

University of Strathclyde  
Department of Marketing

Alliances and acquisitions: the  
selection process in the civil airline  
industry

Alessandro Signorini

A thesis presented in fulfilment of the requirements for the degree  
of Doctor of Philosophy

2012

This thesis is the result of the author's original research. It has been composed by the author and has not been previously submitted for examination which has led to the award of a degree.

The copyright of this thesis belongs to the author under the terms of the United Kingdom Copyright Acts as qualified by University of Strathclyde Regulation 3.50. Due acknowledgement must always be made of the use of any material contained in, or derived from, this thesis.'

Signed:

Date:

## **Abstract**

This research sets to determine how alliances and acquisitions relate to each other and to evaluate how and why organisation decision makers choose.

Transaction Cost Economics theory and the Resource-Based View confirm that acquisitions and alliances are evaluated concurrently when acquiring assets and capabilities where contracts and internal investments are not feasible and efficient. However, alliances and acquisitions relate only to a small number of studies. The literature suggests that alliances and acquisitions are appropriate in their separate contexts and offers no clear guidelines to decision makers when choosing between the two.

The decision making variables are observed in the civil airline industry. The research design focuses on airlines that look for external routes and choose between codeshare alliances and acquisitions. In codesharing, airlines sell part of their flight services to alliance partners on certain routes.

Three case studies have been included in this study, namely Alitalia SpA, Continental Ltd., and Easyjet Ltd.

This study concludes that acquisitions deliver superior economic advantages over codesharing, with no interference from airline regulation authorities, although the difference between acquisition and codesharing advantages is usually limited. Acquisitions provide evident benefits compared to codesharing only where airlines require to streamline major sections of the route network. Acquisitions are also subject to significant ex-ante and ex-post costs that are higher than codesharing costs, therefore, acquisitions are usually favoured over codesharing for strategic and competitive reasons, specifically rapid market expansion and control of feeding traffic into international hubs.

In conclusion, the choice depends on the business model that carriers adopt. Network carriers commonly prefer alliances over acquisitions because they achieve significant network economies, but are more sensitive to organisational diseconomies when merging their operations. Conversely, low-fare carriers prefer acquisitions over alliances because they seek rapid market growth and are less exposed to organisation diseconomies.

Key words: Strategic Alliances, Acquisitions, Mergers and Acquisitions (M&A), Airline industry, Airlines, Alitalia, Easyjet, Continental

## Acknowledgements

The period I spent accomplishing this Research has been without any doubt extraordinary and greatly rewarding. And this is not only for the invaluable learning experience I went through but also for all the people I met without whom it would have been so difficult to complete this Thesis.

First of all, my deepest gratitude goes to Professor Stanley Paliwoda, my Research Supervisor, for his punctual and effective guidance and his commitment and dedication to my Thesis. His critical approach and his constructive criticism has always motivated me to do my best at any stage of my Research. I feel honoured to have had him as my Supervisor and I am aware that his help has been essential for this Research. I am also grateful to Professor Stephen Tagg, my second Supervisor, for his comments and suggestions.

Profuse thanks to all the people that actively cooperated to this Study, in particular the members of staff of Alitalia, Continental, and Easyjet.

I am also deeply indebted to Dean Mary Merva and Professor Susan Fuller for their assistance and support during my three years in John Cabot University. They have believed in me and helped me in good and difficult moments, their trust in my accomplishments have been so important in my work.

Then, I would like to thank all my friends, Andrea and Dawn, who I consider my second family, Mike and Laura and their “inbred dreams”, Claudio “Sgagna” Segagni and our never-ending chats on Skype, Stefano Faiella and still his abduction theories, Professor Giorgio Fazio and his great advices, “Marione” Cerciello and his

guidance and support at difficult times, “Enricone” Iapoce and his friendship despite my bad temper, my French mate Yoann and our wonderful period in Barcelona, mi pareja de hecho Francesca Cunico, Alessio Bellini, my oldest friend, Luciaccio and his wonderful bass, Martina Benetti and her “birette”, Nicholas Heath and his wonderful accent. You have been my light in moments of dark, you have been my joy, all of you have been always wonderful with me.

A special thought goes to Arianna, thank you so much for just being in my life with your endless love and encouragement, you have always been on my side, I have no words to express how important you have been for me in these years.

Finally, I would like to dedicate this Thesis to my family, my mother Fiorenza, my brother Luca, and my aunt Dolores. And most of all, to my father Guido, who I miss every day, I miss every moment. This Thesis is especially for you, I will always carry your love and care with me..

## Table of Contents

|  |           |
|--|-----------|
| Abstract.....  | iii       |
| Acknowledgments.....                                 | v         |
| List of Tables.....                                  | xviii     |
| <br>   |           |
| <b>Chapter 1. Introduction.....</b>                  | <b>1</b>  |
| 1. Introduction.....                                 | 2         |
| 2. Purpose and Objectives of the Research.....       | 5         |
| 3. Research Strategy.....                            | 7         |
| 4. Utility and Significance of the Research.....     | 9         |
| 5. Organisation of the Thesis.....                   | 10        |
| <br>   |           |
| <b>Chapter 2. Strategic Alliances.....</b>           | <b>13</b> |
| Introduction.....                                    | 14        |
| 1. Definition of Strategic Alliances.....            | 18        |
| 2. Major Theories in Strategic Alliances.....        | 19        |
| 2.1 Transaction Cost Economics Theory.....           | 19        |
| 2.2 Resource Dependence Theory.....                  | 21        |
| 2.3 Other Theoretical Approaches.....                | 23        |
| 3. Types of Cooperative Arrangements.....            | 25        |
| 4. Alliance Rationale.....                           | 29        |
| 5. Learning in Alliances.....                        | 37        |
| 5.1 Alliances as Learning Mechanisms.....            | 37        |
| 5.2 Learning from Previous Alliance Experiences..... | 41        |

|     |   |    |
|-----|---|----|
| 6.  | Governance Structure and Relational Issues..... | 43 |
| 6.1 | Trust.....                                      | 45 |
| 6.2 | Commitment.....                                 | 47 |
| 6.3 | Understanding.....                              | 48 |
| 6.4 | Conflict Resolution.....                        | 49 |
| 7.  | Networks.....                                   | 50 |
| 8.  | Alliance Life-Cycle.....                        | 54 |
| 9.  | Alliance Formation.....                         | 56 |
| 10. | Negotiation.....                                | 58 |
| 11. | Alliance Management.....                        | 60 |
| 12. | Alliance Instability.....                       | 62 |
| 13. | Alliance Performances.....                      | 66 |
|     | Summary.....                                    | 68 |

|  |           |
|--|-----------|
| <b>Chapter 3. Choosing between Alliances and Acquisitions..</b>        | <b>69</b> |
| Introduction.....  | 70        |
| 1. Acquisitions and Alliances as Alternative Organisational Forms..... | 73        |
| 2. Drawbacks to Acquisitions.....                                      | 75        |
| 2.1 Ex-ante Costs.....   | 75        |
| 2.2 Ex-post Costs.....   | 77        |
| 2.3 Regulatory Issues.....   | 80        |
| 3. Favouring Alliances to Acquisitions.....                            | 81        |
| 3.1 Cost Reductions.....   | 81        |
| 3.2 Regulatory Issues.....   | 84        |
| 3.3 Alliance Implementation.....                                       | 84        |
| 4. Factors with Alternative Forms.....                                 | 85        |
| 4.1 Industry Factors.....  | 85        |
| 4.2 Organisation Factors.....  | 88        |
| 5. The Integration Process.....  | 94        |
| 6. Equity Links in Alliances.....                                      | 99        |
| Summary.....   | 101       |

|   |            |
|---|------------|
| <b>Chapter 4. The Airline Industry.....</b>               | <b>102</b> |
| Introduction.....   | 103        |
| 1. Definition and Market Features.....                    | 106        |
| 1.1 Definition of the Industry.....                       | 106        |
| 1.2 Market Situation.....                                 | 107        |
| 2. Economic Characteristics.....                          | 111        |
| 3. Regulation/Deregulation.....                           | 114        |
| 3.1 Regulation.....                                       | 114        |
| 3.2 Deregulation.....                                     | 115        |
| 3.3 Privatisation.....                                    | 119        |
| 4. Costs.....   | 120        |
| 4.1 Cost Characteristics.....                             | 120        |
| 4.2 Major Airline Costs.....                              | 121        |
| 5. Marketing.....   | 124        |
| 5.1 Segmentation.....                                     | 124        |
| 5.2 Frequent Flier Programmes.....                        | 125        |
| 6. Distribution System.....                               | 128        |
| 6.1 Computer Reservation Systems and Travel Agencies..... | 128        |
| 6.2 Website Distribution Providers.....                   | 130        |
| 7. Technological Trends and Threats.....                  | 133        |
| 7.1 Aircraft Manufacturing Industry.....                  | 133        |
| 7.2 Airports.....   | 135        |
| 7.3 Surface Transports.....                               | 137        |

|    |                                     |     |
|----|-------------------------------------|-----|
| 8. | Business Models.....                | 138 |
|    | 8.1 Network Carriers.....           | 138 |
|    | 8.2 Low-Fare Carriers.....          | 140 |
|    | 8.3 Niche Carriers.....             | 143 |
|    | 8.4 Innovative Business Models..... | 144 |
|    | Summary.....                        | 146 |

**Chapter 5. Strategic Alliances and Acquisitions in the  
Airline Industry.....** 147

|    |   |     |
|----|---|-----|
|    | Introduction.....                             | 148 |
| 1. | Relational Modes in the Airline Industry..... | 152 |
|    | 1.1 Sharing the Route Networks.....           | 153 |
|    | 1.2 Joint Purchasing.....                     | 156 |
|    | 1.3 Joint Services and Activities.....        | 157 |
|    | 1.4 Sharing the Brand Image.....              | 158 |
|    | 1.5 Marketing and Loyalty Schemes.....        | 159 |
|    | 1.6 Vertical/External Alliances.....          | 160 |
|    | 1.7 From Revenue to Cost Functions.....       | 161 |
| 2. | Regulation in Airline Alliances.....          | 162 |
| 3. | Airline/Alliance Rationale.....               | 165 |
|    | 3.1 Economic Reasons.....                     | 165 |
|    | 3.2 Strategic Reasons.....                    | 167 |
|    | 3.3 Business Models.....                      | 170 |
| 4. | Drawbacks in Airline Alliances.....           | 173 |
| 5. | Alliance Constellations.....                  | 175 |
| 6. | Minority Equity Alliances.....                | 178 |

|     |   |     |
|-----|---|-----|
| 7.  | Effects of Alliances.....   | 180 |
| 8.  | Issues in Alliance Management.....  | 186 |
|     | 8.1 Cargo.....  | 186 |
|     | 8.2 Information Technology (IT).....                                      | 187 |
|     | 8.3 Safety Issues.....  | 188 |
| 9.  | Acquisitions in the Airline Industry.....                                 | 189 |
| 10. | Acquisition Rationale.....  | 193 |
|     | 10.1 Economic Reasons.....  | 193 |
|     | 10.2 Strategic Reasons.....   | 194 |
| 11. | Drawbacks to Acquisitions.....  | 196 |
| 12. | Studies Relating to Acquisitions and Alliances in the Airline Industry... | 199 |
|     | Summary.....  | 201 |

|  |     |
|--|-----|
| <b>Chapter 6. Methodology</b> .....                  | 202 |
| Introduction.....                                    | 203 |
| 1. Research Design.....                              | 206 |
| 1.1 Complementary Routes.....                        | 210 |
| 1.2 Parallel Routes.....                             | 214 |
| 1.3 Overall Network.....                             | 216 |
| 2. Research Framework.....                           | 218 |
| 3. Selecting Qualitative Methods.....                | 219 |
| 4. Case Studies as Research Method.....              | 222 |
| 4.1 Selecting Case Studies.....                      | 222 |
| 4.2 Features of Case Studies.....                    | 223 |
| 4.3 Role of the Theory.....                          | 224 |
| 4.4 Single and Multiple Case Studies.....            | 225 |
| 4.5 Data Sources in Case Studies.....                | 227 |
| 5. Data Collection .....                             | 229 |
| 5.1 Selecting Potential Units for Cases.....         | 230 |
| 5.2 Getting Operational Access.....                  | 232 |
| 5.3 Choosing Specific Units and Collecting Data..... | 232 |
| 6. Research Limitations.....                         | 241 |
| 7. Data Analysis and Interpretation.....             | 243 |
| 7.1 Empirical Pattern of Variables.....              | 244 |
| Summary.....   | 245 |

|  |            |
|--|------------|
| <b>Chapter 7. Alitalia SpA Case.....</b>     | <b>247</b> |
| Introduction.....                            | 248        |
| Methodological Remarks.....                  | 250        |
| 1. Company Context.....                      | 253        |
| 1.1 Brief History.....                       | 253        |
| 1.2 Corporate Performance .....              | 253        |
| 1.3 Corporate Strategy.....                  | 257        |
| 2. Alitalia Strategic Relationships.....     | 261        |
| 2.1 Air France – Alitalia.....               | 261        |
| Summary.....                                 | 288        |
| <br>   |            |
| <b>Chapter 8. Continental Ltd. Case.....</b> | <b>291</b> |
| Introduction.....                            | 292        |
| Methodological Remarks.....                  | 293        |
| 1. Company Context.....                      | 295        |
| 1.1 Brief History.....                       | 295        |
| 1.2 Corporate Performance.....               | 296        |
| 1.3 Corporate Strategy.....                  | 297        |
| 2. Continental Strategic Relationships.....  | 300        |
| 2.1 United Airways – Continental.....        | 301        |
| Summary.....                                 | 324        |

|  |            |
|--|------------|
| <b>Chapter 9. Easyjet Ltd. Case.....</b> | <b>327</b> |
| Introduction.....                        | 328        |
| Methodological Remarks.....              | 330        |
| 1. Company Context.....                  | 332        |
| 1.1 Brief History.....                   | 333        |
| 1.2 Corporate Performance.....           | 332        |
| 1.3 Corporate Strategy.....              | 334        |
| 2. Easyjet Strategic Relationships.....  | 345        |
| 2.1 Easyjet – Go.....                    | 345        |
| 2.2 Easyjet – GB Airways.....            | 361        |
| Summary.....                             | 365        |

|   |            |
|---|------------|
| <b>Chapter 10. Conclusions.....</b>                               | <b>368</b> |
| Introduction.....   | 369        |
| 1. Research Results in the Airline Context.....                   | 372        |
| 1.1 Codesharing Benefits and Costs.....                           | 372        |
| 1.2 Acquisition Benefits and Costs .....                          | 380        |
| 1.3 Decision Process between Codesharing and Acquisitions.....    | 395        |
| 1.4 Business Models.....  | 399        |
| 2. Implications for the Literature.....                           | 403        |
| 2.1 Industrial Level.....   | 404        |
| 2.2 Organisation Level.....                                       | 405        |
| 2.3 The Evolutionary Process and Equity Exchanges.....            | 408        |
| 2.4 Contributions to Scholarly Studies on Alliances.....          | 411        |
| 2.5 Contributions to Scholarly Studies on Acquisitions.....       | 414        |
| 3. Links to the Literature.....                                   | 418        |
| 4. Areas for Further Research.....                                | 422        |
| 5. Research Implications.....                                     | 426        |
| 5.1 Implications for National and Extra-National Authorities..... | 426        |
| 5.2 Implications for Practitioners.....                           | 428        |
| 6. Suggestions for Practitioners.....                             | 428        |
| Summary.....  | 434        |

|  |     |
|--|-----|
| References.....  | 436 |
| Appendix 1 Example of a Contact Letter.....            | 562 |
| Appendix 2 Example of a Confidentiality Agreement..... | 565 |
| Appendix 3 Interview Checklist.....                    | 567 |
| Appendix 4 Coding Framework.....                       | 571 |

## List of Tables

|            |                                     |     |
|------------|-------------------------------------|-----|
| Table 2.1  | Detailed reasons for alliances..... | 36  |
| Table 6.1  | Codeshare’s Key Factors.....        | 216 |
| Table 6.2  | Acquisition’s Key Factors.....      | 217 |
| Table 6.3  | List of Interviews.....             | 240 |
| Table 10.1 | Codeshare’s Key Factors.....        | 395 |
| Table 10.2 | Acquisition’s Key Factors.....      | 397 |

# **CHAPTER 1**

## **Introduction**

## 1.1. INTRODUCTION

Alliances shape industries and influence the strategies of organisations. Academic studies have carefully followed the evolution of alliances, and an extensive body of research has focused on different aspects of cooperation. Scholars have applied contrasting theoretical approaches to alliances, and provided different explanations for the cooperation of organisations. Academic literature has concentrated in particular on high-technology sectors, where alliances have contributed significantly to mutual exchanges of new technologies (Letterie et al., 2008).

According to the Transaction Cost Economics theory, also known as Transaction Cost Analysis (Williamson, 1979, 1981, 1985, 1991), companies combine their assets and capabilities in order to improve their relative efficiency. Companies employ different mechanisms to acquire their assets and capabilities. Companies may use contracts to secure their required assets, however, contracts can be exposed to opportunistic behaviour and continual bargaining if the environmental conditions change and quality and technical standards cannot be specified in advance (Balakrishnan and Koza, 1993). Alternatively, companies can develop their required assets internally; nevertheless, internal development can be less efficient if assets can be shared at low marginal costs (Hennart, 1988). Both alliances and acquisitions can minimise transaction and production costs in securing complementary assets whenever contracts and internal development are not efficient alternatives (Hennart, 1988). The Resource-Based approach (Rumelt, 1984; Wernerfelt, 1984) outlines how the internal resources in organisations determine their competitive advantages. Organisations can employ exchanges to obtain the resources from the market, however, assets in some cases are inextricably combined or embedded in external organisations (Chi, 1994). In this case, only alliances or acquisitions allow the acquisition of the resources that are valuable for organisations (Garette and Dussauge, 2000). Hence, the two theories confirm that organisations evaluate both

alliances and acquisitions when acquiring complementary assets and capabilities, if contracts and internal investments are not feasible or efficient (Wang and Zajac, 2007; Garette and Dussauge, 2000; Hennart, 1988).

However, academic research relates to acquisitions and alliances only in a small number of studies (Wiklund and Shepherd, 2009; Datta et al., 2009; Hennart and Reddy, 1997), and concentrates on alliance integration (Oxley et al., 2009; Chang et al., 2008; Reuer and Zollo, 2005; Bierly and Coombs, 2004; Hagedoorn and Sadowsky, 1999), or minority equity exchanges (Dalziel, 2009; Kale and Singh, 2009; Dushnitsky and Shaver, 2009; Filson and Morales, 2004; Allen and Phillips, 2000). Acquisitions are in most cases excluded by studies on alliances because acquisitions and alliances are difficult to include in one theoretical framework and evaluate in one statistical sample. Acquisitions have indeed different characteristics from alliances (Wiklund and Shepherd, 2009; Hennart and Reddy, 1997). Furthermore, acquisitions are marginally examined in high-tech sectors, where studies on alliances are directed, because acquisitions are considered ineffective in mutual learning processes and exchanges in new technologies. Nonetheless, Inkpen et al. (2000) confirm that acquisitions are successfully employed in technology exchanges.

Further research is therefore necessary to evaluate how alliances and acquisitions relate. Academic studies present no comprehensive theoretical framework when organisations are required to obtain specific assets by acquisitions or alliances. Previous studies point out that alliances (Li et al., 2008; Reuer and Zollo, 2005; Khanna et al., 1999; Drago, 1997) and acquisitions (Gartner and Schmutzler, 2009; Dushnitsky and Shaver, 2009; Pekar and Margulis, 2003; Ashkenas and Francis, 2000; Hennart and Reddy, 2000; Reuer, 1999; Chi, 1994) are exposed to different disadvantages and risks, and organisations are required to carefully compare benefits and costs before selecting acquisitions or alliances. Moreover, the literature (Wiklund and Shepherd, 2009; Datta et al., 2009; Wang and Zajac, 2007; Hagedoorn and Duysters, 2002; Vanhaverbeke et al., 2002; Garette and Dussauge, 2000; Hoffmann and Schaper-Rinkel, 2001) suggests factors and recommendations in

choosing acquisitions and alliances, but no clear guidelines are given to decision makers, who often rely on subjective evaluations. Alliances and acquisitions can be considered as dissimilar but interrelated organisational forms, which appear to be appropriate in separate contexts and for different assets.

Alliances and acquisitions are observed in one industry, where decision making variables are monitored. The civil airline industry has been chosen, because alliances over the 1990s and 2000s registered record growth in terms of both airlines and resources involved (Airline Business, 2010 c.; Airline Business, 2007 b.). Acquisitions are less significant; nevertheless, they are set to extensively develop in the long-term (Airline Business, 2010 c.). Moreover, the civil airline industry is subject to strict regulation (Goeteyn, 2005), hence this study can contribute to evaluating how regulatory issues influence the organisational structure and interfere with economic factors in decision making. In conclusion, technological developments are external in the civil airline industry, because they stem from the aviation manufacturing industry (Sparaco, 2010). Therefore, the impact of exogenous technology on decision making can be evaluated in this study.

## **1.2. PURPOSE AND OBJECTIVES OF THE RESEARCH**

The primary purpose of this research is to determine how alliances and acquisitions relate in the airline industry and evaluate how and why airline decision makers ultimately choose one form over the other. The following research objectives were set in relation to the research aims:

1. To identify and examine the economic and strategic factors that are associated with alliances in the airline industry
2. To identify and examine the economic and strategic factors that are associated with acquisitions in the airline industry
3. To evaluate the decision process of the airlines when choosing between alliances and acquisitions according to the identified factors
4. To relate and compare the factors that emerge in the airline decision process with the factors that scholarly studies identify for organisations when choosing between alliances and acquisitions
5. To explore the integration process and the equity minority links in the airline industry and relate them to scholarly studies on alternative modes of governance
6. To make a contribution to scholarly studies on alliances and acquisitions
7. To offer innovative perspectives and critically evaluate the main theoretical assumptions on the organisational forms of governance, primarily Transaction Cost Economics theory and the Resource-Based theory

The research objectives prompt the following research questions:

1. What are the economic and strategic factors that airlines associate with alliances?
2. What are the economic and strategic factors that airlines associate with acquisitions?
3. How do airline decision makers evaluate alliances and acquisitions in a determined period of time, given the identified factors?
4. How do the factors in the airline decision process relate to the factors that scholars identify for organisations selecting their preferred modes of governance?
5. How do the alliances evolve and how are the minority equity links employed in the airline industry?
6. How can the results from this research contribute to scholarly studies on alliances and acquisitions?
7. What are the innovative insights that this research can offer to the main theoretical approaches on alternative forms of governance? Does this research validate the research assumptions of the main theories on the alternative forms of governance?

The research question will contribute answering the grand tour question:

How and why do decision makers choose between alliances and acquisitions in the civil airline industry?

### 1.3. RESEARCH STRATEGY

Carriers look for a specific volume and combination of traffic over a given period of time in order to achieve their strategic objectives. Carriers design their route networks on the basis of their traffic targets. Airlines incur high losses if they do not reach their traffic targets because they are unable to cover their average high fixed costs with traffic revenues (Toh and Raven, 2003). Carriers at first set capacity and frequency on their existing routes, then they look for additional routes if traffic targets cannot be achieved. Routes can be added either by attaching routes of external carriers or by developing new routes. Nonetheless, internal development is in general impractical due to slot regulation issues and high marginal costs (Moore, 2009; Chang and Williams, 2002), hence airlines seek external routes either by codesharing or acquisitions. In the following research, codesharing will exclusively involve agreements with extensive scope, where airlines are most likely to evaluate either codesharing or acquisitions.

This research design is strictly associated with the main theoretical inquiry. According to Transaction Cost Economic theory, airlines would look for additional routes in order to build their most efficient structure. Contracts are generally not feasible because seat requirements cannot be specified in the long term and depend on exclusive airline strategies (Hassin and Shy, 2004), thus carriers will be exposed to opportunistic behaviour and continuous bargaining. Internal development is not efficient because carriers can share traffic at lower marginal price. As a result, codesharing and acquisitions will ensure additional routes at minimal transaction and production costs.

As for Resource-Based theory, carriers search for routes as essential resources for achieving competitive advantages. Routes are embedded in airline networks, hence market exchanges cannot be applied because routes cannot be separated by their

network (Park and Zhang, 1998). For regulatory reasons, routes cannot be internally developed by airlines, or they are available only with significant investments (Moore, 2009; Chang and Williams, 2002). Acquisitions and codesharing are therefore crucial for achieving airline competitive advantages.

A qualitative method is employed in this study. Qualitative methods resolve the difficulties in including alliances and acquisitions in one statistical sample. Also, variables in the research design are to a large extent exploratory, hence problematic to quantitatively define at the beginning of the study. Qualitative analysis is also effective in understanding the context – the airline industry – where alliances and acquisitions are established (Creswell, 1994, 1997). In conclusion, a qualitative approach serves to further investigate the subjective and political motives that play an important role in the airline industry (Easterby-Smith et al., 2002).

Among the various research methods, case studies were selected since the central question is concerned with “how” and “why”, contemporary events are explored, and the area of control is non-existent (Yin, 1994, 2002). Three case studies have been applied in this study to obtain more compelling and reliable results (Stake, 2005).

In detail, the three cases are:

- a) Alitalia S.p.A.
- b) Continental Ltd.
- c) Easyjet Ltd.

Embedded case studies have been chosen in this study. Embedded case studies detect unpredictable modifications in the phenomenon under investigation, and offer broader data evidence (Stake, 2005). The airlines in the three cases set up alliances and acquisitions, which are assessed as sub-units of analysis. Sub-units offer the opportunity to recognise unexpected changes during data collection and analysis (Stake, 2005).

## **1.4. UTILITY AND SIGNIFICANCE OF THE RESEARCH**

The following study contributes to the building of a theoretical framework where alliances and acquisitions are correlated, when organisations look for external assets and capabilities. The research also contributes to the identification of how regulation and deregulation can influence the internal industrial structure, because evidence is collected in the highly regulated airline industry. Moreover, the effects of external technological trends can be measured in this research. Numerous academic studies on alliances focus on high-technology industries, nonetheless, technology changes in the civil airline industry originate exogenously from the aviation manufacturing industry. Research findings can be extended to industries, such as the telecommunication industry, where network economies play a significant role when decision makers evaluate alliances or acquisitions. The study is also methodologically original, since it provides in-depth insight into current business practices in three different qualitative cases.

The following research is relevant to three different subjects, namely national and international airline bodies, airline practitioners, and academics. This study provides important suggestions to airline bodies on how to set future regulation in the airline industry. Regulation influences the organisational structure in the airline industry, because it interferes with economic factors in decision making when carriers choose their appropriate route networks. Hence, if the airline industry is deregulated, airline companies will evaluate the factors that are emphasised in this research. Consolidation levels in the industry will indeed depend on the relative benefits and costs for alliances and acquisitions in a deregulated environment. Nonetheless, if regulation impedes acquisitions or increases costs in acquisitions, the level of consolidation will be artificially lower and total network economies will be below the optimum level.

Alliances and acquisitions are effective in different circumstances, however, airline practitioners have no consistent guidelines when selecting alliances or acquisitions, and often base their decisions on subjective evaluations. The research points out the factors that practitioners need to evaluate in their decision process. In conclusion, academics are given relevant suggestions on how to develop research on strategic relationships between organisations.

## **1.5. ORGANISATION OF THE THESIS**

Chapters in this thesis are organised as follows:

Chapter 2 will review the literature on strategic alliances and will introduce the different theoretical approaches on alliance agreements between organisations. The rationale for alliances will be explored, along with the relational factors in alliances. Alliance performance and instability will be evaluated during the alliance life-cycle. The learning process between alliance partners and network theories will conclude the literature review.

Chapter 3 will summarise the main academic studies that investigate the choice between alliances and acquisitions. Transaction Cost Economics and Resource-Based theories will be compared, where alliances and acquisitions emerge as alternative forms of governance under specific circumstances. Benefits and drawbacks related to acquisitions and alliances will be defined in order to compare both organisational forms. No definitive framework in the literature supports decision makers in choosing between alliances and acquisitions. In conclusion, this chapter will analyse intermediate forms of governance, i.e. alliances with minority links and alliances evolving into full acquisitions.

Chapter 4 will describe the industrial context – the civil airline industry – where alliances and acquisitions are related. Main concepts in aviation economics will be introduced first, followed by recent economic trends in the airline industry. Subsequently, regulation issues, which restrain airline decision making, will be

outlined. The airline management implements different strategies and models in order to gain differential advantages and to control costs and demand.

Chapter 5 will examine the academic research on strategic alliances and acquisitions in the airline industry. The impact of regulation on alliances and acquisitions will be investigated, followed by the rationale for establishing alliances or acquisitions. Business models appear to influence airline decisions, because network carriers favour alliances, whereas low-fare carriers choose acquisitions in order to expand their routes. Drawbacks for alliances and acquisitions will then be evaluated as components of airline decision making. To conclude, alliance constellations and minority links between carriers will be analysed, given that they can influence relationships between carriers.

Chapter 6 will define the research design for this study, which guides the analysis for the empirical research. The research design will underline the factors that are evaluated by decision makers in choosing between strategic alliances and acquisitions. Research will be limited to a framework where alliances and acquisitions are not influenced by regulation. Additionally, the research methodology will be selected for this study among qualitative and quantitative methods. Case studies will be chosen among qualitative research methodologies. The sources of evidence in field-work as well as procedures for collecting and analysing empirical data will conclude this chapter.

Chapters 7, 8, and 9 will encompass the three case studies where empirical data are collected and analysed. Case studies will be presented in the following order: Chapter 7 – Alitalia SpA; Chapter 8 – Continental Ltd.; and Chapter 9 – Easyjet Ltd. Case studies will first describe the airline financial performances and strategies, followed by the key strategic relationships selected as case sub-units. The airline performances and strategies will be reviewed over the period when the strategic relationships are established. The sub-units will evaluate airline decision making processes in selecting alliances or acquisitions. The first two cases will involve two network carriers in the European and American contexts, whereas the third case will analyse one carrier which employs the low-fare business model.

Chapter 10 will outline the findings in this study. Conclusions and implications for academic literature will be summarised, followed by propositions for further research in the field. Research implications and suggestions for airline policy makers and practitioners will also be examined.

## **CHAPTER 2**

### **Strategic Alliances**

## INTRODUCTION

Strategic alliances significantly change the organisational framework and the relationships between organisations as organisations cooperate in numerous operational areas and competitive and collaborative strategies become interrelated. Organisations establish connections of relationships through alliances and their strategies increasingly reflect their positioning in their network of relationships. Since the 1980s, strategic alliances have experienced an unprecedented growth in terms of scale and intensity. Alliances have also entailed more complex agreements and have involved more far-reaching objectives. Alliances have become a key feature for most industries and are a major determinant in the economic structure.

However, one theoretical structure for alliances is to be found in academic studies, and practitioners have no clear guidelines for managing alliances. Organisations continuously look for effective governance forms in an effort to control environmental and competitive constraints. Nevertheless, alliance objectives are difficult to achieve, and empirical evidence confirms that between 30 and 70 percent of strategic alliances fail (Reuer, 1999). Therefore, practitioners are constantly required to carefully evaluate challenges and problems that emerge during the complex alliance life-cycle.

This Chapter will attempt to summarise the existing academic studies on alliances and introduce the different research approaches to strategic partnerships. This Chapter encompasses thirteen Sections.

Section One seeks to define strategic alliances and describe how alliances have developed in different industries. No consensual definition emerges in academic research; notwithstanding, alliances comprise any form of governance that falls between pure market transactions and acquisition.

Section Two summarises the main theories that give structure to the theoretical foundations of alliances. Research applies diverse theoretical approaches to alliances,

however, no consolidated theoretical framework emerges and different theories contribute to explaining the rationale for and specific features found in alliances.

Section Three attempts to classify the various forms of alliances that emerge in the industrial context. Alliances are established with dissimilar levels of formalization and integration, and organisations apply various formulae and mechanisms for managing their relationships. Alliances are classified according to inter-organisational dependence, forms of governance, and industrial and functional variables.

Section Four summarises the factors that contribute to explaining the rationale behind the alliance implementation. Industrial trends influence organisations when establishing alliances, however, organisational motives also shape the alliance formation.

Section Five focuses on the learning process and knowledge exchanges that occur in alliances. Alliances are effective mechanisms for supporting learning between organisations and are associated with knowledge acquisition and conversion. Knowledge exchanges in alliances primarily refer to technological capabilities. The learning process can also be applied to alliances, where organisations learn from previous alliances and apply their knowledge to future alliances.

Section Six defines the mechanisms that structure the relationships in alliances. Alliances are shaped by third-party enforcing agreements and self-enforcing agreements. Third-party agreements comprise formal contracts, whereas self-enforcing agreements are further divided into formal and informal safeguards. Formal safeguards consist of economic hostages in alliances, which are constituted by either stock exchanges between parties or specific investments for the alliance, whereas informal safeguards are constituted by social context factors, primarily trust, commitment, understanding, and conflict resolution.

Section Seven outlines how network theories are applied to the alliance research area. Network links between business units influence the dyadic exchanges in alliances because they facilitate the flow of information between network members and reduce both the risks of opportunistic behaviour and the search costs for partners. Nevertheless, organisations can experience increased complexity in decision making and reduced strategic autonomy when they join networks.

Section Eight summarises the evolutionary stages in the alliance life-cycle. Objectives and features in alliances appear to develop at different phases, and key alliance stages emerge in academic research. However, alliances evolve in a non-linear manner and boundaries between the different stages cannot be accurately defined.

Section Nine highlights the criteria for selecting alliance partners as well as the attributes which organisations should seek in their partners in order to reduce risks and future conflicts in alliances. Partners should possess complementary competencies and resources as well as corresponding strategic objectives. In addition, organisations should choose partners with cultural symmetry, which implies symmetry in organisational values and the possession of a positive attitude towards alliances.

Section Ten summarises the negotiation process in establishing an alliance, where partners define the structure and organisation for the future alliance. Game theory recommends accomplishing the negotiation process as a zero-sum game, where partners are willing to disregard their own interests in favour of the alliance. Nonetheless, this condition is difficult to achieve in practice because not all partners are willing to embrace this from the outset. In order to improve the likelihood for the future success of the alliance, specific teams should follow the negotiation process and define procedures and initial investments in alliances. In addition, formal contracts should summarize conditions for the alliance at the end of the negotiation process.

Section Eleven focuses on the management of the alliance in its mature form and will emphasise the role of the alliance manager. Organisational incompatibilities and contrasting objectives in the later stages need to be managed, and in some cases, organisations internally appoint an alliance manager in order to coordinate the alliance. The alliance manager can be assisted by alliance teams as part of their organisational structure.

Section Twelve focuses on alliance instability, which influences the alliance outcomes and governance structure. Changes in relationship status and governance structure can result in positive outcomes if they are planned by both partners.

Otherwise, unplanned changes can negatively influence alliance benefits and cause the alliance to collapse. Reasons for a high rate of failure and premature terminations of alliances will also be evaluated.

Section Thirteen outlines the different methods that are used to evaluate alliance performances. Scholars at first used financial indicators in order to measure performance. Subsequently, research focused on objective measures, such as alliance survival rates and instability, as well as subjective evaluations, such as managerial perceptions. In conclusion, a combination of approaches is proposed because both objective and subjective indicators share significant disadvantages.

## 2.1. DEFINITION OF STRATEGIC ALLIANCES

The strategic alliance is an umbrella term (Reuer, 1999) for a continuum of organizational forms from pure market transactions at one end, to fully integrated organisations at the other (Webster, 1992). Alliances gradually replace the competitive nature of the relationships as organisational exchanges move in the continuum toward integration (Young et al., 1996).

In general terms, a strategic alliance can be defined as an agreement between at least two organisations where:

- a) each organisation maintains legal independence when the alliance is formed (Todeva and Knoke, 2005).
- b) each organisation has goals that are compatible and directly related to the other organisations (Spekman and Sawhney, 1995).
- c) each organisation shares resources and knowledge in a number of strategic areas (Vyas et al., 1995; Spekman et al., 1998).
- d) each organisation expects benefits from the alliance and is prepared to hand over managerial control to the other organisations (Vyas et al., 1995; Todeva and Knoke, 2005).

The term “strategic” is extensively disputed among researchers. According to Sheth and Parvatiyar (1995), strategic alliances involve long-term competitive positions and set out to improve operational efficiency for the partners. Varadarajan and Cunningham (1995) argue that strategic alliances are associated with the “exclusivity” of the partnership because strategic alliances imply the combination of exclusive resources and skills in order to achieve both joint goals and goals that are specific to the single partners. Lorange and Roos (1992) and Lau et al. (2008) point out that being strategic depends on the amount of strategic resources involved in the alliance, rather than on the underlying motives.

## **2.2. MAJOR THEORIES IN STRATEGIC ALLIANCES**

Academic research on alliances encompasses different theoretical approaches that offer contrasting views on both the antecedents of the alliances and the evolution of the relationships between organisations. Transaction Cost Economics Theory and the Resource Dependence Theory, which primarily concern this research, will be analysed first, subsequently, the remaining theoretical foundations on alliances will be summarised and related back to the emerging themes on alliance research.

### **2.2.1 Transaction Cost Economics Theory**

The transaction cost economics approach was first applied to strategic alliances by Williamson (1979, 1981, 1985, 1991). Transaction cost theory assumes that corporate decision makers are primarily concerned with the minimization of transaction costs and production costs. Transaction costs result from activities that are related to business exchanges, whereas production costs stem from coordinating and monitoring in-house activities. Organisations may choose between contracts, which are written agreements with external organisations regulating the use of complementary assets, and hierarchy, which entails the internalisation of the assets from external organisations in the existing organisational structure. Contracts generate transaction costs, whereas hierarchy is related to production costs. Organisations can establish a contract with suppliers, which is negotiated either on a short-term or long-term basis, and secures intermediate products from market transactions. Different issues can, however, preclude organisations from establishing contracts that specify all the future conditions for the market transactions. Balakrishnan and Koza (1993) identify quality specification of intermediate products, uncertainty about the future, and bounded rationality, which is the limited knowledge of the production and managerial processes of the other organisations, as

major sources of problems in contracts. Furthermore, as specified by Klein et al. (1978) and Williamson (1979), assets that are designed exclusively for market transactions can represent a hostage in the ex-post negotiations. Problems in contracts can increase the transaction costs and organisations can either choose to develop the intermediate products internally, or acquire the organisation that produces them. Nevertheless, internal development or acquisition often involves high coordination and monitoring costs and can be affected by cultural and organizational matters (Williamson, 1985). Coordination costs can be caused by the difficulty in combining human assets in productive teams, whereas monitoring costs are related to the difficulty in supervising and controlling the established teams after the integration of the organisations following an acquisition.

As a consequence, strategic alliances can be appropriate in a number of cases because they combine hierarchy and market transaction characteristics. Strategic alliances require contracts, nonetheless, alliance activities are mostly coordinated by relational determinants and the exchanges are partially internalised (Williamson, 1991).

As pointed out by Gulati (2007), strategic alliances are the preferred choice if the transaction costs in business exchanges are intermediate, i.e. the difference between transaction costs and production costs is modest. In this case, transaction costs are insufficient to justify the internalisation of the assets and organisations prefer to keep strategic alliances that combine production and transaction costs. Tsang (1998) underlines the hybrid nature of strategic alliances is, however, no guarantee for relational stability due to the opportunistic behaviour of partners, and the necessary controls in alliances can result in distrust and conflict.

Nevertheless, Ghoshal and Moran (1996) and Yin and Shanley (2008) point out that strategic alliances have unique characteristics and should be separated from markets and hierarchy. Indeed, alliances cannot be viewed as mere substitutes for accomplishing efficient transactions when markets and hierarchy imply high costs because alliances entail advantages and problems that have a distinct and independent institutional logic from the markets and hierarchy.

The application of transaction cost theory to alliances receives scholarly criticism for several reasons. Ghoshal and Moran (1996) and Zajac and Olsen (1993) reason that the transaction cost theory is exclusively relevant to routine situations and static efficiency, whereas Globerman and Nielsen (2007) argue that transaction cost theory neglects both the evolving aspects of alliances and the relational determinants in alliance exchanges. Additionally, Jarillo (1989) points out that alliances between direct competitors allow organisations to lower their costs if transaction costs in alliances are higher than those of transaction through hierarchy.

### **2.2.2. Resource Dependence Theory**

Industrial managerial approaches (Porter, 1985) emphasize the importance of the external competitive environment in evaluating organisational behaviour. Nevertheless, the internal characteristics of the organisations also play a significant role in strategies (Das and Teng, 2000). The resource-dependence theory, also defined as the resource-based theory, seeks to include the internal aspects of organisations in strategy evaluation, and assumes that strategies are associated with accumulated organisational resources (Pfeffer and Salancik, 1978). Wernerfelt (1984) defines organisational resources as “those assets which are tied semi-permanently to the organisation” (pp. 173) and Rumelt (1984) argues that the organisation’s competitive position is determined by a unique collection of resources and relationships.

The resource-dependence theory has been successfully applied to strategic alliances (Lau et al., 2008; Miller and Shamsie, 1996; Amit and Schoemaker, 1993). In the resource view, organisations are unable to obtain the necessary resources to achieve and maintain their competitive advantages (Jarratt, 1998), and therefore employ strategic alliances in order to have access to the other organisation’s resources (Das and Teng, 2000).

Market transactions can be used to obtain the necessary resources, however, efficient market exchanges are in some cases unavailable in spot transactions because resources can be inextricably combined with others, or are embedded in organisations (Chi, 1994). Strategic alliances are thus effective mechanisms to avoid market inefficiencies and achieve the appropriate resources (Lau et al., 2008). Alliances allow the combination of complementary resources between organisations and generate new resources by the synergetic interaction within the partnership. New resources produce advantages in the marketplace for organisations (Wittmann et al., 2009), nonetheless, both complementary and additional resources have to be economically integrated during the alliance life-cycle in order to improve joint outcomes for alliances (Luo, 2008 a.).

Organisations are exposed to increasing levels of risk in alliances because partnership abilities vary significantly among organisations and markets change rapidly (Jarratt, 1998). For this reason, Teece and Pisano (1994) introduced “dynamic capabilities” in alliances, which advise that organisations should focus on the development, rather than exploitation, of organisational resources. However, strategic alliances are constantly exposed to instability because resources can be gradually imitated by partners, particularly in high-tech industries (Yasuda, 2004). The independent development of technologies requires in most cases, an extended period of time, and organisations risk losing significant opportunities if the technology is applied in the market by their competitors. Therefore, organisations can choose to imitate the technology of their alliance partners and autonomously launch the technology in the market causing instability in the alliance relationship (Yasuda, 2004).

The resource-based theory in strategic alliances is subject to numerous criticisms. According to Dyer and Singh (1998), the resource-based theory emphasizes the returns that are based on internal corporate resources and capabilities, nevertheless, it disregards the profits that are the property of the dyad or network (Gulati, 2007). In addition, resource-based theory encourages organisations to protect proprietary knowledge, which is crucial to the achievement of competitive advantages.

Traditional resource-based theory indeed encourages organisations to set up barriers around their assets and capabilities in order to prevent imitation by competitors (Gulati, 2007). Conversely, organisations should focus on sharing resources that maximise synergies and common knowledge (Gulati, 1998). Relational determinants in the alliance will develop over time and will provide a natural barrier to imitation from competitors (Gulati, 2007).

### **2.2.3 Other Theoretical Approaches**

Game theory is defined as a theory of rational decisions in conflict situations (Rapoport, 1974). Game theory is generally employed for predicting the outcomes of a defined social situation where social actors are interrelated. Game theory models involve players or decision makers, and outcomes as results of decisions (Rao and Reddy, 1995).

Game theory can be helpful in evaluating strategic alliances, because competition and cooperation components co-exist in alliances. In this context, strategic alliances represent a zero-sum game, where partners maximise their own payoff by keeping the game stable (Sharma, 1998). Alliances generally fall into N-person cooperative games if binding agreements are allowed during the game (Rao and Reddy, 1995). N-players form a “grand alliance” in the coalition, so that the alliance can achieve no less than N-disjointed coalitions (Skaperdas, 1998).

Game theory is a general static model that is in some cases problematical when applied to alliances, which have significant non-linear characteristics. However, a number of applications in game theory use non-linear dynamic systems and stochastic processes to partially control the model limitations (Rao and Reddy, 1995).

Strategic management theory states that organisations select alliances in order to fulfil their own strategic objectives (Harrigan, 1988 a.). Organisations regard alliances as proactive strategies and identify long-term objectives rather than respond to situational contingencies (Sharma, 1998).

Strategic management theory focuses on the antecedents of alliances, i.e. the strategic motives for establishing alliances as well as the alliance objectives. According to strategic management theory, organisations are inclined to cooperate because they need the alliance to continue in order to achieve their long-term objectives. Rational behaviour is assumed, hence partners will expect the alliance benefits to be shared as a condition for the alliance to exist (Sharma, 1998).

Market theory identifies market positioning as a key component for achieving competitive advantage. According to market theory, strategic alliances are employed to improve the relative competitive position in a particular industry and consequently increase market power (Oburai and Baker, 1999).

Porter (1985) argues that organisations can either bring together similar resources in the value chain or unify different value chain activities when they form alliances, in order to maximise economies of scale or build competitive advantages. Major environmental changes eroded numerous sources of competitive advantage, hence organisations increasingly rely on alliances to improve market positioning, because alliances are difficult to imitate and are particularly effective in achieving competitive advantages (Oburai and Baker, 1999).

Market theory is susceptible to criticism because it lacks any evaluation of the evolution of strategic alliances (Poulymenakou and Prasopoulou, 2004). In some cases, alliances in their early stages set out to improve market positioning, nonetheless, relationships can evolve to incorporate different tasks, such as knowledge exchange or cost savings (George and Farris, 1999).

Relational theory assumes that economic exchanges necessarily involve social exchanges. Social factors play an important role when economic decisions are made, hence economic relationships and exchanges need to include a social dimension (Ouchi, 1979).

Relational theory points out that social context factors can be an important deterrent against opportunistic behaviour with no definite economic incentives (Mellat-Parast and Digman, 2008; Granovetter, 1985). Different authors (Wittmann et al., 2009; Ring and Van de Ven, 1992; Anderson and Narus, 1990) introduce the importance of relational determinants in the evolution and outcomes of alliances. Morgan and Hunt (1994) also design a model where the social factors of “commitment” and “trust” are the mediating variables that influence the business relationship outcomes.

### **2.3. TYPES OF COOPERATIVE ARRANGEMENTS**

Diverse inter-organisational forms emerge in the industrial environment as organisations attempt to avoid market constraints and achieve their strategic objectives. Alliances have different degrees of integration and formalization in the broad array of cooperative typologies (Todeva and Knoke, 2005). Alliances distinctively combine the formulae that are employed to compensate each partner, and implement different mechanisms for controlling and coordinating resources, contributions, and administrative responsibilities (Contractor and Lorange, 1993).

The classification below seeks to organise the different cooperative forms that appear in the academic literature on alliances. Alliances are ranked according to inter-organisational dependence, which is in many cases associated with strategic impact (Pfeffer and Nowak, 1976). Hierarchical relationships are at the bottom of the list, where joint organisational management is applied and no external relationships exist. Market transactions are at the top of the list, where organisations act in accordance

with general market rules and there are no pre-existing obligations of cooperation and coordination among parties:

- 1) *Technical training/start up assistance*: an organisation offers technology and training to other organisations for a fixed fee, and no other links are created (Contractor and Lorange, 1993).
- 2) *Supplier arrangements*: a supplier provides a product to organisations within certain product characteristics, delivering schedules, and fixed prices (Culpan, 1989).
- 3) *Industry standard groups*: members of the same industry agree to adopt determined technical standards in manufacturing and trading (Contractor and Lorange, 1993).
- 4) *Licensing*: an organisation (licensor) sells an intangible asset, such as technology and know-how, to another organisation (licensee) for a certain period of time with defined restrictions and royalties (McCutchen et al., 2008).
- 5) *Franchising*: an organisation (franchiser) gives another organisation (franchisor) the right to use a brand within a geographical area and assists the franchisor in pricing, marketing, and service standards (Todeva and Knoke, 2005). The franchiser is paid in exchange, royalties and mark-ups for the products that it supplies.
- 6) *Cartels*: the main members of an industry agree to control production and/or prices in order to control or limit competition (Contractor and Lorange, 1993).
- 7) *Strategic cooperative arrangements*: organisations establish an alliance network in order to collaborate over key strategic decisions and share outcomes (Gulati, 2007).
- 8) *Research and Development (R&D) consortia*: several organisations form alliances in order to exchange knowledge and share research costs. R&D consortia are typically formed in high-tech industries (McCutchen et al., 2008; Lambe and Spekman, 1997).
- 9) *Cooperatives*: coalition of small organisations where collective resources are jointly combined and coordinated (Contractor and Lorange, 1993).

- 10) *Equity investments*: a direct stock purchase of an organisation in an alliance partner in order to achieve a majority or minority equity holding (Bierly and Coombs, 2004).
- 11) *Joint ventures*: creation of a new, separate organisation whose stock is shared between two or more partners. Each partner expects control and benefits to be allocated jointly. Generally, joint ventures do not imply additional equity investments among partners (Lunnan and Haugland, 2008; Hennart, 1988).

This classification also suggests that the governance structure is related to the outcomes and features of alliances. From this perspective, different studies (Barney, 2010; Das and Teng, 1998) evaluate three distinct forms of governance structure – joint ventures, equity alliances, and non-equity alliances. As outlined by Bierly and Coombs (2004), these forms differ in terms of control, commitment, flexibility, knowledge transfer, and transaction costs.

Non-equity alliances allow flexibility and less commitment, and are preferred for short-term objectives (Hagedoorn and Narula, 1996). Nonetheless, non-equity alliances can be unstable entities because partners have modest disincentive for opportunistic behaviour, because significant alliance-specific investments are not required and long-term interests are difficult to align (Williamson, 1979).

Equity alliances (Chapter 3, section 6) are favoured for long-term objectives and require further commitment from the partners. Equity alliances grant flexibility and less organisational problems compared to joint ventures, given that no separate structure is created (Bierly and Coombs, 2004). Equity alliances are assumed to enhance management control in organisations because of the controlled share (Hagedoorn and Narula, 1996). Consequently, equity ownership is more advantageous when the perceived risks of opportunism are higher than the perceived risks related to the ownership of share in the alliance partner (Oxley, 1997). Globerman and Nielsen (2007) demonstrate that, in international alliances, the risks of opportunism for organisations depend on the relational capital between alliance partners, the political and governance environment, and specific attributes in alliance transactions, particularly complexity and uncertainty. Additionally, Luo (2008 b.)

confirms that equity alliances have a “hostage” effect, because equity ownership supports both procedural justice and fairness among partners as a consequence of repeated long-term transactions. Nonetheless, direct stock exchanges guarantee no formal control on the alliance partners and have no direct effect on knowledge transfer and trust building. Consequently, equity alliances often require other mechanisms in addition to stock exchanges in order to ensure effective alliance management (Hagerdoorn and Narula, 1996).

Joint ventures require specific procedures for task allocation as well as benefit and cost sharing (Contractor and Lorange, 1993). Joint ventures are considered effective governance forms for transferring tacit knowledge, because of the frequent contact between employees in the separate entity (Inkpen, 1996; Hennart, 1988). In addition, joint ventures allow the objectives of alliance partners to be gradually combined, hence opportunistic behaviour is minimized (Li et al., 2008). Nevertheless, joint ventures limit strategic flexibility, because investments in joint ventures can be significant and difficult to redeploy (Contractor and Lorange, 1993). Joint ventures are also exposed to risks of unintended knowledge transfer (Inkpen, 1996).

In addition to governance forms, researchers employ supplementary variables to classify alliances:

- 1) *Intra/inter industry*: alliances that are established between partners of the same industry or different industries (Varadarajan and Cunningham, 1995).
- 2) *Domestic and international*: partners in alliances can belong to the same country or to different countries (McCutchen et al., 2008; Vyas et al., 1995). International alliances were first established for avoiding foreign investment regulation or entry barriers, and were subsequently expanded in developed countries (Chapter 2, section 4) (Nielsen, 2007; Contractor and Lorange, 1992).
- 3) *Functional aspects*: alliances can involve diverse functional areas. Ghemawat and Nalebuff (1990) propose to categorize alliances according to three functional areas – technology (R&D), operations and logistics, marketing.
- 4) *Horizontal/vertical*: alliances can be formed between partners that accomplish the same activity in the value chain – horizontal alliances – or different activities – vertical alliances (Porter, 1985).

## 2.4. ALLIANCE RATIONALE

Research on alliances primarily examines the industry-level factors (Lau et al., 2008; Harrigan, 1988 b.; Eisenhardt and Schoonhoven, 1996) and firm-specific factors (Chen and Tseng, 2005; Hennart, 1988) in order to explain the alliance formation. At an industry-level, scholars identify specific industrial trends that contribute to explain the formation of alliances. Evolution in technology (Lau et al., 2008; Vyas et al., 1995) is directly related to the alliance structure. The growing complexity and cost of technology and investments require contributions from organisations that belong to different industries. Alliances allow the sharing of knowledge and R&D investments between partners in different industries (Oburai and Baker, 1999; Vyas et al., 1995). Technology sharing in alliances enables organisations to gain rapid

access to technologies that require a long time to develop internally and secure existing opportunities in the market place (Vyas et al., 1995).

Rapid access to technologies is a crucial competitive advantage because competition and evolving consumer demand have shortened the product life-cycle in many markets and many industries are affected by high rates of obsolescence and volatility (Lau et al., 2008) (Chapter 2, section 5). Moreover, organisations in some cases look for alliances in order to remain at the cutting edge of technology because R&D investments at the embryonic stage are too large for one organisation to sustain in the long-term (Vyas et al., 1995) (Chapter 2, section 5). In conclusion, alliances contribute to sharing costs and risks in product development and rapidly positioning the products in different markets (Oburai and Baker, 1999). Nevertheless, the importance of technology sharing appears to vary in different types of markets. Indeed, in transitional economies, the technology sharing is less effective because the external markets for the application of the technology are less developed (Lau et al., 2008).

Globalisation also transforms the structure of the markets (Yoshino and Rangan, 1995). Organisations are challenged by increasing global competition in almost every industry, and are required to meet complex consumer demands, where global needs and diverse local requirements are interrelated. Organisations need to take into account different levels of interdependence in the international markets, and continuously look for global scale efficiencies by coordinating functional areas that are located worldwide (Brakman et al., 2006; Chan and Wong, 1994). Alliances offer the opportunity to apply unique capabilities and scale efficiencies in global markets and acquire remaining capabilities from alliance partners (Chen and Tseng, 2005).

Industrial trends and factors contribute to establishing the environmental conditions for the formation of alliances, however, organisations are also driven by specific motives in establishing alliances. Hennart (1988) applies a transaction-cost approach (Chapter 2, section 2.1) and proposes that joint ventures are “devices to bypass inefficient markets for intermediate inputs” (pp. 99). Organisations establish joint

ventures if intermediate markets present market inefficiencies, which are determined by several technological, political, and social factors. Hennart (1988) evaluates inefficiencies in raw material and component markets as well as in distribution. In raw material and component markets, differences in the minimum efficient scale emerge at different stages and switching costs prove to be high. Additionally, risks in pure market transactions can be excessive and long-term contracts are unable to prevent changes in the environment. Joint ventures can effectively solve these problems if the component is specific to the purchaser, otherwise, independent suppliers can be used for standardised parts (Hennart, 1988). Distribution also shows high transaction costs if high economies of scale and scope as well as significant up-front investments occur. In these cases, joint ventures can be efficient options only if transaction costs are significant. Hennart's arguments on joint ventures can be applied to the majority of alliance forms (Heath, 2004).

Strategic alliances can also be interpreted as mechanisms to exchange resources in the form of assets, competencies, and capabilities (Chapter 2, section 2.2). The resources must be indivisible and unavailable in secondary markets, hence organisations are encouraged to form alliances to access the other partners' resources (Dyer and Singh, 1998). Chen and Tseng (2005) identify two types of alliances – exchange alliances and integration alliances. In exchange alliances, partners secure the necessary resources from the other partners and use them independently. In integration alliances, resources are used jointly to accomplish specific functions and fulfil determined objectives. Distinctive resources, which are collectively employed in integration alliances, produce additional advantages compared to the sum of the resources that are employed individually by each partner. Combined resources “are more valuable, rare, and difficult to imitate than they had been before they were combined” (Dyer and Singh, 1998, pp. 359).

In addition, alliances are instrumental in the internationalisation process of an organisation and are employed as modes of entry into specific foreign markets (Anand et al., 2010; Brouthers and Brouthers, 2003; Anderson and Gatignon, 1986). Initially, alliances took the form of equity joint ventures as governance structure (Chapter 3, section 3) between an international company and a local partner in

developing countries (Contractor and Lorange, 1993). International companies sought to comply with foreign investment regulations or avoid entry barriers through alliances, hence the scope of alliances was often limited to unilateral technology exchanges (Contractor and Lorange, 1993). Subsequently, alliances were established between organisations from developed countries and of comparable size and no regulatory restrictions (Nielsen, 2007). Alliances grew in complexity and involved joint activities in different functional areas. Additionally, alliances increased in scale and expanded in many international markets (Reuer, 1999).

Traditionally, research in international business describes the choice of the entry mode in foreign markets in a sequential perspective (Brouthers and Brouthers, 2003; Contractor and Kundu, 1998). The different modes of entry are selected in a continuum of increasing degrees of risk, control, and resource commitment as organisations develop their experience and knowledge in the international business environment (Agarwal and Ramaswami, 1992; Anderson and Gatignon, 1986). The selection process of entry modes depends upon the level of risk that organisations are exposed to. The level of risk increases when organisations commit more resources in the foreign market, hence organisations prefer entry modes that offer more control in order to minimise the level of risk (Anderson and Gatignon, 1986). Control is reinforced by increasing the level of equity in the entry mode (Gatignon and Anderson, 1988), therefore, organisations gradually move from entry modes with no equity and low commitment of resources, such as exports and contracts, to entry modes with majority or full equity and high commitment of resources, such as directly controlled subsidiaries or full acquisitions of local organisations (Meyer et al., 2009). Joint ventures are selected when organisations prefer to have an intermediate level of commitment and control in a foreign market since joint ventures imply a shared equity with the local partner (Chapter 2, section 3) (Contractor and Kundu, 1998). Pla-Barber et al. (2010) suggest that executives in organisations are unable to take into account all the key variables simultaneously when expanding their operations abroad, hence Pla-Barber et al. (2010) propose a simpler hierarchical model that separates decisions on the extent of commitment and decisions on the extent of control. The extent of commitment primarily depends on the uncertainty at a country level in configuring the operations in a specific market,

whereas the extent of control is determined by the uncertainty at a firm level. Alliances allow the organisation to maintain a certain level of flexibility in the foreign market while increasing the predictability of the local partner's behaviour at a firm level (Pla-Barber et al., 2010). Indeed, alliances possess a number of self-enforcing mechanisms (Chapter 2, section 6) that enable the organisation to exercise a certain degree of control over the local partner even with no or minor equity involved (Dyer and Singh, 1998).

Furthermore, alliances are employed when organisations demand local knowledge and competences in the market to which organisations plan to expand their operations (Puck et al., 2009; Javorcik and Saggi, 2010). Local knowledge can be defined as the combination of knowledge of the regulatory system, local customers, general economic and political framework, and the business culture (Beamish and Inkpen, 1995; Inkpen and Beamish, 1997). As mentioned before, Hennart (1988) argues that joint ventures are formed when markets for intermediate goods encounter market inefficiencies. According to Beamish (1988) and Zhao and Zhu (1998), local knowledge can be considered as an intermediate good in an inefficient market, hence organisations establish alliances with local partners in order to solve the market inefficiency and achieve local knowledge. Alliances are more beneficial in minimising market inefficiencies in local knowledge when organisations perceive high uncertainty in the environment of the foreign country (Dow and Larimo, 2009; Puck et al., 2009). High environmental uncertainty primarily depends upon the perceived differences in the institutional environment between the organisation's home country and its host country (Yu-Ching et al., 2010). Institutional differences are described as regulative, cognitive and normative differences in the foreign institutional environment (Dow and Larimo, 2009). Furthermore, high environmental uncertainty is determined by the perceived complexity of the foreign government regulations in absolute terms (Puck et al., 2009). Conversely, Yu-Ching et al. (2010) and Meyer et al. (2009) use a more resource-based approach (Chapter 2, section 2.2) and argue that organisations employ alliances when local knowledge is a core resource in competing in a foreign market and is embedded in the structure of local organisations. Consequently, organisations establish alliances with local partners in order to acquire complementary knowledge and skills in the local market (Meyer at

al., 2009; Javorcik and Saggi, 2010). Anand and Delios (2002) point out that organisations are more likely to employ alliances to acquire local knowledge when specialised knowledge, which is created in central research and development (R&D) facilities, is less geographically interchangeable. Moreover, alliances appear to be more likely to be established when organisations rely to a greater extent upon brand awareness and reputation in the local market for achieving their differential advantages and organisations are less involved in specialised business-to-business markets, where knowledge of a particular customer is easier to transfer to the local market (Meyer et al., 2009).

Todeva and Knoke (2005) argue that alliances are driven by strategic motives, rather than static economic components. The alliance formation is based neither on rational explanations of costs and revenues, nor external macro or industrial factors. Conversely, alliances are evaluated as proactive strategies that are projected onto future activities and their perceived benefits, rather than present circumstances (Sharma, 1998). Alliances can be employed to maintain interests and options for future benefits in diversified activities and projects. According to Contractor and Lorange (1993), alliances can be regarded as “guinea pigs” (pp. 178) for different ventures and allow organisations to keep diversified investment portfolios. Once the technological or the market opportunities prove their potential, organisations can choose to either increase the joint investments in the alliance in order to fully exploit the opportunities (Contractor and Lorange, 1993) or acquire their partners and exploit the opportunities independently (Kogut, 1991) (Chapter 3, section 5).

From a strategic point of view, alliances can be classified as defensive or offensive strategies. Defensive strategies entail protecting existing marketing values (Newman and Chaharbaghi, 1996), and sharing financial and economic risks (Lorange and Roos, 1992). Conversely, offensive strategies focus on creating new market values, as well as anticipating new strategic developments (Bronder and Pritzl, 1992). However, Oxley et al. (2009) and Burgers et al. (1993) outline that alliances should also be evaluated as important devices to minimize strategic uncertainty for alliance partners.

Uncertainty stems from external environmental forces, which are primarily demand, competition, and technology. Demand uncertainty is associated with the unpredictability of consumer behaviour, which is significant in particular industrial sectors. Alliances are applied in order to ensure organisational presence in different markets and market segments and minimise the effects of the changes in consumer behaviour (Burgers et al., 1993). Competition uncertainty results from competitive moves in one industry. Oxley et al. (2009) specify that alliances can have a combination of competition-softening and competitive-enhancing effects. Alliances in general show that they reduce competition in the industry when horizontal alliances (Chapter 2, section 3) in concentrated industries are involved, i.e. alliances that link competitors in industries dominated by few large firms, where potential or actual competitors can be locked in alliances (Drago, 1997). Conversely, in cross-border alliances and R&D alliances involving manufacturing and marketing activities, partners tend to achieve new complementary skills that improve their competitive positioning in the industry (Oxley et al., 2009). In conclusion, alliances significantly contribute to the knowledge and learning process of organisations (Luo and Deng, 2009; Gils and Zwart, 2004; Hamel, 1991; Newman and Chaharbaghi, 1996). Learning and knowledge exchanges in alliances will be further explored in section 5.

Both macro-environmental trends and firm-related factors influence the organisations and constitute a theoretical basis for alliances. Nevertheless, specific reasons emerge when single alliance dyads are evaluated, which contribute to the understanding of why alliances are chosen. The list below seeks to summarise the most frequently cited reasons identified in the literature on alliance formation. The list follows the classification of Vyas et al. (1995) that distinguishes between market-related and technological factors.

**TABLE 2.1**  
Detailed reasons for alliances

➤ **MARKET-RELATED FACTORS:**

Access to distribution channels (Vyas et al., 1995).

Co-opting and blocking of competition (Oxley et al., 2009; Drago, 1997).

Monitoring the environment and searching for new opportunities (Hagedoorn and Narula, 1996).

Diversification into new businesses (Todeva and Knoke, 2005).

Overcoming legal/regulatory barriers (Doz and Hamel, 1998).

➤ **TECHNOLOGICAL FACTORS**

Rationalisation of joint production (Oh, 1996).

Achievement of economies of scale (Contractor and Lorange, 1993).

Technology sharing and co-production (Pansiri, 2008).

Field cross-fertilization (Hagedoorn and Sadowski, 1999).

Development of industrial technological standards (Todeva and Knoke, 2005).

## 2.5. LEARNING IN ALLIANCES

### 2.5.1 Alliances as Learning Mechanisms

Numerous researchers (Levinson and Asahi, 1995; Dyer and Singh, 1998) argue that inter-organisational learning is a significant source of innovative ideas for organisations. Powell et al. (1996) and Rosiello (2004) show that in the biotechnology industry, new ideas primarily originate at a network level, rather than at an organisational level, and various organisational points are involved in learning exchanges. Alliances can thus be regarded as primary learning mechanisms for organisations. The learning process can be either the primary objective for alliances, or can develop from other objectives, such as the exploitation of synergies or application of strategic investments (Morrison and Mezentseff, 1997).

A number of studies (Nielsen, 2005; Ghosh, 2004) associate learning with knowledge since learning is functional to the acquisition and conversion of knowledge. Highly-competitive markets require the continual creation of distinct capabilities and the application of innovative market standards (Chang et al., 2008; Gils and Zwart, 2004; Love and Gunasekaran, 1999). The process of accumulating knowledge is essential to create and apply distinct capabilities and standards in the market (Gils and Zwart, 2004). For this purpose, organisations are required to develop a “chain of timely ideas” (Newman and Chaharbaghi, 1996, pp. 852), which ensures market success for existing products by continuously adapting the market values associated with the products. Alliances in many cases allow organisations to accumulate knowledge through close cooperation (Ghosh, 2004). In knowledge-intensive markets, alliances enable the acquisition of knowledge-based resources, which are owned by the alliance partners. Alliances appear to be particularly effective in securing knowledge and improving organisational performances when

the intensity of knowledge in the industry is high (Ranft and Marsh, 2008). Indeed, organisations can evaluate the knowledge-based resources of their partners in the alliance relationship and secure the beneficial knowledge resources. Alliances avoid the problems in acquisitions of integrating all the heterogeneous capabilities in the selection process and enable partners to fully evaluate which knowledge-based resources are critical to success (Ranft and Marsh, 2008).

In alliances, partners gain access to knowledge in two distinct ways (Buckley et al., 2009; Tsang, 1999):

- a. *through acquisition*: one organisation unilaterally acquires knowledge from the other and applies the acquired knowledge to its operations (Buckley et al., 2009). The knowledge can be applied either in areas related to the alliances through synergy or to areas unrelated to the alliance activities through exploitation (Tsang, 1999).
- b. *through accession*: partners exchange knowledge and maintain a distinctive base of specialised knowledge. Knowledge accession encompasses either supplementary knowledge, where partners enlarge the knowledge scope of the alliance, or complementary knowledge, where partners further develop the existing knowledge stock and deepen the knowledge specialisation (Buckley et al., 2009)

Buckley et al. (2009) and Khanna et al. (1999) respectively associate private benefits with exploitation and common benefits with synergy and knowledge accession. Organisations achieve private benefits as soon as they learn to apply knowledge to their own operations. Conversely, organisations have to wait until all the partners learn to cooperate before common benefits are gained (Khanna et al., 1999). Generally, common benefits require a longer period of time and a more extended managerial effort to achieve than private benefits. If partners are interested in private benefits in an alliance, they will engage in a learning race in order to achieve the private benefits and will apply competitive behaviour. Conversely, if partners are interested in common benefits, they will have equal incentives to invest in the

alliance and will apply cooperative behaviour. Therefore, if private benefits prevail, alliances will be exposed to sudden termination when the learning process terminates (Buckley et al., 2009; Khanna et al., 1999).

The exchange of knowledge in alliances primarily involves technology and technological capabilities (Letterie et al., 2008; Lambe and Spekman, 1997). In many industries, technology shapes the products and defines the competitive conditions (Gils and Zwart, 2004). The product innovation in mature industries stems in large part from new technological bases, hence organisations need to rapidly gain access to specific technology bases (Lambe and Spekman, 1997). Internal development for the new technology can be slow, therefore the learning process in alliances can be favoured in order to acquire the necessary technological competences and the related synergies (Letterie et al., 2008). In addition, alliances typically present low exit barriers if technology shifts. In technology-based alliances, alliance members generally apply alliance-specific investments only if the technology is proven in the market, hence the alliance members exclusively lose the investments in monitoring the partners' technology when the technology is abandoned (Letterie et al., 2008).

Doz (1996) and Poulmenakou and Prasopoulou (2004) confirm that several problems can negate the learning benefits in alliances. Alliances should be designed to encourage collective adaptation of knowledge (Nielsen, 2007; Love and Gunasekaran, 1999), because differences in organisational routines and unclear strategic objectives weaken the learning process (Kumar and Nti, 1998). As suggested by Morrison and Mezentseff (1997), alliances require a "learning framework", where learning problems can be confronted and opportunistic behaviours can be identified. Organisations need to implement appropriate procedures and mechanisms for knowledge accumulation, transfer, and diffusion (Nielsen, 2007). Jiang and Li (2008) outline that effective organisational learning requires suitable governance forms, learning tasks with a moderate complexity, and specific levels of competition between organisations, which are consistent with the

learning capabilities of the partners. The need for moderate complexity is explained by the complexities in the learning process, hence McCutchen et al. (2008) suggest dividing complex learning tasks into different parallel or incremental alliances. Nielsen (2007) and Mellat-Parast and Digman (2008) show that a proper “learning framework” is essential to improving the alliance’s performance and building trust among partners.

Organisations are required to achieve the right combination of partner similarity and dissimilarity in order to encourage knowledge creation and innovation (Luo and Deng, 2009; Cowan and Jonard, 2009). Similarity among partners is defined as partners belonging to the same industry or sector. Partner similarity allows for the achievement of cost reductions in exchanging knowledge because partners share mutual routines and can readily recognize valuable knowledge because of overlaps in prior knowledge. However, partner similarity prevents the organisations from recognising and exploiting potential synergies with dissimilar partners and, in some cases, increases the level of competition in the industry (Luo and Deng, 2009). In addition, organisations have to manage “divergent convergence” in exchanging knowledge (Ghosh, 2004). Organisations in the same industry have significant knowledge overlaps, whereas organisational units retain unique processes. Minimum knowledge overlap favours cooperation in alliances, however, divergence in unit processes facilitates the recognition of innovative technological trends (Nielsen, 2005; Ghosh, 2004).

Knowledge exchange also depends on the characteristics/type of knowledge being exchanged. Explicit knowledge is formal and systematic, and can be expressed in the form of product specifications, computer software, and formulae. Exchange of explicit knowledge is simple to accomplish and control (Nielsen, 2005). Conversely, tacit knowledge is embedded in the organisation and can be classified as non-verbalizable, intuitive and unarticulated knowledge (Polanyi, 1962, in Nielsen, 2005). Exchange of tacit knowledge entails the acquisition of the partners’ social processes and subjective motives, hence social interaction and continuous communication between partners are essential in the knowledge exchange (Ghosh,

2004). Lambe and Spekman (1997) suggest that strategic alliances should exclusively be established if tacit knowledge is transferred, otherwise licenses (Chapter 2, section 3) are effective in transferring explicit knowledge.

## **2.5.2 Learning from Previous Alliance Experiences**

Cohen and Levinthal (1994) underline how previous learning processes facilitate additional learning and innovative knowledge. Therefore, organisations gradually acquire a set of learning skills when they establish and manage strategic alliances. Gulati et al. (2009), Chang et al. (2008) and Emden et al. (2005) point out that organisations have the opportunity to learn from previous alliance experiences and that the learning process can influence their behaviour and performances in future alliances. Emden et al. (2005) demonstrate that the level of learning from previous alliances depends on commitment to the alliance and the organisation's learning propensity. Commitment to the alliance comprises the combination of different commitments in relation to the objectives and values of the alliance, whereas learning propensity encompasses the organisational ability to absorb and accumulate knowledge. Swaminathan and Moorman (2009) confirm that the learning propensity in alliances is instrumental in creating value in future alliances and organizations should dedicate specific organisational resources to the alliance relationship learning process. Gulati et al. (2009) distinguish between general partnering experience and partner-specific alliance experience. General partnering experience is accumulated in any alliance relationship, whereas partner-specific alliance is exclusively accumulated by interacting with the same alliance partner. Gulati et al. (2009) empirically demonstrate that partner-specific alliance experience potentially contributes more to value creation than general alliance experience because a number of experience benefits are not interchangeable and partners develop over time relational mechanisms, specifically inter-firm trust and conflict resolution mechanisms that lower the transaction costs in the learning process. The contribution of partner-specific experience on value creation will depend on the amount of the

firm's technological and financial resources as well as the level of firm-specific uncertainty. Technological and financial resources enable firms to take full advantage of their alliance experiences, whereas firm-specific uncertainty, i.e. the unpredictability of the outcomes of internal corporate decisions, increases the relevance of information exchange between alliance partners. Chang et al. (2008) argue that previous experience in alliances has a greater influence in alliance relationships if associated with high levels of intellectual capital. Intellectual capital encompasses the knowledge-based assets and allows organisations to store and capitalize on previous experiences in alliances.

Nielsen (2007) indicates that previous alliance experience is significant in the initial partner selection process (Chapter 2, section 9), but is gradually substituted by relational capital factors during the alliance life-cycle. Pangarkar (2009) outlines how the learning process from previous alliances can be determined by outcome-based experiences, specifically previous unplanned terminations in alliances. The learning process from previous unexpected terminations is positively reflected in different stages in the alliance life-cycle (Chapter 2, section 8), from a more appropriate alliance formation and selection of partners (Chapter 2, sections 9-10) to a more consistent alliance management (Chapter 2, section 11). Indeed, given the accumulated experience in alliance, organisations will initially pay more attention to both the choice of partners and the compatibility of corporate culture, and, at later stages in the alliance, partners will be more dedicated to resolving conflicts (Chapter 2, section 6.4) and identifying and exploiting positive synergies in the alliance (Pangarkar, 2009). Additionally, McCutchen et al. (2008) point out that the experience in alliances needs to be equivalent among partners in order to improve alliance performance, otherwise, one partner will be more effective and efficient at learning and, once the learning objectives in alliances are achieved, the alliance relationship will gradually lose its relevance.

Nonetheless, a number of scholars (Lunnan and Haugland, 2008; Gulati, 2007) contradict the positive association between alliance experience and performance. Alliance relationships present, in some cases, unique challenges, and previous

learning can be applied inappropriately to alliances and can weaken alliance performances (Lunnan and Haugland, 2008). Moreover, organisations tend to be less objective in evaluating their reciprocal capabilities when previously involved in alliances and so proceed to establish less effective additional ties. Interpersonal relationships inside the alliance can also lead to the organisation persisting with ineffective alliances (Gulati, 2007).

## **2.6. GOVERNANCE STRUCTURE AND RELATIONAL ISSUES**

Alliances between organisations involve a complex set of relationships between organisational units that shape the alliance life-cycle. Alliances exist as an array of relationships and links that evolve over the years and respond to internal and external changes (Gulati, 1998).

According to Dyer and Singh (1998), relationships are structured by two compelling mechanisms – third-party enforcing agreements and self-enforcing agreements. Third-party agreements involve a third-party enforcer for resolving disputes among parties, such as government regulators or legitimate organisation authorities, whereas self-enforcing agreements include safeguards that are directly implemented by the alliance parties (Williamson, 1991).

Third-party mechanisms primarily consist of the formal contracts that are used at the beginning of the alliance life-cycle, which are defined as governance structures (Gulati, 1998). Formal contracts define the general objectives of the alliance as well as the contributions that partners should make to the alliance (Sharma, 1998). Contracts also define in most cases, the rewards and penalties that are associated with the contributions to the alliance (Coleman et al., 1989), as well as the termination penalties, which partners agree in case of premature termination of the alliance (Perry et al., 2004).

Formal contracts exclusively cover aspects that are explicit or institutionalised at the beginning of the alliance life-cycle. Consequently, alliances that are entirely based on contracts, are increasingly exposed to environmental and organisational changes (Chang et al., 2008). Furthermore, partners evaluate the alliance as a discrete, independent, event when they establish the governance structure, although organisations can cooperate for several years and establish different levels of relationships (Gulati, 1998). Therefore, during the alliance life-cycle, parties base their evaluations on previous alliance interactions, in order to prevent opportunistic behaviour, and self-enforcing mechanisms from emerging to structure the alliances (Dyer and Singh, 1998).

Self-enforcing mechanisms are further classified in formal and informal safeguards (Dyer and Singh, 1998). Formal mechanisms are formed by economic hostages that align the economic incentives of alliance parties. Economic hostages can be either unilateral or bilateral stock exchanges between parties (equity alliances, Chapter 2, section 3), or alliance-specific investments, i.e. investments that are specifically set up for the alliance (Klein, 1980). Economic hostages decrease or lose their value if the partnership is terminated, hence they provide an incentive for parties to avoid opportunistic behaviour (Pisano, 1989). Additionally, economic hostages will increase their value if the alliance evolves successfully, hence parties are encouraged to engage in value-creation initiatives (Pisano, 1989).

Informal safeguards develop when partners interact and are difficult to plan in advance. Individual relationships have specific goals and assumptions, and two or more organisations develop a portfolio of multiple independent relationships during the alliance life-cycle (Slowinski et al., 1995). Multiple independent relationships evolve in an unstructured way because the relationships are relevant to specific groups, are established at different times, and can have limited scope and goals. Independent relationships influence the propensity for partners to behave opportunistically; nevertheless, effects on alliances of the evolving relationships are difficult to evaluate (Uzzi, 1987).

Different researchers have questioned whether formal and informal safeguards are complementary or alternative mechanisms. Mayer and Argyres (2004) and Poppo

and Zenger (2002) outline that formal safeguards can enhance informal safeguards such as trust and commitment because they promote expectations of cooperation. Conversely, Li et al. (2008), Reuer et al. (2006), and Murray and Kotabe (2005) propose that informal safeguards, such as trust, substitute for formal safeguards, because partners expect a consistent behaviour to relational promises, hence formal safeguards are introduced if no trust emerges between partners.

Researchers propose satisfaction as a prerequisite for effective relationships (Anderson and Narus, 1990; Wray et al., 1994). Shamdasani and Sheth (1995) combine satisfaction and continuity as main dimensions to evaluate alliance relationships. Satisfaction is defined as “the degree of the partner’s overall affective evaluation of the alliance relationship”, whereas continuity is “the degree of a partner firm’s expectation of continued cooperation in the future” (Shamdasani and Sheth, 1995, pp. 318). Continuity introduces the time prospect in the relationships and is positively related with satisfaction.

The literature on strategic alliances extensively evaluates the social context factors that shape alliance relationships in combination with the economic incentives. The main relational factors that emerge in academic studies are summarised in the remaining part of the section.

### **2.6.1 Trust**

Pantelia and Sockalingam (2005) outline that trust provides “a state of a positive, confident, though subjective, expectation regarding the behaviour of somebody or something in a situation which entails risk to a trusting party” (pp. 600). Therefore, trust means that one party in the alliance is confident that the other party will not apply opportunistic behaviour and will demonstrate predictable and satisfactory conduct (Dodgson, 1993).

As mentioned before, Li et al. (2008), Reuer et al. (2006), and Murray and Kotabe (2005) outline that trust allows organisations to cooperate effectively, with no formal mechanisms in place for preventing opportunistic behaviour. Trust is substituted for formal mechanisms and favours learning processes and knowledge exchanges (Chapter 2, section 5). In this way, organisations can reduce their transaction costs (Chapter 2, section 2.1), because formal safeguards and control mechanisms can be reduced (Gulati, 1995).

Alternatively, Ring and Van de Ven (1992) define trust as confidence in another's goodwill and implicit faith in the partner's moral integrity. Trust is therefore based on social exchanges. Parkhe (1998) outlines how trust occurs primarily among individuals, hence it should be evaluated as a psychological phenomenon. Individuals have, however, no need or opportunity to trust, apart from the alliance context, which can be defined as a social relationship. Trust is necessary only if the economic losses in the alliance could be superior to the expected economic gains, and partners establish their perceptions of fairness and equity on the relative share of gains in the alliance (Contractor and Lorange, 1993). Therefore, trust has psychological, sociological and economic components in the alliance context, hence a multi-level analysis of trust is necessary in alliance research (Bierly and Gallagher, 2007).

Mellat-Parast and Digman (2008) and Lewicki and Bunker (1995) point out that the main features of trust change during the alliance life-cycle. Continuous interactions modify the nature of trust because individuals become gradually familiar with the other's behaviour and organisation. Relationships are established at first on calculus-based trust. Calculus-based trust is defined as trust that exclusively stems from both the expectation of future alliance rewards and the fear of sanctions for the violation of trust. Sanctions consist of losses of repeat business and reputation. In calculus-based trust, partners are primarily concerned with the economic aspects of the alliance and allow sharing of limited knowledge (Lane and Bachmann, 2000). Alliance partners have the opportunity to gain relevant information about each other and verify that they adhere to a set of agreed principles when mutual exchanges develop (Mellat-Parast and Digman, 2008), therefore they can predict the alliance's

future direction and recognise reciprocal problems. In this case, calculus-based trust is gradually substituted by knowledge-based trust (Lewicki and Bunker, 1995). Knowledge-based trust supports the learning process in alliances (Mellat-Parast and Digman, 2008) (Chapter 2, section 5) and consents to evaluate the partners' contributions to the alliance. In the long-term, a sense of identity emerges in alliances and the members of the organisation start sharing common values and organisational culture. As a consequence, a habitual state of unconscious trust replaces explicit trust (Blois, 1998), where strict control is substituted by a system that exclusively signals any significant variation in partners' behaviour. Lewicki and Bunker (1995) define this stage as identification-based trust, which favours value-adding knowledge sharing (Chapter 2, section 5). In this case, trust gradually substitutes control and coordination mechanisms and prompts cost savings in the alliance management (Mellat-Parast and Digman, 2008).

Trust evolves in an unstructured way and calculus-based trust as well as knowledge-based trust can still exist in later stages of the alliance life-cycle. Still, organisations are encouraged to monitor and direct the development of trust because benefits in terms of costs and knowledge exchanges for advanced stages of trust are significant (Mellat-Parast and Digman, 2008; Lewicki and Bunker, 1985).

## **2.6.2 Commitment**

Beamish (1988) and Morgan and Hunt (1994) emphasise that commitment is central to alliance development. Commitment is defined by Cook and Emerson (1978) (in Sharma, 1998) as the extent to which the choices of current partners can be predicted from previous relationships. Kauser and Shaw (2004) highlight that committed partners rely on the implicit promise of relational continuity. Commitment depends on partner reliability in performing essential tasks in the alliance (Anderson and Weitz, 1992). Furthermore, committed partners invest significant resources in the alliance and are exposed to high exit barriers if the alliance terminates (Young et al.,

1996). In conclusion, Perry et al. (2004) associate commitment with the partner's choice to decline opportunities and expend little effort in seeking alternative partners. Empirical evidence (Nakos and Brouthers, 2008; Pansiri, 2008; Morgan and Hunt, 1994; Monczka et al., 1998) suggests that in alliances, high levels of commitment are significantly related to favourable performances.

### **2.6.3 Understanding**

Alliances require extensive cooperation between partners to achieve their objectives. Effective cooperation necessitates that organisations know the main characteristics of the parties involved, i.e. they possess a mutual understanding of the resources, knowledge, and strategic goals of their partners (Beamish, 1988).

Sharma (1998) assumes that mutual understanding is associated with interaction, which is shaped by four dimensions:

*frequency*: number of exchanges between partners.

*surface area*: number of people involved in the interaction.

*variety*: multiplicity of contact points between functional areas.

*media*: communication channels that are used by the alliance members.

Interaction is an essential determinant for the success of the alliance because complementary resources in alliances guarantee no joint pay-off unless partners interact and resources are effectively integrated. Hence, partners need to implement effective mechanisms for enhancing interaction and combining resources in the alliance value chain (Luo, 2008 b.).

Interaction and understanding allow the reduction of perceived uncertainty in the other partner's behaviour and the building of trusting relationships (Sharma, 1998).

Frequent and effective interactions are also beneficial for transferring tacit knowledge among organisations and consequently increase the probability of the alliance succeeding (Poulymenakou and Prasopoulou, 2004).

#### **2.6.4 Conflict Resolution**

Relational problems frequently emerge during the alliance life-cycle. Empirical research (Faulkner, 1996) confirms that very few alliances experience no difficulty in managing their relationships. Therefore, the method by which the partners solve their relational problems is essential in the evolution of the alliance (Pantelia and Sockalingam, 2005).

Conflict is defined by Hocker and Wilmot (1985) (in Pantelia and Sockalingam, 2005) as “an expressed struggle between at least two interdependent parties who perceive incompatible goals, scarce rewards and interference from the other party in achieving their goals” (pp. 158). Literature on organisational conflict identifies three common forms of conflict:

- a) *relationship conflict*: which is mainly emotional and based on interpersonal incompatibilities (Hocker and Wilmot, 1985).
- b) *task conflict*: which is associated with judgemental differences in achieving organisational objectives (Faulkner, 1996).
- c) *process controversies*: which develop from differences in tasks and organisational culture (Jehn, 1994).

Specific typologies of conflict occur more frequently at different stages in the alliance life-cycle. At the beginning of the alliance life cycle, process controversies tend to be high, whereas task conflicts routinely emerge when the alliance is mature (Chapter 2, section 8) (Poulymenakou and Prasopoulou, 2004).

Pantelia and Sockalingam (2005) underline that trust and conflict are significantly interrelated in alliances. Trust among partners facilitates conflict resolution; nevertheless, frequent conflicts can damage trust and generate mistrust, which limits the knowledge-sharing process (Chapter 2, section 5) (Ghosh, 2004). If conflicts are resolved among partners, trust will be reinforced, because partners know that relational problems can be confronted and eliminated and trust will form the basis for shared values and common corporate culture (Pantelia and Sockalingam, 2005). Therefore, conflict is not necessarily negative if partners are capable of effectively resolving conflict through resolution techniques. Monczka et al. (1998) underline how partners need to identify in advance the potential for conflict and use problem-solving techniques to control conflicts.

## 2.7. NETWORKS

The application of network theories (Swaminathan and Moorman, 2009; Walter et al., 2007; Gulati and Gargiulo, 1999; Gulati, 1998; Arias, 1995) to strategic alliances offers innovative insights and opportunities in the alliance research area. Inter-organisational networks can be defined as clusters of business units that are held together in network fashion and are coordinated by market mechanisms (Zeffane, 1994; Miles and Show, 1992). Networks are formed by two entities (Arias, 1995):

- a) *nodes*: business units that compose the network, which have varying degrees of interdependence with the other units.
- b) *relationships*: mechanisms and links that shape the network interdependence.

Arias (1995) proposes a classification of networks and divides them into stable and dynamic networks. Stable networks permanently connect in value chains' specialised assets, which are owned independently by the single business units and are allocated with contractual arrangements. The single business units keep their business relationships with organisations outside the value chain and retain their own

competitive strategies. In dynamic networks, organisations cooperate for the production of specific products from a short-term perspective. After the cooperation, they suspend their relationship and become part of another temporary alignment.

As outlined by Gulati (1998), connections of business units into networks can influence alliance formation and evolution. If alliances are exclusively considered as dyadic exchanges, the role of the other relationships, which the organisations are embedded in, is not evaluated. Indeed, external networks define and shape precursors, processes, and outcomes in alliances and alliances are driven by a combination of motives (Gulati and Gargiulo, 1999). At first, external resource dependencies induce business units to establish cooperative arrangements, subsequently “an endogenous embedded dynamic” (Gulati and Gargiulo, 1999, pp. 1447), which is the emerging network, gradually shapes the partners’ choices. The formation of new alliances and relationships gradually modifies the network, which the business unit belongs to, and alliances and networks become interdependent. As a consequence, organisations need to constantly consider the social capital of the subjects involved in networks and alliances (Walter et al., 2007). The social capital is defined by Bourdieu and Wacquant (1992) as “the sum of the resources, actual or virtual, that accrue to a group by virtue of possessing durable networks of more or less institutionalised relationships of mutual acquaintance and recognition” (pp. 119).

Networks primarily influence the information flow among the network business units (Gulati, 1998). Frequent relationships inside the network favour the exchange of minute information and tacit knowledge among network members, and further information is available because information flows both in proximate ties and in the entire structure of the network (Gulati, 1998). For this reason, social networks encourage the matching process among partners in the alliance formation stage (Chapter 2, section 9) because partners have the opportunity to evaluate which resources they can exchange in the alliance (Mitsuhashi and Greve, 2009).

Furthermore, the position that an organisation occupies in the network is a function of the relative ties in the network itself (Walter et al., 2007). Similar organisations in the network tend not to establish close relationships, whereas they are tied to the

same set of dissimilar organisations (Gulati, 1998). Indeed, organisations should restrict their involvements in networks where ties are duplicated. Redundant ties are less costly to establish, compared to non-redundant ties, but they are less effective in delivering relevant information (Letterie et al., 2008) because similar partners exchange at first innovative information among each other, subsequently, additional similar partners gradually lead to less novel information and alliance partners should look for more dissimilar partners (Luo and Deng, 2009). Organisations tend to maintain alliance ties in order to shorten their distance to other alliances in the networks and capture alliance spillovers, but they become intermediaries for other organisations in conducting spillovers and gradually lose their positional advantages in the network (Deroian, 2008).

Network dynamics also influence the behaviour of the social parties (Walker et al., 1999). Alliances evolve with constraints on the partners to perform according to each other's expectations, and partners are encouraged by social constraints to invest in alliance-related resources and share knowledge and organisational values (Chapter 2, section 5) (Swaminathan and Moorman, 2009). Nevertheless, the level of constraints depends on the available information on current and potential partners, therefore low degrees of information and the threat of opportunistic behaviour can interfere with the alliance evolution (Walker et al., 1999). Walker et al. (1999) argue that if organisations in one industry are all interconnected, information will flow perfectly and social constraints will prevent the organisations from engaging in opportunistic behaviour. Conversely, the lack of links in one industry implies that organisations have problems in detecting opportunistic behaviour. With different mixes of links in one industry, network position and the industry's social capital offer important suggestions on organisational behaviour.

In addition, Gulati (1995) discovers that networks play a major role in the alliance governance structure (Chapter 2, section 6). Partners rapidly develop inter-organisational trust (Letterie et al., 2008) when they become embedded in social networks of previous ties, and extensively rely on self-enforcing agreements (Chapter 2, section 6). Gulati and Singh (1998) assume that parties are concerned with behavioural uncertainty and coordination costs in forming alliances. Governance structures are thus primarily designed to minimise costs that originate

from coordinating tasks in the alliance. Inter-organisational trust, which originates from network relationships, reduces the coordination costs because it favours cooperative working environments and reduces formal controls (Gulati and Singh, 1998). Additionally, the position in networks appears to influence the propensity for internationalisation through alliances. Organisations, which are positioned in networks with high international alliance propensity, have a high probability of setting up international alliances because knowledge spillovers in the network reduce both the information gap on potential foreign partners and the challenges in establishing international alliances (Al-Laham and Souitaris, 2008).

Burt (1995) outlines how both social capital and network configuration contribute to shape the industrial structure. Industries are formed by dense pockets of relationships and structural holes, which are sparse regions within the dense pockets. Structural holes are associated with the highest economic returns, hence organisations continuously seek to exploit the opportunities between dense pockets of relationships, and to decrease the social capital. Walker et al. (1999) apply structural holes in the biotechnology industry and conclude that structural holes are relevant to networks of market transactions, rather than to networks of cooperative relationships. Networks of market transactions are determined by the business interactions that happen in different markets and are primarily constituted by short-term connections, whereas networks of cooperative relationships are constituted by a series of alliances between interrelated organisations that generally establish long-term links. Koka and Prescott (2008) combine different structural approaches in the network. Organisations can follow a strategy of network prominence, where they have access to critical information through multiple ties and can promote their strategic priorities in the network. Conversely, organisations can pursue an entrepreneurial network position, where they seek to control the resources between the dense pockets of relationships and exploit non-redundant information between different parts of the network. Koka and Prescott (2008) empirically show that entrepreneurial positions deliver higher performances in cases of relevant changes in the environment, whereas prominent positions are more effective in stable environments, hence

organisations need to adapt their network strategies to contingent requirements. Tiwana (2008) confirms that innovation and new projects in alliances entail a combination of structural holes and strong ties in prominent positions. Structural holes increase the capacity to generate innovation and new projects because organisations can gain access to diversified knowledge, and strong ties improve the capability of implementing innovation and integrating knowledge. Nevertheless, empirical evidence (Tiwana, 2008) shows that the exploitation of structural holes has no negative effect on knowledge integration because the access to broader capabilities counterbalances the problems of integrating diversified knowledge.

However, network relationships can often entail drawbacks and problems. Several subjects are involved in networks, hence cultural clashes and conflicting interests can have escalating effects on the network structure (Gulati, 1998). Hagedoorn (1995) also points out that networks have no clear line of authority, thus decision making can grow in complexity if several units participate in it. Additionally, business units gradually lose their strategic autonomy when they are embedded in tight relationships in networks.

## **2.8. ALLIANCE LIFE-CYCLE**

The academic literature applies the life-cycle methodology to different fields, such as the production stages (Hayes et al., 1988), and evolution of markets and productions (Kotler, 1991). The life-cycle methodology (Lorange, 1996; Harrigan, 1986) is employed in the alliance field in order to evaluate how objectives and features develop in alliances.

Harrigan (1986) demonstrated that alliances follow evolutionary paths that influence their performances. Lorange (1996) showed that alliance evolution has no linearity.

Partners continuously reformulate their relationships and negotiate their relative power balance. Partners also redefine their tasks and strategies according to the alliance's results and environmental conditions. However, scholars (Li and Liao, 2007; Poulymenakou and Prasopoulou, 2004; George and Farris, 1999; Spekman et al., 1998) have established key alliance stages that involve shared behaviours and factors. The following key stages can be identified in the alliance life-cycle, despite a few differences among authors:

- a) *recognition*: organisations start evaluating alliances as strategic opportunities and select organisations as potential partners (Poulymenakou and Prasopoulou, 2004).
- b) *alliance formation/selection of partners*: organisations evaluate alliance prospects and choose suitable partners for forming an alliance (Li and Liao, 2007).
- c) *relationship set-up*: partners negotiate their relationships and define procedures for making the alliance operational (George and Farris, 1999).
- d) *alliance management*: alliance tasks are developed, and managers focus on the integration and coordination of complementary business activities (Spekman et al., 1998). In this stage, alliances realise their potential, however, conflicts between partners can emerge (Poulymenakou and Prasopoulou, 2004).
- e) *alliance termination/dissolution*: the partnership is terminated (Reuer, 1999).

Boundaries between the various phases are not exact and a strict application of the life-cycle methodology fails to appreciate the dynamic interactions in the activities and processes in alliances (Spekman et al., 1998). Practitioners are advised to adopt dynamic approaches in alliance management and evaluate the challenges that emerge at any stage. Actions and decisions that are adopted in the early stages can negatively influence the entire course of the alliance, and alliances can go through complex transitory phases (Poulymenakou and Prasopoulou, 2004).

The life-cycle methodology is employed in the following sections, which correspond to the key stages of alliances. Essential features and objectives are highlighted at every stage.

## **2.9. ALLIANCE FORMATION**

Organisations use various mechanisms for selecting their partners. Vyas et al. (1995) and Melbourne (2005) propose that organisations should at first conduct a SWOT (Strengths, Weaknesses, Opportunities, Threats) analysis. Strengths and opportunities help define short-term and long-term objectives, whereas threats and weaknesses contribute to establish the organisational functions that would require an alliance in order to solve structural problems. Subsequently, organisations should list the alliance prospects by using GWAP analysis (Group With Alliance Potential), which can include competitors, suppliers, and general network members. The alliance prospects should be evaluated according to the goal compatibility with the organisation, opportunities for synergy, potential value to be delivered in the alliance, and balancing contributions in manufacturing and marketing. In order to accomplish the evaluation, prospects should go through detailed SWOT analyses before starting the negotiations.

Harvey and Luscht (1995) introduce three levels of analysis that organisations should consider before choosing their alliance partners. Alliance parties should be evaluated at macro-environmental, industrial, and organisational levels. To begin with, sources of competitive advantages in domestic and international markets as well as cultural factors should be determined for prospects, followed by the competitive role that prospects play in their industries. The evaluation of tangible and intangible assets concludes the analysis.

Steward (1999) outlines that organisations should be supported by external organisations and consultants and use a combination of selection indices, primarily technological indices (e.g. R&D intensity: R&D expenditure upon total sales),

financial indices (e.g. stock market corporate index: biannual average of share performance), and market indices (e.g. market share evolution). Pennac (2003) and Meade et al. (1997) affirm that companies should conduct a business case analysis for each partner, which is based on five phases – system impact identification, transition impact assessment, costs and benefits estimation, decision making analysis, and decisions audit.

Different studies suggest specific attributes that alliance partners should possess to minimise conflicts and risks in alliances. Mitsuhashi and Greve (2009) specify that partners should be selected by choosing the right combination of market complementarity and resource compatibility, depending on the objectives of the alliance. Market complementarity will likely increase the performances of the alliance if different capabilities and resources can be combined to create greater value as partners share risks and information in different marketplaces. Jiang et al. (2008), Pansiri (2008), Nielsen (2007), and Fenner (2003) confirm that organisations should select partners with complementary competencies and resources. In addition, resource compatibility is likely to increase the performances of the alliance if similar capabilities and resources create greater value as they share a standard interface and jointly use compatible resources (Mitsuhashi and Greve, 2009; Kale and Singh, 2009). Moreover, partners with high industrial reputation, high commitment (Chapter 2, section 6.2) to alliance relationships and effective prior ties (Chapter 2, section 5) should be favoured (Jiang et al., 2008; Kale and Singh, 2009), whereas partners with contrasting strategic agendas should be avoided (Vyas et al., 1995; Fenner, 2003). Nonetheless, if previous contacts with organisations were ineffective in developing trust, further contacts increase the risks of exposing core knowledge in organisations (Li et al., 2008).

Shah and Swaminathan (2008) argue that the partner selection process should depend on the project type that organisations plan to accomplish in the alliance. The project type is classified according to process manageability, which is the degree of transparency in the alliance implementation process, and the outcome interpretability, which is the degree of transparency of the alliance outcomes. The

relational factors “trust” and “commitment” are as influential as the financial pay-off in case of high process manageability and outcome interpretability.

However, Bierly and Gallagher (2007) point out that organisations choose their partners with imperfect information and/or under time pressure. Consequently, in partner selection, organisations have to rely on strategic expediency, which is the capability of making prompt and high-quality decisions within simplified bounded frameworks.

## 2.10. NEGOTIATION

During the negotiation, organisations contact their potential partners and establish the structure of the alliance. Organisations recognise for the first time the existing differences with their partners and are confronted with compatibility problems (Lynch, 1993).

Shawoll (2002), Lewicki and Bunker (1995), and Lynch (1993) suggest that two partners should consider the negotiation process as a zero-sum game (Chapter 2, section 2.3), where negotiators avoid maximising their own interests and set favourable conditions for the game (Shawoll, 2002; Lynch, 1993). In this case, negotiators should be prepared to make compromises during the negotiation (Lynch, 1993).

Organisations should pay specific attention to equity exchanges during the negotiation process (Chapter 3, section 6) (Kale and Singh, 2009). Equity constitutes a useful mechanism for making ex-ante commitments toward the alliance and reduces the likelihood for opportunistic behaviours (Chapter 3, section 6) (Williamson, 1985). In addition, equity facilitates hierarchical control in the alliance (Kogut, 1991), which is often a crucial problem in ex-post alliance management (Chapter 2, section 11), and creates a platform for sharing the benefits of the alliance (David and Han, 2004).

Organisations are required to form teams that include operational managers who supervise the entire negotiation process. The negotiation process should result in a number of alliance principles that will direct the procedures and define the initial

investments in the alliance (Shawoll, 2002). Initial investments are controversial because no external evaluation exists in the marketplace for defining asset value, and low-value assets in the marketplace can be essential for the alliance (Palati, 2002). Therefore, teams need to evaluate the long-term effects of investments in the alliance (Shawoll, 2002). Additionally, the scope and the division of tasks in the alliance should be defined during the negotiation process (Jiang et al., 2008). Organisations should immediately develop strategies for achieving effective organisational learning and implement a structure that allows the long-term achievement of the learning objectives (Jiang et al., 2008). Organisations should also agree on the management control of the alliance, i.e. how the alliance will be directed and how the decisions will be made during and after the implementation process. Organisations can either assign specific alliance tasks or the entire supervision of the alliance to alliance managers (Chapter 2, section 11) or divide the alliance assignments among the partners' top managements and define the procedures for decision making (Favour, 2004).

The negotiation process is concluded with the formal contract, where the governance structure, management control, initial investments, and procedures for the alliance are defined (Jiang et al., 2008). The contract should also include a first evaluation of operational problems that can affect the organisations during the alliance implementation (Lynch, 1993). Jandik and Kali (2009) outline that in international alliances, the reliability of external institutions in enforcing contractual obligations is directly related to the probability for future success of the alliance, because organisations can rapidly solve contractual problems if local partners do not abide by the contractual arrangements. This is particularly relevant in an international context where cultural incompatibilities intensify process controversies (Chapter 2, section 6.4) (Jandik and Kali, 2009).

## 2.11. ALLIANCE MANAGEMENT

The alliance has to be effectively managed after the negotiation in order to achieve its objectives. Alliance management is a difficult task because alliance objectives can increasingly contrast with the partners' agendas and organisational differences can emerge in joint operations (Richarge and Scott, 2003). As underlined by Schreiner et al. (2009) and Newman and Chaharbaghi (1996), the alliance initial agreements and formal contracts are of limited value if not accompanied by effective managerial practices and management of the alliance requires a new set of competencies, which allow organisations to combine their corporate values and maintain their own identities. In addition, standard managerial procedures are no longer valid in alliance management because lines of authority are usually replaced by parallel command-and-repeat systems when two organisations begin to cooperate (Todeva and Knoke, 2005). Command-and-repeat systems develop in an unstructured way, and managers are in some cases uncertain about who possesses the decision-making authority. Alliance objectives are not included in the lines of authority and personnel specifically dedicated to the alliance operations have no direct and formal authority in the organisation of the alliance partner (Todeva and Knoke, 2005).

The alliance management should be supported by the internal development of alliance organisation capabilities (Schreiner et al., 2009; Chan, 2004). Alliance organisation capabilities encompass distinct skills to manage coordination, communication and bonding needs. Coordination entails the ability of pooling together different resources as well as identifying and accomplishing task requirements in the alliance (Schreiner et al., 2009; Kale and Singh, 2009). Innovative operational approaches, which are necessary in alliances, emerge only if a specific organisational structure is implemented (Chan, 2004). Communication implies the capability of transferring information to the alliance partners in a timely and complete manner (Schreiner et al., 2009). The alliance management should encourage the resolution of communication and information technology problems (Chan, 2004). In conclusion, close personal ties should develop among alliance

partners (Schreiner et al., 2009), because social integration fosters self-enforcing mechanisms in the alliance (Chapter 2, section 6), such as trust (Chapter 2, section 6.1) (Kale and Singh, 2009; Gulati, 1995). Effective communication and social initiatives, such as conferences and events, contribute to create a cooperative atmosphere in the alliance (George and Farris, 1999).

In some cases, organisations assign the supervision of alliance tasks to a specific manager. The alliance manager should coordinate a number of key relationships inside the alliance (Jiang et al., 2008). The alliance manager can be supported by alliance teams, which are responsible for specific problems involving cross-sectional assignments. Alliance teams should also help the line hierarchy in alliance-related issues and support operational managers (Favour, 2004).

Partner's activities in the alliance indicate commitment and increase trust (Chapter 2, section 6), hence they need to be continuously monitored (Avian, 2003). Nevertheless, monitoring can become a source of conflict in the alliance if it is regarded as excessive (Jiang et al., 2008). Organisations rely on both output and process controls in order to minimise opportunistic behaviour. Output controls depend on alliance outcomes and focus on external results, such as sales levels and profitability of the alliance (Celly and Frazier, 1996). Process controls depend on alliance behaviour and focus on the general conduct of the partners inside the alliance (Aulakh et al., 1996). Nakos and Brouthers (2008) empirically demonstrate that process controls improve cooperation in combination with commitment, whereas output controls reduce cooperation and encourage opportunistic behaviour. Trust is also viewed in alliances as a substitute for more formal control mechanisms (Chapter 2, section 6.1) if it takes a strong hold during the alliance life-cycle (Mellat-Parast and Digman, 2008; Li et al., 2008).

## 2.12. ALLIANCE INSTABILITY

Numerous empirical studies (Reuer, 1999; Dussauge et al., 2000) confirm that alliances tend to be unstable organisational forms and have high failure rates. Reuer (1999) points out that the alliance failure rate is estimated to be between 30 and 70 percent, and Lunnan and Haugland (2008) report alliance termination rates to be over 50 percent.

Alliance instability is defined as a major change in the relationship status, “that was unplanned from one or both partners’ perspective” (pp. 27, Beamish and Inkpen, 1995). In operational terms, changes in the relationship status result in changes in the governance structure (Bierly and Coombs, 2004). The alliance instability influences the objectives and net benefits that partners expect to achieve from alliances (Reuer and Zollo, 2005). Indeed, the long-term stability of an alliance is evaluated as an effective proxy for positive alliance performance and alliance success (Jiang et al., 2008).

Lunnan and Haugland (2008), Bierly and Coombs (2004), and Doz and Hamel (1998), emphasise that the key factor in evaluating the effects of changes is the planning process. If changes are planned and agreed among partners, the alliance will evolve in the following ways:

- a) *the alliance is terminated*: most or all the alliance objectives are achieved and the alliance benefits are shared fairly among the partners. If no other goals exist, the alliance is no longer necessary and partners agree to terminate the alliance. The alliance is evaluated as successful (Beamish and Inkpen, 1995).
- b) *the alliance parties merge in a unique organisation*: the alliance fulfils its objectives, and partners work effectively together and agree on benefits sharing. If further integration results in added benefits, parties can agree to merge into one entity (Bierly and Coombs, 2004). In some cases, alliances are also used as low-risk mechanisms for exploring opportunities for subsequent mergers or takeovers. In this context, organisations evaluate through partnership how working environments and corporate values

interrelate and proceed to a full integration if they successfully cooperate (Chapter 3, section 5) (Todeva and Knoke, 2005).

- c) *government changes for alliance variations*: partners realise that their alliance has further opportunities to achieve, thus parties expand the alliance to other fields and functional areas. Partners can also limit from the start, the areas that are involved in the alliance in order to reduce risks, subsequently, they extend into these areas when the alliance has proven to be effective (Beamish and Inkpen, 1995). Additionally, environmental changes can make some of the alliance objectives inappropriate, hence they may have to be adapted to the new environmental conditions. The alliance governance structure is consequently modified if it is unsuitable for accomplishing the new tasks (Beamish and Inkpen, 1995).

Nevertheless, alliances can also encounter unplanned changes in their governance structure:

- a) *unfriendly takeover*: alliance benefits are prevented by significant relational problems, even if the alliance is based on well-designed strategic objectives. One partner can therefore proceed to acquire the other organisation, because one unified management solves the relational problems (Michaels, 2001).
- b) *sudden termination*: the alliance is confronted with many problems and one party decides to unilaterally terminate the alliance. Net benefits in the partnership are likely to be limited and the alliance is generally perceived as unsuccessful (Beamish and Inkpen, 1995).

Academic literature (Reuer and Zollo, 2005; Drago, 1997; Khanna et al., 1999) highlights several reasons to explain the high rate of alliance failure. The sudden termination is generally the worst-case scenario in alliances, however, alliance problems can also seriously affect overall performances in partnering:

- a) *relationship issues*: alliances involve a complex set of relational factors that evolve during the alliance life-cycle. If relational factors are wrongly managed, parties can experience organisational controversies and conflicts (Chapter 2, section 6) (Li et al., 2008).
- b) *incorrect partner selection*: strategic and organisational compatibility is difficult to build if it is nonexistent at the beginning of the alliance. Therefore, the wrong choice of partner is prejudicial for the development of the alliance (Chapter 2, section 10) (Nielsen, 2007; Fenner, 2003).
- c) *knowledge exchanges*: in the alliance life-cycle, knowledge can be unilaterally acquired by one party and not applied to the alliance activities. In this case, the probability for sudden termination increases because the primary purpose for the alliance gradually declines (Chapter 2, section 5) (Khanna et al., 1999). Conversely, partners can fail to acquire and apply knowledge collectively, and they are forced to terminate the alliance (McCutchen et al., 2008). Additionally, alliances can be based on the exchange of specific technologies. If technology standards change, the alliance is terminated (Chapter 2, section 5) (Vyas et al., 1995).
- d) *power imbalance*: changes in partners' relative bargaining power can result in opportunistic behaviours that increase the probability for the sudden termination of the alliance (Bierly and Coombs, 2004).
- e) *organisational and strategic autonomy*: in alliances, parties need to adjust their own strategies and significantly decrease their organisational autonomy and strategic flexibility (Oh, 1996; Drago, 1997). Consequently, during the alliance life-cycle, parties can have their own strategic objectives that conflict with alliance objectives.

- f) *shifts in strategy*: Koza and Lewin (1998) confirm that alliances are not stand-alone independent operations, but are rather embedded in the evolving partners' strategies. As a result, a major shift in strategy by one partner can contrast with the alliance rationale (Reuer and Zollo, 2005).
- g) *competition outside the alliance*: during the alliance life-cycle, the competitive scenario can change and parties can invest significant resources in similar areas, which are unrelated to the alliance. The resulting competition between the parties can negatively affect the interfirm trust (Chapter 2, section 6) and consequently the entire alliance (Bierly and Coombs, 2004; George and Farris, 1999). Reuer and Zollo (2005) argue that changes in the competitive scenario primarily originate from variations in the industry concentration levels.
- h) *stock market reactions*: numerous empirical studies (Bierly and Coombs, 2004; Koh and Venkatraman, 1991) examine the stock market reactions to alliance formation and confirm that the stock market in general reacts favourably to the announcement of the alliance. Nonetheless, the stock market reaction has been particularly negative in a number of cases, and organisations with financial problems have had to suspend the alliance (Bierly and Coombs, 2004).

Given the numerous problems that alliances can encounter within their life-cycle, alliances are regarded as volatile and hazardous ventures, where net benefits are unpredictable and parties can unexpectedly terminate the relationship. However, no empirical evidence demonstrates that the alliance failure rate exceeds the average corporate or acquisition failure rate for single-owner ventures (Reuer, 1999; Contractor and Lorange, 1993).

## 2.13. ALLIANCE PERFORMANCES

Many authors (Segil, 1998; Gulati, 1998) argue that the constant evaluation of the alliance is one of the key components for its success. Nevertheless, a detailed set of evaluation criteria needs to be defined in order to measure alliance performances.

Scholars have proposed different approaches to evaluate alliance outcomes. Early studies (Geringer and Hebert, 1989; Lecraw, 1983) used financial indicators as performance dimensions, such as profitability, market share growth, and cost reductions. Nevertheless, financial indicators take no account of the strategic and competitive components in alliances, which have no direct quantitative effects. Also, financial indicators are related to the parent organisation's results and may fail to consider the performances of the alliance itself (Lunnan and Haugland, 2008). In conclusion, organisations are reluctant to disclose sensitive financial data to researchers (Chen and Tseng, 2005).

The following studies evaluated alliance performances through objective measures, such as alliance survival rates (Geringer, 1990), alliance instability (Gomes-Casseres, 1989), and alliance duration (Harrigan, 1986). However, objective measures have significant research drawbacks. Firstly, as pointed out by George and Farris (1999), alliances are difficult to compare at different stages in their life-cycle and in different industries. Furthermore, alliance objective performances need to be measured both at a firm-level and at an alliance-level. The alliance can be successful in the long-term and fulfil its objectives, nonetheless, one partner can achieve no alliance benefits, as many examples of one-way knowledge transfer (Khanna et al., 1999) and market access (Emden et al., 2005) can confirm.

In conclusion, Killing (1982) proposes that alliance performances should be evaluated by subjective alliance assessments. However, subjective measures excessively rely on the managers' perception of the partnership (Lunnan and

Haugland, 2008), and can be influenced by political agendas and lack of information on the alliance activities.

Both subjective and objective measures are therefore subject to important drawbacks. For this reason, Chen and Tseng (2005) propose to include multiple approaches in the evaluation of alliance performances, and they use total satisfaction, profit satisfaction, goal achievement, and willingness for continuation as evaluation criteria. Lunnan and Haugland (2008) suggest combining three measures of performance – abrupt termination, short-term performance, and long-term performance. Abrupt termination evaluates the termination before the planned cooperation period (Chapter 2, section 12), short-term performance depends on structural characteristics such as specific alliance investments and complementary resources, whereas long-term performance is related to the alliance dynamics. Empirical evidence shows that positive performances in the initial stages are not significantly related to performances at later stages in the alliance life-cycle, and conditions for success in alliances evolve over time. Alternatively, George and Farris (1999) propose that alliance performances should be measured according to the alliances' capability of successfully evolving through their life-cycle and achieving maturity.

## SUMMARY

Alliances are key mechanisms for obtaining resources and capabilities as well as achieving efficiencies in imperfect markets. Additionally, alliances can be employed to protect and create market values and minimize strategic uncertainty. Organisations can also generate innovative ideas and exchange knowledge by interacting within alliances.

However, alliances are complex forms of governance that have unpredictable results in the long-term. Alliances indeed depend on different compelling mechanisms and relational determinants that are problematic to manage and vary during the different phases of the alliance life-cycle. Links between organisational units in networks also shape the alliance formation and evolution. Problems in alliances can result in the alliance being terminated and can interfere with alliance performances.

Despite the alliance risks and drawbacks, no empirical research demonstrates that alliances have to be preferred to other forms of ventures, such as corporate investments or acquisitions. It is therefore necessary to include the whole array of choices that the organisations have in order to evaluate the reasons for seeking cooperative arrangements, rather than internal development or acquisitions.

## **CHAPTER 3**

# **Choosing between Alliances and Acquisitions**

## INTRODUCTION

This Chapter examines the academic studies concerning acquisitions and alliances as alternative organisational forms. Scholars have outlined the characteristics of strategic alliances in various industries and have offered diverse strategic and economic explanations for companies to cooperate. Most studies have paid attention to the evolution of alliances in high-technology sectors, where alliances have played a significant role in disseminating new technologies and favouring a mutual learning process.

However, acquisitions have received little consideration in the overall research effort on strategic alliances. In many cases, the literature restricts the analysis to new organisational forms, such as joint ventures, or minority equity exchanges, and excludes acquisitions from the alliance context. This can be explained by the difficulties in including acquisitions and alliances in one statistical sample since they have entirely different characteristics. In addition, as for the high-tech sectors, acquisitions are generally assessed as inefficient organisational structures for monitoring and exploiting new technologies.

Nevertheless, a number of studies emphasize that acquisitions and alliances are not separate organisational forms, but competitive devices to acquire specific assets and capabilities for organisations. This emerges from comparing Transaction-Cost Economics theory with Resource-Based theory. Therefore, decision makers evaluate both organisational forms before choosing the most effective structure for their organisations. Furthermore, empirical research (Inkpen et al., 2000) shows how acquisitions can be successfully employed for managing technological changes and know-how exchanges.

The analysis of organisational forms contributes to an understanding of corporate strategies and an evaluation of technologies, markets, and industrial structures over the short and long term.

Section One reviews the two main theories on alternative organisational forms – Transaction-Cost Economics theory and the Resource-Based theory. Both theories confirm that acquisitions and alliances are simultaneously evaluated by decision makers when neither market transactions nor internal development can be applied nor total costs increased. Consequently, factors in decision making are examined in order to establish how organisations choose between alliances and acquisitions. Section Two evaluates how potential downsides relate to acquisitions. Acquisitions can be affected by ex-ante and ex-post costs. Ex-ante costs result from valuation problems and “indigestible assets”, whereas ex-post costs stem from incompatibilities in organisational tasks as well as labour issues. In addition, financial resources can be reduced for funding acquisitions, specifically because the share price tends to decrease after an acquisition is announced. Acquisitions are also influenced by legal, regulatory and political aspects, which interfere with the acquisition process.

Section Three evaluates strategic alliances as a possible alternative to acquisitions. Strategic alliances counterbalance costs and problems in acquisitions and allow the acquisition of the required assets from targeted organisations. In addition, alliances enable organisations to avoid regulatory issues because no property rights are transferred and authorities favour alliances over acquisitions. Nonetheless, partnership is associated with numerous problems during its life cycle and is effective only in limited circumstances. Hence, the literature offers no conclusive framework for evaluating Alliances vs. Acquisitions. Section Four outlines factors influencing the choice between alliances and acquisitions. The academic literature identifies industry and organisational factors in decision making. Industry factors are concerned with the level of uncertainty in the industry as well as competitive and strategic issues. Additionally, various industries appear to experience waves of specific organisational forms in a given period of time because of managerial inertia and competitive forces. Organisational factors involve typologies of assets and the benefits that organisations look for. Specific characteristics, such as size, location, and structure, also appear to be significant in favouring one organisational form over the other. In conclusion, network proximity encourages the exchange of information

and inter-organisational trust in alliances, but does not favour the evaluation of assets and technological know-how in acquisitions.

Section Five analyses the integration process in alliances, when two partners proceed with acquisitions. Alliances appear to support the conditions for a subsequent acquisition to occur. Indeed, organisations reduce information asymmetry and prevent opportunistic valuations when they cooperate in alliances. Additionally, alliances work as real options, when organisations share risks for future opportunities. Alliances are also instrumental in discovering untapped synergies among organisations as well as solving internal alliance issues. Alliances also fulfil strategic objectives when organisations prevent competitors in concentrated industries from acquiring their partners. Empirical studies appear not to support the tendency in alliances to evolve into acquisitions. Therefore, alliances and acquisitions are evaluated as independent and exclusive organisational choices.

In conclusion, Section Six focuses upon alliances with minority equity links. Equity links in alliances act as signals for asset quality and prevent opportunistic behaviour between partners. Moreover, shares in alliance partners can be profitable investments because alliances contribute the disclosure of fine-grained information on assets. Equity alliances have a similar propensity to pure alliances evolving into acquisitions, hence they are considered as independent investments, rather than intermediate organisational forms toward acquisition.

### 3.1. ACQUISITIONS AND ALLIANCES AS ALTERNATIVE ORGANISATIONAL FORMS

Organisations depend on the external environment to accomplish their operations and achieve their strategic objectives. The links with the environment that organisations establish are essential to complete their internal processes and influence their life cycle. Numerous researchers focus on the methods that companies use to establish their links with the environment and introduce distinct and, in some cases, contrasting theoretical approaches. The major theories on alliances have been already summarised in Chapter 2, however, the following arguments emphasise potential alternatives for organisations.

The Transaction Cost Economics (TCE) approach (Williamson 1979, 1981, 1985, 1991) suggests that companies need a specific combination of assets and capabilities to develop their products and establish profitable customer relationships. Assets and capabilities are combined to enhance business efficiency. Organisations can use alternative mechanisms to secure the necessary complementary assets (Balakrishnan and Koza, 1993):

- 1) *contracts*
- 2) *hybrid forms*
- 3) *hierarchy* – acquisition and Greenfield investments

Organisations have the opportunity to acquire the required assets from external providers and define the terms of exchange through spot or long-term contracts. Nonetheless, contracts cannot be used in every circumstance. Contracts are settled in a specific time range and can include no major environmental and organisational changes. In addition, quality standards and technical specifications are in some cases difficult to specify in advance for assets that are integrated in unique business processes. Consequently, organisations can be exposed both to opportunistic behaviour and continuous bargaining by external providers that increase their

transaction costs, i.e. the costs related to market transactions (Balakrishnan and Koza, 1993).

If contracts are not suitable, organisations can allocate resources to develop their necessary assets in-house. However, Greenfield investment can be less effective if assets can be shared at a low marginal cost with one or more organisations. As a pre-condition, the owner of the assets is disposed to allocate its assets to others and its own costs do not significantly increase in sharing its assets (Hennart, 1988). Under these circumstances, acquisition or some hybrid forms of cooperation will be the preferred choice to minimize both transaction and production costs.

The Resource-Based approach states that competitive advantages in organisations are determined by the combination of their internal resources (Rumelt, 1984). The resources are composed of intangible and tangible assets, which are connected semi-permanently with the organisation (Wernerfelt, 1984). Consequently, organisations continuously search to obtain the resources that are required to achieve competitive advantage and share their valuable resources for the exchange of others (Eisenhardt and Schoonhoven, 1996).

In general, organisations rely on market exchanges to procure their resources. If markets offer efficient flows of assets, organisations autonomously build their optimum level of resources. Nevertheless, some assets can be unavailable in market exchanges because they are inextricably combined, or embedded in one organisation (Chi, 1994). Organisations will then depend on acquisitions or strategic alliances to get or put forward their valuable resources and gain otherwise inaccessible competitive advantages (Das and Teng, 2000).

Despite the contrasting approaches, both theories support the idea that acquisitions and alliances are alternative and sometimes exclusive forms of governance (Wang and Zajac, 2007; Garette and Dussauge, 2000), if contracts and in-house investments are not feasible or efficient options. Hence, it is relevant to determine both reasons and circumstances that are evaluated in selecting alliances or acquisitions.

## 3.2. DRAWBACKS TO ACQUISITIONS

Scholars (Hennart and Reddy, 2000) underline how acquisitions are affected by significant drawbacks. Organisations will take into consideration strategic alliances in order to get their required assets as well as avoid acquisition drawbacks.

### 3.2.1 Ex-Ante Costs

Organisations incur relevant ex-ante costs in planning and settling acquisitions that can potentially offset acquisition benefits. Ex-ante costs primarily originate from valuation problems in acquisitions (Chi, 1994). Organisations are rationally prepared to sell their assets only if the net asset value corresponds to the offered price (Balakrishnan and Koza, 1993). Among different bids, organisations will accept the highest bid matching its value estimation for its assets. In some cases, information on the value of the assets is either not available to external sources or cannot be retrieved at low cost (Reuer, 1999). Assets can be organisation-specific and their relative value depends on the unique business process they are involved in, therefore corresponding markets, in which identical assets are traded, are difficult to find. Moreover, intangible assets are complex to estimate, especially if involving tacit knowledge (Ghosh, 2004; Reuer, 1999). As Ranft and Marsh (2008) point out, external organisations have problems in estimating in advance which knowledge-based assets can be transferred and effectively employed in their value chain. When tacit knowledge is involved, quality is also more difficult to measure with no reduction in property rights (Dushnitsky and Shaver, 2009; Vanhaverbeke et al., 2002).

Due to valuation problems, buyers can start the negotiation process with evident information asymmetry (Gartner and Schmutzler, 2009). Buyers will therefore be exposed to the opportunistic behaviour of the target firm, which can take advantage of the information gap and misrepresent the value of the assets. Given that pre-acquisition inspections can be unreliable, the target firm has the opportunity to

deceive efficiency or productivity outcomes, or conceal quality and organisational problems (Gartner and Schmutzler, 2009; Balakrishnan and Koza, 1993).

Ravenscraft and Scherer (1987) underline how transactions in complementary assets are affected by “adverse selection”. Acquirers are aware of the potential bias in asset value and discount bids accordingly. The organisations with the highest quality assets are consequently prevented from trading; otherwise, they have their asset value discounted (Akerlof, 1970). In addition, acquirers can miss their targeted assets if their offer is below the perceived value that is associated with the targeted assets of the target company. Nevertheless, the bargaining process between the acquirer and the target company contributes to limit the discrepancies between the offer and the perceived value (Ravenscraft and Scherer, 1987).

Acquisition outcomes can also be affected by the “indigestibility problem” (Beamish and Banks, 1987). One organisation can look for specific assets and proceed to an acquisition, nevertheless, its required assets may be just a portion of the target organisation (Hennart, 1988). Therefore, the organisation acquires a subset of assets that do not contribute to its business process. In addition, through the transaction, the organisation inherits both the strengths and weaknesses of the target organisation and may incorporate unprofitable business units in unrelated fields (Pekar and Margulis, 2003). Hennart and Reddy (1997) underline how the acquisition will inevitably mean unneeded assets if required assets are combined with other assets that are difficult to separate. As redundant assets are usually organisation-specific, they can be problematic to sell at book or other fair value in the market (Reid et al., 2001), and will appear as “indigestible” for the acquirer. The “indigestibility problem” can also originate from one organisation needing assets for a limited period of time. At the end of the period, assets will become “indigestible” for the organisation (Das and Teng, 2000).

“Indigestible” assets will result in increased administrative and managerial costs as well as transaction losses (Hennart, 1988).

In conclusion, acquisitions often entail significant financial efforts for organisations. Financial resources are decreased either by high debt or shares issuance for purchase

payments, in particular if the target company allowed the acquisition to recover its financial problems. Empirical research (Fredd, 2005) shows how decreased financial resources after an acquisition, expose organisations to significant problems in periods of economic recession.

### **3.2.2 Ex-Post Costs**

In addition to ex-ante costs, organisations can confront ex-post costs associated with acquisitions. Ex-post costs can counterbalance advantages that acquired assets bring to organisations.

Cartwright and Cooper (1993) argue that organisations possess a unique culture that evolves from both the personalities of founders and the actual leaders and internal reactions to environmental forces. Organisational culture tends to resist following environmental changes, because it is based on successful adaptation to the environment (Gordon, 1991). Indeed, organisations have problems modifying organisational culture, which becomes embedded in existing values and procedures and interferes with necessary adjustments to external changes (Kotter and Heskett, 1992). Organisations often become aware of a lack of flexibility in their organisational culture when they proceed to acquisition, which is perceived as a major environmental change (Chatterjee et al., 1992) and opposed by the organisation as such. Reus and Lamont (2009) specify that differences in organisational culture produce divergent results during the integration process. Organisational differences may cause disruptions during the integration, but in some cases, they have enriching effects because organisational diversity is a pre-condition for learning. Organisations are, however, required to design specific mechanisms and systems in order to exploit the learning opportunities, otherwise, organisational differences will exclusively create problems in the post-acquisition process.

Specifically, organisations go through relevant task challenges in merging their operations. Task challenges originate from potential incompatibilities both in business systems and performance measurement procedures (Marks and Mirvis, 1992). Differences in information systems as well as accounting practices can

generate operational disruptions in the initial integration period. Task challenges grow stronger if merging companies are dispersed geographically. Geographic dispersion reinforces both communication and resource allocation problems, and exposes organisations to diverse local rules and regulations (Brannen and Peterson, 2009; Schraeder and Self, 2003).

Labour issues can also be a potential source of costs in the integration process. Senior executives rationally evaluate economic and strategic factors behind the combination of two organisations. However, in most cases, the workforce is detached and unaware of management intentions and perceives the acquisition as a chaotic set of events that can affect their future prospects (Ashkenas and Francis, 2000). Integration is thus regarded as an emotional and hostile process and the workforce tends not to cooperate with senior management (Reus and Lamont, 2009; Buono, 2003). Brannen and Peterson (2009) demonstrate how acquisitions, particularly cross-border acquisitions, are frequently associated with alienation for specific categories of employees. Alienation is defined as a condition in the post-acquisition process where employees feel estranged and disconnected from the merged organisation and get increasingly isolated from the rest of the organisation.

In addition to the negative reactions of the workforce, the merging organisations combine two existing corps of employees with their own routines and operational standards (Hennart and Reddy, 1997). Consequently, work units involved in the merger are required to be instructed and reorganised, and dysfunctions need to be minimised. The top management is also required to directly intervene in the integration process and constantly promote the positive effects of the acquisition to their employees (Brannen and Peterson, 2009).

Top executives in the acquired organisation could also cause concerns in the merging process. Top executives have less incentive to perform in the joint entity (Haleblian et al., 2009; Hennart, 1988), and concentrated ownership can conflict with performance-based incentive schemes (Burkart et al., 1997). Moreover, key members of the acquired organisation can quit the organisation immediately after the transaction is concluded (Haleblian et al., 2009). The departure of key members

could be problematic if they hold specific knowledge and/or intangible assets that motivated the acquisition in the first place (Reid et al., 2001). Generally, the top management in the acquired company departs because they are unwilling or unable to adapt to the new corporate culture (Salama et al., 2003). As an alternative, key members can be hired by the acquiring organisation and transferred into other business units. Part of the organisation's top management can also resign and start up a new organisation, which competes directly with the organisation they departed from (Chen and Hennart, 2004).

Barney (1988) argues that acquisitions result in above-normal returns only if private and uniquely synergistic assets are involved. Such assets imply that no outside bidders possess information on private asset combinations (Gartner and Schmutzler, 2009) and no other combination of organisations could produce identical synergistic values. Otherwise, pricing for the target organisation will bid upwards until the additional acquisition price absorbs potential synergy (Harrison et al., 2001). As a consequence, organisations are forced to bet on the value for target assets in order to achieve above-normal gains from the acquisition. High-technology assets are primarily exposed to value uncertainty, since technological synergies significantly vary and technological trends are difficult to predict (Lambe and Spekman, 1997).

If organisations can readily separate assets in merged organisations, value uncertainty will not cause significant problems. Otherwise, high exit barriers in acquisition reduce organisational flexibility and multiply negative effects for wrong asset evaluation and post-merger dysfunctions (Larraine, 2000). Additionally, investors often react negatively to acquisition announcements, hence the stock price depreciates in the short term (Harbison and Pekar, 1999).

Given potential ex-ante and ex-post costs, organisations that accomplish acquisitions are significantly exposed to failure – failure being defined as “an actual and persistent post-transaction loss in market capitalisation for the acquiring company, persistent market underperformance or both” (Pekar and Margulis, 2003, pp. 57).

### **3.2.3 Regulatory Issues**

In addition to ex-ante and ex-post costs, acquisition may not be viable for legal, regulatory and political reasons (Reuer, 1999). National and regional governments can preclude access to specific assets in some industries for strategic and economic motives (Battena and Xuan, 2009). In addition, anti-trust authorities – principally in the US (Davis, 2009) and the European Union (EU) (Renda, 2010) – appear to react adversely to rapid expansion in acquisition rates. For political reasons, national authorities can also restrict specific acquisitions if “national champions” are acquired by foreign organisations (Renda, 2010).

### **3.3. FAVOURING ALLIANCES TO ACQUISITIONS**

Numerous studies (Reuer and Shen, 2003; Balakrishnan and Koza, 1993) confirm that strategic alliances balance out acquisition downsides and simultaneously achieve the targeted assets. Indeed, the next part of the section demonstrates how strategic alliances can replace acquisitions because alliances allow organisations to both achieve cost reductions and avoid regulatory problems while fulfilling the same objectives as acquisitions. Nevertheless, alliances show problems during the implementation process and can be considered effective and efficient alternatives only in specific circumstances.

#### **3.3.1 Cost Reductions**

As two organisations work together in an alliance, they have the opportunity to learn about their partner's procedures and operations (Gulati et al., 2009; Balakrishnan and Koza, 1993). In this way, organisations can interpret value for their targeted assets more effectively and acknowledge potential synergies that originate from cooperating. Consequently, alliances can reduce both valuation costs and risks related to asset incompatibilities (Hennart and Reddy, 1997). Moreover, Akerlof (1970) outlines that high-quality firms are prevented from engaging in acquisitions because of "adverse selection" (Chapter 3, section 2.1). An accurate evaluation of intangible assets is difficult to accomplish, hence organizations tend to discount their offer for intangible assets in order to minimise losses in case of incorrect evaluation. Therefore, firms with high-quality intangible assets tend to decline acquisitions otherwise they will have their assets traded at discounted prices. On the contrary, firms with low-quality intangible assets will avoid alliances to withhold information on their assets because alliances are confirmed to be signalling mechanisms for the value of intangible assets (Reuer and Shen, 2003). The alliance process can thus offer indications for potential buyers to distinguish between attractive and unattractive targets.

Through partnership, organisations can get access to valuable assets for their business processes, and they do not have to “digest” unneeded assets, which are embedded in the acquired organisation. Costs for “indigestible assets” (Chapter 3, section 2.1) are then saved because less valuable or redundant assets are excluded by the agreement (Reid et al., 2001). In addition, organisations can, in some cases, require assets for a limited period of time (Das and Teng, 2000). In alliances, the organisation can readily stop using the assets of the partner that become unnecessary because the assets are not owned by the organisation (Wiklund and Shepherd, 2009), whereas in acquisitions, the organisation is required to sell or dispose of the unnecessary assets of the targeted firm with a potential transaction loss (Das and Teng, 2000).

Asset disposal is facilitated if companies have already specified conditions for the alliance termination when they establish the alliance.

Organisations are required to invest less financial resources for alliances than acquisitions (Reid et al., 2001; Porter and Fuller, 1986). In most cases, alliances exclusively require initial investments in operational systems and communications, therefore, the alliance will secure organisations from potential financial problems after the first implementation process.

Organisations, in general, perceive alliances as minor innovations for their structure. Organisations assume that they will keep some degree of autonomy even if alliances include broad business areas, hence organisations will not interfere with alliance operations. Additionally, organisations can combine limited functions at first and then gradually proceed to include key assets, once they have solved relevant incompatibilities (Kale and Singh, 2009). Alliances allow the adaptation of the agreement to different contexts, and avoid post-merger organisational issues. As underlined in Chapter 3, section 2.2, the organisational culture tends to resist the required changes in acquisitions while significant task challenges have to be solved when merging operations (Garette and Dussauge, 2000).

Commonly, alliances set off more favourable reactions in the labour force than acquisitions. Partnership is not associated with significant staff restructuring, hence the workforce is inclined to support top management in the alliance implementation (Plugs, 2004). Operations in the alliance are perceived as no disruption for job routines because they concern specific areas of the organisation. Additionally, if combined tasks are gradually introduced, working units involved can be restructured to minimize incompatibilities and dysfunctions.

Furthermore, alliances safeguard top management incentives in the targeted organisation, and maintain incentive schemes that are set to improve performance (Kale and Singh, 2009; Hennart and Reddy, 1997). In alliances, top managers are less likely to resign because the required cultural changes in the organisations are progressively applied. Additionally, given that no ownership rights are transferred, top managers have no reason to leave and set up a new organisation, or be redeployed in other business units.

Organisations incur lower costs in alliances than acquisitions when the real value of the assets turns out to be lower than the initial estimated value. In this case, organisations can either reduce their commitment to the alliance or terminate the alliance altogether with minor costs (Wiklund and Shepherd, 2009). In contrast, in acquisitions, organisations are subject to either having their overall accounting value discounted or confronting transaction losses and problems when selling the overestimated assets (Reuer and Shen, 2003). Transaction problems emerge because potential buyers still need to evaluate both the assets' quality and value potential for their own organisations (Reuer and Shen, 2003). In cooperating, organisations can gather relevant information on assets and respond to environmental and organisational changes (Oxley et al., 2009; Neill et al., 2001). In addition, alliances allow organisations to monitor different technologies and keep the necessary flexibility to shift to technologies that are successful in the market (Buckley et al., 2009; Lambe and Spekman, 1997).

### **3.3.2 Regulatory Issues**

National and regional authorities can prevent specific assets from being transferred because strategic and economic interests can be affected (Battena and Xuan, 2009) (Chapter 3, section 2.3). Organisations can bypass national regulations through alliances because assets are not permanently displaced by other organisations and can be easily re-integrated (Jandik and Kali, 2009). Indeed, governments in some cases favour partnerships between local and foreign organisations because local organisations can get significant technological and economic advantages. Joint ventures are the preferred alliance form to guarantee development for local organisations (Jandik and Kali, 2009).

However, anti-trust authorities are less flexible if alliances involve strategic business areas and partners belong to concentrated industries (Renda, 2010).

### **3.3.3 Alliance Implementation**

Following the aforementioned arguments, organisations should choose strategic partnership as the most viable and efficient option, and leave out acquisitions when organisations look for specific assets and find contracts and in-house investments unfeasible or inconvenient. Nonetheless, strategic partnership is no straightforward and flawless process. As underlined in Chapter 2, section 12, several problems affect the alliance life-cycle that can undermine synergies and cause alliance termination. Therefore, alliances are unstable organisational forms, hence they cannot be applied in every context. It has therefore been confirmed that no defined framework emerges from the literature for the acquisition and alliance evaluation process. The literature offers no unambiguous guidelines, hence specific circumstances are to be evaluated when choosing between acquisitions and alliances.

Nevertheless, the above arguments contribute to defining the decision process that is carried out by different organisations and additional investigation should be undertaken. Furthermore, different studies offer interesting suggestions on the factors

that decision makers should evaluate in selecting alliances or acquisitions. The following section briefly reviews these studies.

### **3.4. FACTORS WITH ALTERNATIVE FORMS**

Hagedoorn and Duysters (2002) distinguish between two categories of factors influencing choice between alliances and acquisitions: industry factors and organisation factors.

#### **3.4.1 Industry Factors**

Various researchers (Wiklund and Shepherd, 2009; Datta et al., 2009; Wang and Zajac, 2007; Hoskisson and Busenitz, 2001) confirm that strategic alliances are preferred to acquisitions if a high level of uncertainty exists in the industry. Uncertainty in the industry is primarily related to information asymmetry (Wiklund and Shepherd, 2009; Wang and Zajac, 2007), where organisations find it difficult to gather information on each other's assets, operations, and environments. Information asymmetry causes problems for both alliances and acquisitions, however, risks are lower for alliances because alliances enable organisations to constantly reevaluate their contributions to the alliance relationship (Wang and Zajac, 2007) and offer lower exit barriers if unfavourable information is gradually disclosed (Wiklund and Shepherd, 2009).

In addition, Datta et al. (2009), Hagedoorn and Duysters (2002) and Vanhaverbeke et al. (2002) reason that the level of uncertainty is directly related to the degree of technological significance and change within the industry. Hence, high-tech and young industries have a high level of uncertainty due to the fluid state of technology and technological significance in the marketplace. Strategic alliances are effective in uncertain environments with rapid technological adjustments because organisations can get involved in small-scale investments and focus on evolving technologies (Datta et al., 2009; Ciborra, 1991). Nonetheless, as technology consolidates, the level of uncertainty slows down and the necessity for flexible organisational forms

declines accordingly. In this case, organisations tend to prefer more formal and established modes of organisation such as acquisitions, because opportunities for internal growth become limited and profit margins are dependent upon corporate size (Hagedoorn and Duysters, 2002; Vanhaverbeke et al., 2002).

Competitive and structural issues also appear to influence choice between organisational forms. As underlined by Hennart and Reddy (1997), in concentrated industries, organisations tend to proceed to acquisitions rather than alliances in the form of greenfield joint ventures because acquisitions add no capacity within the industry and leave unchanged profit margins. These arguments can be extended to all typologies of strategic alliances, because alliances generally maintain the existent level of resources, whereas acquisitions prompt rationalisation (Wang and Zajac, 2007). In addition, Haleblan et al. (2009) assert that the reduction of competition in the industry through acquisitions increases the pricing power at an organisational level.

Wang and Zajac (2007) and Dyer et al. (2004) point out that acquisitions are also preferred in highly competitive environments. Decision makers seek to avoid potential conflicts, which emerge in alliances with direct competitors, and consequently step up to full acquisition.

Apart from specific regulatory measures (Chapter 3, section 2.3; Chapter 3, section 3.2), the regulatory environment can influence the choice between strategic alliances and acquisitions as modes of entry into a foreign market (Jandik and Kali, 2009). Organisations are inclined to favour alliances in markets that experience high- or low-quality accounting and legal systems, whereas organisations tend to prefer acquisitions in markets that experience average-quality accounting and legal systems. The assumption is that high-quality accounting systems allow the firm to measure and interpret organisational performances, and high-quality legal systems allow the firm to rely upon third-party institutions if relational contracts, such as the contracts establishing the alliance (Chapter 2, section 6), are not followed. Organisations prefer alliances with low-quality accounting and legal systems because alliances consent to minimise the losses if the target partner incurs low performance, given the

low exit barriers in alliances (Wiklund and Shepherd, 2009) (Chapter 3, section 3.1). As the quality of the legal and accounting systems improves, organisations will gradually prefer acquisitions over alliances. Nevertheless, when the quality of the legal system grows high, relational contracts will be able to stand on their own and property contracts in acquisitions and relational contracts in alliances will become substitutes. At this point, alliances will be preferred because alliances are exposed to lower economic, social, and political risks in the foreign market compared to acquisitions (Jandik and Kali, 2009).

Specific typologies of organisational forms appear to occur in waves in a number of industries (Arikan and McGahan, 2010; Collins et al., 2009; Hagedoorn and Duysters, 2002; Osborn and Hagedoorn, 1997). In a given period of time, organisations in one industry establish a set of preferences and concentrate either on partnering or acquisitions. Vanhaverbeke et al. (2002) argue that strategic alliances or acquisitions become fashionable and trigger “bandwagon effects” for competitive reasons. Nevertheless, Vanhaverbeke et al. (2002) find no empirical evidence for trends in organisational forms in their study and do not support “bandwagon effects” either for acquisitions or alliances.

Conversely, Arikan and McGahan (2010) and Osborn and Hagedoorn (1997) argue that organisations look for rules of conduct for acquisitions and alliances and develop specific organisational capabilities for conducting alliances and acquisitions that are copied over time before becoming institutionalised. Specific capabilities are created because some activities in conducting alliances or acquisitions cannot be simulated and learned independently. Specific capabilities will develop dynamically over time and will deliver advantages in the management of acquisitions or alliances, hence organisations possessing such capabilities will duplicate their modes of governance, establishing a path dependency for either acquisitions or alliances (Arikan and McGahan, 2010). In addition, Collins et al. (2009) demonstrate how acquisitions and alliances enable the firm to develop a specific type of knowledge in international activities. Organisations will exclusively accumulate knowledge on the general formation process when establishing domestic acquisitions or alliances and will not

develop the intimate knowledge of the international complexities of cross-border alliances and acquisitions. Moreover, different countries offer different opportunities for acquiring specific knowledge, hence, acquisition or alliance waves will exclusively happen in similar regions in international activities (Collins et al., 2009).

### **3.4.2 Organisation Factors**

In addition to industrial factors, organisation-specific factors influence decision makers in choosing between alliances and acquisitions. Alliances and acquisitions are both used to access valuable assets and to benefit from synergies and complementary capabilities. However, the literature suggests that specific advantages are pursued more effectively using one organisational form over the other.

As underlined by Garette and Dussauge (2000) and Hoffmann and Schaper-Rinkel (2001), acquisitions are more efficient than alliances when organisations look for economies of scale. Organisations have to extensively rationalise their operations and redeploy their assets in order to gain economies of scale, and acquisitions appear to be more suited to accomplish necessary downsizing (Haleblian et al., 2009). Efficiencies in acquisitions are particularly relevant when organisations show many duplicated resources. In this case, organisations achieve significant efficiencies in acquisitions by eliminating redundancies and centralising the production processes (Wang and Zajac, 2007).

In acquisitions, key controversies can be settled by the top management, whereas in alliances, decision making centres remain independent and controversial issues require consensus through complex negotiations (Wang and Zajac, 2007). As a consequence, in alliances, contentious resolutions, such as eliminating redundant assets and streamlining production lines, can be postponed or abandoned and the rationalisation process is consequently set back (Garette and Dussauge, 2000).

Instability in strategic alliances (Wiklund and Shepherd, 2009) can also preclude the completion of the rationalisation. Organisations are aware that their partners can abruptly terminate the alliance agreement, hence they avoid activities that impede their operations from running independently. For instance, organisations in alliances

find it inappropriate to close their own plants and so may concentrate on the production activities in the partner's plant. Nonetheless, this compromises production rationalisation and potential economies of scale (Dyer et al., 2004; Garette and Dussauge, 2000).

Following similar arguments to economies of scale, different authors (Haleblian et al., 2009; Houston et al., 2001; Chatterjee, 1992) suggest that acquisitions are favoured over alliances when high-performing organisations target low-performing organisations. Low-performing organisations offer many opportunities for restructuring and streamlining that can be exclusively achieved through acquisitions, because acquisitions enable organisations to redeploy and cut specific assets. Nonetheless, Haleblian et al. (2009) and Clark and Ofek (1994) point out that severely distressed organisations are difficult to restructure and can threaten the long-term performances of the acquiring organisations, therefore, alliances can be favoured after a certain point in order to minimise the risks and attempt a first cooperation with deeply troubled organisations.

Acquisitions are effective for operational restructuring, but they show a high rate of failure when applied in new businesses and when acquiring new capabilities (Bekier et al., 2001; Garette and Dussauge, 2000; Bleeke and Ernst, 1991). When acquisitions are applied to diversification into new businesses, organisations have problems in finding resources for funding acquisition costs (Chapter 3, section 2.2) and simultaneously acquiring expertise in the new businesses. Conversely, alliances are appropriate for entering new businesses because they minimise risks of failure and leave enough financial and managerial resources to deal with new environments. As outlined by Bleeke and Ernst (1991) and Bekier et al. (2001), alliances are also suited to diversifying activities in new geographic locations. However, if companies share activities in the same geographic market, alliances will often lead to competitive conflicts.

Following these arguments, a number of authors (Vanhaverbeke et al., 2002; Hennart and Reddy, 1997; Gomes-Casseres, 1998) reason that strategic alliances are favoured when target organisations belong to different industries, whereas acquisitions are

preferred when target organisations are in the same industry. Hennart and Reddy (1997) point out that post-merger issues (Chapter 3, section 2.2) are less significant for organisations in the same industry because corporate cultures and operational routines tend to be similar. In addition, Gomes-Casseres (1998) argues that the propensity for acquisitions increases when companies have similar technological assets, i.e. they belong to the same industry or industry segment. Indeed, organisations find it easier to estimate asset value for organisations in their own industry or segment, and information asymmetry and potential opportunistic behaviour (Chapter 3, section 2.2) are limited. Consequently, in the same industry, organisations tend to establish acquisitions rather than alliances because both ex-ante and ex-post costs decrease.

Strategic factors also play an important role in the decision process. Organisations are inclined to adopt acquisitions rather than alliances if activities in their core businesses are involved (Lee and Lieberman, 2010; Hagedoorn and Duysters, 2002; Bleeke and Ernst, 1991; Harbison and Pekar, 1999). Decision makers attempt to avoid opportunistic behaviour against their major operational activities, otherwise they expose their organisations to relevant risks. Consequently, they select acquisitions in order to ensure full control for their key assets (Hagedoorn and Duysters, 2002). Moreover, through acquisition, organisations seek to prevent uncontrolled transfers in knowledge that could entail possible competitive moves in their core businesses. In addition, acquisitions are favoured when the organisations plan to extend their offers to new products that are strictly related to the organisation's existing products in their primary business domain (Lee and Lieberman, 2010). Organisations have the opportunity to evaluate more effectively the resources and capabilities of other organisations inside their primary business domain and can act opportunistically, if the price of the other organisations becomes advantageous. For the same reasoning, organisations will prefer acquisitions if the organisations have been related to the market of the new products for a long period of time (Lee and Lieberman, 2010).

Acquisitions and alliances can involve organisations within the same country or from different countries. According to Transaction Cost Theory (Chapter 2, section 2.1; Chapter 3, section 1), transaction costs increase in cross-border alliances because international contracts are exposed to uncertainty (Jandik and Kali, 2009). As a result, organisations proceed instead to acquire foreign target organisations, ensuring further control and lowering monitoring costs (Hagedoorn and Sadowski, 1999). Nevertheless, as mentioned above, strategic alliances appear to be effective when expanding into new locations. Furthermore, information asymmetry is expected to rise in cross-border acquisitions, since pre-merger inspections are complicated by geographical and language barriers (Vanhaverbeke et al., 2002). Organisational and cultural issues can also make post-merger integration problematic because operational systems and corporate values differ considerably among foreign organisations (Schraeder and Self, 2003).

To conclude, most studies appear to confirm that alliances are preferred to acquisitions when foreign organisations are involved. Indeed, Hagedoorn and Sadowski's (1999) empirical results on cross-border alliances are in contrast to the transaction cost perspective. Nevertheless, Wiklund and Shepherd (2009) argue that the performances that are associated with alliances and acquisitions between foreign organisations are independent of the governance form and mostly depend on the integration process between organisations. The performances of alliances and acquisitions between foreign organisations are therefore a function of the managerial activities during the integration process rather than the choice of the governance form.

The choice between alliances and acquisitions can also be influenced by internal agency problems, i.e. managers will follow strategies that reflect their own personal interests rather than the interests of the organisation (Fama and Jensen, 1983). Datta et al. (2009) argue that managers tend to avoid acquisitions and favour alliances because alliances are low-risk strategies that allow the firm to maintain contractual job stability even if alliances deliver low performances and lead to unexpected termination (Chapter 2, section 12). Conversely, acquisitions are exposed to organisational disruptions (Chapter 3, section 2) that can threaten both the job

positions and incentives for the managers. Nevertheless, a number of scholars (Gartner and Schmutzler, 2009; Haleblan et al., 2009) contend that internal agency issues result in managers favouring acquisitions over alliances because acquisitions allow managers to expand their control and boost their confidence and self-gratification. Moreover, incentives for acquiring managers generally increase in the form of equity and bonuses (Harford and Li, 2007), and industries with high managerial compensation show an intense acquisition activity (Haleblan et al., 2009).

Problems with the top management of a target organisation can also induce the other organisation to choose the acquisition over the alliance. Indeed, acquisition provides the authority for dismissing and replacing the existent top management and change the strategic direction of the target organisation, whereas alliances force organisations to cooperate with the existing management (Haleblan et al., 2009).

Organisational size is also significant in choosing between alliances and acquisitions. If the target organisation is small, the acquirer is likely not to experience “indigestibility problems” (Chapter 3, section 2.2) in acquisitions. Since unnecessary assets are, in general, minimal in small organisations, the acquirer can benefit from the required assets with no additional costs (Hennart and Reddy, 1997). As size increases, the acquirer can still minimize additional costs if the target organisation is structured around divisions. In this case, the acquirer has the opportunity to exclusively purchase the divisions that include required assets. Conversely, the acquirer can incur important losses in large and non divisionalised organisations due to unneeded assets; hence strategic alliances can be more suited for such organisations (Hennart and Reddy, 1997).

Additionally, according to Foray (1991), large organisations possess significant financial and managerial resources that entail a high degree of strategic freedom. Consequently, large organisations are capable of sustaining costs and tasks related to acquisitions, whereas small firms usually select less complicated strategic alliances. Nonetheless, Haleblan et al. (2009), Healy et al. (1992), and Cornett and Tehranian (1992) argue that acquisitions among large firms generate high positive accounting

performances because organisations have the opportunity to both increase the productivity of the assets by centralising the production processes and to improve their market positioning by sharing marketing resources in similar markets.

In conclusion, network distance appears to influence decisions on organisational forms. Two organisations can be indirectly connected through an existing network of organisations (Chapter 1, section 7). Indirect ties inside the network favour the exchange of both information and tacit knowledge among network members. Moreover, organisations, which are embedded in networks, develop inter-organisational trust because indirect ties and information flows act as constraints for opportunistic behaviour (Swaminathan and Moorman, 2009; Gulati, 1995, 1998).

However, indirect ties are unlikely to bring about the exchange of fine-grained information for evaluating corporate assets and technological know-how. Hence, indirect ties do not mitigate information asymmetry problems in acquisitions (Luo and Deng, 2009; Vanhaverbeke et al., 2002). Network constraints also make a high level of control unnecessary on target companies and encourage looser forms of organisations (Uzzi, 1996). As a result, if two organisations belong to the same network, strategic alliances appear to be appropriate to achieving high flexibility as well as a high level of control.

### 3.5. THE INTEGRATION PROCESS

Academic research shows that organisations evaluate different issues in choosing alliances or acquisitions. However, organisational forms are not static, but can evolve over time. In this perspective, different studies (Todeva and Knoke, 2005; Spekman et al., 1998) outline that alliances can develop into full acquisitions and that alliance relationships can indeed favour pursuing acquisitions.

Numerous reasons can be pointed out to explain why alliance partners may be encouraged to proceed to acquisition. According to Dalziel (2009) and Kogut (1991), alliance investments can in some cases be associated with the real option, which is defined as an operational investment for future opportunities that need not be exercised. For specific investments, prospecting to exploit future opportunities is a relevant part of the asset value and can increase the overall value of the organisation. Through alliances, organisations can engage in investments with significant real options and share risks and costs as they expand in profitable but uncertain fields (Oxley et al., 2009). Alliances are therefore effective mechanisms to access a broad window of opportunities and reduce development costs. In this way, partners can differentiate their portfolio of activities and explore opportunities in new technologies, new products, and new markets (Chang et al., 2008).

Nonetheless, if opportunities are proven to be valuable, alliance assumptions are no longer valid. Alliance partners no longer necessitate hedging investment risks and are required to commit further capital to achieve gains in opportunities. Hence, alliance agreement is to be renegotiated and acquisition is likely to be exercised (Dalziel, 2009). If one party places a higher value on the investment opportunity, it can decide to avoid alliance re-negotiation and secure the opportunity through acquisition, before redeploying further capital. In general, the divesting organisation is prepared to sell because it possesses no adequate resources to develop the opportunity by itself (Teece, 1987). Furthermore, partners can determine that the alliance offers no sufficient scope for capitalizing the opportunity, thus they merge their operations.

Following these arguments, Haspeslagh and Jemison (1991) apply the real option prospect to the alliance itself. Organisations are prepared to invest in another organisation's assets and capabilities; hence they investigate acquisition opportunities through alliance. Bowman and Hurry (1993) add that organisations apply sequential choices in incremental options that allow them to make a small investment – the alliance – and then postpone option striking – the acquisition, when the alliance opportunity is proven to be valid.

Kogut (1991) argues that organisations find it convenient to exercise the option and acquire partners immediately after the opportunity is proven. The value of real option is indeed realised only when investment is accomplished, therefore organisations seek to avoid unexpected changes and renegotiations which restrain predicted cash flows.

Strategic alliances are effective mechanisms to gather useful information about a partner's capabilities and resources and test synergies in matching two organisations (Gulati et al., 2009; Gulati, 1998). As alliances evolve, partners gain an increasing amount of information on respective strengths and weaknesses. Hence, continuing cooperation both decreases information asymmetry on assets and prevents opportunistic valuations by target organisations (Chapter 3, section 2.2) (Vanhaverbeke et al., 2002). In addition, during the alliance life-cycle, organisations become familiar with mutual business systems and procedures. Staff exchanges in alliances also disseminate routines and operational standards, and the workforce becomes accustomed to collaboration (Gulati et al., 2009). Consequently, acquisition ex-ante and ex-post costs decline and partners are in a good position to merge their operations.

As organisations combine their operations in alliances, they tend to realise that there are untapped synergies to exploit if they consolidate. However, organisations are required to rationalise their operations and remove redundant resources in order to achieve available synergies. In particular, if organisations look for economies of scale, this may necessitate both the downsizing of a number of production centres and the centralisation of operations (Dyer et al., 2004). Nevertheless, organisations

are restrained from investing core resources and changing radically their business structure because of the unstable nature of alliances (Garette and Dussauge, 2000). In this case, organisations can proceed to acquisition if they consider that untapped synergies exceed acquisition costs.

Scholars (Oxley et al., 2009; Lyles, 1994; Kogut, 1991) argue that alliances in some cases are not designed for achieving strategic objectives, but are developed as phased divestiture with a future exercise date. In concentrated industries, where oligopolistic forces are in place and acquisition targets are limited, alliances can be instrumental in preventing other parties from acquiring allied organisations. Organisations will proceed to acquisition once financial resources are available and acquisition costs are evaluated. Indeed, acquisition adds no capacity in a saturated industry.

The transition to acquisition can also be caused by problems in partnership. Acquisition is perceived as functional in solving alliance problems. Reuer and Zollo (2005) argue that sudden shifts in strategy affect alliance stability and can result in changes in organisational structure. Alliances are embedded in the partners' evolving strategies (Koza and Lewin, 1998); hence variation in one partner's strategy can compromise the other's. In this case, organisations can proceed to acquisition in order to impose their own strategic direction. Furthermore, alliance performances can be significantly impaired by continuous disputes for control among management. Partnership entails no formalized authority lines, thus managerial resolutions need to go through long negotiation processes. If major disagreements emerge, alliance operations can be slowed down. Acquisition can solve controversies over control because authority lines are re-established and top management can arbitrate organisational disputes.

In conclusion, partners can experience conflicts in sharing alliance benefits. Alliance gains are difficult to evaluate because intangible assets and long-term advantages are involved. Then, partners tend to overestimate their contributions to the alliance and require increasing benefits in exchange. In acquisitions, synergies converge in one organisation and corresponding conflicts terminate.

If partners experience significant problems during an alliance life cycle, Bierly and Coombs (2004) confirm that a takeover is likely to be applied, i.e. acquisition is carried out without the approval of one partner.

As outlined in Chapter 3, section 4.2, large firms are more inclined to acquisitions as compared to small firms because they possess broader financial and managerial resources. If large organisations become over-dependent on small organisations during the alliance life cycle, they get exposed to significant strategic risks. Consequently, by acquiring the small organisation, risks can be minimised and a limited amount of resources employed. Thus, size differences in alliance partners increase the probability for acquisitions in the long-term (Hagedoorn and Duysters, 2002).

According to Bleeke and Ernst (1995), the integration process between alliance partners depends on their relative bargaining power. Bargaining power is a function of both strengths and weaknesses that partners possess and bring to the alliance. If significant imbalances between partners emerge in terms of strengths and weaknesses, the stronger partner is likely to acquire the weaker partner in the long-term. Even if strengths and weaknesses are balanced at the beginning of the partnership, bargaining power can change over time and one party can grow stronger. Usually, if parties invest more in the alliance and assign key senior managers to alliance management, they are likely to obtain further bargaining power. The learning process also plays a role in power shifts. Organisations, which are able to learn more rapidly and efficiently, will maintain their strategic autonomy and become less dependent on their partners.

Finally, Bleeke and Ernst (1995) argue that conflict is likely to emerge and cause potential problems in alliances where product lines and geographic markets overlap. Therefore, partners may necessitate integration to minimise conflict. Conversely, if alliances involve distinctive capabilities and assets, organisations are expected to gain relevant synergies and will avoid changing alliance structure.

Hagedoorn and Sadowski (1999) demonstrate that partnerships that are established for technology purposes are less likely to end up in acquisitions. Technology alliances contribute to the organisational learning process as organisations evaluate new technological opportunities with several alliances. Nonetheless, the learning process becomes less critical when technologies mature, and organisations tend to choose acquisitions at a higher rate in mature industries (Ciborra, 1991).

Bierly and Coombs (2004) add that acquisitions are also favoured when alliances are formed at early stages of technology development, when research is more basic than applied. At these stages, alliances allow an extensive flow of knowledge and learning, and organisations commit significant resources to both learning and integrating new knowledge within an existing knowledge base. At later stages, the technology value in the market will increase and expose organisations to both changes in strategies and attempts by competitors to obtain the technology. As a consequence, integration will be chosen to hedge potential risks to technological evolution.

The above theoretical arguments support the integration process; nonetheless, empirical evidence on transition from alliances to acquisitions needs to be found. Four different studies (Wang and Zajac, 2007; Reuer and Zollo, 2005; Hagedoorn and Sadowski, 1999; Bierly and Coombs, 2004) analyse large organisational samples across different industries and show that only a limited percentage of alliances become acquisitions. Wang and Zajac (2007) show that organisations both reduce information asymmetry and develop mutual understanding of the organisational routines in cooperating with their alliance partners; however, the partner-specific knowledge leads to further cooperation in alliances rather than to acquisitions. Organisations use the increasing knowledge in their partners for identifying further areas of cooperation and do not show any tendency toward acquisitions.

Further evaluations are required in this field, however, it emerges that alliances are precursors to acquisitions only in limited cases, and alliances and acquisitions are generally independent and mutually exclusive resolutions.

### 3.6. EQUITY LINKS IN ALLIANCES

Strategic alliances with minority links are one step closer to integration on a market versus hierarchy axis in the array of cooperation forms (Teece, 1992). Strategic alliances with minority links are defined as equity exchanges between partners that count for less than 50 percent of the total share (Filson and Morales, 2004). Alliances with minority links possess mixed features between pure alliance agreements and acquisitions when proprietary rights are exchanged.

Strategic behaviour for organisations that engage in alliance equity links appears to be contradictory. Indeed, organisations incur extra costs, but avoid having full access and control over targeted assets. However, numerous studies (Kale and Singh, 2009; Chen and Hennart, 2004; Reuer and Zollo, 2005) confirm that equity links serve several purposes that can be achieved neither through pure alliances nor acquisitions. According to quality signalling theory (Spence, 1974), economic subjects that are confident about the quality of their assets tend to deliberately signal it to the market. Consequently, signals can be evaluated as a guide for quality and contribute to reducing search costs. Parties in alliances can signal both the quality of their capabilities and trust in the alliance agreement by engaging in partial deals. Selling parties will show their confidence in the value of the assets with partial sales, whereas buying parties will both secure high-quality assets and save on ex-ante screening costs (Chen and Hennart, 2004). Dushnitsky and Shaver (2009) indicate that in some cases organisations with high-quality technological assets tend not to disclose their inventions because their partners can imitate and independently exploit their inventions, and expose the organisations to competition from their own partners. Conversely, partners prefer not to invest in minority equity investments if the information on the inventions is not disclosed, thus equity exchanges are not established between partners with high-quality assets.

Equity links also contribute to building reciprocity in alliance agreements and reducing opportunistic behaviour in partners (Williamson, 1985). Target

organisations are aware that the remaining value of their assets depends upon the price of shares. Hence, target organisations are motivated to behave less opportunistically, otherwise their remaining shares will devalue. In this way, alliance incentives become aligned (Reuer and Zollo, 2005) and buying parties will save on monitoring costs against ex-post opportunism (Kale and Singh, 2009).

Additionally, buying shares in the alliance's partner can constitute a profitable investment. In working together in alliances, partners gather fine-grained information on the real value of respective assets (Luo and Deng, 2009; Gulati, 1995). Consequently, partners can employ their financial resources in well-known organisations rather than targeting external assets, whose costs and availability are adversely impacted by asymmetric information (Allen and Phillips, 2000).

Empirical evidence shows that equity links are more frequent in R&D industries. The exchange of tacit knowledge is problematic and requires full cooperation from both partners, hence equity links are instrumental in facilitating the learning process as well as transferring technological know-how (Chen and Hennart, 2004). Conversely, equity links are less common for partners in the same industry. Organisations in the same industry hold extensive information and expertise on assets and tend to comply with alliance agreement rules, otherwise their reputation in the industry is affected. In conclusion, organisations are inclined to employ equity links when project value is high in order to minimise the risks related to the project (Filson and Morales, 2004).

Equity alliances have the same probability to become acquisitions as do pure alliances, despite possessing a number of acquisition features (Bierly and Coombs, 2004). Dalziel (2009) demonstrates that the governance structure of the alliance offers weak evidence on the strategic purpose of the equity owner and that equities provide a weak indication of further investment in the alliance partner. Beyond a certain point, propensity for additional investments in shares decreases, in order to keep strategic independence (Todeva and Knoke, 2005). Therefore, equity links are generally evaluated as independent investments with their own rationale, rather than a step towards acquisitions.

## SUMMARY

Alliances and acquisitions are effective ways to acquire and exchange specific assets if organisations are unable to rely on market transactions or internal development. Nevertheless, numerous studies outline that alliances and acquisitions are both affected by downsides and risks, hence organisations need to evaluate different issues before choosing the most appropriate organisational form. The literature offers no exhaustive model or clear-cut guidelines to assist decision makers, still, it suggests factors and recommendations for selecting acquisitions or alliances. Indeed, acquisitions and alliances are interrelated but independent governance forms that are appropriate in separate contexts.

The rationale behind alliances can change if industrial and organisational characteristics evolve, and partners find it convenient to move forward to acquisition. Previous alliance relationships appear to encourage the progress to acquisition. However, “encroachment” strategies behind alliances are still to be proven by empirical evidence.

Equity alliances are also intermediate governance forms, where equity exchanges confer acquisition characteristics on alliances. Nonetheless, statistical observations demonstrate that equity links are, in general, not precursors to acquisitions, but are instrumental in minimising screening costs and preventing opportunistic behaviour.

A systematic investigation is therefore necessary to evaluate interrelations between cooperative and hierarchical forms. Subjective assessments are often employed by decision makers in evaluating alliances and acquisitions because a consistent framework is missing. Therefore, the following steps for this research will be to observe and evaluate how and why organisations establish inter-organisational links in a specific industrial context – the civil airline industry. This study will thus contribute to comprehending further the general phenomenon of governance forms.

# **CHAPTER 4**

## **The Airline Industry**

## INTRODUCTION

This Chapter will define the industrial context where the decision process between strategic alliances and acquisitions is investigated. The airline industry sets the framework in which airline companies evaluate their relationships. The airline industry's trends and characteristics continuously shape the scenario where airlines establish their strategic links and influence the airlines' organisational structures. This Chapter is constituted by eight Sections.

Section One will offer a general definition of the airline industry and will summarise the industry's economic trends in terms of growth and profitability. The main regional markets in the airline industry will be analysed according to their size and economic characteristics. Airline services contribute to numerous economic activities and are essential in international trade and tourism.

Section Two will evaluate the economic structure and boundaries of the airline industry. Monopolistic tendencies are excluded because airlines appear to gain limited scale advantages. The airline industry shows instead oligopolistic tendencies due to network economies of scope and density, which prevent incoming carriers from achieving profits in the long-term.

Section Three will review the regulation framework in the airline industry. Governments have strictly regulated the airline industry for many years in order to prevent oligopolistic pricing and to guarantee airline services. Deregulation has subsequently been introduced to facilitate further competition and increase network efficiency. Western markets all followed the deregulation of the US and the British markets at the end of the 1970s. International Bilateral Agreements were also influenced by deregulation trends and were increasingly liberalized in regional sub-areas. Regulation was in many cases associated with government ownership of airlines in order to ensure national airline services and to control fares. Privatisation

was then implemented for national airlines in developed markets in an attempt to decrease public expenses and enhance airline efficiency.

In Section Four, the main cost areas for airlines will be examined. Carriers need to constantly monitor their costs due to the average low margins and inelastic revenues. Labour and fuel costs are the largest cost areas for airlines. Airline services are labour-intensive and airline staff receive higher wages than other industries' personnel due to high skill-levels and training as well as significant contractual power. Fuel costs depend on the volatile petroleum price plus the margin for jet-fuel refiners. Recent peaks in fuel costs in 2008 and 2011 have significantly eroded airline margins.

Section Five will outline the key segmentation methods that the airlines use to shape their offers according to consumer needs and values. Airline markets are divided according to journey purpose and journey length. Regarding journey purpose segmentation, passengers fly either for business or leisure purposes. Conversely, journey length segmentation classifies the airline market into short-haul and long-haul journeys. In addition, the fifth section will introduce the Frequent Flier Programmes (FFP's) that are widely-applied loyalty schemes in the airline industry. FFP's were initially effective in differentiating airline brands, however, they gradually delivered fewer benefits and increased administrative costs when several airlines implemented their own loyalty schemes.

Section Six will define the channels of distribution that are employed by carriers for distributing airline services. Travel agencies directly interact with airline customers and trade in airline tickets through Computer Reservation Systems (CRS's). CRS's are automated communication systems that are controlled by airlines and offer fares and seat availability. Airlines limit their costs for travel agencies by using Web distribution. Web distribution is accomplished directly through the airlines' own websites, which completely bypass travel agencies and their commissions, or through on-line travel agencies, which charge lower fees than conventional travel agencies.

Section Seven will explain the role that is played by different technological trends in the airline industry. Exogenous technological developments in the aircraft

manufacturing industry and the airport sector continuously influence the airline industry. New high-capacity aeroplanes, which Airbus and Boeing have introduced, influence long-haul strategies because they uncover new opportunities for direct services connecting Asia with the US and Europe. Capacity restrictions in airports also prevent growth in traffic and cause operational disruptions for airlines. Several airports in the US and Europe face traffic congestion and airlines are in many cases restrained from expanding their routes. Airport expansions require large investments and between 10-15 years for implementation, hence capacity problems cannot be readily solved in the short-term.

In conclusion, Section Eight will summarise the main business models that are employed in the airline industry. Network carriers apply a differentiation strategy and are positioned in different airline markets. Network carriers focus on network scope for synergies and risk minimisation, but are affected by organisational diseconomies and high costs in the attempt to meet different market needs. Low-fare carriers apply a cost-leadership strategy and trade in their services at significantly lower fares. Low-fare carriers concentrate on cost reductions and decrease secondary on-flight and transfer services. Low-fare carriers are typically positioned in the short-haul market, nonetheless, a number of low-fare carriers are considering expansion into the long-haul market in the Asian region and provide hybrid business strategies. The low-fare expansion in the long-haul segment is still to be proven in the market. Niche carriers apply focus strategies and are established in niche markets, which low-fare and network carriers exclude for strategic reasons. Niche carriers achieve no economies of scope and density in their networks.

## **4.1. DEFINITION AND MARKET FEATURES**

### **4.1.1 Definition of the Industry**

The air transport industry comprises companies that operate scheduled and non-scheduled air services through aircraft. Air service involves transportation of passengers, mail, and freight over local, regional, national, and international routes (Encyclopaedia of Global Industries, 2005).

The air transport industry can be further divided into 3 main sectors: air passenger service, air cargo, and general aviation. Air passenger service consists of scheduled passenger air service and related support activities, mainly aircraft maintenance, ground and flight crew management, passenger transportation and movement, and baggage handling (Kulat, 2005). Air cargo service involves air transportation of mail, industrial commodities, food, and livestock. Air cargo can be operated through either dedicated aircraft or in combination with passenger transport in scheduled and non-scheduled services. General aviation involves non-airline, non-military aviation, such as tour operators, flight schools, fixed base operators, and corporate flight departments. Half of the general aviation sector is formed by commercial activities and business flights through corporate and individually owned aircraft (Osborn, 2003). Although some references are made to the other sectors, this study primarily focuses on the air passenger service sector.

In 2009, the air transportation industry contributed directly to about 3 percent of the world domestic product, and about 8 percent indirectly if correlated air activities are included (Buyck, 2010). The airline industry's economic impact is comparable to the energy and telecommunication industries (Panariello and Sobie, 2008). The aviation industry plays a key role in numerous industrial and commercial processes and facilitates international economic relations and exchanges between countries (Rajasekar and Fouts, 2009). In addition, the airline service is an essential factor in

the tourism value chain, which accounts for almost 10 percent of world revenues and is a critical source of income for many economies (e.g. Cuba, Thailand) (Holloway, 2008).

#### **4.1.2 Market Situation**

Between 2000 and 2010, the total number of passengers reached its lowest peak in 2001 (Datamonitor, 2007 a.). The negative passenger trend reversed in 2003, and high growth rates continued between 2004 and 2006 (Air Transport World, 2009). Growth in passengers slowed down in 2007 and 2008, and declined in 2009 (Buyck, 2010).

Revenues in the airline industry followed a similar pattern, however, the total value reflected the decline in passengers only in 2002 and gradually recovered in 2003 and 2004. Between 2005 and 2007, revenues in the airline industry were superior to passenger growth percentages (Air Transport World, 2009), nevertheless, between 2008 and 2009, the airline industry experienced high losses that corresponded only in part to the passenger decline (Buyck, 2010).

Structural features in the airline industry contribute to explaining the evolution in traffic and revenues between 2001 and 2010. Tarry (2004) confirms that air traffic – passengers multiplied by distance flown – grows at approximately twice the rate of the Gross Domestic Product (GDP). Economic growth primarily drives increases in passengers in developing countries, where demand directly reflects higher income levels (International Air Transport Association, Aviation Information and Research, 2005). Nonetheless, between 2000 and 2010, the GDP - passengers relationship appears to have weakened in mature markets, where low fares and deregulation increasingly shaped the airline demand. As a consequence, economic growth is estimated to account for 60 percent of traffic variations in developed countries (Airline Business, 2010 a.; Jala, 2008). Hence, the trend in passengers and revenues

is initially explained by the general economic slowdown in the period 2000-2003 (Pilling, 2005). As the economic cycle maintained sustained growth between 2004 and 2007, air traffic recovered and improved its net levels (Schofield, 2008). Traffic growth mainly originated from the low-fare segment in mature markets (Chapter 4, section 8), thus the airline industry revenues were less responsive to the growth in passengers (Bainbridge, 2007). Between 2008 and 2009, the economic recession resulted in a decline in passengers, which corresponded to a major drop in revenues due to the crisis in the business and first class traffic (Chapter 4, section 5.1) (Karp, 2009 b.).

The airline industry is estimated to gain US\$2.5bn. in profits in 2010, after a total of US\$26bn. losses in 2008 and 2009 (Airline Business, 2010 a.). The airline industry scored negative results after US\$5.6bn. total profits in 2007, which was the first year of profits since 2001 (Bisignani, 2008). Between 2001 and 2006, the airline industry added up a total of US\$45bn. losses, when only minor sectors of the industry remained profitable (Bisignani, 2008).

Empirical evidence (Tarry, 2004) confirms that low profit margins are an inherent feature of the airline industry. Since 1970, the peak operating margins, with no exogenous shocks, have been closer to 6 percent (Schofield and Wall, 2010; Tarry, 2004), hence investments in aviation are generally evaluated as unattractive by institutional investors, although new entrant airlines experience superior performances on average (Geewax, 2005). Tarry (2007) argues that the airline industry is required to achieve operating margins of at least 10 percent through the cycle, in order to minimise capital and financial problems. In addition, since aviation deregulation in 1978 (Chapter 4, section 3), the airline industry has shown a fixed pattern, where 2-4 years of adequate profits are followed by 2-3 years of low profits or heavy losses (Schofield and Wall, 2010; Nolan et al., 2003). Empirical evidence also shows that the operating margins are lower than the preceding peak (Schofield and Wall, 2010; Tarry, 2004). Moreover, the airline industry has a high ratio debts/assets (Bisignani, 2008), and substantial cash flow allocated to maintenance requirements and terminal infrastructure (Holloway, 2008). As a consequence,

airlines have limited reserves of cash to counteract financial shocks (Bisignani, 2008).

Furthermore, specific factors have affected airline profitability that are extraneous to the structural cycle. The significant decline in revenues between 2000 and 2010 was not adequately compensated by the reduction in operational costs. Airlines attempted to improve their efficiency, nevertheless, cost-cutting measures encompassed complex investments in infrastructure and managerial methodologies that required long periods to counteract the decline in revenues (Richardson, 2010). In addition, between 2007 and 2008, high fuel costs counterbalanced the efficiency gains that the airline industry had achieved (Chapter 4, section 4.2) (Foust and Capell, 2008).

With regard to market size, North America is the leading regional market in terms of passengers with 30 percent of the world market in 2009 (Buyck, 2010). Between 2000 and 2005, the North American market experienced the most severe problems in the airline industry as it incurred almost US\$39bn. losses, despite an estimated US\$9.5bn. contribution from the US Federal Government in grants and tax waivers (Gessing, 2005). Additionally, four carriers among the top six US major network carriers got into Chapter 11 bankruptcy proceedings (Maldutis, 2006). The North American market recovered in 2006 and 2007 when three out of four carriers were authorised to exit from Chapter 11 bankruptcy proceedings (Field, 2007 b.). In 2008 and 2009, traffic slowed down and US airlines experienced heavy losses due to high oil prices and despite the growth in revenues in international markets (Richardson, 2010). The Northern American market is estimated to recover in 2011 and achieve approximately US\$2bn. in profits due to the expansion of transpacific and transatlantic routes (Schofield and Wall, 2010).

US carriers are primarily affected by high labour costs, which require major operational restructuring and expose the US carriers to labour disruptions (Pilling, 2005). Additionally, high US airport taxes put pressure on fares, whereas the high competition from low-fare carriers limits profit margins (Foust and Capell, 2008). Simpkins (2005) also points out that the Chapter 11 bankruptcy proceedings are not

effective solutions for the US airline market crisis. Airlines in Chapter 11 maintained their capacity, which natural market forces would eliminate, and failed to address their operational problems. Added capacity and cash inflow requirements generated aggressive price marketing strategies that limited profitability in the US airline market (Schofield, 2008).

Europe is the second largest market in terms of passengers, accounting for 28 percent of the world market in 2009 (Buyck, 2010). The European market experienced negative financial performances between 2001 and 2004, and in 2005 returned to breaking even (Hughes, 2008). The European market maintained significant profitability during the period 2005-2007 (Hughes, 2008), however, in 2008 and 2009, it went back to losses as a result of the slowing European economy and high oil prices (Chapter 4, section 4.2) (Airline Business, 2010 a.). In 2010, Europe is estimated to incur the largest losses among regions with US\$2.5bn. due to the slower recovery of the Euro area's economy and the disruptions following the volcanic eruptions in Iceland that affected a great deal of European air space (Schofield and Wall, 2010).

In Europe, major network carriers with broad international destinations and well-established low-fare carriers are key drivers for traffic growth and profitability, whereas middle-size flag carriers experience major problems in terms of market share and financial results (Richardson, 2010; Tucker and Panariello, 2007). Between 2000 and 2010, medium-size flag carriers Sabena and Swissair were bankrupted, and Tap, Olympic Airways, and Alitalia (Chapter 7) were rescued by government interventions (Richardson, 2010; Tucker and Panariello, 2007). Since 2001, major European network carriers have applied strict cost-cutting strategies and introduced significant redundancies as well as capacity cuts in secondary international routes (Richardson, 2010). Additionally, major European carriers proceeded to renew their fleet with fuel-efficient aircraft, hence they got less exposed to high oil prices (Bisignani, 2008). Nevertheless, domestic and intra-European business traffic appears to be particularly sensitive to the economic slowdown in the

EU and causes problems for the overall profitability of European carriers (Schofield and Wall, 2010).

The Asian market is the third market in terms of passengers, with 25 percent of the world market in 2009 (Buyck, 2010). The Asian market was the only sector in the airline industry to achieve US\$1bn. profits in 2005 and secured high profits for 2006 and 2007 (Tarry, 2007). Profits in the Asian market grew by 32 percent between 2008 and 2009 and are expected to amount to almost US\$3bn. in 2010 (Schofield and Wall, 2010). The Asian region capitalizes on the development of the Chinese and Indian economies, as well as low labour costs and improvements in infrastructure (Airline Business, 2010 a.). The Asian market shows to be gradually less dependent on the traffic from and to Europe and the US and has developed a sustainable internal traffic, in particular in the Far-East regions (Schofield and Wall, 2010). In addition, the growth in Asia is driven by regional airports, which open new market opportunities for Asian carriers, whereas primary hubs maintain a constant flow of domestic and international traffic (Buyck, 2010).

## **4.2. ECONOMIC CHARACTERISTICS**

Airline services can be classified as undifferentiated services, where marketing differentiation strategy is difficult to apply (Toh and Raven, 2003). Airline services appear similar to passengers, regardless of the selected airline, given that technological developments in the airline industry have resulted in significant similarities in terms of speed, comfort and safety within given aircraft size ranges. Consequently, product and communication strategies focus on minor aspects of the service – such as catering and personnel – and are effective only in the short term. In the long term, only flight scheduling appears to be successful as a differentiation strategy (Toh and Raven, 2003).

Academic literature proposes several possible economic structures for the airline industry. A number of scholars (White, 1979; Wheatcroft, 1964) argue that the airline industry has significant monopolistic tendencies due to the advantages and cost reductions per output unit that airlines gain when their size increases. Khan (1970) outlines how the airline industry can be classified as a natural monopoly, where high economies of scale allow the attainment of minimum costs exclusively when production is provided for the whole market. In such conditions, competition is disadvantageous because it results in cost increases at first, followed by pure monopoly in the long term, due to the survival of only one firm. If products or services are considered as a public utility, governments can decide either to provide products or services autonomously or to strongly regulate the market.

Different academic studies (Levine, 1987; Hanlon, 1996) show that two factors contrast with monopolistic tendencies in the airline industry. First, Levine (1987) disputes the existence of economies of scale. Empirical evidence shows that companies of different size obtain no competitive advantages in terms of cost reductions, although their size is larger than average. Furthermore, the airline industry presents no significant entry or exit barriers as compared to other industries. Indeed, the airline industry has no heavy “sunk” costs, since fleet acquisition is the only major investment that airlines sustain (Hanlon, 1996). Leasing options are also widely available and airlines can count on a developed second-hand market, where aircraft can be acquired and moved rapidly. Remaining inescapable costs – airport expenses, training, maintenance, terminal infrastructures – generate no heavy entry barriers.

Nevertheless, O’Connor (2000) points out that the airline industry shows a trend towards gradual oligopolistic concentration, even if monopolistic forces are demonstrated not to operate. Base economies of scope and density can contribute to explaining oligopolistic tendencies (Wan et al., 2009; Lindstadt and Fauser, 2004). Large airlines secure significant economies of scope and density through their extensive networks and marketing activities, because extensive networks set off improvements in traffic density and load factors, as well as reductions in marketing costs per traffic unit (Goh and Yong, 2006). Only a limited number of small airlines

can survive in the long-term because weak entry barriers and oligopolistic tendencies co-exist (O'Connor, 2000). The economic structure of the airline industry will be analysed in Chapter 5, section 1.3.

Given the oligopolistic tendencies in the airline industry, Douglas and Miller (1979) outline how airline services tend to be overpriced, similarly to cartels, if no regulation is applied. Baumol et al. (1992) challenge the necessity of regulation by developing the “theory of contestable market”. This theory assumes that companies in oligopolistic industries price at the same levels as companies in more competitive industries if they are exposed to potential competition. In this case, potential competitors should have the opportunity to enter into the market, make profits in the short-term, and exit from the market by keeping most of their profits. Incumbent firms should also require some time to adjust their prices to counteract the entry of potential competitors.

Nonetheless, the theory of contestable markets is denied the airline industry by the presence of economies of scope and density and high marketing expenses (Wan et al., 2009; Lindstadt and Fauser, 2004), which prevent profits in the short-term for potential competitors (Chapter 5, section 1.3). In addition, Computer Reservation Systems (Chapter 4, section 7) allow the rapid changing of fares for all routes (Vinod, 2009). The airline industry is thus subject to destructive competition with no contestable markets and high fixed costs and low variable costs, and is exposed to frequent “price wars”. The airline industry is also susceptible to continuous financial instability, due to the high debt/equity ratios (O'Connor, 2000). Consequently, the airline industry requires to be regulated in order to avoid overpricing, low-quality services, and destructive competition.

## 4.3. REGULATION/DEREGULATION

### 4.3.1 Regulation

Strong monopolistic or oligopolistic tendencies make clear the need for regulation in the airline industry (O'Connor, 2000). In addition, significant external benefits to the economic system explain why governments have closely regulated the airline industry for many years, both domestically and internationally, and in some cases have provided airline services with autonomy through national ownership (Dobson, 1995). Moreover, national airlines can be considered as prestige symbols or as important defence and emergency reserves (Holloway, 2008). Finally, given that airline services involve significant safety issues, advocates for regulation argue that market forces offer no guarantee for adequate safe services (Holloway, 2008).

Regulation in the airline industry concerns three major areas (Goeteyn, 2005):

- 1) *Safety*: various safety standards of aircraft maintenance and aircrew qualifications under the aegis of the International Civil Aviation Organisation (ICAO).
- 2) *Frequency and capacity*: enforced number of scheduled flights and total seats during a certain period (usually a week).
- 3) *Fares*: in domestic markets, governments fix fares for domestic routes. At an international level, the International Air Transport Association (IATA) in many cases sets the fares for international networks.

Regulation varies across domestic and international markets. In domestic markets, governments usually regulate entry and exit barriers, frequency, capacity, and fares. Additionally, governments often impose traffic on unprofitable routes, and forbid

investments and cabotage traffic from foreign airlines. In international markets, aviation services are to a large extent regulated by Bilateral Agreements (also defined as Air Service Agreements) (Goeteyn, 2005). Bilateral Agreements use as a model the two Bermuda Agreements, which were signed by the US and the UK in 1946 and 1977 (Yu-Chun et al., 2009). When airlines serve routes that touch two or more countries, they require formal approval from their respective governments. Governments usually give priority to their national airlines in carrying traffic to and from their own country, hence they limit in many cases the so-called “Fifth Freedom”, i.e. the right to use routes that exclude the airline’s home country. Bilateral Agreements also regulate capacities and frequencies that airlines can offer (Yu-Chun et al., 2009). In addition, the International Air Transport Association (IATA) set fares in international markets, which were defined in the so-called Tariff Conferences and then approved by the respective governments. Approvals by unanimous vote were required until 1976, subsequently many airlines were given the opportunity to discuss and approve fares in regional sub-areas (International Air Transport Association, 1989).

### **4.3.2 Deregulation**

During the 1970s, many authors (Douglas and Miller, 1979) and airline representatives (United Airlines, American Airlines, 1976, in Boule and Crimsted, 1978; British Airways in Miller, 1995) questioned the existing airline regulatory system in both the US and the UK. They argued that the airline industry had reached the maturity stage in its life cycle, and regulation was no longer necessary to ensure the industry’s development. In addition, the existing regulation limited network efficiency and further competition was essential to improve services and reduce fares. Following these arguments, the US government introduced the Airline Deregulation Act in 1978, which deregulated the US domestic airline market (Shaw, 2007). Moreover, during the first two Conservative mandates between 1979 and 1987, the British Government gradually deregulated the air transport system and

restructured the route networks of the public-owned British Airways under a broader privatisation process that involved different industrial sectors in the UK (Balmer et al., 2009). The air transport deregulation process in the UK was concluded with the privatisation of British Airways in 1986 (Parker, 2009). Numerous European governments followed the US and the UK measures in their domestic markets and most significant domestic markets were completely deregulated (Shaw, 2007).

Domestic deregulation also influenced international markets and Bilateral Agreements were modified. The US introduced “Open Skies” agreements with numerous European and Asian countries, which apply the deregulatory principles between the US and the countries involved in the agreement. The “Open Skies” agreements employ as a model the agreement between the US and Canada, which was drafted and proposed by Professor John Kenneth Galbraith, a Canadian national, and his team of Canadian aviation experts, and was signed in 1995 (Kaduck, 1997). In 2009, the US had 93 “Open Skies” agreements, including China in 2004, India in 2005 and Japan in 2008 (Knibb, 2010; Shane, 2005).

In addition, the European Union (EU) implemented the Single Aviation Act (1995), which completely revoked the Bilateral Agreements between its member states. The airline market in the EU was completely deregulated, and any entry restrictions, capacity regulation, and controls on pricing among member states were removed (Wigham, 2005). The Single Aviation Act (1995) also eliminated any property restrictions among airlines belonging to member states and assigned the authority to rule upon strategic alliances and acquisitions between EU airlines to the European Commission under the legislation of the European Community Treaty (Chapter 5, section 2) (Cameron and Kiviniemi, 2009).

In April 2004, the EU issued the “single European sky” legislation, which set common regulatory, safety and competency standards in Europe, and sought to increase efficiency and safety in the European aviation market (Wigham, 2005). The legislation established functional regional blocks by merging adjacent national airspaces. Air traffic control centres in the regional blocks would be reduced and

would further coordinate their control activities inside the regional areas (European Policy Analyst, 2009). Member states had to harmonise the capacity between airports and jointly assign the slots to airlines in the regional blocks. The functional regions would gradually establish links among each other and converge into an EU-wide network (European Policy Analyst, 2009). The legislation set out to eliminate the inefficiencies in both route-planning and aircraft configuration that independent air traffic controls with different security standards generated. In addition, the legislation sought to minimise the discrepancies in traffic flow among geographically adjacent member states (Michaels, 2010).

In 2008, the European Commission had to introduce a new legislative package on regional airspace blocks because, despite several negotiations, member states had not entirely implemented the plan. The new legislation fixed the limit for the constitution of regional blocks at the end of 2012 (European Policy Analyst, 2009). The new legislation also introduced both a common EU flying certificate, which would replace the national certificates of member states, and binding security criteria to airlines flying inside the EU (Michaels, 2010).

In 2010, the EU appointed the civil organisation Eurocontrol to coordinate the operations across the European airspace and established a crisis management unit inside Eurocontrol to centrally manage major disruptions to airline services (Michaels, 2010). Eurocontrol was also assigned the implementation of the single Air Transport Monitoring research plan, which would introduce an innovative satellite-based navigation system inside the EU (Wiley, 2010) (Chapter 4, section 7). In addition, the EU introduced a common legislation on air passenger rights, including rules on website transparency, overbooking, and carry-on luggage (Wall, 2010 a.).

In November 2005, the EU and the US initiated a round of talks for the EU-US “Open Skies” agreement, which involved 27 EU countries and the US (Laitner and Minder, 2005). The agreement was signed at the end of 2007 and became effective in March 2008 (Panariello and Sobie, 2008). The agreement replaced the existing

“Open Skies” agreements between US and single EU member states and allowed cabotage and fifth freedom rights for EU airlines in the US. Cabotage rights entitle EU airlines to operate air services that originate from different EU countries and connect with the US (Panariello and Sobie, 2008), whereas fifth freedom rights allow EU airlines to connect US airports with a number of non-EU airports including Central and South America (Yu-Chun et al., 2009). Nevertheless, EU carriers were excluded from flying between two US domestic airports, while US carriers could connect any airport inside the EU airspace (Yu-Chun et al., 2009). The agreement also replaced the restrictions in London Heathrow, where only American Airlines, United Airlines, British Airways, and Virgin Atlantic could fly according to the second Bermuda agreement (1977) (Chapter 4, section 3.1). All the US and EU airlines could participate in the redistribution of slots in Heathrow starting from 2009 (Yu-Chun et al., 2009). Moreover, the agreement raised the US foreign ownership limit from 25 to 49 percent, which matched the existing EU level (Foust and Capell, 2008). The limit of 25 percent voting control for foreign investors in US airlines was maintained because US legislators feared that the agreement could have negative consequences on US labour groups and might expose the civil reserve air fleet to foreign control (Foust and Capell, 2008).

International Air Transport Association (IATA) procedures (Chapter 4, section 3.1) followed the deregulation trend and applied flexible approaches to fare setting (International Air Transport Association, 2003). Airlines were allowed to negotiate for under-the-counter tariff discounts with both implicit IATA and government approvals, and IATA stopped enforcing the officially agreed fares on airlines (World Trade, 2010; Cameron, 2005).

### **4.3.3 Privatisation**

Monopolistic or oligopolistic tendencies (Chapter 4, section 2) in the airline industry contribute to explaining why governments have maintained ownership in national airlines under monopolistic conditions. Governments have sought to provide high-quality airline services at reasonable prices (O'Connor, 2000) and control airline strategic support for military defence. Additionally, national ownership has guaranteed continued existence for national airlines, despite limited markets and strong competition from foreign airlines (Holloway, 2008).

Until the mid-1980's, the majority of airlines in the world were state-owned, with the exception of US airlines (Shaw, 2007). Subsequently, in 1986, the British government privatised British Airways, which was followed by KLM in the Netherlands in 1987, and many other governments started to dispose of their carriers to private investors in order to improve airlines' efficiency and reduce public expenditure (Parker, 2009). In 1995, the International Chamber of Commerce recommended that airline ownership should be reduced and state aids for airlines should be limited to transitional periods (Shaw, 2007). Airlines in Western markets were in large part privatised, nonetheless, partial or majority state ownership was maintained in the African or Asian regions, where airlines frequently encountered financial problems which deterred potential investors (Encyclopaedia of Global Industries, 2005).

## 4.4. COSTS

### 4.4.1 Cost Characteristics

Costs significantly influence investments and planning decisions in airline strategies, because the airline industry's inelastic revenues and low margins limit the strategic options available. Indeed, the largest results in terms of efficiency are to be achieved in reviewing and controlling different cost areas (Holloway, 2008).

The International Civil Aviation Organisation (ICAO) suggests a classification of the major costs for airlines according to the functional areas involved (International Civil Aviation Organisation, ICAO, 1990, in Doganis, 1991). Airline costs are thus divided into:

1) *Non-operating costs*: costs not directly related with the airline service and its operations. Non-operating costs are further divided into 5 categories:

- a. Property and equipment dismissal gains and losses.
- b. Interests.
- c. Profits and losses from affiliated companies.
- d. Government subsidies.
- e. Miscellaneous.

2) *Operating Costs*: costs directly related to the airline service and its operations. Operating costs are further divided in:

- a. Direct Operating Costs: costs clearly associated with flying the aircraft, such as airport expenses, crew wages and fuel.
- b. Indirect Operating Costs: costs not related to the direct flight operations. They mainly include terminal costs and general administrative costs.

Direct operating costs are primarily formed by fixed costs, which remain constant regardless of the operational scale and occur even if the flight is not operated. Large capital investments, such as cargo handling equipment, make up for fixed costs, and account on average for more than 50 percent of the airline's total costs (Toh and Raven, 2003). Airlines therefore regularly use operating and capital leases to financially cover their capital investments (Holloway, 2008).

Direct operating costs also encompass constant costs, which differ from fixed costs because they remain unchanged with variations in traffic volume, but are avoided if the flight is cancelled. Landing fees and crew allowances are examples of constant costs. Constant costs constitute on average 30 percent of direct operating costs (Toh and Raven, 2003).

Variable costs are the smallest component of direct operating costs. Variable costs are a function of the traffic volume and in general amount to 20 percent of direct operating costs (Toh and Raven, 2003). Variable costs mainly include food and beverages, baggage handling, and ticket commissions. Airlines primarily apply cost cutting strategies in the variable cost areas, in particular in the short-haul segment (Chapter 4, section 5.1) (Mouawad, 2010).

#### **4.4.2 Major Airline Costs**

Labour is commonly the largest cost area for airlines, accounting on average for 30 percent of operational costs (Shannon, 2005). The airline industry is labour-intensive and requires a significant labour force to operate (Holloway, 2008). High labour costs are also explained by the higher labour wages as compared to other industries. Air transport service requires a skilled workforce that operates in different countries, hence high standards of skills and training result in high wages. In addition, airline service disruptions due to industrial actions can considerably affect the airline's financial situation, hence the labour negotiation power in the airline industry is higher than other industries (Shannon, 2005).

Labour costs vary among geographical areas. Labour costs are estimated to add up to 35 percent in the US, 30 percent in Europe, and 20 percent in Asia (Airline Business, 2010 a.). Differences among airlines are also significant, due to dissimilar conditions in job markets and cost of living indices. Growth in low-fare carriers increasingly lowers average wages, because low-fare carriers require less skilled labour since they require low service standards and operate exclusively in the short-haul segment (Chapter 4, section 8).

Many airlines plan to renegotiate labour contracts and relationships with trade unions in the attempt to reduce labour costs and emerge from the recession with improved cost bases (Airline Business, 2010 a.). Airlines increasingly offer shares in exchange for wage and work rule concessions to their employees, and establish independent airline branches – the “airlines-within-the-airlines” – where the staff are paid at lower wage levels (Airline Business, 2010 a.; Daniel, 2005).

Labour costs should be constantly compared to airline productivity, which is measured by the available tonne-kilometre per employee index (Groenewege, 1996). For example, European carriers have lower labour costs than US airlines, however, US airlines counterbalance labour costs with airline productivity, which is on average 25 percent higher than their European counterparts (Airline Business, 2010 a.).

Fuel costs account for 15-30 percent of operating costs and are to a large extent out of airlines’ control. Fuel price is directly linked to the petroleum price, plus the margin that is charged by jet-fuel refiners (Anselmo, 2005). Additional components of the fuel price depend on various variables, such as airport size, airline bargaining power of the airline and country of purchase (Anselmo, 2005).

Petroleum price is extremely variable and volatile. Petroleum price is a function of complex political and economic variables, which expose the airline industry to sudden changes in the fuel costs and operational margins (Smith, 2010). After constant low prices at the end of the 1990’s, petroleum prices showed moderate growth during the period 2002-2003 (Evans, 2005). Petroleum prices have escalated

since 2005 and reached unprecedented levels in 2008, where average petroleum price was 55 percent higher than 2007 (Fabey, 2008). High fuel prices resulted in high operational costs and offset the improvements in terms of operational efficiency that numerous airlines had achieved in Europe and the US (Foust and Capell, 2008). Airlines had problems in transferring high fuel prices into fuel surcharges because the concurrent economic recession required low fares for maintaining sufficient levels of demand in order to cover the fixed and constant costs (Hughes, 2008). As a consequence, airlines reduced capacity in many markets and changed their fleet plans in order to accelerate replacements for fuel-efficient aircraft (Chapter 4, section 7), although complete fleet replacements are feasible only in the long term (Fabey, 2008). In 2009, the petroleum prices declined and went back to the levels of 2007, which allowed the airlines to reduce their operational costs and minimise their losses in combination with the capacity adjustments that airlines had applied in 2008 (Unnikrishnan, 2010). In 2010, petroleum price maintained steady patterns, however, price increases are predicted at the beginning of 2011 (Smith, 2010). Airlines will nonetheless confront better conditions in 2011 than 2008 because the demand levels will be higher and the exposure to petroleum price will be lower thanks to the incoming fuel-efficient aircraft (Unnikrishnan, 2010).

## 4.5. MARKETING

### 4.5.1 Segmentation

In the airline industry, passenger demand is variable and unstable, because it depends on numerous independent variables, such as income, price, and seasonality. For this reason, airlines segment their market in order to minimise fluctuations in demand and improve their revenue management (Holloway, 2008).

Segmentation in the airline market is generally based on the journey purpose and journey length. The journey purpose method assumes that passengers fly either for business or for leisure purposes. Business passengers can be further segmented into corporate business travellers and independent business travellers, whereas leisure passengers can be further segmented into holidaymakers and Visiting Friends and Relatives (VFR) (Shaw, 2007).

The business segment is normally less price sensitive and gives importance to service characteristics. Marketing strategies for this segment focus on service features, such as frequency, timing, punctuality, and in-flight services, whereas price strategies are applied exclusively in competitive routes (Shaw, 2007). In recent years, the business segment has declined in terms of size and revenues in the air market because corporations increasingly pressed business fliers to reduce their flying or choose economy class in an effort to reduce their costs. The reductions involved, in particular, the short-haul destinations, where business travellers increasingly relied upon low-fare offers and surface transports (Chapter 4, section 7.3) (Karp, 2009 b.). The decline of the business segment causes significant yield problems and redundant capacity for airline companies as well as major changes in their marketing strategies (Tarry, 2007). Nevertheless, a niche section of business fliers inside the business segment maintains its demand for high-quality services for premium prices, and constitutes a primary source of revenues for airlines (Chapter 4, section 8.4)

(Sparaco, 2008 a.). Nonetheless, airlines have to invest significant resources to attract premium business fliers because they expect exclusive services as compared to competing airlines. Exclusive services revolve around well-equipped cabin rooms, privacy suites, highly-customized services, and modern terminals (Sparaco, 2008 a.).

Conversely, demand for leisure travelling is price elastic and companies primarily focus on price marketing strategies to attract leisure passengers. Yields per passenger are low for the leisure segment, however, airlines can reduce their costs through low-quality in-flight and terminal services as well as high load factors (Shaw, 2007; Sparaco, 2007 b.). Indeed, low-fare carriers (Chapter 4, section 8), which set their offers exclusively for leisure travelling, show on average positive financial results (Bevens, 2007).

Segmentation is also based on the journey length. Passenger demand is less price elastic as the journey length increases. In addition, short-haul passengers are primarily concerned with airport services, frequency and punctuality, whereas long-haul passengers are sensitive to in-flight services (Tarry, 2007). The expansion in long-haul routes is due to the development of new services in major cities between Asia and Europe, as well as new hub-to-hub routes in the Transpacific market (Schofield and Wall, 2010).

#### **4.5.2 Frequent Flier Programmes**

Frequent Flier Programmes (FFP's) can be defined as loyalty schemes with the aim of making selected passenger segments less susceptible to competitors' offers and comparably higher prices. FFP's are specifically directed to frequent travellers, in particular, business passengers (Chapter 4, section 5.1) (Gossing and Nilsson, 2010). FFP's were introduced for the first time in 1981 by American Airlines. FFP's proved to be successful for American Airlines, hence major carriers imitated this strategy. In today's airline industry, the majority of airlines have their own FFP (Shaw, 2007), or

offer a joint FFP with other airlines (Chapter 5, section 1.5) (Gudmundsson et al., 2002).

FFP's consist of bonus points that are awarded to passengers for choosing specific flights. The amount of points depends on flight distance, chosen class, and fare paid. Bonus points are, in general, divided into two types, basic award points and status points (Gossing and Nilsson, 2010). Basic points can be employed by passengers for gaining free or discounted flights as well as class upgrades, whereas status points grant higher status in FFP's graded memberships. FFP's divide their members into three/four graded memberships and assign to the holder of an higher status, additional services, such as access to exclusive lounges, preferential check-in, and additional luggage allowance (Gossing and Nilsson, 2010).

Airlines have increasingly diversified their programmes in order to both achieve extra-revenues and expand their programmes' recognition, and have sold basic points to different groups, in particular credit card holders and car rentals, which offer airline points as incentives for their own customers. Transactions conferring air miles on non-airline organisations are significant sources of revenues and amount to approximately half of the awarded points in the airline industry (Piluno, 2010). Airlines have also introduced mileage bonus programmes as additional sources of revenues to their FFP members, which allow passengers to double or triple their air miles for a fee when buying tickets (McCartney, 2010 b.). Conversely, status points can be obtained only with air travel and selected hotels in order to maintain the exclusivity of the membership to frequent fliers (Gossing and Nilsson, 2010).

FFP's at the outset were effective in creating customer loyalty for airline brands. Nevertheless, when many carriers applied FFP's, differential advantages were gradually limited, whereas programme costs grew. For this reason, airlines introduced numerous barriers to redeeming their air miles in an attempt to reduce programme costs; as a result, programmes further lost their appeal to passengers (Marketing, 2010 b.). In addition, airlines seem not to tailor their loyalty schemes to the specific needs of airline passengers, which are increasingly sensitive to economic

downturns and financial crises. During the recession periods, airlines tend to reduce their budget for their loyalty schemes and maintain services only to the higher status ranks. Conversely, loyalty schemes should introduce additional discounts on low-seasonal flights to both economy passengers with high propensity of travelling and short-haul business travellers. In this way, airlines can maintain customer loyalty and counteract the competition of low-fare carriers, which take advantage of the increased price sensitivity in recession periods (Chapter 4, section 8.2) (Piluno, 2010).

In conclusion, corporations have increasingly changed their policies towards their business fliers. During the recession in 2007-2009, corporations reviewed their travel agreements in an attempt to reduce their travel budgets and established new comprehensive contracts with just one or two airlines (McCartney, 2010 b.). The majority of these contracts entailed converting the FFP's benefits to business fliers into discounts for the corporations. However, regular business fliers obtain the highest advantages from these programmes, hence they are generally loyal to their preferred airlines. Consequently, airlines had to compromise their relationships with regular business fliers in order to maintain their market share in the corporate market (McCartney, 2010 b.).

FFP's have therefore turned out to be ineffective and costly strategies for airlines. Carriers are required to find new benefits for their customers and minimise relationship problems in introducing further barriers to programmes (Marketing, 2010 b.). Airlines have had to consider attracting other non-airline partners and establishing links with independent loyalty schemes, such as supermarkets' loyalty schemes, in order to achieve better recognition of their programmes and further extending the market opportunities for air miles (Piluno, 2010). Furthermore, as outlined in Chapter 5, section 1.5, strategic alliances can contribute to improving benefits and reducing costs for FFP's because earning and redeeming flights could be extended to all the partners of the alliance (McCartney, 2010 a.).

## **4.6. DISTRIBUTION SYSTEM**

In the airline industry, the distribution system consists of three main subjects (Boyd and Bilegan, 2003):

- 1) Computer Reservation Systems (CRS's) and travel agencies.
- 2) Airline companies' own websites.
- 3) Third-party websites.

### **4.6.1 Computer Reservation Systems and Travel Agencies**

Computer Reservation Systems (CRS's) are automated communication systems that provide seat availability and price for flights. Travel agencies employ CRS's for distributing airline services to customers. Travel agencies match seat availability and price with specific customer needs, and conclude the transactions (Vinod, 2009).

At the beginning of the 1980's, United Airlines and American Airlines introduced respectively the Apollo and the SABRE systems, in order to save point-of-sale time and resources with travel agencies. Travel agencies could afford only one CRS system, but they needed to offer different airline services to remain competitive, hence booking systems had to provide most airline services (Boyd and Bilegan, 2003). System providers established their presence among travel agencies by offering desktop computer support and low service prices. High economies of scale prompted the system providers to maintain high-quality services and charge high commissions to airline companies rather than to travel agencies, in order to cover their fixed costs (O'Connor, 2000).

Over the years, SABRE maintained its presence in the airline distribution system, whereas Amadeus and Galileo – two European consortia – replaced Apollo.

Worldspan, which is a US Airlines and Delta consortium, is also used in niche US markets (Staff, 2005).

CRS's offer extensive and valuable services to airlines and have several strengths. CRS's allow airlines to process a high volume of transactions per second with several concurrent users and offer a secure environment with full availability at all times (Vinod, 2009). Nevertheless, CRS's are designed in mainframe technology and do not include a compiler or desktop, hence they are complex to modify, in order to offer new and customized services (Vinod, 2009; Learmount, 2004). Furthermore, CRS's are a significant cost area for airlines, particularly for low-fare carriers (Chapter 4, section 8) that require simpler and more economic services (Esperou, 2007 in Sparaco, 2007 b.).

Deregulation also modified the CRS competitive framework. The US Government in 2004 completely liberalised the reservation systems and was followed by the EU in 2006 (Withiam, 2008). CRS providers were thus required to compete against third-party website providers and new substitute systems, while airlines were allowed to pay a smaller share of the distribution costs than agencies and CRS providers (Boehmer, 2009 a.).

Travel agencies complete the indirect airline distribution channel. Travel agencies differ in terms of size and managerial complexity, and offer a broad range of travel products in addition to airline services, such as car rental, hotel reservations, guided tours (Learmount, 2004). Travel agencies generally follow the fares that are set by the reservation systems and receive a commission from airlines, which is on average between 10 percent to 15 percent of the airline ticket, for the service that they provide. Airlines frequently offer a commission override to travel agencies, which is up to 10 percent of the total ticket value, if travel agents sell tickets above a fixed amount (Boyd and Bilegan, 2003).

Travel agencies provide geographical coverage and customer assistance to airlines, and generally accomplish a significant part of the air travel administrative work. Airlines can share part of their investments and risks with travel agencies. However, commissions to travel agencies are an important source of costs because they amount to 10 percent of the airline operating costs (Learmount, 2004). Consequently, airlines have implemented different strategies in order to reduce their distribution costs. A number of airlines have introduced commission capping for many travel typologies, i.e. an upper limit for commissions to travel agents (Boyd and Bilegan, 2003). In addition, as was underlined in section 6.2, airlines have increasingly replaced travel agencies with direct distribution channels, such as home websites and phone centres. For this reason, travel agencies appear to concentrate upon travelling consultancy for corporations in order to maintain their presence in the marketplace. Travel agencies use their expertise in travel management to support their corporate clients in developing more effective travel policies for their employees and reducing the overall costs of business travelling (Ku and Yi, 2009).

#### **4.6.2 Website Distribution Providers**

The rapid diffusion of the Web offers the opportunity for airlines to design direct channels for their customers and reduce travel agency costs (Mamaghani, 2009; Learmount, 2004). Airlines can establish their own e-commerce channels in their home website, which is run independently by the airline. Home websites consent to identify passengers according to their Frequent Flier Programme profile (Chapter 4, section 5.2) and provide tailored offers to them. Airlines have developed specific software applications that automatically notify specific proposals to their FFP members (Sobie, 2010). In addition, home websites are important facilitators in selling ancillary services to passengers in the process of unbundling airline services (Chapter 4, section 8.1), because CRS providers have problems in listing these services (Sobie, 2010).

Airline direct channels, nonetheless, compete with third-party web providers, which offer airline reservations in combination with other tourism-related services. Third-party web providers bypass travel agent commissions and charge fees to airlines that are, in general, lower than travel agencies (Mamaghani, 2009). Different business models co-exist in the online travel marketplace. Four main third-party web providers – namely Expedia, Lastminute, Orbitz, and Priceline – have established their presence in the web distribution market. Orbitz was launched in 2001 as an alliance between major airlines in the US in an effort to play a joint role in the airline distribution system (Boyd and Bilegan, 2003). In 2003, the five airline founders ceased their alliance, and Orbitz was transformed into a public traded company in July 2007 (Crockett, 2007). The Travelocity web provider was established by Sabre CRS in order to maintain a competitive edge in the airline distribution system (Hayhurst, 2008). In 2004, Travelocity acquired Lastminute and focused on the budget-conscious traveller's segment looking for bargaining offers from airlines (Hayhurst, 2008). Priceline conversely concentrates on average-quality low-price hotels and offers airline tickets as complementary to hotel reservations for their customers (Levy and Farzad, 2010). In conclusion, Expedia duplicated the model of traditional travel agencies on-line and expanded in different niches of leisure services, such as theatre and concert tickets (Mamaghani, 2009).

Given the growing success of third-party providers in airline reservations, airlines have encouraged their customers to employ their own websites in order to reduce the commissions paid to third parties. Airlines indeed provide a number of special proposals exclusively on their websites, whereas a number of airlines, particularly low-fare carriers, have restrained their sales only through their own on-line booking channels (Consumer Reports, 2010).

Internet distribution particularly suits short-haul destinations and simple bookings, and mainly appeals to cost-conscious, leisure travellers (Chapter 4, section 5.1). Empirical evidence confirms that offline airline sales gradually dropped in favour of online transactions, which reached almost one-third of the market transactions (Sobie, 2010; Brunger, 2010). Offline sales are unlikely to decrease further in the

airline marketplace, because complex international and business flights require travel agent assistance (Brunger, 2010). In addition, third-party web providers have increasingly moved their attention from airline tickets to high-margin offers, which combine multiple tourist services, such as air and hotel reservations (Mamaghani, 2010; Hayhurst, 2008).

The airline on-line distribution environment is confronted with new developments that could change the competitive scenario, in particular, the rapid diffusion of both mobile technology, such as smart phones and e-readers, and social networks (Stevenson, 2010). Mobile technology enables airlines and third-party providers to issue constant updates on offers and new services and allows consumers to accomplish simplified last-minute bookings and changes in reservations while travelling (Sobie, 2010). Social networks offer customers the opportunity to interact and exchange comments in regards to trip planning and development, while airlines could establish a more direct link with specific niches of their market. Nevertheless, social networks prompt several concerns on the property and utilization of customer data that airlines require for establishing an effective communication with their customers (Stevenson, 2010).

Airlines have also introduced innovative schemes for distributing flights on the Web. As an example, airlines run auctions on their own websites on less frequented flights, where consumers can bid up to the ticket list price for a specified period of time. Additionally, reverse auctions are operated in business markets, where travel agents submit bids for customer orders (Withiam, 2008). A consortium of US airlines has also formed Hotwire, which enables customers to buy last-minute tickets at reduced rates by making a blind offer. Customers exclusively specify the price that they are willing to pay for one route in a certain time frame and wait for their offer to be accepted. Hotwire independently allocates the airline, the time of departure, and the airports in the route, while no changes or refunds are permitted. Hotwire can also reject the blind offer and provide alternative non-binding proposals (Consumer Reports, 2010).

## **4.7. TECHNOLOGICAL TRENDS AND THREATS**

The civil airline industry is considered a relatively mature industry, where the main technological components are fixed and the percentage of Research and Development (R&D) is limited as compared to other industries (OCSE, 2003). However, the airline industry is influenced by exogenous technological developments, which come from the aviation and transport industries, in particular, the aircraft manufacturing industry and the airports. Exogenous technological developments result in threats and opportunities for the civil airline industry.

### **4.7.1 Aircraft Manufacturing Industry**

Since 2000, the aircraft manufacturing industry has introduced a new generation of aircraft, which provide a larger long-haul capability and innovative technical features. The extended capability of the aircraft discloses new market opportunities for airlines, particularly the direct point-to-point routes connecting Asia with Europe and the US (Browne, 2010).

Airbus Industrie and Boeing took two contrasting approaches in the design of the long-haul aeroplanes by respectively introducing the Airbus A380 and Boeing B787 Dreamliner. The A380 has the unprecedented maximum capacity of 800 passengers plus additional room for different activities on-board in the standard configuration. The A380 is designed for the non-stop long-haul routes between the main hubs in Europe, Asia, and the US (Sparaco, 2010). The A380 provides high standards of services for the first and business classes and offers the opportunity for innovative entertainment during the flight, such as casinos, clubs, and shopping areas (Coburn, 2010). In addition, the A380 reduces the operating costs per passenger - approximately 20 percent less than Boeing B747 - due to both a higher fuel efficiency and the distribution of the operative costs over a higher number of

passengers (Wall, 2010 c.). Nonetheless, the A380 increases demands on the airport infrastructure because it necessitates enlarged runways and specific equipment for baggage and passenger handling. For this reason, the A380 can fly only to major airports and requires adjustments to the airport operations (Sparaco, 2010). Furthermore, the A380 has an interesting but relatively small market because many airlines do not possess the necessary passenger flow and the long-haul routes between hubs that justify the acquisition of the A380 (Talbot, 2010). In conclusion, the A380 underwent major delays in deliveries, which caused problems for airline clients and negatively impacted on Airbus' image and financial situation (Flottau and Wall, 2010). Delays were caused by both the complexities in the development programme, which were not fully accounted for in the projected scheduling, and extended problems in the wiring systems (Sparaco, 2010). For all these reasons, the A380 shows a much slower market penetration than projected in terms of both orders and acquisitions, although the economic recession and the necessary adjustments in the airline fleets may have slowed down the market entry process (Talbot, 2010).

Conversely, Boeing presented the complete project of the new Boeing B787 Dreamliner in 2010, which has the same long-haul capability than the A380 but carries half capacity up to 250 passengers (Coburn, 2010). The B787 Dreamliner is devised for serving direct flights between distant primary or secondary destinations in a cost-effective way (Sparaco, 2010). Indeed, the B787 Dreamliner is entirely produced with advanced composites that significantly reduce the weight of the aeroplane and consequently increase its fuel efficiency by 20 percent comparing to the Boeing B777 (Talbot, 2010). The B787 Dreamliner has no limitations in terms of access to airports and reduces the symptoms of jet lag because it flies at 1,800 metres altitude rather than 2,400 metres increasing the oxygen in the cabin (Browne, 2010). For all these reasons, the B787 Dreamliner could disclose interesting opportunities in the market of short holiday breaks from the US and Europe to far-flung tourist destinations in Asia and Latin America (Talbot, 2010). Nevertheless, the B787 Dreamliner faced unprecedented production and engineering challenges, which forced Boeing to postpone the introduction in the market to at least the end of 2012 and prompted significant financial problems to Boeing (Zhao and Shenhar, 2011; Browne, 2010). As a consequence, the orders for B787 Dreamliner dropped in 2011

because carriers chose to wait for the solution of the main B787 Dreamliner's technical issues before ordering (Zhao and Shenhar, 2011).

Airbus and Boeing plan to introduce new aircraft in addition to their long-capable models. Boeing has proposed the Advanced Boeing B747-8 with 450 seats, which competes directly with the Airbus A380 (Norris, 2010). The Advanced B747-8 applies most of the technological developments of the Boeing B777 and B787 in terms of engines and redesigned wings, but it maintains many characteristics of the old B747, such as the same structural aluminium alloy, in order to both retain the existing broad customer base of the old B747 and reduce engineering problems and development costs (Norris, 2010). Additionally, Airbus has put forward the Airbus A350 wide-body jet, which challenges the B787 Dreamliner (Matlack, 2008). The A350 development addresses the range of problems that Airbus encountered on the A380 (Wall, 2010 c.; Matlack, 2008). The A350 makes extensive use of advanced composites similar to the B787 Dreamliner and aims to provide the same long-haul capabilities as the A380 with 15 percent reduction in fuel costs. The A350 targets direct connections between distant secondary destinations (Norris, 2010) and is set to become operative in 2013 (Flottau, 2010 a.).

#### **4.7.2 Airports**

Airports are highly capital intensive businesses that have development programmes that last for 20-30 years. Modifications to the airport infrastructure require between 10 to 15 years to be designed and fully implemented. Airports have limited variable costs and high fixed costs. Fixed costs require long-term financing plans to be covered. The instalments of the financing plans account for the majority of the financial costs of the airports (Moores, 2009).

The relationship between airlines and airports is regulated by the allocation of the slots, which are the defined periods of time when airlines can depart from or land at

an airport (Lott, 2005). Airlines pay a fixed fee to the airports for their assigned slots, which is partially covered by the airport taxes that passengers pay as part of their airline tickets (Moore, 2009). The allocation of the slots follows a system that is defined as a “grandfather rights” slot system. The “grandfather right” system simply means that the airport authorities have the exclusive right to assign slots to airlines and, in general, give preference to domestic carriers. Airlines are forbidden to trade their slots with other airlines. Airlines lose their rights exclusively if they make no use of their slots for a specified amount of time per year for 2-4 consecutive years (Moore, 2009; Chang and Williams, 2002).

Capacity restrictions in airports also influence the long-term development of the airline industry. Numerous airports around the world experience traffic congestion, which result in operational disruptions and traffic limitations on many routes (Geoffrey, 2009; Travel Trade Gazette, 2008). Problems in airport capacity are difficult to resolve in the short-term because of the long-term requirements for modifications in the airport infrastructure (Moore, 2009). For this reason, industry analysts (Lott, 2005) propose the substitution of the “grandfather rights” system with a more efficient market-based system in order to solve capacity restrictions and support profitable routes. Alternatively, airports can set up innovative ways for allocating slots, such as slot auctions and peak-hour pricing. Slot auctions settle the number of flights that are technically possible during each time period, and peak-hour pricing allows efficient distribution for flights (Compart, 2010).

Capacity problems in airports could also be reduced with the introduction of new air traffic control systems based on satellites and global positioning (GPS) technology, which would replace the current systems that operate with ground-based radar and repetitive voice communication (Walsh, 2009). The new systems would enable a more precise and rapid landing approach with reduced mandatory distance, because aeroplanes could descend at a continuous rate rather than at a stepped rate. In this way, more aeroplanes could fly to an airport in a given time period with less fuel consumption and delays (Walsh, 2009). The US is considering to introducing the NextGen GPS system in the US aerospace by 2020, whereas the European Union has implemented the Air Transport Monitoring research plan for establishing a common

GPS air traffic system in all member states (Wiley, 2010) (Chapter 4, section 3). Nevertheless, both projects are estimated to cost between US\$15bn. and US\$20bn. to the public finances with comparable costs for airlines updating their aircraft (Walsh, 2009).

### **4.7.3 Surface Transports**

Surface transport, especially railways, is a potential substitute for air transport, particularly for short-haul destinations. Trains offer the opportunity to depart from and arrive into the city centres of main destinations and are less exposed to the disruptions associated with adverse weather conditions. In addition, trains address concerns for environmental impact that many companies have gradually included in their travel planning (Browne and Fox, 2009). Trains can also compete with air transport on longer distances – up to 500-600 Km, given the required operations for air service and distant location of airports.

Rail transport has improved in terms of speed and comfort principally in Europe, due to considerable investments in the network infrastructure and train technology (Nativi and Wall, 2009). In addition, high-speed train providers established a partnership for improving train connections across Europe, whereas Eurostar has enhanced its market presence in numerous intra-capital itineraries (Browne and Fox, 2009; Bokaie, 2006).

## **4.8. BUSINESS MODELS**

The airline industry is affected by numerous economic and political changes (Chapter 4, section 1; Chapter 4, section 3). Airline companies propose different business models in order to control changes in the airline environment. The main strategies that are applied in the airline industry are differentiation strategies, cost-leadership strategies, and focus strategies (Hanlon, 1996). Network carriers primarily apply differentiation strategies, low-fare carriers apply cost-leadership strategies, and niche carriers apply focus strategies (Shaw, 2007). Airlines have also recently diversified their business models in order to effectively satisfy emerging consumer needs.

### **4.8.1 Network Carriers**

Network carriers position their offer in different segments and seek to satisfy distinct customer needs through their network scope. Network carriers capitalize on their network synergies and distribute their costs and risks in their route destinations. Network carriers apply differentiation strategies and their model is based on static, oligopolistic markets, where carriers are required to cover global networks (Jarach, 2004). Network carriers achieve stable patterns of demand and cash flow by exploiting opportunities in the short-haul and long-haul markets for passengers and freight (Hanlon, 1996).

In general, large airline companies employ a differentiation strategy. Indeed, major airlines in the US – United, American, Delta – and in Europe – British Airways, Lufthansa, Air France – can be classified as network carriers. Network carriers in the US adopt hub-and-spoke route structures, where airlines are established in central hub airports which are linked to a number of distant spoke airports. Hub-and-spoke networks generate network economies of density and scope (Chapter 4, section 2)

that prevent possible competitors from establishing their presence in the long-term because they cannot rely upon network economies and consequently incur higher operational costs than the carriers established in the network (Lin, 2008). Moreover, the entry of a new carrier in the hub-and-spoke network generates new connections in the network that can be exploited by the incumbent airline (Lin, 2008). Conversely, network carriers in Europe are established in their national markets, which feed traffic into long-haul destinations (Jarach, 2004). This structure prevents possible competitors from entering into the long-haul destinations because network carriers have full control over domestic routes in the national market. Therefore, they can rely upon the overall traffic coming from and into the national market and achieve higher load factors (Jarach, 2004).

Numerous network carriers are afflicted by financial problems. As underlined by Sparaco (2004), the network business model appears to have structural problems, because, in many cases, traffic growth results in no improvements to financial results. The network model requires complex and costly route structures and seems unable to respond rapidly to environmental changes and counteract competitive challenges. Organizational diseconomies and high production costs are inevitable for satisfying different customer needs, hence profits per passenger decrease.

The majority of European and US network carriers responded to their structural problems through strict cost-cutting measures, which were mostly implemented during the two economic recessions between 2001-2005 and 2007-2009 (Jaworowski, 2010). Cost-cutting measures encompassed both reductions in the labour costs with broad re-negotiations of the labour contracts and renewal of the fleet with more fuel-efficient aircraft (Chapter 4, section 4) (Airline Business, 2010 a.; Fabey, 2008). In addition, network carriers proceeded to market their airline services separately rather than as part of a package in short-haul routes, particularly in economy class, and charge for ancillary services, such as checked baggage and in-flight refreshments. Ancillary revenues from additional services became a significant source of revenues for airlines in short-haul routes, whereas network carriers maintained their package services in long-haul routes (Moores et al., 2010).

However, the separation of airline services in short-haul routes blurs the line between network carriers and low-fare carriers as network carriers lose their service differential for customers and provide similar flight experiences to low-fare carriers (Deprez, 2009).

#### **4.8.2 Low-Fare Carriers**

Low-fare carriers seek to offer airline services at substantially lower fares, since they minimize ancillary in-flight services and continuously look for cost reductions. Low-fare carriers apply a cost-leadership strategy and consider the airline service as a pure commodity, rather than a value-added experience (D'Aveni, 1995). Low-fare carriers identify essential service features that are required by airline customers, and provide them at the lowest price (Tarry, 2004).

The low-cost business model can be divided into two distinct strategic typologies (Jarach, 2004). On one side, a number of carriers – such as Ryanair in Europe and Southwest in the US – strictly apply cost-cutting policies. They concentrate on Visiting Friends and Relatives (VFR, Chapter 4, section 5) and occasional tourism segments, fly point-to-point to left-out secondary airports, and minimise in-flight and airport services (Sparaco, 2007 b.). Conversely, other carriers – such as Easyjet (Chapter 9) – focus on cost-conscious business travellers, and compete in primary airports at known destinations. In addition, they employ additional resources for flight-related services and customer satisfaction (Dennis, 2007).

The low-fare business model established its presence rapidly in the airline industry and showed high rates of growth between 2000 and 2006. Rapid growth for low-fare carriers is supported by positive financial results that low-fare airlines on average show, as compared to network carriers (Bevens, 2007). Jarach (2004) argues that low-fare carriers exploit some circumstances that are related to their nature being new enterprises, rather than being industry-specific advantages. Specifically, low-

fare carriers incur lower labour costs because low-fare carriers set lower salaries and less advantageous job conditions than network carriers. The low-fare business model also appears to be suited to the volatile aviation environment. Simple short-haul point-to-point routes and streamlined operations hedge continuous imbalances in the aviation cost structure and minimise risks of cyclical downturns in specific portions of the marketplace. In addition, the Internet growth (Chapter 4, section 6.2) benefited the low-fare sector significantly, because low-fare carriers could simplify their operations through e-commerce and make their low prices apparent to customers (Sobie, 2010).

The low-fare sector is set to develop in the long-term in different marketplaces and aviation segments. Indeed, low-fare carriers have started expanding in the long-haul segment, as short-haul routes have become saturated (Bell and Lindenau, 2009; Ezard et al., 2007). Low-fare carriers in long-haul markets apply a hybrid business model, because they combine strategies of low-fare and network carriers (Chapter 5, section 3.3). Indeed, long-haul low-fare carriers offer simplified economy and business fares and provide high-quality in-flight services as well as Frequent Flier Programmes (Chapter 4, section 5.2) (Bell and Lindenau, 2009; Business Travel World, 2007). In addition, long-haul low-fare carriers actively target corporate clients and offer them preferential agreements for business travel (Airline Business, 2009 b.; Capell, 2007 a.; Faithfull, 2007 b.).

Given the growing opportunities in long-haul markets, established low-fare carriers plan to diversify their operations towards transatlantic or transpacific destinations. Southwest established for the first time a code-sharing agreement with ATA (previously American Trans Air) in 2004, whereby Southwest short-haul passengers could be redirected to ATA transatlantic routes (Daniel, 2005). Nevertheless, in 2008, ATA shifted its focus onto business destinations, as a consequence of the negative financial results in 2007, therefore, Southwest put on hold its plans for differentiating into international destinations through the ATA international network (Airline Business, 2008 b.). Still, Southwest maintains its plans to independently

expand into the British, Mexican, and Caribbean markets in case its short-haul market is significantly reduced in the US (Esterl, 2009 a.).

Conversely, Ryanair attempted to acquire its Irish competitor Aer Lingus and employ Aer Lingus to expand into the transatlantic service (Air Cargo World, 2010) (Chapter 5, section 9). In 2006, Ryanair acquired a 16 percent stake in Aer Lingus when the carrier was privatised and in 2010 expanded its share to 30 percent (Air Cargo World, 2010). Nonetheless, the merger was refused because the European Commission (EC) was concerned on the resulting monopolistic situation in the Irish market and Aer Lingus' shareholders disagreed with the acquisition (Airline Business, 2008 b.). Ryanair appears to maintain its plans to acquire Aer Lingus and offer transatlantic services if the EC changes its position against the acquisition (Air Cargo World, 2010).

Done (2005) and Esperou (2007) (in Sparaco, 2007 b.) point out that the pure low-fare business model is required to adjust to long-haul operations and is exposed to numerous problems. Low-fare carriers take advantage of high-time aircraft utilisation in order to achieve lower direct operating costs, which is difficult to apply to long-haul operations. (Esperou, 2007 in Sparaco, 2007 b.). Furthermore, long-haul flights add complexity to the simple low-fare model because long-haul flights require on-board entertainment and services as well as extra crew on board (Economist, 2007 b.). Low-fare carriers can also jeopardise their differential advantage over traditional network carriers since their fares necessarily reflect additional costs for long-haul flights. Nonetheless, Capell (2007 a.) argues that low-fare carriers need to strictly maintain their ordinary cost-cutting measures, such as extensive outsourcing and intense web distribution.

The diversification of low-fare carriers into the long-haul market is still to be proven in the market; however, positive financial results between 2007 and 2009 for low-fare start-ups involved in the long-haul segment confirm that opportunities can be exploited in long-haul routes by low-fare carriers (Moore and Dunn, 2010).

### 4.8.3 Niche Carriers

Airline companies direct their resources into a single area of the airline business when applying focus strategies. Niche carriers identify niche markets, where they can satisfy specific customer needs that are commercially inappropriate for low-fare and network carriers. However, niche carriers take no advantage of the significant economies of scope in the airline industry (Chapter 4, section 2) (Capell, 2007 a.).

Niche carriers are primarily divided into charter and regional airlines. Charter airlines are positioned in the tourism sector, where they exploit the high load factors during tourist peak periods. Charter airlines counterbalance unstable cash flows and lack of business yields by offering low fares and essential services (Holloway, 2008). Charter airlines are particularly well-established in Europe, where summer demand peaks are widespread. Some European charter airlines dominate the summer destinations and have forced network carriers to suspend operations in the summer niche markets. Nevertheless, European charter airlines face increasing competition from scheduled low-fare carriers (Bokaie, 2007).

Regional carriers can also be classified as niche carriers. The business model of regional carriers is based on long-term franchising contracts with major network carriers, where regional carriers sell seats to major network carriers and make use of their brand (Chapter 5, section 1.4). Major carriers employ regional carriers because they have the opportunity to expand in minor routes with no major investments, improve their feeding traffic in their long-haul routes, and reduce their operational costs (Bachman, 2009). Operational costs are on average lower in regional carriers because they operate smaller aircraft and establish less costly labour contracts than network carriers. Indeed, regional carriers often use 50-seat regional jets that can achieve high load factors in point-to-point traffic in minor regional routes (Forbes and Lederman, 2009). In addition, regional carriers take advantage of lower salaries and less convenient work conditions than network carriers because their employees have a greater mobility and accept lower salaries in order to gain the necessary

experience for working for network carriers. Also, employees of regional carriers have less contractual power because network carriers can readily find another regional carrier as an alternative (Forbes and Lederman, 2009).

#### **4.8.4 Innovative Business Models**

New business models emerge in the airline industry in an attempt to cover untapped market opportunities and satisfy different customer needs. In 2005, two airline ventures – namely EOS and Maxjet – focused on prime-rate business customers, which relied on business jets (Sparaco, 2008 a.), and began to provide all-business class services in the point-to-point transcontinental sector. EOS radically reduced its aircraft capacity to 45 seats in its Boeing 747's, and offered in-flight services and environments that matched corporate jet standards in terms of privacy and leg-room per seat (Bremner, 2005). Conversely, Maxjet focused on price-conscious business passengers and provided less exclusive but still high-quality in-flight services and comfortable seats (Done, 2005). Between 2006 and 2008, Silverjet, L'Avion, and Singapore Air followed the Eos and Maxjet model and introduced all-business class services (De Lollis, 2008; Gray, 2008).

The economic rationale for all-business airline ventures is still to be proven because all the ventures have gone bankrupt with the exception of Singapore Air, which has returned to the network model (Tarry, 2010 d.). Indeed, all-business airlines rely upon no feeding traffic on their routes and have problems in competing against extensive loyalty plans (Chapter 4, section 5.2) and global corporate accounts that network carriers offer to their business customers (Chapter 4, section 8.1) (Field, 2008). Additionally, all-business ventures were exposed to competitive reactions from incumbent network airlines, which reduced business fares in the short-term because they depended on large networks and differentiated services (Field, 2008).

However, the airline industry attempts to move towards new segmentation approaches, where commoditised low-fare offers and highly-customised services could re-shape the airline market (Sparaco, 2008 a.). In this context, the traditional flag or hub-and-spoke network airlines appear to copy and implement different strategies that low-fare and niche carriers adopt, such as charges for ancillary services in short-haul routes, in order to adjust to new environmental changes.

## SUMMARY

The airline industry is highly exposed to economic and political changes, which constantly re-shape the industrial scenario and prevent the airline industry from reaching long-term stability. Significant financial volatility and continuous political interference affect the airline economic structure and force airlines to continuously adjust their strategies. The deregulation process introduces competitive elements into domestic and international markets, however, government intervention in the industry depends on complex interactions between political and economic interests. The airline industry is an essential element of economic development and international trade, and its assets represent strategic reserves for the military structure. The airline industry also plays a key role in the tourism value chain. Additionally, exogenous technological developments, constant high price of oil, and innovative distribution strategies pose opportunities and threats that need to be constantly monitored by airlines.

In this context, innovative business models emerge in the airline. Low-fare model appears to be effective for adjusting to environmental changes in the airline industry. Low-fare carriers achieved rapid growth in short-haul destinations; nonetheless, a number of low-fare carriers are evaluating the diversification of their operations towards long-haul destinations.

In this volatile context, airline companies evaluate the formation of partnerships or the increase of their network scope through acquisitions. As highlighted in the next chapter, airline relationships are strongly interrelated with characteristics and trends in the airline industry. Airline relationships therefore depend on economic and political factors and are in some cases influenced by significant political intervention.

## **CHAPTER 5**

# **Strategic Alliances and Acquisitions in the Airline Industry**

## INTRODUCTION

In the airline industry, many authors (Gimeno, 2004; Gillen and Morrison, 2005; Jaworowski, 2006) point out that strategic alliances are a major source of comparative advantage for airline carriers. Indeed, airline competitive structure has switched from direct competition between carriers to competition between allied partners and alliance networks. In cooperating, airline carriers can spread the risks in an unstable airline industry (Chapter 4, section 1), as well as bypass the regulative restrictions, which are still enforced by aviation authorities (Chapter 4, section 3). Furthermore, carriers can achieve significant economic and strategic benefits with strategic alliances.

Acquisitions can also deliver key benefits to carriers in the airline industry. Nevertheless, carriers are in many cases unable to exploit opportunities for consolidation, because existing regulations strictly limit acquisitions. Existing Bilateral Agreements in international markets (Chapter 4, section 3) require airlines to keep their national identity, otherwise they lose their rights to fly international routes. In this way, cross-border acquisitions are difficult to accomplish. Also, specific national regulations work against foreign investments and external holdings on domestic carriers.

This Chapter reviews the academic literature on strategic alliances and acquisitions in the airline industry. This Chapter focuses in particular on studies where alliances and acquisitions are related. This Chapter encompasses seven Sections.

In Section One, airline alliances will be classified according to their strategic relevance and main functions accomplished. The main typologies of alliance will be introduced, and a statistical overview of the alliances will be presented.

Section Two will summarise the regulative framework in which carriers establish their cooperative arrangements. Alliances depend on approval from air transport

authorities for joint pricing and schedule coordination. Air transport authorities apply complex procedures and impose airline-specific constraints for approval. The alliance approval process and alliance constraints can counterbalance the benefits of cooperation.

Section Three will describe the main reasons behind airline cooperation. Carriers gain key economic and strategic benefits through alliances. Economic benefits primarily concern route network economies in terms of density network economies and economies of scope. Alliances are also implemented as strategic defensive moves against competitor alliance groupings. In parallel routes, alliances allow partners to avoid competitive threats from preferential routing and aggressive marketing strategies. Alliances are instrumental in improving marketing positioning toward a business segment and sharing strategic risks in an unstable airline environment. In addition, this section will underline how strategic alliances appear to be a function of the business model that carriers follow. In the airline industry, network carriers broadly apply strategic alliances, whereas low fare carriers prefer not to set up alliances with either other low-fare carriers or network carriers (Gillen and Morrison, 2005).

Section Four will identify the drawbacks of strategic partnership, which can constrain alliance benefits, and eventually cause alliance termination. Organisations are subject to relational problems, which airline alliances encounter in their life cycle. Airline alliances also experience specific problems in terms of high implementation costs, as well as benefits becoming apparent only in the long-term. Ultimately, alliances allow no optimisation in existing airline networks.

In Section Five, alliance constellations will be introduced in the alliance context. Alliance constellations involve a group of allied partners, who cooperate in different strategic areas and follow common objectives. Three main constellations emerge in the airline industry, namely Star Alliance, Oneworld and SkyTeam.

In Section Six, minority equity alliances will be analysed in terms of underlying motives and strategic purposes. Unidirectional equity investments generally attempt to guarantee control over airline partners, however, they are negatively perceived by

airlines and generate conflicts in alliance relationships. Bi-directional equity investments are employed to strengthen alliance relationships and demonstrate commitment. Bi-directional exchanges result in no conflict among partners.

Section Seven will summarise the existing literature on alliance effects. Strategic alliances can have conflicting effects on airline shareholders and passengers as well as on the competitive structure in the airline industry. Airline passengers benefit from alliances in terms of fares, frequency, and connectivity, although parallel alliances can result in less convenient outcomes. Alliances also encourage competition between alliance and non-alliance members, nonetheless, parallel alliances favour decreasing quality and collusive pricing.

Section Eight will evaluate a number of general issues that influence the airline partnership, such as the cargo business area, Information Technology, and safety standards. Cargo operations benefit from alliances in terms of extended reach and capacity. However, the cargo business area requires a more intense combination of operations than passenger alliances in order to generate benefits. Differences in Information Technology (IT) protocols in booking and operation handling can generate significant initial costs. Nevertheless, airlines can use IT for on-line distribution in order to decrease costs. Alliances bring about safety questions because carriers with different safety standards are connected. Carriers in alliances are also subject to different country regulations.

Section Nine will review regulation issues that restrain the consolidation process. The consolidation process is predicted to modify the aviation competitive structure with no regulation, creating 3-4 global carriers and a number of well-established niche carriers. Additionally, the main categories of acquisitions will be identified in the airline industry.

In Section Ten, the decision process between strategic alliances and acquisitions will be analysed at airline level. From this perspective, economic and strategic benefits for acquisitions will be compared. Airlines can eliminate capacity duplication and fragmentation in their networks and maximise economies of scope and density in acquisitions. Additionally, acquisitions can offset feeding traffic to international

hubs, and reduce average costs per passenger. Acquisitions are also implemented as competitive defensive moves in order to prevent competition from breaking out in close adjacent regional and domestic markets. Regional and domestic markets provide key traffic to international hubs. In conclusion, acquisitions are employed for securing airport slots.

Section Eleven will analyse potential drawbacks for acquisitions. Acquisition drawbacks are generated by ex-ante and ex-post costs. Ex-ante costs concern the “adverse selection” process in the evaluation of brand equity and managerial expertise, whereas ex-post costs are related to organisational diseconomies and task challenges in the acquisition process.

In conclusion, Section Twelve will identify studies that specifically compare acquisitions and strategic alliances in the airline industry.

## 5.1. RELATIONAL MODES IN THE AIRLINE INDUSTRY

In the aviation industry, airlines establish a broad set of relationships, which differ in terms of managerial involvement and resources employed. The term “alliance” encompasses all the relationships that involve cooperation between two or more airlines and preserves legal independence for carriers (Tae and Park, 1997).

In general, alliance agreements between airlines are classified in two categories (Oum et al., 2000):

- 1) *Agreements limited in scope*: primarily route-specific alliances, where airlines establish simple agreements in one or few routes and have access to specific markets. Carriers strictly define within the agreement both the services involved and capacity provided.
- 2) *Agreements with extensive scope*: key sections of the route network are interconnected and strategic operations are jointly accomplished by airline partners. Airlines disclose sensitive customer information and hand over management control to the partner. In many cases, alliance partners are highly committed to the alliance and share resources and marketing knowledge (Oum et al., 2000).

In the airline industry, agreements with extensive scope can be classified as strategic alliances because they involve key routes in the network and imply resource sharing, expected benefits, and compatible goals (Todeva and Knoke, 2005; Vyas et al., 1995; Spekman and Sawhney, 1995). Conversely, according to Glisson and Cunningham (1996), route-specific alliances are evaluated as non-strategic because key organisational areas are unrelated, secondary and marginal routes are involved, and carriers keep strict control of route operations (Vyas et al., 1995) (Chapter 2, section 1). Alliance relationships are for the most part classified as horizontal alliances, given that partners offer the same product or service (Hanlon, 1996).

Scholars (Wang and Evans, 2002; Tae and Park, 1997) further categorize airline alliances according to the main functions accomplished:

- 1) Sharing the route networks
- 2) Joint purchasing
- 3) Joint services and activities
- 4) Sharing the brand image
- 5) Marketing and loyalty schemes

### **5.1.1 Sharing the Route Networks**

Airlines share sections of their networks through codeshares and block space agreements. In codeshares, participating airlines allow their alliance partners to sell flight services that they operate. Tickets will be processed and issued with the flight code of the airline that sells the tickets. In this way, passengers can buy a ticket for one carrier and end up flying with a different carrier (Hassin and Shy, 2004). Codeshare agreements include parallel operations, where airlines share the same routes, and complementary operations, where agreements touch different routes (Wang and Evans, 2002). Parallel codeshares can affect competition between route networks because airlines can coordinate their services and capacity. Conversely, complementary codeshares create new route connections, which facilitate feeding traffic and links between international and domestic routes (Park and Zhang, 1998).

In block space agreements, airlines indefinitely assign an entire block of seats on specific routes to their alliance partners. Partners will independently manage the block of seats through their own marketing system and will cover losses if seats are not sold. Kleymann and Seristo (2004) suggest the inclusion of block space agreements in the codeshare category, although block spacing involves higher financial risks and commitment as compared to codeshares.

Through codesharing, airlines have the opportunity to offer new on-line destinations to their customers, rather than depending on inter-line destinations. On-line destinations are formed by a number of connecting routes that are traded by one airline company, even if the airline company does not operate all the connecting routes. For example, airline 1 operates the routes to cities A and B, whereas airline 2 operates the routes to cities B and C. If airline 1 and airline 2 establish a codeshare agreement between the cities A, B, and C, airline 1 can offer the on-line destination A-C to its customers although airline 1 does not directly operate the connecting route B-C. Conversely, an interline destination encompasses a number of connecting routes that are offered separately by two airlines. Consumers can still purchase the interline destination A-C with no codesharing agreement, however, they have to separately deal with airline 1 for route A-B and airline 2 for route B-C (Wan et al., 2009). Airlines 1 and 2 apply different fare regulations on their routes, hence, an interline destination is subject to higher fares comparing to an on-line destination because each airline attempts to maximise the profits in its routes independently of the other airline (Armantier and Richard, 2008). Therefore, consumers prefer on-line destinations because they can minimize time and costs when dealing with one carrier in travel planning (Government Accountability Office, GAO, 2005).

In addition, codesharing allows carriers to propose a “seamless” network to additional destinations, where passengers are guaranteed smooth service and high loyalty status until they reach their final destination. Carriers in many cases combine their Frequent Flier Programmes (FFP’s) in their codeshared routes (Wan et al., 2009) (Chapter 5, section 1.5), hence passengers maintain their privileged status and services in all the codeshared routes. Passengers are also protected against delays and cancellations (Goh and Yong, 2006), because airlines are responsible for rescheduling their journey, providing financial compensation, and covering passengers’ layover expenses. A broader destination portfolio is also available with a low level of commitment and resources.

Codeshares are relatively simple agreements that require no investments in infrastructure other than changes in the reservation system. Nonetheless, codeshares entail associating the airline’s brand with all the codeshared routes, even if the airline

does not directly operate the routes. Hence, problems in terms of service and operational disruptions, which the airline's own customers may experience in the external codeshared routes, will be directly associated with the airline's own brand (Armantier and Richard, 2008).

Most codeshare agreements involve one or few destinations and can be considered as tactical relationships (Government Accountability Office, GAO, 2005). Codeshares can, however, grow in complexity and include major network interconnections. In this case, codesharing is strategically relevant for carriers, and is generally followed by additional services in order to improve destination offers and facilitate network coordination. In some cases, complex alliances have set up sophisticated systems to manage capacity among partners on a seat-by-seat basis at a regional or global level, and will adjust their scheduling to ensure smoother connections among networks (Wang and Evans, 2002). Also, codeshare partners can be more flexible in pricing for joint destinations (Brueckner, 2003).

Codesharing has been criticised by consumer associations for misleading passengers. Passengers are in some cases unaware that they are purchasing flights offered by different carriers with dissimilar safety and quality standards because travel agents and web reservation systems rarely disclose codeshared flights (Hemphill, 2000). Consumer associations propose to introduce specific regulations on codesharing in both Europe and the US, where travel agents and web reservation systems have to separately communicate the routes forming the destination and the airline brands operating the routes, and passengers have to actively assent to the codeshared offers (Garrow, 2009).

Additionally, codesharing results in crowding-out effects in computer reservation systems (CRS) (Chapter 4, section 6) and on-line travel portals, because on-line destinations are usually displayed before inter-line destinations (Goh and Yong, 2006). In this way, airlines have multiple listings on the screen, and are thus advantaged in the reservation process.

### 5.1.2 Joint Purchasing

Carriers can achieve beneficial contractual conditions if they co-purchase items with other alliance partners. Through co-purchasing, airline partners increase their relative market power and exert higher contractual pressure on external suppliers. Alliance partners promote purchasing groups to monitor and encourage joint purchasing (Chathoth, 2004).

Airlines accomplish joint purchasing in different areas:

- 1) *Small items*: alliance partners achieve the largest part of cost savings from acquiring low-value items, such as cabin or airport lounge items as well as maintenance spare parts (Guild, 2003). Small items are suitable for co-purchase because low-value orders are simple to implement and have no influence on long-term strategic objectives.
- 2) *Fuel*: airline partners obtain advantageous conditions in fuel purchasing if they define their fuel needs in advance and place joint orders with the oil companies. Carriers also take advantage of price differentials between international hubs if they entrust their partners to buy fuel in convenient locations (Field and Pilling, 2004). Finally, alliance partners can form new legal entities and jointly apply fuel hedging (Baker and Field, 2003).
- 3) *Aircraft*: combined buying power of airline partners offers leverage over commercial transport manufacturers for aircraft purchases (Jaworowski, 2006). Still, potential in aircraft co-purchasing is untapped in the airline industry. Only Star Alliance (Chapter 5, section 6) attempted to jointly acquire regional jets for its members in 2003 (Baker and Field, 2003), but the project was postponed until 2009 and then definitely abandoned in 2008 (Luna, 2010). Aircraft specifications are long-term strategic decisions for airlines and influence their overall marketing strategy. For this reason, airlines have problems agreeing on common aircraft procurement.

Baker and Field (2003) point out that cost savings are fully exploited only if partners standardise their product requirements and specifications. In many cases, airlines oppose such standardisation because they are required to share strategic and sensitive information on procurement prices and processes with their airline partners. In this way, if the alliance is terminated, airlines will be exposed to a potential competitive threat from their previous alliance partners (Wagner et al., 2005).

### **5.1.3 Joint Services and Activities**

Alliance partners can accomplish coordinated services and operations. Joint operations and services include baggage and ground handling, airport facilities sharing, passenger check-in, and staff training (Wan et al., 2009; Wang and Evans, 2002). Airlines also engage in mutual maintenance operations and efficiently locate their maintenance centres. Joint maintenance and engineering appear to be the areas where airlines achieve the majority of cost savings in airline alliances (Dunn, 2008).

Numerous carriers have outsourced their maintenance services to their alliance partners, which have established separate profit units. These service units look for additional relationships and provide competitive external services to other airlines (Knorr and Arndt, 2004).

In addition, airlines share crew members between partner firms. Crew members can be allocated to partners if destinations facilitate no crew transfers. Crew sharing also minimises problems of understaffing during peaks in demand (Chathoth, 2004).

### **5.1.4 Sharing the Brand Image**

Airline companies can share their brands and market their products under joint or different brands. Brand sharing is common in regional markets, where regional carriers often use the brand of established network carriers (Bachman, 2009; Jarach, 2004) (Chapter 4, section 8.3).

Airlines usually employ franchising agreements for brand sharing. Airline franchising is a form of licensing agreement, where one airline (franchiser) allows partners (franchisees) to use its brand image including its name, aircraft livery, and uniforms. The franchiser usually incorporates franchisees into its network and supports franchisees with its reservation system. In exchange, franchisees pay royalty fees and feed traffic into the franchiser's network (Hanlon, 1996).

Both parties benefit from franchising. The franchiser includes small and marginal markets in its network, which are not available due to regulation restrictions, shortage of slots, and necessary investments. Also, the franchiser improves its load factor thanks to traffic feeding into its network and reduces its overall operating costs, because regional carriers operate smaller aircraft that incur less cost per seat on minor routes (Forbes and Lederman, 2009). Conversely, franchisees get access to the franchiser's operational system as well as Frequent Flier Program (FFP) (Chapter 4, section 5.2). In addition, franchisees take advantage of the franchiser's brand reputation in terms of safety, reliability, and quality of service (Lott and Taylor, 2005). Nonetheless, the franchiser entrusts its brand image to minor carriers that are difficult to control, whereas franchisees are often required to reach the franchiser's high-quality standards of service and are exposed to the franchiser's problems (Pender, 1999). Additionally, regional airlines experience significant switching costs from one franchiser to another because their franchiser generally provides the greatest part of their capacity. Consequently, regional carriers become asymmetrically dependent on their franchiser and are vulnerable to exploitation (Gulati et al., 2008).

### **5.1.5 Marketing and Loyalty Schemes**

Airlines extensively use loyalty schemes like Frequent Flier Programs (FFP's) and service-oriented marketing strategies in order to differentiate their offers to their consumers (Chapter 4, section 5). Airlines often combine their loyalty schemes and marketing tools in order to enhance their marketing positioning (Wan et al., 2009; Gallacher, 1997). Joint FFP's exploit numerous synergies. Consumers have additional opportunities to gain points and redeem their flights with a larger set of destinations. Moreover, top-tier service privileges are usually recognised by all partners, thus consumers enjoy status privileges in all alliance destinations. Airlines are also facilitated in selling their miles to external airlines and non-airline subjects because their airmile programmes become more attractive with partnership (Gudmundsson et al., 2002). Advantages for joint FFP's increase proportionally with the number of partners involved, although coordination issues for several separate programmes grow correspondingly (Gudmundsson et al., 2002).

Joint FFP's and marketing alliances can be affected by numerous problems. Individual programmes are implemented for distinctive purposes and play different roles in different markets. Airlines can set up loyalty programmes either for building long-term customer bases, or for increasing sales and applying promotions in the short term (Gudmundsson et al., 2002). In addition, FFP's have different procedures and rules, which are difficult to harmonize between airline partners (Rose, 1998). Consequently, joint FFP's become complex to administer and can potentially fail to fulfil their specific marketing objectives. Indeed, consumers can find airline joint programmes inconsistent and confusing, because accrual and redemption rules are managed differently by individual airlines. Consumer associations also express their concerns about FFP alliances. Airlines are usually reluctant to increase their available flights for redemption in FFP alliances, even if the potential base for

redemption increases. Hence, passengers face increasing problems in reclaiming their flights with their existing programmes (Gallacher, 1997).

Airlines agree to compensate programme imbalances when they establish their joint FFP's. Programme imbalances occur when demand for flight redemption is different among allied carriers because a specific set of flights is preferred by members of the joint programme. Consequently, small and regional airlines are disadvantaged in participating in FFP alliances, because they have on average less attractive holiday destinations. Thus, small and regional airlines may end up paying substantial compensation to bigger airlines if they do not negotiate in advance limits to programme imbalances (Gallacher, 1997).

### **5.1.6 Vertical/External Alliances**

In the airline industry, vertical and external alliances have, in general, limited scope and involve no key strategic resources. Yet, a small set of non-horizontal alliances has developed in the airline industry. Firstly, airlines have established several agreements with credit card companies. FFP's (Chapter 4, section 5.2) are associated with credit card schemes, where credit card holders get a certain amount of miles for any card transaction. Credit card partnerships are well-established in the US market, whereas in Europe and Asia they have limited applications (Simpson, 2003). Agreements with credit card companies generally generate higher card usage and loyalty to both card companies and airlines. Research, which was undertaken by American Express (2003), confirms that card users affiliated to FFP's have 50 percent higher retention rate to the credit card brand and are 56 percent more loyal to the selected airline. According to Simpson (2003), alliances with credit card companies are important sources of revenue for US airlines, since they achieve, on average, higher profits for selling air miles to credit cards than selling seats directly. However, such partnerships expose airlines to brand dilution, because consumers fail to associate air miles with the flight experience. Airlines counteract brand dilution by

offering top-tier privileges exclusively to clients that use their flight services (Simpson, 2003).

Airlines also establish cooperative arrangements with specialist tourism companies, such as tour operators and car rental companies. Charter airlines establish most agreements with tour operators because they are a key source of passengers, nonetheless, network carriers also favour partnership with tour operators in order to create a stable flow of passengers toward their routes (Heiden, 2005).

Alliances between airports and airlines are infrequent. Differences in strategic objectives and resources still prevent these relationships from developing and airlines and airports have limited opportunities for cooperation. In addition, most airports are publicly owned and unwilling to commit to partnering with private airlines (Heiden, 2005).

### **5.1.7 From Revenue to Cost Functions**

In the airline industry, alliances between carriers include various typologies of relational modes, and different business units are involved in the alliance process. Commonly, operations in alliances evolve during their life-cycle and carriers typically move from revenue maximising to cost minimizing functions (Saglietto, 2009; Chathoth, 2004). Airlines typically examine at first, network sharing and joint marketing agreements, which increase traffic and revenues, before becoming involved in joint activities and exchange of complementary know-how, which require intense cooperation and disclosure of sensitive data. Through intense cooperation, airlines can distribute risks and enhance the synergies and cohesion among the alliance partners (Saglietto, 2009). As underlined in Chapter 2, section 6, complex agreements involve social context factors, such as trust and commitment, which are built through extensive interaction between partners.

Dunn (2008) confirms that codeshare agreements are more widespread in initial relationships, and that cost saving functions are exclusively accomplished by more

evolved alliances. The type of alliances also appear to be sensitive to economic cycles. Numerous codeshares and revenue-sharing alliances are rapidly established if the economic situation goes through upper cycles, whereas carriers focus on downsizing and cost saving activities in recession periods (Airline Business, 2009 a.; Dunn, 2008).

## **5.2. REGULATION IN AIRLINE ALLIANCES**

As underlined in Chapter 4, section 3, the airline industry is influenced by regulations that limit airline strategies. Despite the deregulation process, the airline industry is still governed by both International Bilateral Agreements between countries, which impede global competition, and complex domestic regulations.

Alliances in the airline industry are influenced by regulations and procedures, which restrain alliance operations and slow the cooperation process (Lyle, 2003). Primarily, airline partners are banned from mutually establishing fares for on-line trips (Chapter 5, section 1.1) (Brueckner, 2003), and coordinating their schedules for their destinations (Knibb, 2009). Alliances can be exempted only if they receive formal approval from the air transport authorities where they operate.

In the US, the US Department of Transport (DOT) is in charge of granting alliance approval, which is defined as antitrust immunity (Caruso, 2009). The DOT is a federal Cabinet department of the United States government responsible for the supervision and control of the US transportation system (Stober, 2003). Antitrust immunity prevents both private antitrust actions and US government interference, thus guaranteeing joint pricing, scheduling, and marketing to alliance partners (Stober, 2003). The US Department of Justice (DOJ) supports the DOT in its decisions by evaluating the effects of alliances on competition (Carey and Williamson, 2009 a.). The DOJ is the federal executive department of the United

States government in charge of the enforcement of the law and administration of justice (Carey and Williamson, 2009 a.).

In the European Union, the European Commission (EC) examines the airline partnership referring to both the Articles 81-82 on competition in the European Community Treaty and the Merger Regulation (1989). The EC concedes exemption from the European Community Treaty to airline alliances (Cameron and Kiviniemi, 2009).

In theory, alliances are granted antitrust immunity as long as alliances do not result in a monopoly in the markets involved, and airlines fulfil the requirements for International Bilateral Agreements. Nevertheless, both the DOT and the EC have applied inconsistent policies and criteria towards alliances over time, and evaluate the principles of competition differently. Indeed, the DOT appears to focus on the resulting competition between geographical regions, whereas the EC is more concerned with the resulting competition on individual city-pairs. Therefore, the markets of reference for the DOT and the EC differ because competition on region-to-region primarily encompasses leisure passengers and competition on individual city-pairs mostly encompasses business passengers (Chapter 4, section 5.1). Hence, the analysis of the DOT on the effects of airline alliances concentrates upon how many passengers are willing to substitute connecting to direct flights, where connecting flights involve more than one stop to a final destination while direct flights exclusively involve one stop. Conversely, the analysis of the EC on the effects of airline alliances focuses on the use of slot divestitures as a remedy for diminishing competition between city-pairs. Slot divestitures imply the obligation of disposing slots, which are controlled by the allied airlines, to competing airlines in the city-pairs (Knibb, 2009). For these reasons, international alliances go through complex and unpredictable examination processes before airlines can start cooperating (Cameron and Kiviniemi, 2009).

Antitrust immunity is also employed by the DOT as a political instrument to extend the “Open Skies” policy to different countries. The “Open Skies” policy (Chapter 4, section 3) is based upon the agreement that was formulated by Professor John Kenneth Galbraith, a Canadian national, and his team of Canadian experts, and was signed by the US and Canada in 1995 (Kaduck, 1997). The DOT is usually prepared to grant antitrust immunity as long as the government of the carrier involved, opens up its market to US carriers. The DOT started this practice with smaller European countries, whose carriers were more dependent on long haul routes, then targeted larger European countries.

The “Open Skies” process was slowed down in April 2004, when the European Union implemented the “Single European Sky” legislation and revoked “Open Skies” agreements between the EU members and the US. The “Single European Sky” legislation establishes common regulatory, safety and competency standards for all the members of the EU and attempts to improve the safety and efficiency parameters in the European aviation market (Wigham, 2005) (Chapter 4, section 3). Antitrust immunities for transatlantic alliances were included in the discussion for the “Single Aviation Sky” agreement between the EU and the US, which was signed at the end of 2007 and was implemented on March 31, 2008 (Chapter 4, section 3) (Panariello and Sobie, 2008). In the agreement, the EC and the US DOT got exclusive jurisdiction on antitrust immunity for transatlantic alliances (Foust and Capell, 2008).

### **5.3. AIRLINE/ALLIANCE RATIONALE**

The rationale for strategic alliances in the airline industry is still a matter of debate among researchers and practitioners. Two main categories of motives emerge from reviewing the literature on strategic alliances, which are not mutually exclusive:

- 1) Economic reasons
- 2) Strategic reasons

#### **5.3.1 Economic Reasons**

Contractor and Lorange (1993) underline how in some cases, strategic alliances are established to achieve scale efficiencies (Chapter 2, section 4). However, Levine (1987) questions the very existence of economies of scale in the airline industry, because carriers appear to gain no economies in terms of cost reductions when size increases (Levine, 1987). Following these arguments, strategic alliances in the airline industry are not explained by scale efficiencies.

Nonetheless, scale efficiencies are significant on the production side, which is one sub-area of the airline business. The production side concerns both ground activities related to the flight, such as ground handling and aircraft maintenance, and passenger flow, such as check-in and baggage handling procedures. In this case, carriers can get cost reductions if scale increases (Antoniou, 1991).

Joint services and activities, which are accomplished by airline partners, exploit scale efficiencies on the production side. In addition, airlines achieve cost reductions by increasing their relative purchasing size through joint purchasing agreements.

Furthermore, Levine (1987), followed by Flint (1998), underlines how carriers exploit scale efficiencies that are not directly related to pure airline size. Airlines are indeed able to exploit marketing economies when they extend their operations. Larger route networks have marketing and advertising efficiencies, because the marketing unit costs per route decrease as additional routes are covered. Additionally, large newspapers and national television channels have substantial minimum costs and indivisibilities for advertising space, which only larger airlines can spread through their route networks (Goetz, 2002). In conclusion, companies can exploit their brand value for scale efficiencies because they can attach their well-known brand to new route services at minimal unit cost (Flint, 1998). Economies of scale on the marketing side contribute to explaining joint marketing activities and franchising among carriers.

In the airline environment, route network economies can also explain strategic alliances. Route network economies are independent from size economies and stem from the scope and density of route designs (Holloway, 2008). When two or more airlines combine their networks through codesharing and block space agreements, airlines can gain traffic density economies, which are realized when a higher flow of passengers is processed into the airline's system. The higher passenger flow results in more efficient aircraft utilization. Carriers can indeed use a smaller number of aircraft with larger capacity as a consequence of a higher flow of passengers (Dempsey and Goetz, 1992). Hence, the fixed costs directly related to the airline services and operations can be distributed over a higher number of passengers and the average costs per passenger reduce (Wan et al., 2009). Fixed costs are defined as the costs in the airline that occur even if the airline service is not operated (Chapter 4, section 4.1). In addition, a higher flow of passengers allows the airlines to better organise their operations in the airports and streamline the transfer of passengers between carriers. More efficient transfers enable the airlines to better utilise their aircraft and lower their operational costs (Wan et al., 2009). In conclusion, carriers can concentrate on routes that have comparative advantages, and leave the others to

alliance partners. In this way, the relative output per unit increases due to the higher traffic density on specific routes (Goh and Yong, 2006).

In addition to density advantages, carriers achieve economies of scope by connecting two or more route networks. Through alliances, carriers enlarge their network with no relevant investments required, and can offer global reach to their consumers (Lindstadt and Fauser, 2004). Airline partners can provide “seamless” services thanks to larger networks, exploiting the consumer preference for on-line services as opposed to inter-line services. On-line services encompass connecting routes that are traded by one airline, although the airline does not directly operate all the connecting routes. Passengers prefer on-line services because they minimise their own costs of route planning. Moreover, on-line services offer consumers higher quality of service in terms of check-in and baggage handling (Park, 1997) (Chapter 5, section 1.1). The number of connections significantly increases in joining networks, hence alliance partners can exploit higher feeding traffic to their main hubs. In this way, alliances generate a higher load factor through route networks (Tretheway, 2004). In conclusion, if codeshare agreements are extended to scheduling coordination and resource pooling, airlines can rationalise their network structures, thus preventing operational duplication and achieving more efficient use of factor inputs (Goh and Yong, 2006).

### **5.3.2 Strategic Reasons**

As mentioned in Chapter 2, section 4, strategic alliances are not exclusively explained by economic reasons, but also by strategic and competitive factors (Todeva and Knoke, 2005). In addition to economic issues, organisations evaluate future benefits and competitive scenarios when they establish alliances.

The airline industry is no exception to that. Park and Zhou (2005) confirm that strategic alliances in aviation are formed to shape competitive dynamics and respond to competitive pressures. Competitive factors are particularly relevant in the airline

industry because the majority of alliances are horizontal, i.e. among direct competitors, where alliances invariably influence competitive positioning (Harbison and Pekar, 1999).

In general, airlines respond to alliances between their competitors through intra- or inter-network competition. In intra-network competition, airlines become part of their competitors' network and seek identical alliance benefits to those of their competitors. Conversely, in inter-network competition, airlines establish counteracting alliances and search for similar benefits from different partners (Gimeno, 2004). In both cases, alliances look for no immediate economic benefits, but are influenced by competitive dynamics in the industry. From this perspective, carriers establish alliances when they expect that alliance benefits in terms of competitive positioning and economic gains will compensate for alliance managerial diseconomies (Park and Zhou, 2005).

Different authors (Iatrou and Alamdari, 2005; Park and Zhou, 2005) argue that airline alliances are for the majority, defensive moves, where airlines attempt to prevent traffic losses against other alliance groupings rather than create new market values. Indeed, if airlines strictly follow their competitors in their alliance strategy, they will remain close competitors, even if alliances fail to achieve their objectives (Gomes-Casseres, 2003). Airlines also pre-emptively look for alliance partners in order to avoid strategic gridlock. Gimeno (2004) argues that in the airline industry, most alliances are co-specialised. Co-specialised alliances involve investments in partner activities and disclosure of sensitive information so that carriers can exploit mutual specialization (Gomes-Casseres, 1998). Co-specialised alliances are more exclusive, and consequently limit available partners in the industry. For this reason, carriers rapidly target potential partners, otherwise they risk being left out in the alliance game and losing out on alliance benefits to competitors (Gimeno, 2004). Therefore, carriers establish pre-emptive alliances because most airline alliances are co-specialised (Gimeno, 2004).

Additionally, competition plays a role in parallel codesharing, i.e. two or more carriers share specific routes in their networks. In this case, alliances are set to stop the competitive threat from preferential routing and aggressive pricing strategies, rather than enlarging the route network. Carriers can thus concentrate on performance differentials, such as time departures and customer service, and create loyal customer bases, instead of engaging in competitive conflicts (Wakeam, 2003).

In conclusion, strategic factors contribute to explaining strategic alliances in the airline industry. Strategic alliances are primarily employed to gain a marketing edge in the business passenger segment. As underlined in Chapter 3, section 4, the business segment displays less sensitivity to price and is interested in service differentials. Codesharing and Frequent Flier Programme (FFP) partnerships (Chapter 5, section 1) guarantee high service standards and top-tier status in broader route networks, as well as wider airmile availability in FFP's for the business segment. Therefore, carriers achieve more effective marketing positioning in the highly profitable business segment. Conversely, the leisure segment, in general, shows high sensitivity to price and is less concerned with service differentials, thus alliances deliver minor marketing benefits toward the leisure segment.

Contractor and Lorange (1993) (Chapter 2, section 4) point out that alliances are formed to share risks among alliance parties. Indeed, risks related to demand variability are hedged more effectively in larger networks. Probability for traffic off-peaking decreases when additional destinations are included in the network, hence carriers take advantage of steady patterns of demand and cash flows (Shaw, 2007). Alliances also offer the opportunity to test new markets and minimise the risks of getting into those markets, because no major investments are required and exit barriers are relatively low (Byrd, 1999).

### **5.3.3 Business Models**

In the airline industry, alliances appear to be a function of the business model that carriers apply. Network carriers (Chapter 4, section 8) extensively rely on alliances for achieving their strategic objectives, whereas the majority of low-fare carriers (Chapter 4, section 8) establish partnership neither with other low-fare competitors nor network carriers (Gillen and Morrison, 2005).

In general, low-fare carriers apply a cost-leadership strategy, and focus on point-to-point short-haul routes with the same aircraft type. They dedicate less resource to in-flight services and specifically target the leisure segment and cost-conscious business travellers (Chapter 5, section 4; Chapter 5, section 8) (Tarry, 2004).

Considering the features of the low-fare model, low-fare carriers achieve only minor benefits from scope economies, which primarily drive alliances. As underlined in section 3.1, scope economies stem from the connection of two or more route networks, that enable carriers to enlarge their global destinations, substitute interline destinations to on-line destinations, and increase the feeding traffic to their hubs. Low-fare carriers do not look for a global network with a broad range of destinations, since they offer exclusively short-haul journeys. Low-fare carriers indeed tend to avoid organisational complexities and high costs related to long-haul journeys. In addition, low-fare carriers do not pursue feeding traffic and “seamless” travel experiences, since they offer no connection services in order to minimize their operational costs. Economies of density (Chapter 5, section 3.1) are also less significant because low-fare carriers usually have dispersed networks and employ a standardised fleet in terms of size and capacity. In dispersed networks, a higher flow of passengers results in limited advantages in terms of aircraft utilization. Also, low-fare carriers are unable to modify the aircraft size and capacity in order to process a higher flow of passengers in their system.

Alliances are particularly effective for attracting business class passengers. Alliances offer availability of service privileges and air miles for Frequent Flier Programmes (FFP's) (Chapter 5, section 5) on additional routes (Chapter 5, section 3.2). Low-fare carriers, however, concentrate on lower fares on week-long roundtrips and ancillary services on demand in order to appeal to business passengers, and avoid class differentials on their flights in order to minimise administrative costs.

As underlined in section 3.1, airlines have the opportunity to achieve economies of scale in the areas of ground activities and passenger flow, by joining their operations (Antoniou, 1991). Nevertheless, potential for economies of scale is restricted because low-fare carriers tend to outsource their ground-handling and catering activities. The catering selection in low-fare carriers is also severely limited and is an option to be paid for by the passengers.

For all these reasons, low-fare carriers establish no partnerships. Indeed, high managerial and organisational costs, which carriers sustain when establishing alliances, are not balanced by perceived benefits from alliances (Gillen and Morrison, 2005).

The low-fare context has changed as low-fare airlines have commenced offering long-haul flights (Chapter 4, section 8.2). The expansion of low-fare carriers in long-haul routes is still to be proven in the market, however, encouraging financial results between 2007 and 2009 for low-fare carriers in long-haul segments support a potential growth of low-fare carriers in long-haul routes in the long-term (Moore and Dunn, 2010) (Chapter 4, section 8.2).

Low-fare carriers involved in long-haul markets have adopted marketing strategies that are implemented by network carriers and that have applied a hybrid business model (Bell and Lindenau, 2009) (Chapter 3, section 8.2). Long-haul low-fare carriers have indeed introduced differentiating product characteristics, such as Frequent Flier Programmes and extensive on-flight services, while maintaining a strict discipline on operational efficiency (Airline Business, 2009 b.; Noakes, 2007 b.). From this perspective, long-haul low-fare carriers have considered the

opportunity of coordinating their schedules and operations by codesharing with short-haul carriers established in Europe and the US. Nonetheless, the negotiations and the agreements between low-fare carriers have exclusively concerned simple codesharing and narrow marketing agreements (Bell and Lindenau, 2009; Lodon, 2007). Codesharing between long-haul and short-haul routes appears to capitalize on feeding traffic, which originates from short-haul routes by low-fare carriers. Long-haul flights create economies of scope if traffic is directed into long-haul destinations, hence low-fare carriers evaluate codesharing in order to exploit network economies. Still, agreements between low-fare carriers are strategically limited because codesharing adds complexities and administrative costs to a simple low-fare business model (Lodon, 2007). Also, codesharing benefits for low-fares are restricted to feeding traffic and exclude density economies, economies of scale, and economies of scope for transit traffic. Therefore, only codeshares with limited scope are convenient for low-fare carriers because the codeshare benefits can be counterbalanced by the complexities and administrative costs.

Conversely, in the network model, alliances are essential in achieving strategic objectives and most network carriers are involved in partnerships. Indeed, alliances are set to grow in importance in the long-term for network carriers as they face growing competition from low-fare carriers (Gillen and Morrison, 2005). Network carriers focus on their comparative advantage and concentrate on connections in their global network in order to counteract low-fare market growth (Kiefer, 2005; Jaworowski, 2006). In addition, in combined journeys with several stopovers, network carriers guarantee services, such as baggage delivery and flight rescheduling, until the final destination, whereas low-fare carriers only take responsibility for the separate segments of the journey (Jaworowski, 2006).

Alliances are particularly advantageous because they provide feeding traffic into long-haul destinations and additional routes to global networks.

## 5.4. DRAWBACKS IN AIRLINE ALLIANCES

Strategic alliances generate significant economic and strategic benefits for carriers. However, alliances are affected by significant drawbacks that can potentially undermine alliance benefits. Carriers indeed will proceed to terminate their partnership if they conclude that the drawbacks counterbalance the benefits in the long term.

Airline partners are no exception to relational problems that organisations experience in strategic alliances (Chapter 2, section 12). Given that most alliances are formed between competitors in defined market sectors, airline partners often cooperate in some geographical areas and compete in others. Competitive elements in the alliance can endanger inter-organisational trust and potentially damage the whole relationship (Wang and Zajac, 2007; Bierly and Coombs, 2004). Additionally, in the airline industry, alliances are more unstable than in other industries, thus are exposed to changes in the whole competitive structure.

Significant divergences in corporate culture can set off operational problems among carriers and hamper the alliance activities. Airline alliances imply cooperation in complex scheduled procedures and processes, and divergences in corporate culture cause continuous disagreements in how to accomplish the procedures and processes. Continuous disagreements prevent the joint alliance activities from getting integrated and generate disruptions and delays in the operations (Li et al., 2008). The airline industry is particularly vulnerable to cultural incompatibilities because many airlines still maintain strong national features (Stober, 2003). National components are embedded both in organisational procedures and workforces. Consequently, cultural incompatibilities are difficult to manage in cross-border alliances because airline workforces are not accustomed to working and cooperating in multicultural environments.

Alliances are influenced by a set of connections and relational factors that shape airline exchanges. Relational factors are complex to administer, because they encompass formal and informal exchanges and continuously evolve during the alliance life cycle. If wrongly managed, relational factors can result in opportunistic behaviour and organisational problems (Reuer et al., 2006). Since organisational diseconomies are intense in the airline industry, airline alliances are exposed to significant risks if carriers face problems when cooperating with their partners.

Iatrou and Alamdari (2005) also identify a number of drawbacks and problems that specifically concern alliances in the airline industry. In general, benefits related to alliances are available for airlines only in the long term. Cost savings require the longest period to achieve among the various categories of benefits. Significant revenue and cost gains require a complex process because alliance parties need to align numerous operational specifications and reach a high level of integration (Iatrou and Alamdari, 2005). High organisational diseconomies and dispersed operations in the airline industry make the process difficult and uncertain.

Airline alliances also entail substantial initial costs of implementation. Initial costs mainly concern several operational requirements, such as the harmonisation of ground handling and reservation systems, as well as marketing costs to advertise alliance opportunities to customers. Initial costs can decrease the already limited financial resources available to carriers (Iatrou and Alamdari, 2005).

As mentioned in section 3, strategic alliances are primarily developed to achieve scope advantages and economies of scale in the revenue and production side. Nevertheless, economic gains are partly diminished by duplication in two or more co-existing networks. Network structures in alliance are not optimised, thus the synergies available are only partially exploited by the alliance parties.

## 5.5. ALLIANCE CONSTELLATIONS

In the airline industry, relational links between carriers in many cases involve multiple organisations. These agreements are defined as airline constellations (Gomes-Casseres, 2003). According to Lazzarini (2007), airline constellations are generally either explicit or implicit. Explicit constellations are defined as groups of firms that establish formal multilateral agreements in order to pursue joint action in different strategic areas. Explicit constellations imply contractual agreements that are applied to all members of the alliance. By definition, explicit constellations are disclosed to the general public. Carriers can make up new brands for explicit constellations, and implement separate organisations or joint-decision making committees in order to manage joint operations and brand identity.

Conversely, implicit constellations emerge from different dyadic alliances and are defined as a group of organisations that show more bilateral ties to one another than to organisations outside the group (Nohria and Garcia-Pont, 1991). Implicit constellations have no consistent framework and carriers build no branding or external structure around them. Also, implicit constellations do not have members that are densely tied to one another in a specific way. In some cases, members of the explicit constellations have external ties to other carriers. External ties form expanded implicit constellations that are based on the explicit constellation structure (Lazzarini, 2007).

Alliance constellations have an important role in the airline industry. Gimeno (2004) underlines how the airline competitive structure increasingly switches from competition among carriers to competition among networks. Indeed, carrier performances become gradually dependent on the group they belong to, rather than on their own comparative advantage.

Das and Teng (2002) classify airline constellations as being part of the product bundling category. In product bundling, carriers create and market product combinations to consumers. Product bundling constellations are generally short-term

associations because they exploit short-term synergies among partners. Needs change rapidly in the volatile airline industry (Chapter 4, section 1), hence long-term strategic objectives between multiple carriers are difficult to accommodate. Relational structures are generally flexible, and entry and exit barriers are low. In addition, carriers usually interact in chain-generalised reciprocity in product bundling constellations, i.e. every member of the constellation has exchanges with most of the other members (Das and Teng, 2002).

Links and exchanges are also based on indirect reciprocity between members, because networks are required to be balanced. Indirect reciprocity is a process in which members of the constellations receive benefits from a particular member of the constellation and subsequently offer benefits to a different member in return. Indirect reciprocity in product bundling constellations entails no net increase in general reciprocity, because there is no exchange between members and the group entity (Das and Teng, 2002).

Theory on structural holes (Chapter 2, section 7) in networks can also be applied to airline constellations (Gudmundsson and Lechner, 2006). Structural holes are defined as spaces in the network that generate social capital. Social capital is formed as organisations establish connections between disconnected segments in the network (Burt, 1995). Social capital is associated with the sum of network resources that individuals or groups can potentially exploit (Bourdieu and Wacquant, 1992). For this reason, organisations seek to fill structural holes as they establish links in constellations. Conversely, Coleman (1988) argues that the network closure, i.e. closed cohesive ties in the network, generate higher social capital because members in the constellation will take advantage of increased trust and cooperation due to the strong internal ties. In airline constellations, the benefits of network closure are critical for the long-term survival of the airline constellations (Saglietto, 2009).

Opportunities, i.e. structural holes, can be exclusively pursued by adding partners with non-redundant ties and gradually eliminate partners with redundant ties. Redundant ties can be defined as relationships and exchanges that already exist in the network. Therefore, highly distributed alliances better exploit opportunities, i.e. structural holes, than higher density alliances. In addition, both highly distributed

alliances and higher density alliances should continuously balance the advantages from network closure and structural holes (Saglietto, 2009; Gudmundsson and Lechner, 2006).

Structural holes contribute to explaining why small/regional airlines act differently from large/network airlines in constellations (Gudmundsson and Lechner, 2006). Small airlines are, in general, reluctant to join airline constellations with large networks because they have problems in finding a prominent position and in exploiting structural holes. Small airlines can otherwise attempt to rapidly build new partnerships inside small networks. Conversely, large airlines can achieve additional benefits if they form ties with several small airlines rather than with a few large airlines because they take advantage of several connections between disconnected segments. Competition over structural holes leads to continuous instability in alliance constellations because large airlines continuously look for new opportunities with small airlines, while small airlines tend to join different small constellations (Gudmundsson and Lechner, 2006).

In the global airline market, constellations appear to have consolidated into three main players, namely Star Alliance, Oneworld, and SkyTeam. Star Alliance is led by Lufthansa and United/Continental, Oneworld is led by British Airways/Iberia and American, and SkyTeam is led by Air France/KLM, Aeroflot, and Delta/Northwest (Airline Business, 2009 c.). The three airline constellations account for almost 75 percent of the airline market based on revenue passenger kilometres (Luna, 2010). The market share for the three airline constellations appear to remain stable in the long-term (Saglietto, 2009). However, although major groups are defined, a number of members continue to switch alliance groups, whereas new members join up to the main constellations (Airline Business, 2009 c.). The three constellations have all received anti-trust immunity from the US DOT and the EC (Chapter 5, section 2), hence they are able to jointly fix fares and schedule flights (Luna, 2010; Knibb, 2009).

The alliance groupings have chosen different structures for coordinating their activities. Star Alliance has created a separate management company – Star Alliance

Service Gmbh, which manages the whole group, although constellation members still have a key role in the decision process. Star Alliance has also implemented a combined brand strategy, where individual brands are predominantly used in point-to-point traffic, whereas the Star Alliance brand replaces individual brands for connecting flights with different members (Andal-Ancion and Yip, 2005). SkyTeam has established a central management team that comprises six executives from its partner airlines that coordinate the brand activities and marketing strategies in different geographical areas (Airline Business, 2009 e.; Preloin, 2007). Oneworld has set an independent management structure that relies on flexible coordination strategies and individual brand identities. The independent management structure supports the members of Oneworld in flight planning, electronic ticketing and route structuring (Rajasekar and Fouts, 2009).

## **5.6. MINORITY EQUITY ALLIANCES**

In the airline industry, several alliances involve direct minority equity exchanges between partners. Equity exchange is usually perceived as a sign of commitment to the alliance agreement, and implies a long-term approach to the alliance relationship (Kale and Singh, 2009; Reuer and Zollo, 2005) (Chapter 2, section 3).

In the airline industry, equity exchanges differ in terms of underlying motives and managerial approaches and are further divided into unidirectional and bi-directional investments (Tae and Park, 1997). In unidirectional investments, one carrier unilaterally purchases minority equity in another carrier. On one side, the airline acquirer seeks to cement the alliance (Glisson and Cunningham, 1996; Tae and Park, 1997), and commits financial resources to its partner. Nevertheless, equity exchanges are also employed to secure strategic and operational control over airline partners (Carney and Dostaler, 2006). In this case, the airline acquirer can plan to obtain full control over its partner and make use of minority equities as a first mover option to increase shares in the future, if legal and strategic conditions favour full acquisitions (Carney and Dostaler, 2006). The underlying motives behind unilateral equity

exchanges usually remain uncertain for a long period of time and can be a source of conflict among partners (Wahyuni and Karsten, 2006). Indeed, most airline carriers negatively regard unilateral equity purchases. Equity stakes are perceived as devices for gaining further control (Glisson and Cunningham, 1996), whereas carriers seek to preserve their operational independence, given the high organisational diseconomies in the airline industry. Therefore, carriers accept equity purchases only if they face significant financial problems or have limited capital raising options (Carney and Dostaler, 2006). Carriers normally attempt to buy their shares back once they solve their financial problems (Tae and Park, 1997).

In bi-directional investments, two or more carriers exchange their equity with their partners. In this case, no partner plans to acquire further control, and consequently equity exchanges are employed to both reinforce the alliance relationship (Glisson and Cunningham, 1996; Tae and Park, 1997) and demonstrate long-term commitment to the alliance (Tae and Park, 1997). Under these circumstances, bi-directional investments are rarely a source of conflict and carriers attempt to purchase their stock back only when the alliance is terminated (Wahyuni and Karsten, 2006).

The airline industry shows financial instability and low financial margins (Chapter 4, section 1), and equity investments are affected by low profitability in airline capital. For this reason, airline equity investments are perceived as being financially insecure and carriers appear to limit equity investments in other carriers. In addition, airlines as equity investors look for specific strategic goals within the alliance, rather than financial returns for their equity (Carney and Dostaler, 2006). Nevertheless, carriers have to carefully evaluate if equity benefits compensate for the financial risks involved, because equity investments guarantee no formal control over the alliance partners.

Rajasekar and Fouts (2009) attempted to evaluate the effects of alliances involving equity investments on airline performance, which is measured as the weighted average of revenue passenger miles (RPM's), load factor, and market share. Rajasekar and Fouts (2009) found contrasting empirical evidence for alliances

involving equity investments and concluded that equity investments could not be considered as relevant factors influencing the performance of alliances.

## 5.7. EFFECTS OF ALLIANCES

The growth in airline alliances brings about several questions as to how alliances affect the airline industry and the general economic situation. The evaluation of the alliance effects also influences the alliance regulatory framework, because air transportation authorities direct their policies according to the expected effects of airline cooperation.

Many studies (Armantier and Richard, 2008; Goh and Yong, 2006; Brueckner, 2003; Hassin and Shy, 2004) analyse the effects of alliances, however, the evaluation of alliance consequences is affected by numerous research problems. Airlines are reluctant to disclose sensitive data and experience difficulties in measuring their partners' performances (Feldman, 1998). Alliance outcomes are also influenced by external factors, such as economic trends, that are difficult to isolate (Park and Cho, 1997). In conclusion, alliances significantly differ in terms of size and scope, hence alliances are difficult to include in a single evaluation framework (Brueckner, 2003). Despite these research problems, a number of significant studies concerning the effects of airline alliances are summarised in the following section:

*Effects on fares of parallel routes for airline constellations (Chapter 5, section 5), by Wan et al. (2009)*

Wan et al. (2009) argued that tacit cooperation on parallel routes may result in higher fares on parallel routes even if alliances are not granted anti-trust immunity by the regulatory authorities. However, higher fares can be offset by efficiency gains in the network routes, which are directly related to economies of density in the network (Chapter 5, section 3.1). Economies of density in the routes lower the average operational costs and may counterbalance the higher fares. Wan et al. (2009) analysed a combination of databases on international alliances and concluded that fares on parallel routes are, in general, not affected by alliances. Indeed, in the

Oneworld case, fares diminished as a result of the alliance, due to the efficiency gains in the network. The results suggest that the effect of international alliances may depend on the ability of an alliance to coordinate fares and generate efficiency gains by coordinating alliance operations.

*Effects on competition of codesharing, by Lin (2008)*

Lin (2008) focused on the effects that codeshare agreements between international carriers have on competition. Lin (2008) evaluated a hub-and-spoke network (Chapter 4, section 8.1) with  $n$  cities, where the hub is the departure and arrival route for international destinations. The carrier that operates the hub-and-spoke network establishes a codeshare agreement with a foreign carrier and is subsequently exposed to the competition of one airline entrant in its own spoke routes. Empirical evidence showed that the airline entrant would prompt lower profits for the hub-and-spoke carrier if the hub-and-spoke network was formed by less than three/four routes. Otherwise, the airline entrant would prompt higher profits for the hub-and-spoke carrier if the hub-and-spoke network was formed by more than four routes. Higher profits are explained by the network-wide spillovers, which are formed by the new demand for inter-line routes (Chapter 5, section 1.1) that are generated by the entry of a new carrier in the hub-and-spoke network. Therefore, Lin (2008) concluded that the overall competition decreases as a result of the international codeshare for networks with more than four routes.

*Effects on costs for codesharing, by Goh and Yong (2006)*

Goh and Yong (2006) examined whether codesharing had an impact on airline costs. Alliances were divided into two categories, large and small, and the variation in airline costs was estimated following codeshare arrangements for ten airlines between 1994 and 2001. Goh and Yong (2006) found that codeshares were associated with statistically relevant cost reductions, which are a function of airline size. Still, alliance efficiency gains were relatively small.

*Effects for complementary codeshare operations, by Hassin and Shy (2004)*

Hassin and Shy (2004) evaluated the effects that complementary operations in codesharing have on profits, passenger surplus, and the general competitive situation. Research was limited to two carriers, and codesharing was applied between hub airports and non-hub airports. Hassin and Yin (2004) found that only a subset of passengers achieved significant benefits, although the others suffered no damage from codesharing. Both operators earned higher profits from codesharing, and competition levels were maintained because passengers could take advantage of further opportunities.

*Effects on fares of codesharing and anti-trust immunity by Brueckner (2003)*

This study sought to measure the impact that codesharing had on fares with or without antitrust immunity (Chapter 5, section 2). This research excluded non-stop international travel on parallel routes, however, Brueckner (2001) in a previous study had identified no significant fare increase in parallel routes. Brueckner (2003) determined that codesharing reduced fares by 8%-17% compared to fares in non-codeshared routes. The range limits depend on both the sample and estimation method used. If antitrust immunity is granted to codesharing, fares are further reduced by 13%-21% compared to fares in non-codeshared routes.

If codesharing and the antitrust immunity effects are combined, total fare reductions amount to 17%-30% compared to fares in non-codeshared routes. Total fare reductions are smaller than the sum for codesharing and antitrust effects (which would be 21%-36%). Combination of codesharing and antitrust is measured when an alliance is granted antitrust immunity at the beginning of its operations. Brueckner (2003) argued that extra cooperative gains following antitrust immunity should be theoretically modest. Nonetheless, empirical analysis has confirmed no extra minor cooperative gains because carriers concentrate their resources on codeshared routes, where they apply most price discounts.

Codeshares result in significant benefits for passengers, given the general fare reductions.

*Effects on business performance, by Oum et al. (2004)*

Oum et al. (2004) attempted to estimate the alliance effects on business performance. Business performance was measured in terms of productivity gains and profitability gains. Research also examined whether business performances were dependent on the level of cooperation, in terms of the extent to which partners cooperated.

Empirical findings confirmed that carriers achieved significant productivity gains in alliances, which are directly related to the level of cooperation. Conversely, consistent profits were available only for high levels of cooperation.

*Effects on consumer welfare, service quality, and stock price, by Oum et al. (2000)*

Oum et al. (2000) examined four major transatlantic alliances in terms of fares and passenger volumes. Research confirmed that strategic alliances had contrasting effects on consumer welfare. In complementary alliances, consumer welfare improved because frequencies increased and fares were stable. Conversely, parallel alliances reduced combined frequencies on route networks and consumer welfare was affected. In addition, Oum et al. (2000) measured alliance impact on service quality. Service quality improved in complementary alliances, whereas dissimilar results emerged for parallel alliances. If partners withdrew no routes, service quality remained unchanged. Conversely, if routes were reduced by alliance partners, service quality decreased accordingly, even if costs were reduced in decreasing the total capacity. If fares followed the cost reductions, lower fares could compensate for the frequency reductions. In conclusion, Oum et al. (2000) evaluated the alliance impact on stock prices. Only if alliances had broad scope (Chapter 5, section 1.1), did airlines achieve returns on stock prices on the day of the alliance announcement. For alliances limited in scope (Chapter 5, section 1.1) and equity alliances, stock prices had no significant variations.

*Effects on aggregate demand, traffic, fares and consumer surplus, by Park and Zhang (2000)*

This paper estimated the effects for four global alliances on transatlantic routes in terms of air fares, passenger volume and consumer surplus. Park and Zhang (2000) used a structural estimation for oligopolistic international air markets and selected 19 North-American and 12 European cities in the period 1991-1994.

Park and Zhang (2000) demonstrated that the aggregate demand increased for all carriers with one exception. Such an exception is explained by inefficient route management in traffic feeding into transatlantic flights. Only two alliances appear to have reduced fares on transatlantic flights. Empirical findings on consumer benefits support the previous analysis, which was accomplished by Park (1997) and is presented below, where complementary alliances enhanced consumer benefits, whereas parallel alliances diminished the consumer benefits.

Authors concluded that global alliances had a positive impact on economic welfare if alliance effects were aggregated.

*Effects on market outcome and welfare, by Park (1997)*

Park (1997) designed an econometric model in order to analyse the effects for complementary and parallel alliances. Park (1997) found that fares tended to decrease and customers generally benefited from complementary alliances. Conversely, fares tended to increase on alliance routes in parallel alliances, whereas they decreased in non-alliance routes. Overall, consumers were negatively affected by parallel alliances. This study concluded that complementary alliances enhanced the overall welfare if market size was sufficiently large. However, economic welfare could be weakened by complementary alliances in small markets. Conversely, parallel alliances diminish the overall welfare if the market was sufficiently large, whereas they enhanced the overall welfare in small markets.

To summarise the research findings, alliances in the airline industry appear to prompt reductions on fares in the routes where alliances are applied. Fare reductions are significantly higher if antitrust immunity is granted. However, only complementary alliances showed general fare reductions, whereas, in most cases, parallel alliances result in fare increases. Passengers, in general, could get important gains from alliances in terms of fares, frequency, and connectivity, although parallel alliances could generate the opposite effects. Empirical evidence shows how service quality and general consumer welfare drop in parallel alliances, particularly if carriers reduce their offers on parallel routes.

Alliances generate uncertain anti-competitive effects. Alliances can rather favour more competitive structures, where alliance and non-alliance members are involved. Policy makers need to monitor the outcomes in parallel alliances, where increased market power can produce collusive pricing and cause less quality in services. In conclusion, alliances generate relevant additional traffic on routes involved in the alliance. Nonetheless, additional traffic generates higher profits for carriers only if carriers cooperate extensively. If carriers do not cooperate extensively, they will not achieve significant cost savings in the alliance and their total profits will be reduced by the higher costs. Productivity gains in alliances appear to be small as compared to benefits on the revenue side.

## 5.8. ISSUES IN ALLIANCE MANAGEMENT

Strategic alliances in the airline industry are influenced by three issues that carriers need to evaluate in establishing their alliance relationships:

- Cargo.
- Information Technology.
- Safety.

### 5.8.1 Cargo

Airline alliances are designed around the specific needs and preferences of airline passengers. Still, cargo operations can also become involved when networks are combined in alliances.

The cargo area can gain significant benefits from alliances because it has the ability to offer global reach and an extended capacity (Karp, 2004). Extensive access to international markets is a key comparative advantage for cargo operations given that intercontinental trade in goods grows significantly as a consequence of the globalisation process. In addition, the shippers, which are the main clients for cargo, can reduce the number of delivery points through alliances, and consequently achieve critical economies of scale (Air Cargo World, 2008; Kilcarr, 1997).

Cargo operations necessitate more extensive integration as compared to passenger operations. Cargo handling operations, proprietary computer systems, and booking centres need to form coordinated pipelines, where goods are rapidly moved (Karp, 2004). As a consequence, many carriers find it difficult to cooperate in cargo operations, because significant resources need to be invested and sensitive data need to be disclosed (Air Cargo World, 2008). Alternatively, carriers establish narrow alliances in the cargo area that can be independent from the established alliance networks and are focused on specific cargo tasks (Morrell and Pillon, 1999). In conclusion, cargo departments also evaluate partnerships with shippers and

forwarders in an attempt to develop more highly integrated and efficient pipelines (Air Cargo World, 2008).

### **5.8.2 Information Technology (IT)**

As mentioned in Section 4, alliances entail substantial initial expenses, whereas the benefits in terms of higher revenues and lower costs are generally deferred for the long term. The major source of expense and organisational problems in the initial alliance period, is in the area of Information Technology (IT) (Iatrou and Alamdari, 2005). Carriers use dissimilar systems in booking and operation handling, which may conflict in joint operations. Airline workforces can also be unfamiliar with their partners' IT procedures. For this reason, carriers need to go through an expensive and troublesome process in order to match and link their IT systems.

Establishing a common IT platform can reduce operational costs and minimise operational obstacles. However, common platforms require significant investments and oblige carriers to disclose sensitive data to alliance partners. Consequently, in some cases, airlines attempt to create external Internet-based systems (Ku and Yi, 2009).

Nevertheless, IT offers the airlines a number of opportunities in distribution, where airlines can employ e-commerce in order to bypass travel agencies and save on costs (Chapter 4, section 6) (Garrow, 2009; Boyd and Bilegan, 2003). The more airlines are linked together, the more Internet channels are effective, because consumers can access more travel offers in one visit. Therefore, airlines establish nonaligned web portals or common travel agencies – such as Orbitz, where airlines can jointly offer their travel services on-line (Garrow, 2009; Osborn, 2000). In addition, airlines cooperate with on-line travel agencies, which offer their services at lower prices than traditional travel agencies (Boyd and Bilegan, 2003).

### **5.8.3 Safety Issues**

Strategic alliances link up different carriers in terms of size, fleet, and personnel. This raises concerns for safety, due to contrasting levels of expertise and differing operational standards among alliance carriers. Safety standards can reach the carriers' lowest common denominator, when carriers become connected in alliances (Cordle, 1999). Moreover, alliances are formed by carriers from different countries, which comply with dissimilar national safety regulations. Alliances between carriers from different countries can cause problems in the implementation of the regulations because carriers can avoid the stricter safety standards in their own countries by codesharing routes in countries with more flexible safety standards. For example, the European and US safety standards are normally more rigid than the rest of the world, thus alliances with non-EU or US partners can interfere with these regulations (Government Accountability Office, GAO, 2005).

Consumer associations have vehemently protested against the different safety standards in codeshared routes. As a consequence, airlines have made several attempts to solve the safety issues in alliances. A number of airlines have voluntarily established alliance-based professional standard councils to ensure that their less safe members meet acceptable performance levels. In addition, most alliance constellations now require all members to meet the highest national aviation authorities' safety standards (Saglietto, 2009).

## 5.9. ACQUISITIONS IN THE AIRLINE INDUSTRY

Acquisitions in the airline industry are strictly limited both in scale and scope by existing regulations. Airlines are restricted in following their possibly desired consolidation strategies by numerous rules and procedures.

At an international level, acquisitions are difficult to accomplish. Almost all international markets are regulated by Bilateral Agreements. The routes that are operated by the airlines, need to be formally indicated in the Agreements (Dobson, 1995) (Chapter 4, section 3). If one airline loses its national identity in a cross-border acquisition, it automatically loses its network rights in countries covered by the Bilateral Agreements. With the approval of regulators, carriers can bypass regulative restrictions by establishing external holding companies, which control the airline capital, whereas airlines keep their national identity (Baker, 2003). Nevertheless, external holdings add managerial and organisational complexity which impacts the acquisition process. In addition to Bilateral Agreements, specific restrictions on national ownership are designed to prevent any foreign investor from acquiring national carriers. For example, in the US, no foreign investor can hold more than a 25% share in a national carrier, whereas in the European Union (EU), non-EU investors can purchase up to 49% of any EU carrier (Stober, 2003).

In addition to strict regulation procedures, political factors work against consolidation in the airline industry. In general, flagship carriers are still perceived as national symbols for a country, hence acquisitions from foreign investors are perceived as a loss of national identity by the public (Business Travel World, 2005). Moreover, transport regulators appear to be politically sensitive to protecting individual national carriers, rather than being concerned with general aviation policies (Airline Business, 2009 d.).

Many authors (Hamlin, 2009; Stober, 2003; Guild, 2003) argue that regulatory and political restrictions on acquisitions, prevent the aviation industry from consolidating. Should the aviation industry follow pure economic rules, an extensive

consolidation process would be implemented at an industrial level. Acquisitions would offer the airline industry the opportunity to normalize its international network structure, which is inefficiently fragmented due to the existence of exclusive national markets. A normalised international structure would balance the instability of the airline operations, and spread the risks throughout the network (Aviation Week & Space Technology, 2008 b.). Moreover, the removal of the restrictions on acquisition would result in strategic investments from carriers that are interested in the aviation business in the long-term, rather than investors focused on transitory gains. The airline industry indeed requires a level of capital which is too large to be entirely provided by national markets (Lyle, 2003).

Following these arguments, with no regulation and political constraints, the airline industry would follow the growth model of the telecommunication and banking industries, and become a global industry through wide-ranging acquisitions (Stober, 2003; Economist, 2003). The industry would stabilize as three or four global carriers emerge, whereas a number of well-established small carriers would cover niche and short-haul markets. The global carriers would maximise the economies of scope available in international markets and offer seamless travel to international passengers (Aviation Week & Space Technology, 2008 b.). Current alliance groupings (Chapter 5, section 5) are likely to shape the overall consolidation process, where international carriers will merge in joint structures (Wan et al., 2009).

Nevertheless, airlines have no opportunity to change their property structure until the industry is strictly regulated, and consequently, acquisitions are relatively uncommon in the aviation industry. Additionally, even when acquisitions are allowed, transport authorities impose significant constraints in terms of slot access in order to avoid anti-competitive behaviour (Jonas, 2005).

Despite the limited acquisition scale, specific categories in acquisitions can be identified in the airline industry. First, the airline industry experiences a modest growth in cross-border acquisitions, despite the unfavourable regulatory environment. Cross-border acquisitions are primarily concentrated in the European Union (EU), where the EU Single Aviation Act (1995) liberalised acquisitions

among EU airlines (Chapter 4, section 3) (Wigham, 2005). The EU market appears to stabilize into three main airline blocks around Lufthansa, Air France, and British Airways. Lufthansa Airlines has been the most active in accomplishing an acquisition program in the EU. After acquiring Swiss in 2005, Lufthansa acquired 45 percent stake in Brussels Airlines and 50 percent stake in BMI in 2008 and 90 percent stake in Austrian Airlines in 2009 (Dunn, 2009 d.). British Airways and Iberia concluded their merger process in 2010 (Flottau, 2010 b.), whereas Air France merged with KLM in 2004 with an additional connection of 25% equity in Alitalia (Flint, 2009) (Chapter 7, section 3). However, Stober (2003) states that acquisitions in the EU have no association with cross-border acquisitions, but rather with the natural consolidation process in domestic markets after deregulation, similar to the US market in the period 1978-1990, following the US deregulation in 1978 (Chapter 4, section 3).

Domestic mergers have historically been more frequent than cross-border acquisitions with no Bilateral Agreements to comply with. National air authorities are also generally favourable to domestic consolidation because it provides scope for one national carrier, which usually becomes the flagship carrier. Smaller domestic markets rarely offer enough feeding traffic for international flights for two or more operators (Business Travel World, 2005). Most national markets are consolidated in the developed world, hence domestic acquisitions are less frequent. However, the US market still experiences a consolidation process because the US market shows excessive capacity in redundant routes and hubs (Hatfield, 2007). As a consequence, the US market is continuously exposed to fare reductions and competition from low-fare carriers, hence it ensures no long-term profitability (Bachman, 2006) (Chapter 8, section 2.2). Consequently, the US market requires consolidation through acquisitions in order to rationalise the capacity in the market. For this reason, numerous US network carriers have proceeded to acquire or merge with their domestic competitors. In 2008, Delta merged with Northwest (Dooley, 2008) and in 2010, United Airlines and Continental Airlines merged (Chapter 8, section 3.3) (Schlangenstein et al., 2010).

As underlined in section 3.3, low-fare carriers in general employ no alliances to achieve their strategic objectives. Low-fare carriers rather tend to expand through acquisitions and keep a faster growth rate than network carriers (Vlaar et al., 2005). Empirical evidence confirms that the two main European low-fare carriers Easyjet and Ryanair established no alliances, but rather proceeded to acquire other low-fare carriers. Specifically, Easyjet bought GO in 2002 (Chapter 9, section 2) and GB in 2004 (Bell and Lindenau, 2009), whereas Ryanair bought Buzz in 2003 (Baker, 2003) and made several attempts to accomplish the full acquisition of Aer Lingus, which failed because of concerns on competition by the European Commission and the disagreement of Aer Lingus' shareholders (Airline Business, 2008 b.).

In conclusion, regional carriers are frequently targeted by major network carriers. However, the US and European network carriers appear to have opposite approaches for regional airlines (Bachman, 2009). In the US, airline majors seek to spin-off their regional affiliates and focus on the long-haul segment. Conversely, the European carriers tend to acquire regional carriers in their own domestic markets, and the acquired regional carriers are used to feed traffic into national hubs in an attempt to rationalise domestic fragmented markets (Bachman, 2009).

## **5.10. ACQUISITION RATIONALE**

As mentioned in Section 9, consolidation in the aviation industry eliminates network fragmentation in international markets and offers carriers an effective and efficient structure for covering different market needs. Therefore, many authors (Hamlin, 2009; Stober, 2003; Lyle, 2003) argue that, if regulation is removed from the airline industry, the consolidation process will remove most strategic alliances, which are established to avoid regulatory restrictions.

Nonetheless, the complex decision process at an organisational level should also be evaluated. Airlines indeed evaluate strategic and economic outcomes for acquisitions and strategic alliances according to their strategic objectives, and the industrial perspective is only one factor in their evaluation process. For this reason, the rationale behind acquisitions needs to be examined at an organisational level, and subsequently, the potential related risks and drawbacks.

### **5.10.1 Economic Reasons**

Airlines have the opportunity to combine two or more existing networks into one entity as a result of acquisition. In this way, route structures can be completely reorganised and network fragmentation can be eliminated (Goh and Yong, 2006; Jones, 1998). Joint airlines can achieve capacity reductions and keep passenger flow stable as parallel routes are removed, hence improving their system yields and profitability (Kiefer, 2005). Acquisitions also allow carriers to exploit the economies of scope and scale available by combining two or more networks (Holloway, 2008). Merged carriers can gain access to each other's destinations, and extend route combinations for their customer base (Lindstadt and Fauser, 2004; Airline Business,

2003 a.). Wide network ranges are especially useful for carriers that are based on small domestic markets that support no global strategy (Business Travel World, 2005). In addition, combined route structure offers stable feeding traffic direct into international hubs (Chang and Williams, 2002), and take advantage of consumer preference for “seamless” travel, since inter-line connections are transformed in acquisitions. As underlined in Section 3, passengers prefer on-line services because they minimise their own costs of route planning. In conclusion, airlines can achieve significant reductions on average cost per passenger in acquisitions because economies of density are maximised and unit costs decrease with intense use of capital assets in the network (Wan et al., 2009; Clougherty, 2002).

In addition to scope efficiencies, acquisitions can set off significant scale efficiencies. The production area of the carriers, which includes ground and passenger handling as well as aircraft maintenance, can be streamlined and production activities can be re-organised in order to maximise scale efficiencies. Also, airlines benefit from scale marketing efficiencies that are available from large networks (Goetz, 2004).

Finally, acquisitions are in some cases employed to rescue carriers that experience financial difficulties (Wahyuni and Karsten, 2006). Financial problems are frequent in the aviation industry, where carriers are vulnerable to economic recession due to low average margins (Chapter 4, section 3).

### **5.10.2 Strategic Reasons**

In addition to economic motives, acquisitions are applied for competitive reasons. Airlines can build up market power against their competitors and get permanent access to new markets and assets in acquisitions (Clougherty, 2002). Indeed, acquisitions set out to eliminate competitive disputes in specific markets. Merged carriers have the opportunity to apply a long-term strategy in these markets and avoid responding to competitive threats (Flores, 1998). Merged carriers can also effectively work toward common objectives because the risk perception decreases.

Many scholars (Forbes and Lederman, 2009; Airline Business, 2005 a.) argue that, in the airline industry, acquisitions are identified as competitive defensive moves. Major network carriers are entrenched in their domestic or regional markets, which carry numerous connecting passengers and provide essential traffic to hub airports for long-haul flights (Forbes and Lederman, 2009). Consequently, network carriers can incur major traffic losses from their hub airports if competitors enter into their domestic or regional markets. Therefore, network carriers proceed to acquire carriers that are established in close proximity to their key markets, in order to prevent potential competition in their hubs (Airline Business, 2005 a.)

To conclude, acquisitions guarantee long-term access to airport slots. In the airline industry, airports use the “grandfather right” system of allocating slots (Chang and Williams, 2002) (Chapter 4, section 7). According to the “grandfather right” system, airport authorities unilaterally allocate slots to carriers, usually favouring domestic carriers. Carriers can lose access to their assigned slots only if they offer no services in the slots for a prolonged period of time per year for 2-4 years on average. Moreover, carriers are forbidden to dispose of their slots to other carriers. As a result, slot availability in busy airports is often insufficient, hence acquisitions are employed to obtain the scarce slots as well as the scarce airline and airport facilities (Forbes and Lederman, 2009; Chang and Williams, 2002).

Acquisitions can also create large providers for air transport support services, such as aircraft maintenance and cargo operations (Air Cargo World, 2008). Merged carriers can achieve the necessary scale to compete in the support service market, as airlines increasingly outsource their maintenance units. Airlines also tend to specialize in engine maintenance and will have a preferred engine supplier to keep maintenance costs low (Air Transport World, 2005).

## 5.11. DRAWBACKS TO ACQUISITIONS

Acquisitions in the airline industry entail a number of drawbacks that can potentially counterbalance the acquisition benefits. In the airline industry, drawbacks in acquisitions are associated with ex-ante costs and ex-post costs (Chapter 3, section 2).

Ex-ante costs primarily concern valuation and “indigestibility” problems, which are associated with the difficulty of evaluating and separating intangible and embedded assets in acquisitions (Balakrishnan and Koza, 1993; Beamish and Banks, 1987; Hennart, 1988). Intangible assets and tacit knowledge are not significant in airline organisations, because the technology involved is exogenously developed by the aero-manufacturing industry (Baker, 2003). Nevertheless, carriers can incur significant problems in asset evaluation when they attempt to estimate the airline’s brand equity and managerial expertise. Brand equity is essentially constituted by the passengers’ perception of airline service quality and reliability. Reliability refers to both the airline’s punctuality and safety standards. Evaluation for brand equity and managerial expertise can prompt “adverse selection” and transaction losses (Chapter 3, section 2) (Ravenscraft and Scherer, 1987). Brand equity can be significant with specific destinations, hence a number of airlines choose to maintain their brands for a long time after acquisition (Baker, 2003).

Unnecessary assets, which are embedded in organizations, are limited in airline acquisitions. Indeed, aircraft, which are the major assets for airlines, are easily disposed of through efficient second-hand markets, and can be transferred in a short period of time (Teichert et al., 2008). In addition, terminal facilities can be readily re-allocated to airport organizations. Nonetheless, Xiaoli and Shanley (2008) argue that, in addition to aircraft, airlines are dependent on large specialized assets that are difficult to dispose of and can prompt significant unnecessary assets in acquisitions.

Specifically, airline carriers appear to require specialised baggage and ground handling equipment, computerised reservation units, and dedicated maintenance facilities that are difficult to allocate to other carriers if unnecessary after integration (Xiaoli and Shanley, 2008).

Ex-post costs are critical in airline acquisitions. Size is no advantage in the airline industry, despite the scope efficiencies available (Airline Business, 2003 a.; Flint, 1998) (Chapter 4, section 2). Airline operations entail complex procedures in scattered markets, which are accomplished according to the diverse needs of airline passengers. As underlined by Levine (1987) (Chapter 4, section 2), significant organisational diseconomies emerge as size increases, which can offset scale advantages. Therefore, merged organisations are exposed to high organisational diseconomies, because acquisitions result in the rapid expansion of the airline structure.

As mentioned in section 10, airlines need to re-organise their network structure and cut capacity in parallel routes, i.e. routes that are present in both networks, in order to maximise the economies of scope and density available. Therefore, high system yields and scope efficiencies are attainable only if airlines rationalise and streamline their networks. However, network rationalisation requires time for it to be achieved, hence the economic benefits of acquisition are available over the long-term, whereas financial expenses and organisational costs occur immediately (Oum et al., 2000).

Airline organisations can encounter key challenges in merging their networks and operations. These challenges stem from incompatibilities in business procedures and performance measurement (Marks and Mirvis, 1992) (Chapter 3, section 2). Task challenges are concentrated in IT systems in the airline industry. Joint operations require common IT platforms, because in many cases airlines adopt dissimilar IT systems (Ku and Yi, 2009; Learmount, 2004). Common IT platforms entail major investments as well as important changes in core activities for airline companies, such as in the booking system (Garrow, 2009). In addition, as underlined by Schraeder and Self (2003), such challenges are particularly demanding because

airline companies are dispersed geographically and communication problems increase in intensity. Merged carriers are also required to reconcile their distribution strategies. Airline carriers choose different mixes of on-line and travel agency transactions (Ku and Yi, 2009; Learmount, 2004) (Chapter 4, section 6), hence the distribution systems need to be harmonized. As a final point, ground and air personnel have to be retrained in order to implement consistent customer policies, and operational managers need to become rapidly familiar with the joint procedures in merged companies (Schraeder and Self, 2003).

Kotter and Heskett (1992) point out that corporate culture usually resists external changes and has difficulty in adjusting to new values and procedures. In common with other industries, carriers face problems in creating a common corporate culture after acquisition. Cross-border acquisitions are particularly problematic, because airline executives are generally used to environments in which national characteristics predominate, given the existing regulations in the airline industry (Chapter 4, section 2). Therefore, airline executives find it difficult to work in multinational environments (Prandoni, 1998), hence managerial conflicts can arise when airlines are combined (Paran, 1999). In addition, acquisitions expose airlines to the loss of key executives who prefer to resign from their positions because they feel alienated in the merged organisation. In most cases, key executives apply for similar positions in the airline's main competitors (Wagner and Muller, 2009).

In the airline industry, the workforce generally hold high bargaining power, because job disruption can cause total suspension of airline services. Acquisitions are negatively perceived by staff and trade unions due to major concerns over job losses and pension schemes. Hence, working units will show no cooperation in being re-structured and acquisitions are then exposed to labour unrest and organisational problems (Aviation Week & Space Technology, 2008 b.; Flouris and Swidler, 2004). Acquisitions can also be challenging due to fleet incompatibilities. Fleet configurations influence overall strategies and require significant resources for modification. Fleets are generally incompatible when acquisitions are accomplished and re-configurations can generate significant ex-post costs (Paran, 1999).

Ex-post costs following acquisitions can counterbalance acquisition benefits and cause significant problems for merged airlines. Ex-post costs largely explain the poor financial records that acquisitions have in the airline industry (Donoghue, 2005). The literature offers numerous examples of failures of acquisitions, such as Swissair/Sabena (Knorr and Arndt, 2004), American Airlines/TWA (Flouris and Swidler, 2004), Air New Zealand/Ansett (Airline Business, 2003 a.). Nevertheless, as argued by Chang and Williams (2002), the sample in airline acquisitions is not entirely representative, because legislators are inclined to favour acquisitions that involve financially-troubled carriers.

## **5.12. STUDIES RELATING TO ACQUISITIONS AND ALLIANCES IN THE AIRLINE INDUSTRY**

The literature offers two articles that specifically relate to acquisitions and alliances in the airline industry.

Barla and Constantatos (2006) consider the economic reasons for favouring acquisitions over strategic alliances. The authors design a model with three competitors, where capacity is fixed at the beginning and carriers exclusively compete on number of passengers. Allied carriers jointly settle capacity at first, and then market their capacity independently, hence they compete in the market as aggressively as the independent carrier. According to the model, in acquisitions, two merged carriers will compete for passengers more prudently and increase their prices in combined markets. The independent carrier will reach the highest equilibrium capacity, however, allied carriers will immediately follow and achieve higher equilibrium capacity than acquisitions. Therefore, allied carriers are set to achieve higher profits than the independent carrier if alliances generate synergies and cost reductions. Moreover, if strategic alliances and acquisitions achieve identical benefits in terms of cost reductions, strategic alliances will be preferred to acquisitions. Finally, if markets are exposed to high demand uncertainty, allied carriers will deliver higher profits than acquisitions. Barla and Constantatos (2006)

introduced the theoretical model in their paper, but accomplished no empirical research to support their model.

Zhang and Zhang (2006) present a two-stage model of competition between two alliances. Alliances are formed by two carriers with demand complementarities. In the first stage, carriers decide the degree of cooperation by evaluating the impact on the partner's profits. In the second stage, alliances compete on passengers. Demand complementarities in the alliance have a positive economic direct impact and improve strategic positioning for the two carriers. Consequently, partners, after the second stage, become interested in proceeding to consolidate through acquisitions.

## SUMMARY

The airline industry has still to find long-term stability in terms of organisational structure. Strategic alliances and acquisitions are evolving arrangements, which deliver similar benefits but are affected by significant drawbacks that can hinder expected outcomes and interfere with airline strategies. In addition, airlines are restricted by relevant regulation constraints, which are influenced by controversial political issues.

Many authors (Stober, 2003; Demarquette, in Guild, 2003; Lyle, 2003; Economist, 2003) argue that a widespread consolidation process will take place in the airline industry as regulation is gradually removed. However, at an organisational level, airlines will become exposed to significant ex-post costs for acquisitions, and will abandon the flexible alliance structure.

In conclusion, carriers appear to choose their organisational structure according to their business model. Indeed, low-fare carriers apply no strategic alliances and rather rely on acquisitions, whereas network carriers prefer strategic alliances for their global network. Consequently, the competition between business models will contribute to defining the organisational structure in the airline industry.

These questions and issues will be addressed in the next chapter on research methodology, which will constitute the framework for the subsequent research analysis.

# **CHAPTER 6**

## **Methodology**

## INTRODUCTION

The Transaction-Cost Economics theory and the Resource-based theory confirm that acquisitions and alliances are not separate organisational forms, but are alternative forms of governance when organisations require assets and competencies in other organisations and contracts and internal development are not efficient or feasible alternatives. In addition, academic studies do not offer clear guidelines to decision makers when they choose between strategic alliances and acquisitions.

Additional research is therefore required in order to fill this literature gap. Research is accomplished in the context of the airline industry. Academic research on strategic alliances and acquisitions in the airline industry, which was reviewed in Chapter 5, contributes to define the factors that airline decision makers use in choosing between alliances and acquisitions. Factors are structured in the research design, which guide empirical data collection and analysis in order to meet research objectives. Research methodology specifies the approach for relating research design with empirical data.

This Chapter sets out the research design for this study, which frames empirical research in accordance with the research objectives. Additionally, a methodological approach has been selected, which defines the techniques for connecting research assumptions with empirical data. This Chapter details seven Sections.

Section One encompasses the research design. Research focuses on one airline looking for external routes as key resources and choices between codesharing and acquisition. Research design is related to underlying theories and is consistent with the theoretical inquiry.

Section Two sets the research framework. The airline industry is significantly influenced by regulation and the airline decision process is often limited by regulatory issues. Consequently, empirical research is accomplished in a specific

research framework, where regulation issues are controlled and preclude neither alliances nor acquisitions.

Section Three describes quantitative and qualitative methodologies and explains why qualitative approaches are favoured in this research. A qualitative approach appears to match the nature and content of this research better than quantitative approach.

In Section Four, case studies are selected amongst the qualitative methods because research questions involve exploratory variables in contemporary contexts with no area of control. In case studies, theoretical patterns are required to be developed in advance. This is consistent with the structure in this research, where research design originates from literature review and drives data collection. Single or multiple case studies can be applied in empirical research, however, multiple case studies appear to be suitable for this research. In conclusion, appropriate sources of data for case studies are highlighted. Case studies use diversified sources of data, and data triangulation minimises divergent results.

Section Five summarises the procedures that are followed for collecting data in this study. Research objectives and framework limit the airlines that are eligible for being case units, hence strict criteria were established for selecting potential units. Corporate sources in potential units were then explored in order to get operational access. Most airline companies have specific departments for managing alliances, hence department heads were contacted by mail or email. Specific units were selected in order to improve reliability and significance in research results. In conclusion, field work is described, including field activities and a complete list of interviewees.

Section Six underlines research limitations to this study. Firstly, general limitations related to case methods and data sources are extended to this study. In addition, the number of units and informants to the case studies was restricted because only a limited set of airlines and departments inside the airlines were willing to cooperate in this research. Evolving regulation can also unpredictably change the research context and limit research generalisation.

Section Seven provides guidelines for interpreting and analysing data. An empirical pattern of variables emerges by data analysis, which employs coding procedures for examining text.

## 6.1. RESEARCH DESIGN

As underlined in Chapter 4, section 1, this research is accomplished within the airline industry, which comprises both the scheduled transport of passengers over network routes and the support activities related to the air service.

Airline companies set passenger traffic as a key component of their revenue function and strategically seek the right amount and combination of traffic over a specific period of time. Airline fixed costs make up, on average, more than 50 percent of total costs (Toh and Raven, 2003) (Chapter 4, section 4), hence airlines are exposed to high losses if the traffic load factor is unable to cover aircraft capacity. Indeed, airlines can achieve higher rates of profitability from specific target segments – i.e. business and long haul segments (Shaw, 2007), thus airlines look for the most profitable combination of traffic (Chapter 4, section 5).

Airlines design their route network structure over a given period of time according to their established traffic objectives. Airlines at first fix their aircraft capacity and frequency for any route in their existing network, then evaluate if they need to bring in additional routes to their network. Carriers can increase the number of available routes either by developing them internally or adding the network routes of other carriers.

The internal development of new routes requires implementation of new airline operations and additional investments in aircraft capacity. Internal development is time-consuming and requires a constant amount of resources for airlines. In addition, airlines have limited options to expand internally because of existing regulation. As underlined in Chapter 4, section 7, airport authorities have the right to allocate their slots to specific carriers, mainly domestic carriers, which lose their rights only in limited circumstances and are prohibited from disposing of their slots (Moores, 2009;

Chang and Williams, 2002). Consequently, airlines have scarce opportunities to expand internally.

Alternatively, airlines can get additional traffic by adding routes to their network that are operated by other carriers. Airlines can have access to external network routes through:

- a. Codeshare alliances
- b. Acquisitions

As outlined in Chapter 5, section 1, codeshare agreements consist of an airline selling part of its flight services to another airline on certain routes (Wan et al., 2009; Hassin and Shy, 2004). Conversely, acquisitions entail the full combination of the route networks (Hamlin, 2009) (Chapter 5, section 10).

This research focuses on the decision process in selecting codeshares or acquisitions when airlines look for additional routes. Internal development is excluded by the decision process, given the limited opportunities and high marginal costs. As pointed out in Chapter 5, section 1.7, codeshares and joint marketing alliances are examined at first when airlines start cooperating and are the most common agreements in the airline industry (Saglietto, 2009; Chathoth, 2004).

Nonetheless, airlines consider both the acquisition and alliance alternatives only in a number of cases when contacting other airlines. This research will thus be limited to settings where airlines evaluate important combinations in their route networks. Therefore, research settings will exclusively include codeshare agreements with extensive scope, where major interconnections of route networks are evaluated (Todeva and Knoke, 2005; Oum et al., 2000) (Chapter 5, section 1). Under these

circumstances, airline organisations are most likely to evaluate either codesharing or acquisition.

As underlined in Chapters 2 and 3, the main theories on strategic alliances – Transaction Cost Economics Theory (TCE) and Resource Dependence Theory – confirm that acquisitions and alliances are alternative and exclusive forms of governance and that further research is necessary in a specific industrial context – the civil airline industry – in order to evaluate the interrelations between cooperative and hierarchical forms. This research design is consistent with the main theoretical enquiry.

As for TCE, airlines require a specific combination of network routes to achieve the most efficient network structure. Airlines can use different mechanisms to get access to the external routes that they require, i.e. contracts, codeshares, and hierarchical forms, including internal development and acquisitions. However, carriers are unable to use contracts because they find it difficult to detail the specific seat requirements and corresponding scheduling per route over an extended period of time because many unpredictable contingencies may arise (Forbes and Lederman, 2009). Adjustments in the planned capacity and scheduling can be required as a result of volatile factors, such as adverse weather conditions, air traffic control or airport disruptions, and mechanical problems. Adjustments may face conflicting incentives as carriers try to optimize the overall profitability of their own networks (Forbes and Lederman, 2009). As a consequence, seat requirements and scheduling are integrated into the unique operational process of airlines, hence airlines get exposed to opportunistic behaviour and continuous bargaining of route providers increasing their transaction costs.

Since transaction costs increase with contracts, airlines can choose to internally develop network routes. Nevertheless, internal development is less effective than traffic sharing because airlines have the opportunity to share traffic at a low price. Traffic sharing indeed adds no significant costs to airline operations (Hennart, 1988). Consequently, codesharing and acquisitions will be the most efficient way to get

access to routes and minimise transaction and production costs (for a complete review of TCE, Chapter 2, section 2.1, and Chapter 3, section 1).

According to Resource-Based Theory, airlines continuously look for the necessary resources – the route networks – in order to achieve competitive advantages. Airlines are unable to use market exchanges with other airlines in order to get network routes because network routes are embedded in another carrier and cannot be autonomously separated by route networks. In addition, airlines are unable to develop routes independently because in most cases the resources – slots and lines that form the routes – are unavailable due to the regulation in the airports. Airlines will therefore apply acquisitions or codeshares in order to get otherwise unattainable competitive advantages (for a complete review of Resource-Based Theory, Chapter 2, section 2.2, and Chapter 3, section 1).

This research applies to both theories and can contribute to evaluating how cooperative and hierarchical forms operate within the civil aviation industry.

This research seeks to define the key factors that decision makers evaluate in selecting codeshares and acquisitions when airlines plan to secure routes served by external carriers. For analytical reasons, this research can be divided into two sub-sets:

- access to complementary routes
- access to parallel routes

Parallel routes are external routes that overlay the airline's own network, whereas complementary routes are external routes that are not covered by the airline's own network. As confirmed by Wan et al., 2009, Oum et al. (2000), Park and Zhang (2000), and Park (1997) in their studies on alliance effects (Chapter 5, section 7), the key factors in decision making appear to change if airlines look for complementary or parallel routes.

When evaluating codeshares or acquisitions, decision makers assess one external network, which is formed by a combination of complementary and parallel routes.

### **6.1.1 Complementary Routes**

#### *Codeshares*

In the airline network, one route is composed by one route line and two route nodes. The route line connects two route nodes, which are defined as slots. Therefore, the route line departs and arrives from two slots. According to the existing regulation on slots (Chapter 4, section 7) (Moore, 2009; Chang and Williams, 2002), airport authorities assign the slots to an airline, which fully controls traffic in the route line.

By definition, codesharing allows an airline to get access to passenger traffic in routes that are operated by an external airline, with no capacity provided. Nevertheless, codesharing secures access exclusively to route lines, and guarantees no full control of route slots. Route slots are still controlled by the external airline, which keeps the right to assign variable fractions of traffic to the codeshared airline according to its own strategic priorities. For this reason, codeshare secures only a portion of total traffic, depending on the external airline's allocation.

As mentioned in Chapter 5, section 3, an airline gains route traffic economies in combining its network with another airline, because it processes a higher flow of passengers through its system and exploits feeding traffic across the extended network (Wan et al., 2009; Goh and Yong, 2006; Lindstadt and Fauser, 2004). In addition, the airline takes advantage of consumer preference for on-line services, rather than inter-line (Government Accountability Office, GAO, 2005). Consequently, the airline gets economies of scope and density in addition to a portion of route traffic.

In codesharing, airlines follow competitive objectives in addition to economic benefits (Chapter 4, section 3). Codeshares with extensive scope can be classified as co-specialised alliances because they imply disclosure of sensitive information and high investments in partner's activities (Gomes-Casseres, 2003). Gimeno (2004) underlines how the number of available partners are generally limited for co-specialised alliances. Therefore, airlines set up codeshare agreements with prospective partners in order to avoid their competitors gaining alliance benefits and incurring strategic gridlock (Park and Zhou, 2005). From this perspective, airlines establish codesharing because they look for both immediate economic benefits and future economic benefits against their competitors.

As underlined in Chapter 5, section 4, airline alliances are shaped by a set of relational factors that are complex to administer as they evolve in the alliance life cycle (Reuer et al., 2006). Competitive elements (Wang and Zajac, 2007; Bierly and Coombs, 2004) and important cultural incompatibilities in the airline industry (Stober, 2003) further complicate relational management in the alliance life cycle. As a result, economic and competitive advantages in codesharing are exposed to the alliance's relational evolution. Airlines achieve full alliance benefits only if the relationship works perfectly, otherwise they lose significant advantages, given the high organisational diseconomies in the airline industry. If the relationship is incorrectly managed and partners suddenly change their strategy, alliances can be unilaterally terminated.

If major sections of the network are interrelated, airlines may incur significant costs in implementing their alliance (Chapter 5, section 4). Codesharing requires numerous operational adjustments, such as the harmonisation of reservation and handling systems, and marketing costs to promote new routes (Iatrou and Alamdari, 2005). After a first implementation period, costs related to the alliance become generally less significant.

### *Acquisitions*

When an airline acquires or merges with another carrier, it gets access not only to one route line, but also to the two route nodes, which are the slots from which the line departs and arrives. Consequently, the airline controls the total traffic in the route for an indefinite period of time (Holloway, 2008).

As highlighted in Chapter 5, section 10, network integration allows airlines to take advantage of all economies of scope and density available. Airlines indeed exploit the more intense use of capital assets in their network (Wan et al., 2009; Clougherty, 2002), as well as feeding traffic into their long-haul routes (Chang and Williams, 2002). In conclusion, inter-line connections between networks become on-line, hence airlines exploit consumer preference for on-line destinations and offer additional “seamless connections” (Armantier and Richard, 2008).

Airlines search for both economic benefits and competitive objectives when they choose acquisitions. As pointed out in Chapter 5, section 10, acquisitions are, in most cases, applied as competitive defensive moves (Forbes and Lederman, 2009; Airline Business, 2005 a.). For network carriers, domestic and regional markets where they are established deliver essential transfer traffic to their long-haul flights. Therefore, carriers favour acquiring those airlines that are positioned close to their key markets – particularly, if those airlines experience financial problems – in order to avoid a major competitive threat to their core hubs (Forbes and Lederman, 2009). Indeed, if competitors acquire the routes close to airline hubs, they can re-direct transfer traffic from airline hubs and take over significant airline market share. In this case, acquisitions can be classified as competitive defensive moves, where airlines seek to avoid having a percentage of their traffic flow captured by their competitors, rather than looking for traffic growth (Forbes and Lederman, 2009).

In the airline industry, ex-ante costs in acquisitions involve the asset valuation and the “indigestibility problems” (Chapter 5, section 11). Airlines have problems in evaluating brand equity and managerial expertise in other carriers. Brand equity refers to the differential in consumer response that is related to an airline’s reputation in terms of service quality and reliability. Reliability is constituted by the airline’s punctuality and safety standards. Conversely, technology is exogenously developed by the aero-manufacturing industry (Chapter 4, section 7), hence valuation problems for technological assets are limited (Chapter 5, section 11).

In addition to valuation problems, acquisitions are affected by “indigestibility problems” that originate from unnecessary assets in acquisitions. Unnecessary assets can be defined as assets that are not feasible or beneficial to redeploy in the merged organisation and require to be disposed of (Balakrishnan and Koza, 1993; Beamish and Banks, 1987). Both aircraft and terminal facilities can be easily disposed of, to other airlines and airport organisations (Barla and Constantatos, 2006). Nonetheless, in many countries, labour regulations prevent labour contracts from being terminated in the short term, hence a redundant labour force can bring about additional costs for the acquirer. Furthermore, most airport authorities require a minimum amount of service for keeping their slots under the airport regulations (Chapter 5, section 10) (Moores, 2009; Chang and Williams, 2002), hence the acquirer has to maintain minimum operational activities, which make aircraft disposal problematic (Chapter 5, section 11). Moreover, Xiaoli and Shanley (2008) affirm that airlines rely upon large specialised assets in addition to aircraft. Such specialised assets are primarily formed by computerised reservation systems, baggage and ground handling equipment, and customised maintenance facilities that are complex to transfer to other carriers. Consequently, specialised assets can become an obstacle in the integration process if they are not required by the merged organisation.

Airline acquisitions also show significant ex-post costs (Chapter 5, section 11). The aviation business process is affected by relevant organisational diseconomies when operational size increases (Airline Business, 2003 b.; Flint, 1998; Levine, 1987).

Organisational diseconomies are explained by complex operational procedures that airlines are required to accomplish in scattered markets (Economist, 2005 b.).

Consequently, as operations grow in size of acquisitions, acquisition benefits can be hindered by relevant organisational diseconomies. Organisational diseconomies intensify because of the numerous task challenges that airlines need to solve when they mix their operations in different corporate cultures. Task challenges are concentrated in the IT and distribution areas (Ku and Yi, 2009; Learmount, 2004).

In acquisitions, airlines have to invest a significant amount of capital, which results in high financial expenses. Financial expenses in acquisitions primarily stem from the cost of capital (Eiteman et al., 2006). Financial resources can indeed be stretched by high debt or the issuance of shares for the purchase payment, particularly if acquisitions seek to cure financial problems (Fredd, 2005).

### **6.1.2 Parallel Routes**

#### *Codeshares*

In addition to complementary routes, codeshares can include parallel routes, which are operated by another carrier and are already included in the airline's own network.

In this case, airlines provide additional frequencies to their route services, rather than getting traffic by expanding their network destinations. Additional frequencies are particularly effective in attracting the business segment, which is sensitive to improved service features (Shaw, 2007) (Chapter 4, section 5). As a consequence, in codesharing, airlines can get extra traffic from their established route portfolio, which is a fraction of the traffic operated by the other carrier.

As outlined in Chapter 5, section 3.2, parallel codesharing is also explained by significant competitive motives. Codesharing sets out to prevent aggressive price

strategies and preferential routing, hence airlines can focus on performance service differentials (Wakeam, 2003). Codesharing results in cost savings by avoiding continuous competitive conflicts, particularly aggressive price marketing strategies. Nevertheless, cost savings are partially achieved because competition still exists.

Relational factors and initial costs for implementing codeshares, which are analysed in the complementary route section, can also be applied to the parallel routes subset.

### *Acquisitions*

In acquisitions, airlines permanently attach additional frequencies to their route services in overlapping routes because they secure traffic frequencies that were controlled by acquired carriers. Furthermore, as outlined in Chapter 5, section 10.1, the merged airlines can get capacity reductions by removing unnecessary overlap in their flight frequencies and consequently improving their load factor and profitability (Goh and Yong, 2006; Jones, 1998).

Acquisitions also allow permanent removal of competitive conflicts on the routes covered. Therefore, airlines indefinitely prevent potential losses from competitive conflicts, in particular in the area of aggressive pricing.

Asset valuation, indigestibility problems, organisational diseconomies, and cost of capital, which are analysed in the complementary route section, can be also applied to the parallel routes subset.

### 6.1.3 Overall Network

Decision makers will combine the key factors, which are associated with codesharing and acquisitions, for complementary and parallel routes when evaluating the overall network. The key factors originate from the literature review on alliances and acquisitions in the airline industry, which was accomplished in Chapter 5. The literature review is directly related to the analysis of the academic literature on alliances and acquisitions in general, which was accomplished in Chapter 2 and Chapter 3. The context where empirical evidence is collected, is the airline industry, which main features and trends are summarised in Chapter 4.

The resulting key factors for codesharing, when evaluating for the overall network, are:

**TABLE 6.1**

#### **Codeshare's key factors**

|   |
|---|
| <p><i>Codeshare benefits</i></p> <ul style="list-style-type: none"><li>○ Economic<ul style="list-style-type: none"><li>– Portion of network traffic on complementary routes</li><li>– Density economies on portion of network traffic on complementary routes</li><li>– Scope economies on portion of network traffic on complementary routes</li><li>– Additional frequencies on parallel routes</li></ul></li><li>○ Competitive/Strategic<ul style="list-style-type: none"><li>– Secure future economic benefits against competitors on complementary routes</li><li>– Prevent aggressive price marketing strategies on parallel routes</li></ul></li></ul> <p><i>Codeshare costs</i></p> <ul style="list-style-type: none"><li>○ Relational factors</li><li>○ Initial implementation costs<ul style="list-style-type: none"><li>– Harmonisation of reservation and handling system</li></ul></li></ul> |
|---|

- Marketing expenses

The resulting key factors for acquisitions, when evaluating the overall network, are:

**TABLE 6.2**

**Acquisition's key factors**

|   |
|---|
| <p><i>Acquisition benefits</i></p> <ul style="list-style-type: none"><li>○ Economic<ul style="list-style-type: none"><li>- Total traffic on route lines on complementary routes</li><li>- Total density economies on complementary routes</li><li>- Total scope economies on complementary routes</li><li>- Total traffic frequencies on parallel routes</li><li>- Network rationalisation on parallel routes</li><li>- Operational cost savings</li></ul></li><li>○ Competitive/Strategic<ul style="list-style-type: none"><li>- Avoid transfer traffic on core hubs to be captured by competitors</li><li>- Eliminate competitive conflicts on parallel routes</li></ul></li></ul> <p><i>Acquisition costs</i></p> <ul style="list-style-type: none"><li>○ Ex-ante<ul style="list-style-type: none"><li>- Asset valuation</li><li>- Indigestibility problems</li></ul></li><li>○ Ex-post<ul style="list-style-type: none"><li>- Organisational diseconomies</li><li>- Cost of capital</li></ul></li></ul> |
|---|

Therefore, airline decision makers will choose codesharing over acquisition if they consider that the contribution from codeshare benefits minus costs will be superior to acquisition benefits minus costs. Conversely, airline decision makers will choose acquisition over codesharing if they consider that acquisition benefits minus costs are superior to codeshare benefits minus costs. Given the high risks for acquisition, if codeshare and acquisition deliver similar results, airline decision makers will favour

codesharing. However, if both evaluations result in negative outcomes, airline decision makers will reject both acquisitions and codesharing.

The case studies that are employed for collecting the empirical evidence (Chapter 6, section 4) will investigate the decision process in airlines and will compare the key factors that emerge in the research design with the key factors that emerge from the case studies. The conclusive key factors will contribute to draw the final conclusions on how airline decision makers choose between alliances and acquisitions. The conclusive key factors are summarised in Table 10.1, Chapter 10, section 1.

## **6.2. RESEARCH FRAMEWORK**

This research is applied in a framework where regulation does not prevent carriers from establishing acquisitions. Otherwise, carriers could favour codesharing exclusively because it is the only option available for getting access to network routes.

Hence, the research will be limited to:

- 1) Areas in which international treaties enable airlines from different nationalities to proceed to cross-border acquisitions – e.g. European Union (EU) Common Aviation Space, Australia-New Zealand International Treaty, Switzerland Referendum and following International Treaty with EU countries.
- 2) Important national aviation markets in which acquisitions include sizeable carriers – e.g. the US and Japan.
- 3) Acquisitions involving national flag carriers and important regional carriers – e.g. Austrian Airlines-Lauda Air.

Acquisitions encompassing regional carriers will be excluded from this research because they are on average less significant in terms of resources involved.

Additionally, codeshares are often affected by rules that interfere with their implementation and development. Nonetheless, rules on codesharing primarily concern competition issues, hence they will be applied in similar ways to acquisitions. Therefore, rules on codesharing are assumed not to influence the decision process between strategic alliances and acquisitions.

The research framework offers valuable advantages in this study. Many authors (Hamlin, 2009; Goh and Yong, 2006) believe that the industry will be further deregulated in the long term. How the deregulation process will evolve is difficult to predict, nevertheless, the final result is likely to be an almost liberalised industry. Consequently, this research will contribute to identifying how the property and organisational structure in the airline industry will develop. In addition, as pointed out in Chapter 5, section 10, consolidation in the airline industry can eliminate network fragmentation in international markets and offer airlines an effective structure for covering different market needs (Aviation Week & Space Technology, 2008 b.). However, benefits at the industrial level consider no decision making process at the airline level. This research will therefore contribute to evaluating how industrial consolidation benefits are considered at the airline level when acquisitions are compared to alliances.

### **6.3. SELECTING QUALITATIVE METHODS**

In social sciences, two methodological approaches are applied in relating theoretical models and data:

- quantitative methods
- qualitative methods

Quantitative methods are associated with the positivist philosophical assumptions (Johnson and Christensen, 2007; Neuman, 2005; Burrell and Morgan, 1979; Popper, 1959). Quantitative methods exclusively focus on objective methods of measurement for observable phenomena, and exclude subjective methods, which are based on intangible or subjective facts (Creswell, 2008). Quantitative methods are also strictly deductive, hence theories need to be developed ahead of data collection. Theory is expressed in detailed hypotheses and is tested by the collected data. Hypotheses are fixed during data collection, and are accepted until new empirical evidence disconfirms the theory (Gill and Johnson, 2002). Popper (1959) suggests that the research process should focus on disconfirming the initial hypotheses because theory can be confirmed only a finite number of times.

In quantitative methods, accurate instruments and measurements are required to evaluate statistical variation in observations. Data collection and analysis are strictly independent processes, and theoretical generalisations can be inferred only at the end of the research (Neuman, 2005). Research objectives and procedures are generally well-defined in quantitative methods, nonetheless, innovative knowledge can be restricted because research exclusively focuses on existent knowledge (Easterby-Smith et al., 2002).

Qualitative methods are based on the phenomenological assumptions (Berg, 2006; Taylor and Bogdan, 1998; Habermas, 1970; Husserl, 1946), which challenge the positivist approach in many aspects of research. Qualitative methods contrast the positivist immutability of reality, and assume that social actors continuously modify the social world. Research should be accomplished in different social settings, and relevant data can be generated by analysing the social context (Glaser and Strauss, 1999). Subjective motives and intentions of participants are relevant in understanding the reality, and should relate to objective facts.

Qualitative methods rely on inductive logic (Silverman, 2004). Research hypotheses are generally developed during empirical research. Hence, theory development, data collection and data analysis are strictly interrelated (Creswell, 1997). Flexible methods of analysis are applied in order to combine objective facts and subjective

constructs, because statistical variance of data is unable to evaluate subjective patterns (Gill and Johnson, 2002). In this way, qualitative methods can offer new research perspectives, however, they can be exposed to unclear procedures in accomplishing data collection (Easterby-Smith et al., 2002).

Despite the differences between the two philosophical assumptions, quantitative and qualitative methods are combined in numerous researches in order to exploit the advantages in both approaches and broaden research viewpoints (Creswell, 2008). Consequently, philosophical incompatibilities often break down in practice, and various interrelationships emerge between the two approaches at the empirical level (Creswell and Plano Clark, 2006).

Methodological approaches are selected for specific research according to different criteria. As suggested by Gill and Johnson (2002), the nature and content of the problem under investigation primarily drives methodological decisions, since research problems are effectively investigated by either qualitative or quantitative methods. In addition, the characteristics of the researcher should be evaluated in terms of psychological attributes and general worldview for methodological decisions (Creswell, 2008). In conclusion, the researcher's expertise in applying quantitative and qualitative methods should also be examined (Creswell, 2008).

For this research, qualitative methods appear to be appropriate for the research problem being investigated. Indeed, in the research objectives presented in section 1, most variables are explorative and are difficult to be statistically analysed, as requested by quantitative methods. Furthermore, as underlined in Chapter 2, section 1, the relationships between acquisitions and strategic alliances have been marginally explored by the literature because acquisitions and alliances are too complex to include in the same statistical sample as they have entirely diverse characteristics

(Inkpen et al., 2000). Qualitative methods can therefore offer new research viewpoints and overcome statistical incompatibilities (Bailey, 2006).

Qualitative methods also allow further investigation of subjective motives that influence decision makers along with objective facts. In order to explain model variables, it is required to “get inside” the meanings that airline decision makers give to problems, and process their beliefs, attitudes and intentions. Hence, this research can benefit from flexible qualitative methods to examine subjective components in the model (Creswell, 1994).

## **6.4. CASE STUDIES AS RESEARCH METHOD**

### **6.4.1 Selecting Case Studies**

Creswell (1994) summarises four main methods that are employed in qualitative research – ethnographies (Thomas, 1992), grounded theory (Marshall and Rossman, 1999), case studies (Yin, 1994, 2002), phenomenological studies (Howe and Eisenhart, 1990). Generally, research designs are chosen according to the specific research objectives.

Yin (1994) suggests using case studies, experiments and histories if the general purpose of the research is exploratory and the ground tour question is concerned with “how” and “why”. In this study, variables are mainly explorative and the research seeks to examine *how* decision makers choose between acquisitions and alliances in the airline industry, and *why*, the variables being processed during the decision process (grand tour question, Chapter 1, section 2).

Case studies are ultimately selected from among experiments and histories because of two further criteria that Yin (1994) proposes. Case studies are being adopted

rather than histories because this research focuses on contemporary rather than historical events. Case studies can take advantage of two methodological instruments – interviews and direct observations – that are not applied in histories. Interviews and direct observations allow examining the present context where the decision making takes place. Experiments are effective if systematic manipulation of events is possible and available to the researcher. The area of control on airline alliances is non-existent, hence case studies are preferred to experiments (Yin, 1994).

#### **6.4.2 Features of Case Studies**

In this investigation, case studies are used primarily to understand and interpret observable phenomena and obtain further insights. This research shows no intrinsic interest in the case units, i.e. the focus of the inquiry is not to perceive critical issues for the case units, hence case studies are exclusively instrumental to achieving the objectives of this research (Stake, 2005).

Smith (1979) defines case studies as “bounded systems”, which focus on research objects rather than research processes. Generally, case studies involve large sets of variables and seek to illustrate wide-ranging research inquiries (Adams and Schvaneveldt, 1991). Case studies are particularly effective when the phenomenon being investigated is interrelated with the research context. Large sets of variables, which are used in cases, contribute to distinguish the phenomenon by the context; nevertheless, the number of variables can exceed the number of data points in some situations. Consequently, case studies should employ different data collection techniques in order to increase the variety and the depth of the data that are collected in the case studies (Yin, 2002).

Case studies set out to accomplish analytical analysis, rather than building statistically representative samples. Therefore, case studies produce no statistically-proven results, which can confirm or disconfirm established theories, but seek to

generalise theories holistically instead (George and Bennett, 2005). Research focuses on understanding the chosen case studies, rather than enumerating frequencies or representing other cases. Typical or representative cases can improve research outcomes, however, no scientific methodological reasons are claimed. Case studies are thus unaffected by incomplete scientific results (Adams and Schvaneveldt, 1991; Hoaglin et al., 2000), and offer new qualitative perspectives (Hancock and Algozzine, 2006).

### **6.4.3 Role of the Theory**

As outlined in section 1, theory is not necessarily developed at the beginning of the research in qualitative research, and can be modified in the course of the investigation (Gerring, 2006; Strauss and Corbin, 1990).

In case studies, theory should be constructed in the first sections of the case before data collection. Theory guides the design research phase and shapes the entire research process. As suggested by Lincoln and Guba (1985), case studies should employ “pattern theories”. Neuman (2005) defines pattern theory as “an interconnected set of concepts and relationships” (pp. 98), which requires no causal statements. Metaphors and analogies should be used in pattern theory to relate the concepts and produce “systems of ideas that inform” (Neuman, 1991, pp. 56). Pattern theory is flexible and should not restrain the research process. Theory should be constantly revised during data collection, and new hypotheses should be continuously evaluated through research phases (Gerring, 2006).

The structure of this research is consistent with the recommended application of theory in case studies. Indeed, literature review is accomplished in Chapters 2 and 3, along with contextual analysis of the airline industry in Chapter 4. Literature review is followed by research design, which provides the theoretical outline for data collection. The theoretical outline is formed by exploratory variables that are revised

during the data collection and analysis phases. This study sets out to achieve analytical generalisation where “a previously developed theory is used as a template with which to compare the empirical results of the case study” (Yin, 1994, pp. 68).

#### **6.4.4 Single and Multiple Case Studies**

Yin (1994) suggests that single case studies should be selected only if they are classified as:

- 1) *Critical Cases*: single cases that are capable and sufficient to prove or disconfirm a theory, which has been defined at the beginning of the research.
- 2) *Extreme or Unique Cases*: only one case is available for analysing one phenomenon.
- 3) *Revelatory Case*: single cases that have not been previously accessible to research.

The above conditions occur infrequently, hence multiple case studies are largely applied in qualitative research. Additionally, Stake (2005) underlines that multiple case studies contribute to achieving compelling and reliable research results. Nevertheless, the research process is difficult to control in multiple case studies and further resources are necessary for coordinating data collection and analysis.

Replication logic is applied in multiple cases in drawing cross-case conclusions. Replication logic is extensively used for multiple experiments, and implies that reliability and significance of research results increase if empirical evidence is collected in various experiments or cases (Hersen and Barlow, 1976). Replication logic is unrelated to sampling logic. Sampling logic uses a portion of the population to statistically estimate the characteristics for the entire population. Conversely, multiple cases are not a subset of the population, but are complete and independent

studies that are chosen because they contribute to the inquiry and are not representative of the population.

As a consequence, multiple cases should be selected if they lead either to similar conclusions (literal replication), or contrasting conclusions but for an expected rationale (theoretical replication) (Yin, 1994, 2002).

No set criteria exist in multiple cases for choosing the appropriate number of cases in order to get conclusive outcomes. In general, a limited amount of cases (2-3) is applied for literal replication, whereby additional cases (4-6) are applied for theoretical replication. However, a larger number of cases is recommended (5-6) for literal replication if research design applies subtle theoretical propositions. Conversely, further cases are required for theoretical replication if the research model introduces controversial hypotheses (Stake, 2005; Yin, 1994).

In this research, case studies seek to confirm the research design and thus achieve similar conclusions. Therefore, literal replication is appropriate and cases are selected to increase the probability of achieving similar conclusions. Indeed, three cases appear to be adequate in this study since variables in the research design are clearly defined.

Case studies can be further classified into (Yin, 2002):

- 1) *Holistic cases*: only one unit of analysis is identified per case.
- 2) *Embedded cases*: one or more sub-units are analysed within the one unit of analysis.

Holistic cases are generally applied if no sub-units of analysis can be selected in the phenomenon being analysed, and no elements in the theory can be independently examined. Conversely, sub-units can be identified for embedded cases as a result of research analysis, and sub-units can independently test theory (Stake, 2005). Sub-units contribute to detect unpredictable modifications during data collection and

analysis, although embedded cases can excessively focus on sub-units and restrict theory testing (Yin, 1994).

In this research, airline organizations, which are included in the research setting, establish a number of alliances and acquisitions that can be identified as sub-units of analysis. Therefore, embedded case studies are selected in accomplishing this research. Broader evidence can be collected through embedded cases, and unexpected changes in the phenomenon under investigation can be detected.

#### **6.4.5 Data Sources in Case Studies**

As mentioned above, case studies capitalise on several sources of data to collect empirical evidence. Nonetheless, the use of different sources can generate coordination problems in data collection (Bailey, 2006). Moreover, different sources can provide divergent empirical evidence, hence data deviation should be monitored in order to collect additional data (Barzun and Graff, 2003). Consequently, case studies require continuous data triangulation, in order to prevent one method from having a disproportionate role in research results (Abrahamson, 1982). Data triangulation seeks to achieve converging explanations for the phenomenon under investigation (Stake, 1995). Furthermore, data triangulation increases research validity, which is defined as “the understanding of the theoretical rationale underlying the obtained measurement” (Kinnear and Taylor, 1995, pp. 54). Data triangulation requires additional resources to be utilized, however, only important data should be triangulated in order to minimise research resources (Stake, 2005).

In this research, the following sources of evidence are selected:

- 1) Interviews
- 2) Documents
- 3) Archival Records

Interviews are defined as verbal interchange between individuals (Creswell, 2008). Interviews are extensively used in academic research in order to get access to objective facts as well as subjective motives that researchers were unable to directly observe. Interviews are generally classified in three main categories:

- a) *Structured Interviews*: questions are prepared in advance and a limited set of response categories is established. Variations in the interview structure are rarely applied (Patton, 1987).
- b) *Group interviews* (also defined as *focus groups*): a small group of people (between 6 and 14 on average) replies to a fixed or loose set of questions. A moderator coordinates the interview process and guides the conversation (Kinneer and Taylor, 1995).
- c) *In-depth open-ended interviews*: individual, face-to-face interviews where the list of questions is unstructured and respondents are encouraged to talk liberally about different topics (Gubrium and Holstein, 2001).

In this research, in-depth interviews are exclusively employed because they are both effective in achieving research objectives and consistent with qualitative research methods. Unstructured interviews are appropriate for evaluating subjective issues and opinions of respondents in contexts that are not influenced by theoretical assumptions. Moreover, open-ended interviews allow analysing beliefs and values that respondents use to process information (Gubrium and Holstein, 2001; Burgess, 1982). In-depth interviews “get below the respondent’s surface reactions” (Kahan, 1990, pp. 9) because no categorisation is applied to limit the inquiry (Ryan and Bernard, 2000).

In-depth interviews are therefore applied to analyse subjective motives and views of airline decision makers when they evaluate alliances and acquisitions. Additionally, as suggested by Easterby-Smith et al. (2002), in-depth interviews are suitable to analyse confidential or commercially sensitive issues in airline acquisitions and alliances.

In in-depth interviews, interviewers are active participants and continuously interact with respondents (Foddy, 1994). Interview context should be continuously evaluated in order to examine subjective attitudes and views of respondents. Although in-depth interviews have loose structures, clear objectives need to be defined at the beginning of data collection in order to relate interview data and research theoretical assumptions (Patton, 1987). For this reason, issues and themes, which will be discussed in the interview, are generally summarised in topic guides, where a loose question structure is suggested. However, interviews should always keep a certain degree of flexibility and be open to unexpected themes and issues.

As suggested by Patton (1987), interviews will be recorded along with detailed notes. Immediately after the interview, a complete report will be accomplished.

In addition to in-depth interviews, case studies rely on documents and archival records to collect data. Documents and archival records are valuable resources to evaluate facts that were impractical to observe due to lack of resources and time (Yin, 2002), although documents and archival records are generally created for specific objectives that are different from the research's own objectives.

Documents and archival records are also used in data triangulation to validate or disconfirm data collected from other sources, such as in-depth interviews. If documents and other sources diverge, further investigation is necessary to evaluate both source reliability and reasons behind deviations (Stake, 2005).

## **6.5. DATA COLLECTION**

Potential units of analysis need to be selected for case studies in data collection. Given the research objectives, only a limited set of airline companies is eligible as case units. Once the airlines are selected, organisations are contacted in order to get operational access. After receiving formal approval for access, three units are chosen,

and primary and internal secondary data are collected for the three units (Bailey, 2006).

### **6.5.1 Selecting Potential Units for Cases**

The selection of airline companies as potential units for cases is based on the following criteria:

- 1) Airlines that primarily focus on passenger air transport – at least 80 percent of their revenues.
- 2a) Airlines that are among the top three in terms of market share in their national market, mainly national flag carriers or important regional carriers. The top US eight airlines are included in the selection, taking into consideration the strategic importance and size of the US market.

*and*

- 2b) Airlines that have significant market share in the low-fare segment (Chapter 4, section 8).
- 3) For airlines selected in point 2a), airlines that are significantly involved in alliances – at least one agreement with extended scope and several agreements with limited scope (Chapter 5, section 1).
- 4) For airlines selected in point 2b) and point 3), airlines that are engaged in acquisition activities:
  - a. successful or unsuccessful acquisitions in the past
  - b. acquisition implementation process
  - c. acquisition negotiations or incomplete acquisition negotiations in the past

As outlined in section 2, the research is limited to contexts where regulation allows acquisitions to be applied. Therefore, airlines that are exempted by regulation issues from acquisitions were favoured in the selection process.

Eligible airlines were selected by reviewing different published sources:

- 1) *International journal publications*: Academy of Management Journal, Academy of Management Review, British Journal of Management, California Management Review, European Business Forum, Journal of Accounting and Economics, Journal of Business, Journal of Business & Economic Studies, Journal of Finance, Journal of International Business Studies, Journal of Management, Journal of Management Studies, Journal of Marketing, Journal of Marketing Research, Journal of the Academy of Marketing Science, Management Science, Organization Science, Review of Financial Studies, Strategic Management Journal.
- 2) *Specialised aviation and transport newspapers*: Air Cargo World, Air Transport World, Aviation Business, Aviation Week and Space Technology, Flight International, Journal of Air Transport Management, Journal of Travel and Tourism Marketing, Journal of Transport Economics and Policy, International Journal and Physical Distribution, Transportation Research Part B: Methodological, Transportation Research Part D: Transport and Environment, Transportation Research Part E: Logistic and Transportation Review, Transportation and Distribution.
- 3) *Business and financial journals*: Bloomberg Businessweek, Business Horizons, Business Week, Economist, Financial Times, il Sole 24 Ore, Industry Week, International Management, Journal of Commerce, Management Today, Marketing, Marketing Week, Mergers and Acquisitions, Privatisation International, Value Line Investment Survey, Wall Street Journal.

At the end of the selection process, 26 companies were chosen as potential units of analysis for cases.

### **6.5.2 Getting Operational Access**

After selecting potential units of analysis, airline corporate sources – mainly investors' reports and corporate websites – were examined in order to identify the organisational units that primarily supervise alliances and acquisitions. Usually, airline organisations have distinct departments that operationally control alliances. Otherwise, alliances are managed either by corporate development departments or marketing departments.

The decision process for alliances and acquisitions is directed by airline top management, however, organisation units, which supervise alliance relationships, are generally very influential in the decision process.

Heads of departments previously identified were contacted by mail and email. Main research objectives were summarised in the letter and cooperation was requested for accomplishing the cases. A complete copy of the letter can be found in Appendix 1. Ten organisations replied positively to the request for cooperation.

### **6.5.3 Choosing Specific Units and Collecting Data**

In selecting the units of analysis for cases, airlines that apply diversified business models – respectively low-fare and network models (Chapter 4, section 8) – were preferred. The airlines representing the network model were then selected in order to analyse different airline markets, in detail the US and the EU airline markets. This

selection was accomplished in order to improve reliability and significance in research results.

Given the above criteria, the three specific units of analysis were selected and for the following reasons:

1) *Alitalia S.p.A:*

Alitalia represents a European flag network carrier, which is based in the Italian domestic market. Alitalia has limited opportunities in the long-haul market because it draws only one third of its traffic from long-haul flights as compared to two-thirds for major European carriers. Alitalia's financial performance had been unsatisfactory between 2000 and 2007, and strategic relationships offered opportunities for Alitalia to overturn its negative economic conditions.

*Air France-Alitalia sub-unit*

Air France had been the first among European major carriers to proceed to acquire another national carrier. In 2004, Air France merged with KLM (Betts, 2007). Aviation analysts (Pogliotti, 2007) had outlined that integration costs and organisational diseconomies endangered Air France Group's performance, however, Air France solved the acquisition problems and managed integration effectively. When Air France proposed acquiring Alitalia, Popham (2006) argued that Air France applied an innovative model for growth through acquisitions in the European market.

Air France and Alitalia had already set up a long-term codeshare agreement, hence Air France-Alitalia discussions contributed to analysing the Air France's choice between its existing codesharing with Alitalia and acquisition. Air France had two rounds of negotiations with the Italian government in 2006 and 2007 for acquiring Alitalia. In the first negotiation in 2006, the Italian government implemented a privatisation process for selling 39.9 percent of its 49 percent share in Alitalia (Hooper, 2007). According to Italian law, airline carriers buying 39.9 percent in Alitalia had to get full control of the airline, thus privatisation resulted in airline

acquisition (Baker, 2007). In this instance, regulative and political interference in the airline decision process could be controlled because privatisation required the Italian government to openly state conditions for acquiring Alitalia. In the second negotiation in 2007, the Italian government supported the unions in rejecting concessions on labour contracts for Alitalia's workforce (Kahn et al., 2008). In both negotiations, the conduct of the Italian government increased acquisition ex-post costs for Air France. In conclusion, in 2008, Alitalia was restructured and purchased by a group of Italian investors (Meichtry, 2009). Air France acquired 25 percent in the new Alitalia (Dunn, 2009 d.). Air France's initiative contributes to explaining the strategic motives behind minority equity links as well as the relationship between the governance structure of the alliance and the purpose of the equity owner in the airline industry.

## 2) *Continental Ltd.:*

Continental represents a US network carrier, which positions its offer in the Southern-East US domestic market and European and Latin American long-haul flights. Continental is influenced by the US airline market structure, which is quite fragmented and shows excessive capacity (Hatfield, 2007). In addition, the US market is shaped by a complex regulatory system, where political, anti-trust, and strategic factors are interrelated (Schlangenstein et al., 2010; Mitchell and Carey, 2010 b.).

At the beginning, Continental had adopted loose codeshare agreements in order to maintain its strategic independence. Subsequently, Continental adapted its strategy and established codeshare agreements at first with Delta and Northwest in 2003 (Airfinance Journal, 2007), and subsequently with United in 2009 (Casey and Chon, 2010). In addition, Continental commenced and dropped negotiations for merging with Delta in 2003 and accomplished two round of negotiations with United Airlines in 2007 (Goeteyn, 2006) and 2010 (Flint, 2010). Continental concluded a merger with United in 2010 (Mitchell and Carey, 2010 b.).

### *Continental-United sub-unit*

The first Continental merger proposal to United in 2007 is representative of a defensive competitive move, following merger discussions between US major network competitors. Continental commenced negotiations with United when US Airways announced a possible takeover by Delta (Marilyn, 2007). The Continental merger with United delivered relevant benefits (GAO Reports, 2010), nevertheless, it was exposed to both ex-ante costs for fleet incompatibilities (Shannon and Schofield, 2010) and ex-post costs for potential labour disruptions (Ranson, 2010). Consequently, Continental preferred not to merge with United. Nevertheless, the external merger between Delta and US Airways exposed Continental's market position, since the merged carrier could exploit higher market power and domestic feeding traffic in international routes (Faithfull, 2007 a.). Codesharing delivered insufficient scope, hence Continental had to merge. When US Airways dismissed its takeover by Delta, Continental terminated its discussions with United (Field, 2007 b.). The second negotiation and the successful conclusion of the merger between United and Continental in 2010 could also be considered as a delayed response to the Delta merger with Northwest in 2008 with the purpose of preserving the strategic position in domestic and international markets against Delta (Chon et al., 2010). Moreover, the costs for the merger in 2010 were lower than in 2007 because United had improved its situation in operational and financial terms (Carey, 2010 a.). Continental could also reduce its operational costs in international routes and improve its market positioning in the business segment by merging with United (Chon et al., 2010).

### 3) *Easyjet Ltd.*

Easyjet represents a European carrier basing its strategy on the low-fare business model. Business models appear to influence airline conduct for alliances and acquisitions, because low-fare carriers tend to establish no alliances and exclusively favour acquisitions in securing external network routes. Easyjet's case contributes to

evaluating which factors cause low-fare carriers to select acquisitions and avoid alliances.

Easyjet exclusively serves short-haul flights and is positioned in the UK domestic and intra-European markets.

#### *Easyjet-Go sub-unit*

Go was established in 1998 as British Airways' low-fare subsidiary in order to counteract rising competition from Easyjet (European Venture Capital Journal, 2002). In 2001, British Airways chose to sell Go and contacted Easyjet as a potential buyer. Easyjet refused at first, but then purchased Go the following year (Parsons, 2002). Network carriers seem to be ineffective in establishing low-fare subsidiaries, and Go exemplifies the problems for British Airways. Indeed, in Europe, the only two significant low-fare subsidiaries – Go from British Airways and Buzz from KLM – were purchased by major European low-fare carriers, respectively Easyjet and Ryanair (Graf, 2005).

To summarise, the three cases are:

- 1) *Alitalia S.p.A* strategic alliances and acquisitions
- 2) *Continental Ltd.* strategic alliances and acquisitions
- 3) *Easyjet Ltd.* acquisitions

The embedded sub-units are:

- 1a) Alitalia and Air France strategic relationships
- 2a) Continental and United Airlines strategic relationships
- 3a) Easyjet and Go strategic relationships

Airline staff members that offered to cooperate in the case studies were pre-contacted by phone. In the phone call, research objectives were clarified, cooperation requirements were further explained, and interview dates were proposed. A formal letter followed the phone call, where confidential treatment of data was explicitly guaranteed. A complete copy of the formal letter can be found in Appendix 2. The formal letter also included the interview checklist that would guide interviews. The interview checklist had to be adapted for single cases, given the dissimilar research contexts. The complete list of questions for in-depth interviews is included in Appendix 3.

In operational terms, field work was accomplished in three different phases, one for each case study.

#### Phase 1 *Alitalia*

Phase 1 encompassed two separate stages. The first stage started in February 2007 and was concluded in May 2007, whereas the second stage started in March 2010 and was concluded in June 2010. During the first stage, secondary data were collected between February and April 2007, and in-depth interviews were accomplished in May 2007. During the second stage, secondary data were collected between March 2010 and May 2010, and in-depth interviews were accomplished in June 2010. In both stages, in-depth interviews were carried out with Alitalia and Air France staff in Alitalia Headquarters, located in Rome, Italy. In both stages, before the in-depth interviews, research objectives and interview proceedings were presented to Alitalia and Air France staff. The presentation was followed by questions and clarifications from the staff. Alitalia data evidence was analysed in November 2007 and July 2010.

Refer to Table 6.3 for the list of interviews. Both the names and the actual positions of the personnel being interviewed are concealed in compliance with the confidentiality agreement that has been signed with the company (Appendix 2).

### *Phase 2 Continental*

Phase 2 includes two different stages. The first stage started in June 2007 and finished in July 2007, whereas the second stage started in April 2010 and finished in July 2010. In the first phase, Continental secondary data collection was accomplished in June 2007, followed by in-depth telephone interviews in June and July 2007. In the second stage, Continental secondary data collection was accomplished between April 2010 and July 2010, and in-depth telephone interviews were carried out in July 2010. In both stages, telephone interviews were realised using Voip technology and recorded by Skype Pamela © software. Telephone interviews were used due to time and resource constraints. This approach is the least used by researchers because respondents are generally reluctant to commit long amounts of time in telephone interviews (Fontana and Frey, 2000). However, time issues were solved by specifying in the requesting letter the period of time required for interviews. In-depth interviews involved Continental staff and one external consultant, who was proposed by Continental staff. Continental empirical data was analysed in December 2007 after the first stage and in August 2010 after the second stage.

Refer to Table 6.3 for the list of interviews. Both the names and the actual positions of the personnel being interviewed are concealed in compliance with the confidentiality agreement that has been signed with the company (Appendix 2).

### *Phase 3 Easyjet*

Phase 3 comprises two separate stages. The first stage started in August 2007 and finished in September 2007. Secondary data was collected in August 2007 and in-depth interviews were realised in September 2007. Easyjet staff suggested telephone interviews with Voip technology. Interviews were recorded with Skype Pamela © software. Empirical data was analysed in January 2008. The second stage started in September 2010 and was concluded in November 2010. Secondary data was

gathered in September 2010 and telephone interviews were carried out in November 2010. Empirical data was reviewed in December 2010. Time issues in telephone interviews (Fontana and Frey, 2000) were solved as interview length was agreed in the pre-contact phone call. A presentation on research objectives and interview proceedings preceded in-depth interviews. Questions and clarifications from Easyjet staff followed the presentation. The presentation was transmitted via Skype © videoconference software.

Refer to Table 6.3 for the list of interviews. Both the names and the actual positions of the personnel being interviewed are concealed in compliance with the confidentiality agreement that has been signed with the company (Appendix 2).

**TABLE 6.3****List of interviews**

| <b>Name</b>           | <b>Company</b>                   | <b>Date</b> | <b>Duration Time (min.)</b> |
|-----------------------|----------------------------------|-------------|-----------------------------|
| In-depth Interview 1  | Alitalia                         | 17/05/2007  | 90                          |
| In-depth Interview 2  | Alitalia                         | 17/05/2007  | 90                          |
| In-depth Interview 3  | Air France                       | 18/05/2007  | 90                          |
| In-depth Interview 4  | Air France                       | 18/05/2007  | 90                          |
| In-depth Interview 5  | Air France                       | 18/05/2007  | 90                          |
| In-depth Interview 6  | Alitalia                         | 15/06/2010  | 90                          |
| In-depth Interview 7  | Alitalia                         | 15/06/2010  | 120                         |
| In-depth Interview 8  | Alitalia                         | 16/06/2010  | 90                          |
| In-depth Interview 9  | Air France                       | 17/06/2010  | 75                          |
| In-depth Interview 10 | Air France                       | 18/06/2010  | 60                          |
|                       |                                  |             |                             |
| In-depth Interview 1  | Continental                      | 11/06/2007  | 90                          |
| In-depth Interview 2  | Continental                      | 28/06/2007  | 90                          |
| In-depth Interview 3  | Hamlin Transportation Consulting | 18/06/2007  | 90                          |
| In-depth Interview 4  | Continental                      | 19/07/2010  | 90                          |
| In-depth Interview 5  | Continental                      | 27/07/2010  | 120                         |
| In-depth Interview 6  | Continental                      | 30/07/2010  | 90                          |
|                       |                                  |             |                             |
| In-depth Interview 1  | Easyjet                          | 10/10/2007  | 120                         |
| In-depth Interview 2  | Easyjet                          | 11/10/2007  | 90                          |
| In-depth Interview 3  | Easyjet                          | 15/10/2007  | 90                          |
| In-depth Interview 4  | Easyjet                          | 15/11/2010  | 90                          |
| In-depth Interview 5  | Easyjet                          | 17/11/2010  | 90                          |
| In-depth Interview 6  | Easyjet                          | 19/11/2010  | 75                          |
|                       |                                  |             |                             |

As mentioned in section 2.5, in-depth interviews were entirely taped and noted down. Once the interviews were concluded, a complete report was prepared and integral contents of interviews were written down. Text of both the report and the interviews was extensively used in case data analysis.

## **6.6. RESEARCH LIMITATIONS**

This research was affected by several limitations that can partially undermine research results. To begin with, limitations associated with case methodologies and data sources (Chapter 6, section 4) were applicable to this research. However, limitations were addressed at the beginning of the research and potential drawbacks related to cases were minimised.

In addition, access to two airline organisations, which were involved in the same decision process for acquisitions and alliances, was difficult to gain, considering the problems in getting access to operational knowledge. Both airlines' members were interviewed and corporate documents were analysed exclusively in the Air France-Alitalia sub-unit of analysis (Chapter 6, section 5). Conversely, one airline per unit of analysis was examined to accomplish Continental and Easyjet cases. Research results were inevitably limited because acquisitions and alliances involve at least two subjects that give different meanings to the context and have distinct strategic objectives. Nevertheless, secondary data contributed to providing different viewpoints during the research process and consequently minimising research limitations.

In case studies, the number of informants per airline was restricted and for the most part belonged to one department – the airline alliance department. Indeed, alliance departments showed much interest in this research because it strictly relates to their departmental activities. Conversely, other departments and organisational units appeared to be less cooperative. Nonetheless, analytical generalisation was

constrained by selective informants. Selective informants have limited reliability in offering organisational insights because respondents are generally influenced by their job positions, department culture, and previous experiences (Aneshensel, 2002).

Moreover, a number of informants were reluctant to offer personal ideas and judgments and chose to support organisational strategies instead. Given that acquisitions and alliances play a key role in the organisation's strategy, major disagreements can indeed be perceived as criticism of top management decisions. Additionally, informants were aware that the organisation's competitors could take advantage of sensitive internal information, hence, in some cases, they exclusively referred to the official material published by the airline.

In conclusion, in-depth interviews were arranged to minimise the time period in airline offices, due to budgetary and time restrictions. However, some employees were unavailable for interviews since they were occupied outside airline offices during the interview period.

As mentioned in section 2, the research design is applied in frameworks where regulation allows airline acquisitions. Nonetheless, if deregulation is further introduced in the aviation industry, contexts where acquisitions and alliances are evaluated will change unpredictably. Potentially, research generalisation can be restricted because uncontrolled changes in the research framework can restrain research conclusions.

## 6.7. DATA ANALYSIS AND INTERPRETATION

Data analysis and interpretation can be defined as “the process of bringing order to data, organising what is there into patterns, categories and basic descriptive units and attaching meaning and significance to the analysis, exploring descriptive patterns and looking for relationships and linkages among descriptive dimensions” (Patton, 1987, pp. 101). In qualitative methods, data analysis and interpretation are mainly unstructured and follow no precise procedures. In this way, new interpretations and unexpected results can emerge during the analysis process (Warren and Karner, 2004). Qualitative analysis also implies that the activities of data collection, analysis, and narrative reporting are strictly interrelated. Initial interpretations can be modified during field work and encourage further research investigations. Additionally, alternative research explanations should be continuously evaluated in order to achieve rigorous conclusions (Creswell, 1994).

In this research, data analysis sets out to compare the research design, which is summarised in section 1, and the empirical evidence, which emerges from cases. Yin (1994, 2002) suggests applying the pattern matching logic to guide the process of analysis in case studies. In pattern matching logic, the predicted pattern of variables is compared with empirically based variables. If discrepancy between both patterns is minimal, the predicted pattern of variables is confirmed and internal validity for the case is reinforced (George and Bennett, 2005; Trochim, 1989). For multiple cases, research results need to be further evaluated as predicted and empirical patterns are compared. If research outcomes are identical among cases, the predicted pattern of variables will be further confirmed by literal replication (Chapter 6, section 4.4). Otherwise, if research outcomes are different among cases for predicted reasons, the predicted pattern of variables will be further confirmed by theoretical replication (Chapter 6, section 4.4) (Yin, 1994, 2002).

Pattern matching logic relies on flexible comparisons. Researchers can encounter research conclusions that match alternative explanations and are consequently difficult to classify. Consequently, data triangulation should be applied in order to achieve the best match between theory and data (Patton, 1987).

### **6.7.1 Empirical Pattern of Variables**

The predicted pattern of variables is developed in section 1, whereas the empirical based pattern of variables is extrapolated by data collection, i.e. in-depth interview transcriptions and reports as well as archival records and documents. For this purpose, as suggested by Hancock and Algozzine (2006), coding is preferred among the different methods of analysing free flows of text.

The coding process involves several steps to be accomplished. Firstly, basic units of analysis should be identified. In this research, in-depth interviews and documents are evaluated as basic units (Ryan and Bernard, 2000). Units of analysis have to be meticulously read and some incomplete data should be added in the text. For instance, in interviews, transcriptions should be accompanied with notes on data reliability and the attitude of respondents. Data cleaning is followed by text evaluation, where abstract constructs – also defined as themes – emerge from the text, fieldwork process, and research model (George and Bennett, 2005).

Crabtree and Miller (1992) recommend using a code-book in order to identify emerging themes. A code-book can be defined as a framed list of codes where each code is classified. Codes are employed to highlight themes in the text and appear as mnemonic words or numbers. Emerging themes should be linked together in models, which are formed by a set of variables. Models should be tested through re-coding and an accurate search of negative cases (Easterby-Smith et al., 2002). In conclusion, once the model is verified, the emerging empirical pattern of variables is compared with the theoretical pattern of variables (Yin, 1994, 2002).

The complete list of the codes, that were employed for analysing the text of the in-depth interviews in the case studies, can be found in Appendix 4.

## SUMMARY

The research design defines routes as key resources for airlines in order to achieve their traffic targets. Carriers define capacity and frequency in their network and evaluate external routes for additional traffic. Contracts and internal development are not feasible or efficient options for gaining external routes, hence carriers depend on either codesharing or acquisitions. The airline decision process evaluates factors that are associated with alliances and acquisitions and selects the most effective organisational form. The research framework limits decision making in deregulated contexts where alliances and acquisitions are allowed.

Qualitative methods are employed in this research because they contribute to evaluating objective constructs as well as the subjective motives and intentions that participants give to social contexts. Subjective motives play a significant role in airline decision making. In addition, exploratory variables in this research are difficult to specify in advance and to statistically analyse, as quantitative methods would demand.

Case studies are applied amid the different qualitative methods because the main research question is concerned with “how” and “why”, and the research examines contemporary events that cannot be manipulated. Three case studies are used in order to get reliable and compelling conclusions. Sub-units inside cases can be readily identified, thus embedded cases will be implemented, where sub-units are associated with acquisitions and alliances that airlines have established or plan to establish. Three sources of evidence – in-depth interviews, documents and archival records – are introduced to collect empirical data. Data triangulation will be constantly applied to avoid data divergence.

Potential units of analysis were selected following strict criteria and were contacted by mail or email. Among the airlines willing to cooperate, the three units were

chosen in order to have low-fare and network business models (Chapter 4, section 8) represented. Two network carriers and one low-fare carrier were therefore selected. Between the two network carriers, one airline representing the EU airline market context and one airline representing the US airline market context were preferred. The units of analysis for cases were selected in this way in order to improve reliability and significance in research results.

The three units of analysis are in detail:

- 1) Alitalia S.p.A.
- 2) Continental Ltd.
- 3) Easyjet Ltd.

Data is analysed and interpreted following qualitative requirements. Data collection and analysis will be strictly interrelated and continuously open to new interpretations and unexpected results. The empirical pattern of variables will stem from data analysis. Free flow of text will be evaluated through coding.

Research results are exposed to several limitations. Qualitative case study limitations affect this research. Moreover, acquisitions and alliances are developed and accomplished by decision makers of two airlines, nevertheless, limitations of access to airline companies limited the analysis to decision makers of one airline with the exception of the Air France-Alitalia case.

The informant panel was also limited in terms of size and role in the airline, because exclusively alliance departments inside the airlines were willing to cooperate. In conclusion, unpredictable changes in regulation restrain research conclusions.

The following three Chapters will summarise the three cases that have been selected. Case studies will be presented in the following order: Chapter 7 – Alitalia SpA; Chapter 8 – Continental Ltd; and Chapter 9 – Easyjet Ltd.

# **CHAPTER 7**

## **Alitalia SpA Case**

## INTRODUCTION

This case study reviews the relationships that Alitalia established with other carriers during the period 2004-2010. As outlined in Chapter 6, section 1, this research is limited to airline relationships that involve major sections of the network. Between 2004 and 2010, Alitalia maintained a strategic codeshare, linking most of its network with Air France.

Air France evaluated acquiring Alitalia at different stages, therefore, this case study is consistent with the purpose of this research (Chapter 6, section 1). Air France ultimately chose not to purchase Alitalia but maintained its codesharing agreement with the Italian carrier.

This case study is formed by two Sections. Section One provides contextual information about Alitalia. After a brief summary of Alitalia's corporate history, Alitalia's financial and economic performances are outlined. Since Alitalia showed constant negative performances between 1998 and 2010, this section seeks to explain the reasons behind Alitalia's performance. Alitalia was negatively influenced by the lack of strategic positioning in the European market, an old and too diversified fleet, an oversized workforce compared to its operational requirements, and a double hub structure in both Malpensa and Fiumicino airports. This section concludes with the responses that both Alitalia's management and the Italian government applied to solve Alitalia's problems. After a failed industrial plan in 2004, the Italian government proceeded to privatise Alitalia in 2007, in order to provide the necessary investments in fleet and network restructuring to Alitalia. The privatisation plan was abandoned because no bidders satisfied the Italian government. In 2008, the Italian government completely restructured Alitalia and merged it with Air One. The flying assets of Alitalia and Air One were combined and sold to a group of Italian investors

and Air France, whereas the remaining assets and the outstanding debt of Alitalia were absorbed by the Italian public finances.

Section Two examines the strategic relationship between Alitalia and Air France. In this section, the Air France decision making process between codesharing and acquisition is evaluated, taking into consideration, the relative benefits and costs. Air France conducted two rounds of negotiations to acquire Alitalia from the Italian government, however, both negotiations failed for a combination of economic and political reasons. In the end, Air France purchased a 25 percent stake in the restructured Alitalia.

## METHODOLOGICAL REMARKS

This case evaluates the main strategic relationships that were established by Alitalia during the period 2004-2010.

As underlined in Chapter 6, section 4.4, embedded case studies are applied in this study. Embedded cases entail that one or more sub-units are identified within the case analysis and are employed to independently test theory (Stake, 2005).

The unit of analysis is:

- 1) Alitalia's codeshares involving large parts of the network and Alitalia's acquisition activities.

The sub-unit of analysis is:

- a) Codesharing between Air France and Alitalia and negotiations for the acquisition of Alitalia by Air France.

Data is collected through three different sources of evidence:

*In-depth interviews:*

- a. On May 17, 2007, two in-depth interviews were conducted at Alitalia Headquarters in Rome with two members of staff from Alitalia. The interviews had the following timetable:
  - 10.00 11.30 In-depth Interview 1
  - 11.30 13.00 In-depth Interview 2
- b. On May 18, 2007, three in-depth interviews were carried out with members of staff from Air France Consulting, Air France Group branch, in Alitalia's Headquarters in Rome. The interviews had the following timetable:
  - 9.00 10.30 In-depth Interview 3
  - 14.00 15.30 In-depth Interview 4
  - 17.00 18.00 In-depth Interview 5
- c. On June 15, 2010, two in-depth interviews were accomplished at the new Alitalia Headquarters in Rome with two members of staff from Alitalia. The interviews had the following timetable:
  - 12.00 13.30 In-depth Interview 6
  - 16.00 18.00 In-depth Interview 7
- d. On June 16, 2010, one in-depth interview was carried out at the new Alitalia Headquarters in Rome with one member of staff from Alitalia. The interview had the following timetable:
  - 17.00 18.30 In-depth Interview 8
- e. On June 17, 2010, one in-depth interview was conducted at the new Alitalia Headquarters in Rome with one member of staff from Air France Consulting, Air France Group branch. The interview had the following timetable:
  - 10.00 11.15 In-depth Interview 9
- f. On June 18, 2010, one in-depth interview was carried out at the new Alitalia Headquarters in Rome with one member of staff from Air France Consulting, Air France Group branch. The interview had the following timetable:
  - 13.30 14.30 In-depth Interview 10

*Documents and Archival Records:*

- a. Alitalia company sources: Alitalia Director's Reports 2004-2010, Alitalia Press Releases 2004-2010, Alitalia Financial Reports 2004-2010, Alitalia Investors Presentation 2004-2010.
- b. external sources: press material, such as Air Transport World, Airfinance Journal, Airline Business, Airline Industry Information, Aviation Week & Space Technology, published between January 2004 and June 2010 concerning Alitalia.

## **7.1. COMPANY CONTEXT**

### **7.1.1 Brief History**

Alitalia commenced its activities in 1947 and in 1957, merged with LAI, becoming the flag carrier for the Italian domestic and international markets (Datamonitor, 2007 b.). During the 1980s, Alitalia took over the Aeroporti di Roma and acquired minority stakes in Avianova, Eurofly, and Air Europe. In 1998, the international hub Milan Malpensa was opened and the KLM-Alitalia alliance was established. In 2000, KLM unilaterally terminated the partnership with Alitalia (The Economist Intelligence Unit, 2006). In 2003, Air France and Alitalia established a codesharing agreement and Alitalia joined the SkyTeam umbrella alliance (Chapter 7, section 2) (Westgate and Fogarty, 2006). In 2004, Alitalia approved a rescue plan, which envisaged splitting Alitalia into two independent units, Alitalia Fly encompassing the core airline services and Alitalia Service including the airline maintenance activities. In 2006, the Italian government launched the privatisation plan for Alitalia Fly, which was abandoned in July 2007 because no bids entirely satisfied the Italian government. In 2008, Alitalia was completely privatised and restructured. Parts of Alitalia's assets were merged with Air One in a new independent company with the same brand and logo of Alitalia (Air Transport World, 2009). In 2009, Air France acquired a 25 percent stake in the new Alitalia (Dunn, 2009 d.).

### **7.1.2 Corporate Performance**

Since 1998, Alitalia has not delivered operating profits and has had losses totalling Euro 2.6bn., consistently increasing its debt ratio in comparison with the industry

averages (Dunn, 2009 b.). Alitalia was also unable to take advantage of several state bailouts that the Italian government turned over to the carrier. Between 1997 and 2010, Alitalia received nearly Euro 5bn. from the Italian government (Dunn, 2009 b.; Economist, 2006). In August 2008, Alitalia entered into bankruptcy protection in order to safeguard its creditors (Meichtry, 2009). At the end of 2008, Alitalia completed its restructuring process (Chapter 7, section 1.2), where its previous debt was absorbed by the Italian public finance (Economist, 2008 d.). Financial data for the new Alitalia (Chapter 7, section 1.2) are unavailable for 2010, nonetheless, financial break-even is expected only for 2012 (Dunn, 2010).

Alitalia's negative financial performances are largely connected with the carrier's imbalance between revenues and costs per passenger. Since 2000, Alitalia has experienced negative net margins, since it earned an average of Euro 270 per passenger, but incurred Euro 300 costs (Sparaco, 2009; Moore, 2006). Therefore, Alitalia could not implement growth strategies, because higher flight hours would generate further losses (Dunn, 2010). For Alitalia, negative margins were concentrated in the domestic route segment, with the exception of the Milan-Rome route (Nativi, 2009).

Alitalia's financial performances are explained by major strategic problems that the carrier has encountered since 1998.

Alitalia's problems offset the carrier's strategic advantages. Indeed, Alitalia is Italy's flag carrier and as such, the leading airline in the affluent Italian market. The Italian market accounts for 105m. passengers per year on average, with a high percentage of business passengers (Dunn, 2009 b.; Evans-Pritchard, 2006 a.). Before the reorganisation of Alitalia (Chapter 7, section 1.2), Alitalia could rely upon a dominant position in Malpensa and Fiumicino, the main Italian hubs, controlling respectively 60 percent of the seats offered in Malpensa and 50 percent in Fiumicino (Ezard, 2008 a.). Moreover, Alitalia had high brand recognition in both Italian and European markets, benefiting from a near-monopoly in the Italian airline market between 1947 and 1981, and a market leader position since 1981 (Dunn, 2009 a.).

Nevertheless, as underlined by Schofield (2009) and Jarach (2006) (in Baker, 2006), Alitalia lacks clear strategic positioning as a network carrier (Chapter 4, section 8.1), and applies an outdated business model even after its reorganisation in 2008 (Chapter 7, section 1.3). The European market experiences the increasing dominance of three main airline companies, namely Lufthansa, Air France, and British Airways (Dunn, 2009 a.) (Chapter 5, section 9), and Alitalia is short of competitive opportunities in its current configuration as a full-service carrier (Schofield, 2009; Sparaco, 2007 a.). Alitalia makes up only one third of its traffic from long-haul flights, compared with two-thirds of the three main network European carriers. Alitalia is unable to compete in the long-haul market because it lacks the destinations, frequencies, and service levels, that major carriers offer (Sparaco, 2008 b.). Nonetheless, network carriers prefer to focus on long-haul flights in order to respond to the competitive threat of low-fare carriers (Chapter 4, section 8.2).

For this reason, Alitalia gets exposed to the growing competition of low-fare carriers in its domestic market, because its cost base is higher than the low fare carriers' cost base and its network scope prevents it from differentiating into the long-haul market (Dunn, 2010; Sylvers, 2006). Ryanair has already secured in Italy, its second strongest passenger flow after the British market, whereas Easyjet has set up its main European hub from Malpensa airport and plans to further expand in the Northern Italian market (Dunn, 2010). In addition, the affluent Italian market has attracted a number of European network carriers, particularly Lufthansa that has established an independent branch and brand in Italy called Lufthansa Italy, which is based in Malpensa Airport (Wall, 2009).

Furthermore, many analysts (Kahn et al., 2008; Evans-Pritchard, 2006 a.) point out that Alitalia's operational costs have been inflated by its excessive amount of staff compared to the carrier's operational requirements. As underlined by Mortsenchio (2006, in Evans-Pritchard, 2006 a.), Alitalia was no exception to numerous public companies in Italy that were used by successive governments to secure votes and

support in exchange for labour contracts. Before the reorganisation of Alitalia in 2008 (Chapter 7, section 1.3), the Alitalia workforce was evaluated to be between 30 to 40 percent higher than necessary (Nativi, 2008 a.). Therefore, workforce cuts and changes in labour contracts were essential for reducing the cost base and improving the carrier's negative net margins (Meichtry, 2009). However, the continuous resistance from the unions and strict Italian labour law prevented Alitalia from implementing the required reductions in the workforce and caused numerous labour disruptions (Wall Street Journal, 2009; Taylor, 2007 a.).

Alitalia's fleet also constituted a major concern for the airline's performance. Alitalia lacked the appropriate fleet to sustain an expansion in the long-haul market since only 15 percent of its total fleet included long-haul aircraft (Airfinance Journal, 2009 b.). Furthermore, since 1998, Alitalia had the oldest fleet on average among the ten top major European carriers (Airline Business, 2009 a.). Alitalia's fleet also required to be rationalised, because it ran ten different aircraft models (Nativi, 2009). A too diverse fleet implied high maintenance costs because different equipment and separately-trained staff are necessary for each model (Nativi, 2009).

In addition, Alitalia had to sustain two independent hubs in both Milan Malpensa and Rome Fiumicino for political considerations and priorities. Opened in 1998, Malpensa Airport experienced numerous difficulties but received unconditional support from both the Lombardy administrative region and the strong Northern League party (Ezard, 2008 a.). In 1999, the European Commission modified the planned traffic allocation between Malpensa and Linate airports and allocated more slots to European competitors in the two airports (Blitz, 2000), hence Alitalia was prevented from developing Malpensa as a major international hub and was obliged to duplicate its operations in Linate, increasing its cost base. Additionally, Malpensa airport failed to solve its problems in terms of accessibility because of insufficient investment in transport links to the Milan city centre, therefore Linate airport is still preferred by passengers, especially for domestic short-haul connections (Ezard, 2008

a.). Moreover, political opposition precluded Alitalia from cutting its long-haul operations in Fiumicino airport, hence Alitalia had to maintain scattered and duplicated operations between the two hubs (Ezard, 2008 a.).

To conclude, Alitalia's performances were negatively influenced by continuous political involvement in business and managerial issues (Doganis, 2010; Michaels, 2006). The Italian government retained a 62 percent stake in Alitalia until 2005, subsequently, it reduced its quota to 49 percent and finally relinquished its control in the reorganisation of Alitalia in 2008 (Economist, 2008 d.) (Chapter 7, section 1.3).

Political priorities have often prevailed over business objectives in support of national policies of maintaining domestic and international connections as well as preserving high rates of employment (Chapter 7, section 2), therefore Alitalia faced several problems in implementing a well-balanced route network and applying a consistent cost-cutting strategy in order to fulfil its business objectives (Doganis, 2010; Aviation Week & Space Technology, 2006).

### **7.1.3 Corporate Strategy**

In order to solve the carrier's strategic problems, both Alitalia's top management and the Italian government put forward different solutions, which concluded with the complete reorganisation of Alitalia at the end of 2008.

In 2004, Alitalia's top management proposed a 4 year rescue plan for Alitalia (Barber, 2006). The plan envisaged Alitalia being regrouped into two new firms, Alitalia Fly, which encompassed core airline activities, and Alitalia Service, which combined the former maintenance, ground handling, and IT units (The Economist Intelligence Unit, 2006). According to the plan, a 51 percent share of Alitalia Service was allocated to Fintecna, a state-owned company, and separated from Alitalia's financial results (Air Transport World, 2006). The plan was to result in both the

removal of 35 percent of the workforce from Alitalia's books and the reduction of 18 percent in internal costs (Air Transport World, 2006). Nevertheless, the plan was never fully implemented, due to strong union resistance and failure to downgrade various contractual positions (Barber, 2007). Although the two companies were created, 75 percent of the planned workers were not transferred to Alitalia Service (Cittanova, 2007) and cost-cutting measures were not applied.

In 2006, the Italian government decided to sell the majority of its stake to a private investor and therefore release its involvement with the national flag carrier. With the privatisation process, Alitalia looked for major investors that could provide the capital to restructure the carrier and improve its negative financial performances (Chapter 7, section 1.2). Furthermore, the privatisation could contribute to reducing political interference and establishing clearer business objectives (Chapter 7, section 1.2) (Powell, 2006, in Milmo, 2006). Potential investors in Alitalia could be either airline carriers or financial parties external to the aviation industry, or a combination of both (Schrage, 2007).

The Italian government imposed strict conditions on Alitalia's privatisation (Evans-Pritchard, 2006 a.). The Italian government required that the new owner retain all the domestic routes in Alitalia's network at least eight years after the purchase (Hooper, 2007). Also, the buyer had to keep the double-hub structure in Alitalia's route configuration and safeguard Alitalia's workforce, both in terms of employment levels and contractual conditions (Barber and Michaels, 2007 b.).

Air France Group opened exploratory talks for acquiring Alitalia in November 2006, before the official launch of Alitalia's privatisation process. Nevertheless, exploratory talks were abruptly interrupted after two weeks of talks (Chapter 7, section 2). Subsequently, eleven bidders presented their offer by January 31, 2007 (Webster, 2007). In the second phase, only three candidates presented their non-binding offers, namely Toto consortium, an investment group formed by Texas Pacific Group and MatlinPatterson, and Aeroflot-Unicredit consortium (Barber and

Buckley, 2007). At the end of July 2007, the Italian government declared that none of the bidders had presented a satisfactory offer and the privatisation process was therefore abandoned (Aviation Week & Space Technology, 2008 c.).

Between June 2008 and January 2009, the Italian government put forward the “Phoenix plan” in order to completely restructure Alitalia and avoid bankruptcy due to its prolonged negative financial performance (Chapter 7, section 1.2) (Economist, 2008 d.). Alitalia was divided into two entities, one entity included the assets directly involved in the airline services, whereas the other entity encompassed the remaining industrial activities in Alitalia, including heavy maintenance and airport operations, which generated most of the financial losses in Alitalia (Nativi, 2008 c.). The first entity was merged with Air One, the second Italian carrier in terms of size, and was sold for Euro 1.05bn. to a consortium of 21 Italian entrepreneurs (Brothers and Povoledo, 2009). The first entity was assigned the same logo and brand of Alitalia (Air Transport World, 2009). In January 2009, Air France joined the consortium and acquired 25 percent of the new Alitalia (Dunn, 2009 d.) (Chapter 7, section 2). Conversely, the second entity was completely absorbed by the Italian Minister of Treasury including its Euro 1.2bn. debt (Nativi, 2008 b.). Moreover, the new Alitalia had its workforce reduced from 18,500 to 12,500 including the Air One 3,000 workforce (Wall, 2008), and renegotiated its job contracts with more favourable conditions for the carrier (Meichtry, 2009).

The new Alitalia was also given the opportunity to reshape its international and domestic route networks. Alitalia chose to focus on short- and medium-range flights in both the domestic and Western European markets with an emphasis on business travellers, and maintained exclusively the most profitable long-haul destinations (Nativi, 2008 b.). The new Alitalia also abandoned the double-hub strategy in Malpensa airport, which had caused inefficiencies and duplication of assets for Alitalia (Chapter 7, section 1.2), and concentrated on Fiumicino airport, where the residual long-haul destinations were allocated (Moore, 2009). In addition, the new Alitalia could count on Air One’s domestic routes, which allowed 55 percent control of the affluent Italian domestic traffic (Meichtry, 2009) as well as a monopolistic

position in the Fiumicino-Linate route, which is the most profitable route in the Italian market (Dunn, 2009 a.).

The reorganisation of the route network in Alitalia was followed by the rationalisation and modernisation of the fleet. The new Alitalia fleet included the more modern Air One's fleet (Aviation Week & Space Technology, 2008 d.) and planned to gradually substitute the old McDonnell Douglas MD80's with Airbus A320's (Chapter 7, section 2) in order to reduce the maintenance and support costs (Chapter 7, section 1.2) (Nativi, 2009).

The reorganisation of Alitalia follows the consolidation process that the main domestic airline markets commonly experienced after deregulation (Stober, 2003) (Chapter 5, section 9). The Italian domestic market is unable to support two main network carriers because the duplication in assets in the domestic market increases operational costs and the fragmentation of the transfer traffic into two carriers impedes running middle- and long-haul destinations efficiently. Therefore, the merger of Air One and Alitalia could solve the endemic problems of high operational costs that Alitalia had experienced (Chapter 7, section 1.2) (In-depth interviews 7, 2010; Dunn, 2010).

In addition, the new Alitalia was freed from political interference that in many cases compromised its business objectives (Economist, 2008 f.) and was given a sounder financial structure as well as a more rational route network (Airline Business, 2009 a.) (Chapter 7, section 1.2). Nonetheless, the new Alitalia has not found a solution to the lack of strategic focus that has weakened its previous performances. The new Alitalia has been transformed into a regional subsidiary, however, the European market offers decreasing room for second-tier carriers with a small long-haul network (Sparaco, 2008 b.).

## 7.2. ALITALIA STRATEGIC RELATIONSHIPS

As outlined in Chapter 7, section 1.3, Alitalia applied different strategies in order to solve its negative financial performance. Among its strategic responses, Alitalia set up a major relationship with Air France, which went through different phases over the years. The evaluation of the relationship with Air France is the primary purpose of this case study.

### 7.2.1 Air France – Alitalia

Negotiations for a strategic relationship between Air France and Alitalia started in 1997, when the two carriers submitted a proposal for codesharing to the European Commission (EC). The codeshare involved routes between the French and Italian markets, but excluded the main routes Paris-Rome-Milan (Jones, 1997). The agreement lasted for less than 18 months. The European Commission (EC) imposed strict regulations on the agreement, which prevented most benefits from being achieved, hence the codeshare was abandoned (Thornton, 2000).

In 1999, Alitalia established a strategic alliance with KLM, which at that time had not merged yet with Air France. After the conclusion of the alliance between Alitalia and KLM in April 2000, Air France contacted Alitalia for a potential partnership and negotiations between the two carriers started again. In July 2001, the two carriers agreed a commercial partnership (Airline Industry Information, 2001 a.). The agreement involved codesharing on most international routes as well as a profit and revenue sharing alliance on the main routes between France and Italy, including Milan-Paris and Rome-Paris (Barber and Done, 2006). Air France and Alitalia also exchanged a 2 percent cross shareholding and since 2003 had membership of each other's board (Betts, 2007). Alitalia also joined the SkyTeam alliance constellation in

2001 (Chapter 5, section 5), led by Air France. Alitalia is required to pay an exit price of Euro 295m. for leaving SkyTeam (Baker, 2007).

During the reorganisation process of Alitalia in 2008 (Chapter 7, section 1.3), Air France maintained its codeshare agreement with the new entity and became the exclusive foreign partner for the new Alitalia. Air France also purchased a 25 percent share in the new Alitalia with a total investment of Euro 323m. (Dunn, 2009 d.). The shares of the new Alitalia, including Air France's shares, cannot be sold until 2013, when Air France and the other major shareholders will have the right of first refusal on the shares (Flottau et al., 2009). Air France was assigned 3 seats out of 19 in the new Alitalia board and 2 seats out of 9 in the new Alitalia executive committee (Air Transport World, 2009).

As confirmed by many sources (In-depth Interview 8, 2010; In-depth Interview 3, 2007; Flottau et al., 2009; Betts, 2007; Popham, 2006), since the initial agreement in 2001, Air France has always shown an interest in acquiring or merging with the Italian carrier. According to Air France, the relationship with Alitalia was specifically designed to accomplish a full combination. In Air France's original plans, Alitalia was to be part of the Air France-KLM merger in 2004, but the plan was postponed, because Air France required more time to evaluate Alitalia's financial situation (In-depth Interview 8, 2010; In-depth Interview 4, 2007).

Air France Group opened exploratory talks for acquiring Alitalia on November 2006, before the official launch of the Alitalia privatisation (Barbera, 2007) (Chapter 7, section 1.3). Nevertheless, exploratory talks were interrupted after two weeks because the Air France management were not satisfied with the Italian government's response on different issues (In-depth Interview 3, 2007) (Chapter 7, section 2.1.2). In February 2007, Air France cancelled its acquisition plans for Alitalia (Barber and Michaels, 2007 b.).

Air France management outlined that their negative response to the merger did not involve its codeshare with Alitalia. Conversely, Air France was satisfied with its existing relationship with Alitalia, and intended to continue the codeshare agreement

if its new owner allowed it (In-depth Interview 5, 2007; Barber and Michaels, 2007 b.).

At the end of 2007, Air France tried again to acquire Alitalia and directly proposed a bid to the Italian government. The final decision of the Italian government was delayed after the political elections in April 2008. After the victory of the centre-right party, Air France withdrew its offer (CILT World, 2008). After the rejection of the acquisition bid, Air France Group again confirmed its interest in maintaining its codeshare agreement with Alitalia, despite its increasing financial losses (In-depth Interview 10, 2010).

As outlined before, Air France Group had acquired a 25 percent stake in the new Alitalia at the beginning of 2009 and became the exclusive foreign partner for Alitalia. In-depth Interviews 8 and 9 (2010) confirm that Air France Group is still motivated to fully acquire the new Alitalia and will evaluate the acquisition of the remaining shares at the end of 2013. Nonetheless, Air France Group considers as first priority its codeshare agreement with the new Alitalia and will work towards taking full advantage of the codesharing synergies for the next four years (In-depth Interview 8, 2010; In-depth Interview 9, 2010).

From a methodological point of view, the investigation of Air France Group's decision between alliance and acquisition with Alitalia, is consistent with the objective of this research (Chapter 6, section 1). Indeed, in analysing Air France Group's decision process, it is possible to identify key factors that were evaluated by Air France managers to maintain the existing alliance, rather than moving to an acquisition. Air France Group also jeopardized its existing relationship with Alitalia in the likely event that a member of a different alliance constellation acquired Alitalia.

### **7.2.1.1 Codeshare between Air France and Alitalia**

The codeshare between Air France and Alitalia uses the model of revenue-sharing that Air France Group applies to its core codesharing agreements, including the transatlantic codeshare with Delta and Northwest (Pilling, 2008). The model of revenue-sharing was initially introduced by KLM to the Air France Group. KLM was inspired by the transatlantic codeshare that it had established with Northwest since 1991, where the carriers jointly developed a set of skills in managing their transatlantic alliance and deepened the knowledge specialisation in cooperation by using their alliance as a learning mechanism (Buckley et al., 2009; Pilling, 2008) (Chapter 2, section 5.1). The managerial skills that the two carriers had developed were then transmitted to and converted by the Air France Group when KLM and Air France merged. Northwest had no problems in allowing the knowledge acquisition and conversion because Northwest was already a member of SkyTeam (In-depth interview 8, 2010).

The model of revenue sharing entails that the added revenues that an alliance produces, are shared equally between the partners even if they are distributed differently among them (Pilling, 2008). Partners are in this way encouraged to estimate and constantly monitor the added revenues of an alliance so that the advantages of the alliance are always well-defined and clear to all the members. Otherwise, the added traffic from codesharing tends to be included in the companywide revenues and after a while disregarded by airline top management (In-depth interview 9, 2010). Moreover, network carriers secure a significant part of their business traffic from corporate accounts, i.e. long-term agreements with large companies on their corporate travels (Chapter 4, section 5.1). If added revenues in the alliance are shared, corporate accountants are compelled to pay equal attention to the codeshared routes in their negotiations with large companies. Similarly, revenue-sharing fosters assigning the same marketing resources and concentrating the same marketing efforts on the codeshared routes (In-depth interview 9, 2010).

The codeshare between Air France Group and Alitalia is based on consistent networks and organisational models. Air France and Alitalia are indeed network carriers (Chapter 4, section 8.1), which are structured as flag carriers in major European countries. According to this structure, Air France's and Alitalia's domestic networks are formed by a combination of high-traffic routes, which provide high margins for every kilometre/mile travelled, and low-traffic routes, which are usually loss-generating and are maintained for political, rather than economic reasons. For both carriers, domestic routes provide feeding traffic to international routes (In-depth Interview 1, 2007).

Codesharing allows combining the two domestic markets into one passenger catchment area, given their geographical proximity. However, the French and the Italian domestic markets show differences in terms of geographical structure, which make the combination of the domestic networks complex for codesharing. Indeed, Paris is a natural hub for France, where most business and leisure traffic is concentrated and most international traffic is directed, while the remaining leisure traffic aims at the Southeast and Southwest part of France (In-depth Interview 6, 2010). Conversely, Italy has structural complexities that make it difficult for one hub to manage most of the traffic in the country. Italy maintains the separation of the business and political centres, since Milan and the Northern part of Italy encompass most economies activities, while Rome is the political centre of the Italian government, the Vatican, and the numerous intergovernmental organisations (Chapter 7, section 1.2) (Ezard, 2008 a.). Furthermore, Italy comprises a number of important cities and regions that generate a relevant amount of business and leisure traffic (Dunn, 2010).

Due to the complexities and differences in the geographical structure of the two domestic markets, Air France applied a gradual approach to codesharing. In the beginning, Air France established a codesharing agreement only on the routes Rome-Paris and Milan-Paris, in order to cater for feeding traffic into the long-haul destinations and left Alitalia to independently manage the remaining domestic routes (In-depth Interview 2, 2007). Subsequently, after the purchase of a 25 percent share

in the new Alitalia (Chapter 7, section 1.3), Air France Group chose to expand its codesharing agreement to almost 80 percent of the domestic routes. Air France Group evaluated that Italy tends to progressively expand its tourist offer to different destinations. In recent years, main tourist Italian destinations, such as Rome, Venice, and Florence, have maintained a steady tourist flow, whereas less renowned destinations have become more popular thanks to returning tourists, i.e. tourists that have already visited Italy once. Consequently, less trafficked domestic routes are likely to increase their traffic and their margins in the long-term (In-depth Interview 10, 2010; Ezard, 2008 b.). Moreover, the domestic Italian market has significant potential for growth because the Italian government has invested heavily over the years in its airports (Dunn, 2010). In conclusion, between 2005 and 2010, French nationals maintained first position in terms of visitors to Italy (Turismo Italia, 2010). At the same time, the new Alitalia found it convenient to expand its codeshare with Air France to 70 percent of the destinations in the Southern part of France, due to the increasing interest of Italian visitors for the southern French regions (Turismo Italia, 2010).

Three further interviews (In-depth Interview 1 (2007), In-depth Interview 5 (2007), and In-depth Interview 6 (2010)) revealed that the most valuable advantages in the codeshare between Air France and Alitalia originated from transfer traffic into the long-destinations from the Paris Charles De Gaulle hub. By 2005, Air France Group also redirected some feeding traffic to the Amsterdam Schipol hub (Fair Disclosure Wire, 2006 c.). In this way, Air France Group expands its overall international traffic, which is its driving force in terms of profitability (In-depth Interview 4, 2007). The core part of transfer traffic originates from the Northern part of Italy, which caters for the majority of the business traffic, while Rome generates transfer traffic from its political and diplomatic activities. Such transfer traffic could not be fully exploited by Alitalia because its international destinations had insufficient scope (Chapter 7, section 1.2) (Brothers and Povoledo, 2009). Alitalia further emphasised its concentration on short-haul destinations in its reorganisation (Nativi, 2008 b.).

Transfer traffic from Alitalia's route network into Air France is associated with significant traffic economies. Traffic economies originate from the possibility for Air France to employ aircraft with increased capacity on its long-haul destinations from Paris Charles de Gaulle. Consequently, Air France can reduce its operational costs per passenger because of the maintenance and ground-handling services, which remain constant with the increase of the number of passengers, can spread over a higher flow of passengers (In-depth Interview 3, 2007). In addition, Air France and Alitalia have jointly established a dedicated structure in Paris Charles de Gaulle in order to optimise the connections from Alitalia's domestic market to long-haul destinations. The dedicated structure allows for the concentration of services that are offered in the transfer, particularly the ground and baggage handling for passengers, and reducing costs per passenger, given the efficiencies that a centralised structure generates. Moreover, the dedicated structure diminishes the average connecting times between flights, increasing the overall utilisation of the aircraft and improves the quality of the connecting services (In-depth Interview 7, 2010; In-depth Interview 9, 2010).

Air France and Alitalia also considered increasing the transfer time in their connections between Milan-Paris and Rome-Paris (In-depth Interviews 7, 2010), following the example of many US carriers after the economic recession in 2001 (Flottau, 2009). The connections between Alitalia and Air France are structured for maximum connectivity in the shortest period of time. Short connections are a core factor for business passengers, who value the overall timing of flights in their airline purchases (Chapter 4, section 5.1). However, the minimisation of transfer time causes problems in the system because it increases the probability of disruptions as a consequence of one flight delay. Disruptions in connections increase the average costs per passenger because carriers need to redeploy passengers to other flights and need to provide appropriate coverage for delays, including meals and accommodation for passengers (Flottau, 2009). Carriers generally transfer these additional costs to the ticket prices, nonetheless, business passengers have been showing increasing sensitivity to prices due to the recent economic recession (Chapter 4, section 5.1). Therefore, Alitalia and Air France plan to modify their offers by increasing the transfer time in a number of their connections so that they

can reduce their prices and tailor their fares more effectively to price-conscious business passengers (In-depth Interview 7, 2010).

Major overlaps between Alitalia and Air France networks exist in the routes Milan-Paris, Paris-Rome, and Milan-Amsterdam (In-depth Interview 1, 2007). Nevertheless, parallel routes comprise high-traffic, high-margin, routes that are not affected by seasonal trends. Hence, Air France and Alitalia have the opportunity to provide additional frequencies in overlaps and still maintain enough traffic and margins. Traffic and margins in these parallel routes are mainly generated by the business segment that is sensitive to frequency as to service feature (Chapter 4, section 5.1), thus Air France and Alitalia can improve their offer through codesharing. In addition, as mentioned above, the routes Milan-Paris, Paris-Rome, and Milan-Amsterdam are employed to direct the transfer traffic to long-haul destinations, therefore higher frequencies can be instrumental in optimising the connection times and expanding the offer of long-haul destinations (In-depth Interview 7, 2010).

The codeshare between Air France and Alitalia is an integral part of the broader SkyTeam alliance constellation (Chapter 5, section 5). SkyTeam is an alliance umbrella that is led by Air France Group in Europe and Delta-Northwest in the US. In 2008, SkyTeam received antitrust immunity from the US Department of Transport (Chapter 5, section 2) in the transatlantic routes (Air Transport World, 2009), which allows SkyTeam members to coordinate fares, services, and capacity in their codeshared routes (Outsourced Logistics, 2008). In 2009 and 2010, SkyTeam also extended their presence in the Chinese market by adding China Southern Airlines and China Eastern Airlines (Govindasamy, 2010).

Alitalia's network contributes to ensuring market presence and destinations in the Western European market for SkyTeam (In-depth Interview 1, 2007). At the same time, Alitalia can fulfil its domestic demand for American destinations, where Alitalia has reduced its activities over the years (In-depth Interview 8, 2010; In-depth

Interview 1, 2007). The merger between Delta and Northwest in 2009 allows privileged access to the US South-East and North-West market for Alitalia, which can provide a tailored offer for its domestic customers in full coordination with its partners, on account of its anti-trust immunity (In-depth Interview 8, 2010). In addition, Alitalia can have access to the Chinese market, which is the fastest growing business destination due to the increasing interests of the Italian economy in China (Turismo Italia, 2010).

As was outlined by two further interviews, (In-depth Interview 8 (2010) and In-depth Interview 1 (2007)), Air France Group prevents its main competitor, Lufthansa, from expanding its market presence in Italy by codesharing with Alitalia. Lufthansa acquired Swiss in 2005 and Austrian Airlines in 2008, whose domestic markets border the Italian market (Wall, 2009). In addition, Lufthansa set up an independent brand in Malpensa Airport called Lufthansa Italy in order to compete in the Italian market (Wall, 2009) (Chapter 7, section 1.2). As a result of an alliance with Alitalia, Lufthansa would establish a significant and continuous presence in Central-Western Europe, because it would control the traffic from Northern Germany to Southern Italy and would be in an ideal position for dominating the traffic from Western to Eastern Europe. In this way, Air France Group will be exposed to Lufthansa's competition in the long-haul market because Lufthansa will be able to direct a higher percentage of transfer traffic into its own long-haul destinations from its Frankfurt airport to the US and from its Munich airport to Eastern Europe and Asia (In-depth Interview 8, 2010).

As for the costs associated with the codeshare, Air France and Alitalia appear to have built an effective cooperation, where relational factors have evolved positively over the alliance period (In-depth Interview 6, 2010; In-depth Interview 1, 2007). The two carriers have complementary working styles and corporate cultures as well as similar management backgrounds, where hierarchical organisation and centralized decisions are still common elements (In-depth Interview 6, 2010; In-depth Interview 2, 2007).

Moreover, the two carriers experienced broad political influence in their management, although both governments increasingly reduced control over their national airlines (Chapter 7, section 1). The relationship is also facilitated by compatible cultural identities (In-depth Interview 6, 2010; In-depth Interview 2, 2007). Therefore, Air France Group and Alitalia can minimise their relational problems and can achieve full advantages from their commercial agreement.

Nevertheless, relational factors can become an issue in the long-term because Air France has been seen to adapt to a less hierarchical structure and modern management more rapidly than Alitalia, particularly after its merger with KLM (In-depth Interview 6, 2010). As outlined before, Air France acquired and applied a number of innovative managerial methodologies from KLM. Advantages in codesharing can be affected if Alitalia does not evolve rapidly after reorganisation (Chapter 7, section 1.3).

Initial costs for implementing the codeshare have been significant only in the Information Technology (IT) area. The majority of carriers employ established facility platforms in order to accomplish their reservation systems, such as Amadeus, Galileo and Worldspan (Chapter 4, section 6). However, Alitalia chose to design and operate an independent facility platform, which is called Sigma, in order to accomplish its reservations (Vinod, 2009). Alitalia's booking system had major incompatibilities with Air France's Amadeus and with the SkyTeam's US partners, particularly Delta that uses Worldspan (In-depth Interview 1, 2007). In common with other reservation systems, Sigma does not have a compiler/assembler or a desktop and requires a complex process to be coordinated with other reservation systems (Vinod, 2009). Alitalia's programmers for Sigma needed significant time and resources to match the requirements of Amadeus and eventually chose to maintain the two parallel systems working simultaneously for more complex reservations, in particular corporate accounts. The two parallel systems, nonetheless, increase the time taken for reservations and are subject to frequent disruptions (In-depth Interview 6, 2010).

### **7.2.1.2 Air France Acquisition of Alitalia**

The integration of Air France and Alitalia would centre around the model of a soft merger (the concept is explained further below) and multi-hub structure that has been applied by Air France with KLM and by other European carriers, such as Lufthansa with Swiss in 2005 and Austrian Airlines in 2008 (Flottau et al., 2009). The model of a soft merger implies that a holding group is created with one bottom line, while the merged airlines maintain their brands and identities as well as their existent hub structure (Ezard, 2008 b.). By keeping the same brands and identities, the carriers can still operate their existing international routes in accordance with the Bilateral Agreements that their countries of origin have established (Chapter 4, section 3) (Ezard, 2008 b.). In addition, the merged carriers maintain their primary hubs, hence the holding group organises its network according to a multi-hub structure, in which each carrier operates one hub that connects the domestic spoke routes into the long-haul network (Flottau et al., 2009). The multi-hub strategy also entails the specialisation of the single hubs in specific international geographical areas in order to maximise efficiencies in the route network and concentrate marketing efforts. After a soft merger, the hubs of the group experience growth in connections which enable them to direct the transfer traffic to specific international geographical areas (Del Canho and Engelfriet, 2008).

In the Air France and KLM merger in October 2003, Air France Group left only 19 percent equity to KLM shareholders, but the Dutch government and two Dutch foundations retained 51 percent of KLM's voting rights and KLM maintained its brand and logo (Osborne, 2006). KLM kept its hub in Amsterdam Schipol, which gradually specialised in the US North-West and North-East and Asia, while Paris Charles de Gaulle focused on Africa, Latin America, and the US South-East and South-West in cooperation with other SkyTeam members (In-depth Interview 4, 2007). The soft merger model between KLM and Air France has proven to be effective both financially and logistically (Economist, 2008 a.).

Before Alitalia's reorganisation in 2008 (Chapter 7, section 1.3), Air France Group intended to shape the acquisition of Alitalia around a similar model of soft merger and multi-hub structure that had been applied with KLM. Alitalia would be gradually included in the Air France Group and would keep the same brand and logo (In-depth Interview 9, 2010; Nativi and Wall, 2008). Alitalia had, nonetheless, to abandon its double hub structure in Malpensa and Fiumicino (Chapter 7, section 1.2) because two hubs in addition to the hubs of the Air France Group were too complex to manage and created too much duplication of resources (In-depth Interview 9, 2010). Air France's original plan was to focus on the hub of Rome Fiumicino for Alitalia's international network, which would become the Southern hub in the Air France Group and would concentrate on Southern European, Northern African, and Middle-Eastern destinations (In-depth Interview 4, 2007; Flottau et al., 2009). Fiumicino Airport, indeed, was included in all the Bilateral Agreements between Italy and other nations (Ezard, 2008 a.). Conversely, the presence of Alitalia in Malpensa would be reduced and would retain only three intercontinental routes because Malpensa could compete with Air France's regional airport in Lyon and with the two main hubs in Paris and Amsterdam (In-depth Interview 4, 2007; Nativi, 2008 a.). Codesharing did not provide enough power and control to Air France management over Alitalia in order to convert the Alitalia's network into a one-hub structure (In-depth Interview 3, 2007).

In addition, through an acquisition, Air France Group had the opportunity to reconfigure Alitalia's network and rationalise it into their own route configuration (In-depth Interview 4, 2007). Air France could cut duplication in international routes with Alitalia because Air France had already enough scope in the long-haul market (Aviation Week & Space Technology, 2006). In this way, Air France could take advantage of a more efficient use of aircraft and related flight-services in the network. Air France could also evaluate the potential in terms of traffic expansion for unprofitable domestic routes and proceed to cut routes that were unlikely to grow in the long-term (In-depth Interview 1, 2007).

By acquiring Alitalia, Air France could also indefinitely secure the transfer traffic from Italy, which was already evaluated as a key advantage for codesharing, and maximise related traffic economies (In-depth Interview 1, 2007; In-depth Interview 3, 2007). Traffic economies increased in acquisition compared to codesharing because Air France could redesign the whole Alitalia network in order to maximise the load factors in its long-haul flights and increase the connections between the Italian domestic market and the Air France Group's hubs in Paris and Amsterdam (In-depth Interview 3, 2007).

Before the re-organisation of Alitalia (Chapter 7, section 1.3), the acquisition would be economically convenient only if Alitalia was transformed into a regional feeder subsidiary. It was estimated that Alitalia had to downgrade to approximately 60 percent of its existing structure in order to match Air France Group's network and maintain efficiency levels (In-depth Interview 1, 2007). The re-organisation of Alitalia made its network consistent with Air France, nonetheless, a number of domestic routes could still be streamlined to enhance connectivity with Air France's hubs and other domestic routes could be eliminated because they were unprofitable and inadequate for connectivity (In-depth Interview 10, 2010; Ezard, 2008 a.). Approximately 25 percent of the domestic routes could be eliminated, while 20 percent could be limited in capacity and streamlined to adjust to the Air France's hubs (In-depth Interview 10, 2010).

Air France could also assemble a dedicated structure in Fiumicino Airport in addition to the one in Charles de Gaulle, in order to further reduce connecting times and improve connecting services (In-depth Interview 7, 2010). After the choice of Fiumicino as a unique hub for the new Alitalia (Chapter 7, section 1.3), Alitalia still declined to implement the dedicated structure in Fiumicino because Alitalia management preferred to improve the structure for the route Linate-Fiumicino in Fiumicino Terminal A (In-depth Interview 9, 2010; Nativi, 2009). Alitalia management favoured the high profits coming from Linate-Fiumicino over the connections with the Air France's network (In-depth Interview 9, 2010).

The acquisition of Alitalia would also allow Air France to rationalise and upgrade Alitalia's fleet, which consisted of too many models with high average operational years (Chapter 7, section 1.2). The first step for Air France would be to reduce the number of aircraft in accordance with the role of regional feeder now for Alitalia with one hub in Fiumicino airport. During the first and second rounds of negotiations for the acquisition, Air France proposed to the Italian government to reduce the number of aircraft in Alitalia from 185 to approximately 140 (In-depth Interview 7, 2010; Nativi, 2008 a.). Moreover, Air France planned to invest in gradually substituting a number of aircraft models in Alitalia's fleet with newer Airbus aircraft that were already included in Air France's fleet. In this way, Air France could achieve more favourable conditions from Airbus, its main supplier of aircraft, because it could leverage its purchasing power, and obtain lower costs of maintenance per aircraft by employing its existent maintenance facilities for Airbus (In-depth Interview 10, 2010). The maintenance of the Airbus aircraft in Alitalia's fleet could be processed after connecting flights in the facilities of Charles De Gaulle airport (In-depth Interview 10, 2010).

Air France envisaged substituting all the McDonnell Douglas MD80's in Alitalia's fleet with Airbus A320's (Nativi, 2009). The MD80 is considered a reliable and dependable aircraft that has been effectively employed by many airlines around the world. However, the MD80 is between 25 and 35 percent less fuel efficient than the corresponding Airbus A320 and Boeing B767 and provides no multimedia services on-board (Bachman, 2008). For this reason, Air France intended to substitute the MD80's with Airbus 320's in order to improve the fuel efficiency and enhance in-flight services in Alitalia (In-depth Interview 9, 2010). During the first and the second rounds of negotiations with the Italian government, Air France guaranteed investing Euro 850m. in Alitalia's fleet within three years (Nativi, 2008 a.).

In addition, Air France and Alitalia would seek to achieve significant cost savings in combining their structures. Air France would at first make changes to Alitalia's maintenance methods and enhance efficiency in the costly area of maintenance (Nativi, 2008 a.). Specifically, Air France devised introducing a maintenance

optimisation programme in Alitalia (In-depth Interview 9, 2010; Ezard, 2008 c.), which implies rescheduling non-essential maintenance and concentrating it in specific timeframes in order to reduce the amount of work performed (Ezard, 2008 c.). Alitalia conversely accomplished complete maintenance routines on single aircraft, which required additional workforce and increased maintenance processing time (In-depth Interview 9, 2010). Moreover, Air France intended to sell out the heavy maintenance operations and exclusively maintain line maintenance activities in Alitalia. The heavy maintenance activities were outsized compared to the needs of Alitalia and caused most of the inefficiencies in the maintenance cost area (Nativi, 2008 b.). Alitalia had designed the heavy maintenance activities with the intention of accomplishing maintenance operations for other airlines (In-depth Interview 1, 2007), however, the majority of airlines preferred to outsource maintenance to low-cost labour countries (Ezard, 2008 c.). For this reason, Air France planned to perform the heavy maintenance activities for Alitalia's Airbus fleet inside the Air France Group and establish a combination of long-term and short-term contracts for the heavy maintenance of Boeing and McDonnell Douglas aircraft until their dismissal (In-depth Interview 9, 2010). In the reorganisation of Alitalia, the heavy maintenance activities were separated and absorbed by the public finances (Chapter 7, section 1.3) (Nativi, 2008 b.).

Furthermore, Air France expected to achieve significant cost returns from implementing a joint Information Technology (IT) platform. As mentioned before, Alitalia ran an independent facility platform, called Sigma (Vinod, 2009), which had caused high initial costs for codesharing. Alitalia could at first abandon Sigma and adopt Air France Group's Amadeus platform and minimize system conflicts, subsequently phasing in combined departure and load control IT platforms and cutting down system replications in order to become compatible with the other reservation systems in SkyTeam, in particular, the Worldspan system employed by Delta-Northwest (In-depth Interview 8, 2010; In-depth Interview 1, 2007). In conclusion, Alitalia and Air France Group could achieve cost savings by jointly purchasing different supplies, such as fuel, cabin and airport lounge items as well as maintenance spare parts (Flottau et al., 2009).

Alitalia and Air France estimated that they could achieve cost savings of approximately Euro 100m. within three years after the acquisition (In-depth Interview 8, 2010; Dunn, 2009 b.).

The integration process between Air France and Alitalia would also enable transfer of effective managerial practices to Alitalia and modernise the traditional and bureaucratic organisation in Alitalia (In-depth Interview 7, 2010). Alitalia would require, in particular, to acquire and develop innovative managerial methodologies in cost-cutting and efficiency in the areas of airline passenger transfer handling and in-flight services, in order to adjust its operational costs to industry standards and contrast competition from low-fare carriers (Chapter 7, section 1.2) (Kahn et al., 2008). Alitalia could, in particular, acquire methodologies that were independently developed by KLM before its merger with Air France. KLM could count upon a small domestic market in the Netherlands and based 60 percent of its operations on transfers to long-haul destinations in Schipol airport, hence it was forced to develop innovative methodologies for cutting costs in transfers (Pilling, 2008). Alitalia could convert KLM's efficiency practices to its operations and strengthen its model of regional feeder into the Air France Group.

As for parallel routes between the two networks, Air France Group can guarantee permanent additional frequencies on the routes Milan-Paris, Rome-Paris, and Milan-Amsterdam (In-depth Interview 2, 2007), and therefore further attract the business segment on these routes (Chapter 4, section 5.1). Moreover, Air France Group can reduce unnecessary duplication at specific time periods, hence building up a load factor on these routes (In-depth Interview 6, 2010; In-depth Interview 2, 2007). In common with codesharing, parallel routes are essential in directing traffic to long-haul destinations, hence higher frequencies can be maintained in the integration process in order to minimise the transfer connection time for passengers (In-depth Interview 6, 2010).

In common with codesharing, Air France Group could apply a defensive strategy by acquiring Alitalia in order to prevent potential competitive attacks from Lufthansa, and would secure a united passenger catchment area that would cover almost one third of Europe with Alitalia (Wall, 2009). Otherwise, if Lufthansa acquired Alitalia, Air France Group would lose transfer traffic from the Italian market, and would allow Lufthansa to expand its long-haul scope in proximity of the Air France Group's major international hubs of Paris and Amsterdam (Wall, 2009; In-depth Interview 8, 2010). Nonetheless, In-depth Interviews 8 and 9 (2010) deny that Air France's strategy had defensive motives because Air France's acquisition policies are grounded on economic principles rather than strategic objectives. Air France is not willing to accept acquisitions that could generate losses and cash flow problems in the short-term, even if the acquisitions have strategic and competitive objectives. Air France appears to favour both the shareholders' interest and the financial stability of the company over the strategic control of the airline European market. Air France's approach on acquisitions is therefore based on synergies and complementarities in the route network, whereas Lufthansa pursues the control of a large geographical area in Europe with a centre in Germany as the main objective for its acquisitions (In-depth Interview 9, 2010; Pilling, 2008; Sparaco, 2008 b.). Hence, Air France would set aside the acquisition of Alitalia if it did not deliver economic advantages to the Group, notwithstanding the aggressive expansion plan of Lufthansa in Europe (In-depth Interview 9, 2010; Dunn, 2009 d.).

From the aforementioned arguments, it emerges that full integration between Alitalia and Air France makes economic sense and improves the strategic positioning of both networks. Therefore, costs and potential problems related to the merger need to be addressed in order to comprehend why the Air France Group eventually refused to acquire Alitalia.

Integration between Alitalia and Air France Group would be affected by ex-ante costs. As outlined by In-depth Interview 1 (2007) and In-depth Interview 7 (2010), brand evaluation was controversial for Alitalia. Alitalia's brand is well-recognised both in domestic and European markets and is established in the consumer

preferences of business passengers, particularly Italian nationals (Chapter 7, section 1.2), nonetheless, its brand value declined due to extended service disruptions and delays as a result of labour unrest, low operational quality, and major restructuring processes (Nativi, 2008 c.). Additionally, the Italian public increasingly associated government-owned companies with inefficient and unreliable services (Ciuspino, 2007), negatively influencing Alitalia's brand perception. For this reason, Air France was concerned that the Alitalia brand was overvalued and difficult to evaluate in the acquisition process (In-depth Interview 7, 2010; In-depth Interview 1, 2007).

“Indigestibility problems” related to unnecessary assets in the acquisition (Chapter 6, section 1) significantly increased because of the conditions that the Italian government imposed during the negotiations with Air France (In-depth Interview 1, 2007; In-depth Interview 7, 2010; Fiorino, 2006). In the first negotiation with Air France in November 2006, the Italian government applied the same conditions to Air France as the bidders of the privatisation (Barber and Michaels, 2007 b.) (Chapter 7, section 1.3). The Italian government made it clear that Air France would have to keep all domestic routes for at least 8 years (Hooper, 2007), during which, Air France would be bound to retain minimal operational activities. Air France would be unable to reduce the Alitalia fleet, which was used in regional operations, or would be required to provide aircraft replacements. Hence, Air France would inherit Alitalia's unprofitable routes and would be incapable of streamlining Alitalia's operations into a regional feeder for Air France (In-depth Interview 3, 2007). During the second negotiation with Air France at the end of 2007, the Italian government specified that part of the double-hub structure in Malpensa and Fiumicino should be maintained, particularly at least 20 international routes starting from Malpensa, as well as 90 percent of the domestic connections, where Air France could only reduce the daily frequencies. As mentioned before, Air France instead planned to cut the international destinations in Malpensa and focus on Fiumicino airport (In-depth Interview 4, 2007; Flottau et al., 2009).

Labour issues could also become a major cost for the acquisition of Alitalia by Air France. One of the greatest risks in the integration process between Alitalia and Air

France was the combination of the two management groups and the competition for the best positions among managers (Pilling, 2008). Alitalia management group had already shown during the negotiations that they were unwilling to lose a number of key positions in the organisation and also resisted redeployment to different departments inside the Air France Group. Air France proposed to introduce a rigorous and objective process in the selection of the positions, however, Alitalia management manifested their disapproval for selection criteria that were decided independently of their own departments. Consequently, after the acquisition, Air France had to go through a complex process for the reallocation of management positions, which could cause alienation within the Alitalia management group (In-depth Interview 6, 2010).

Moreover, Air France was required to reduce the Alitalia's workforce in order to restructure Alitalia and achieve its economic objectives (In-depth Interview 4, 2007). Alitalia's workforce was already considered to be overly large for its operations (Nativi, 2008 a.) (Chapter 7, section 1.2). Air France had also to change a number of contractual arrangements in order to lower the high operational costs in Alitalia (Dunn, 2010) (Chapter 7, section 1.2). Air France estimated that the required redundancies in Alitalia were to be between 2,000 and 3,000 and were concentrated in the job categories of pilots and flight assistants (In-depth Interview 9, 2010; Kahn et al., 2008).

Nevertheless, in Alitalia, trade unions had already shown lack of flexibility for labour reductions and were openly supported by part of the centre-left Italian government in the first negotiation (Airfinance Journal, 2008), and by the opposition centre-right Italian party in the second negotiation (Nativi, 2009). Consequently, Air France was concerned that an acquisition would generate further labour unrest, which would cause operational disruptions and eventually prevent the Air France Group from cutting the Alitalia workforce (In-depth Interview 9, 2010; In-depth Interview 3, 2007).

Organisational diseconomies can cause problems for airlines when operations are expanded. In an acquisition, two networks are combined and significant organisational diseconomies can emerge (Chapter 5, section 11). When the negotiations with Alitalia started in 2006, organisational diseconomies could be particularly relevant for Air France Group because it was already involved in combining the previous KLM and Air France structures. Managerial resources were fully employed in this task and Air France Group's staff were concerned that organisational diseconomies could become difficult to manage by adding Alitalia operations to an uncompleted merger (In-depth Interview 3, 2007). In the following negotiations, the integration process between KLM and Air France was almost completed, hence, managerial resources could be redeployed for the combination of Alitalia. Nevertheless, Air France predicted that organisational diseconomies could increase because the combination had to be accomplished in conjunction with the reorganisation of Alitalia, which added managerial complexities to the whole process (In-depth Interview 6, 2010).

Air France planned to introduce a stepwise approach to integration, in order to prevent organisational diseconomies, which had already been successfully applied with KLM (In-depth Interview 6, 2010; Del Canho and Engelfriet, 2008). The management should concentrate upon synergies and compatibilities between operations in an acquisition, rather than focusing on organisational issues. Large part of the synergies can be achieved with no immediate combination, in particular, in the purchasing and commercial operations, whereas some synergies can be achieved only if the areas are fully merged, such as in the route network area (In-depth Interview 6, 2010). Therefore, organisational diseconomies can be minimised if managerial efforts are directed to the areas that require immediate integration, whereas the remaining areas are just coordinated until the initial integration problems are solved (Del Canho and Engelfriet, 2008). As underlined by In-depth Interview 6 (2010), "the areas that do not generate immediate synergies can be coordinated like the codeshare that we already have with Air France. Our staff are already used to the procedures in the codeshare, so major disruptions are unlikely to occur".

In Alitalia's case, the reorganisation of the airline would be accomplished as the first priority, particularly the elimination of redundant routes; subsequently, cost savings would be achieved through common purchasing and the reorganisation of procedures for the maintenance and passage transfer handling (In-depth Interview 6, 2010; Nativi and Wall, 2008).

Financial concerns also played a role in Air France's decision process (In-depth Interview 7, 2010; In-depth Interview 4, 2007). As underlined in Chapter 7, section 1.2, Alitalia's financial position was exposed to a high-debt burden, which would inevitably be inherited by the carrier's acquirer. Additionally, Shellock (2006) pointed out how Alitalia shares were artificially overvalued, as a result of partial government control. Share value influenced the final acquisition price. The reorganisation of Alitalia in 2008 solved both problems because the Euro 1.2bn. debt was absorbed by the Italian Minister of Treasury, while the shares of the new Alitalia were sold to private investors at market value (Nativi, 2008 b.).

During the first and the second negotiations in 2006 and 2007, Air France Group could rely on significant financial resources, given its positive performance between 1997 and 2007. However, Air France Group's positive results were in part linked to effective fuel hedging, which Air France Group had applied in 2005 for 2006 and 2007 (Business Week Online, 2006). Nevertheless, fuel hedges expired in 2008, hence Air France Group faced significant growth in fuel costs in 2008, which limited its financial freedom and restrained its capacity to invest large capital in Alitalia (In-depth Interview 6, 2010; Meichtry, 2009).

After the reorganisation of Alitalia in 2008, Air France was confronted with the restrictions that banks applied to funding as a consequence of the global recession. The high level of uncertainty of the airline industry, whose financial results are strongly connected with economic cycles (Chapter 4, section 1), made banks more conservative in granting funds to airlines for their acquisition processes (Business Travel World, 2009). Air France Group could produce sufficient financial reserves for acquiring Alitalia, nonetheless, a number of managers argued that the acquisition

could weaken the financial situation for Air France in a moment of credit constraint and global financial crisis (In-depth Interview 10, 2010).

Subjective and political motives, rather than objective economic issues, played a significant role in the various negotiations between Air France and the Italian government. Several government ministers and politicians from both political sides, as well as union leaders, denied their approval to a settlement with Air France and explicitly opposed it for strictly political considerations (In-depth Interview 6, 2010; Sparaco, 2009).

The political approach to the acquisition of Alitalia reflects the general Italian orientation in industrial policy. Italian governments, regardless of their political ideas, appear to support the establishment of national champions in the most strategic industries, such as the automotive, telecommunication, and aviation industries, which are guaranteed large domestic operations in an almost monopolistic regime and are openly assisted by national government. Such industrial policy is based on the assumption that large domestic operations provide national champions with economies of scale and scope, which allow them to be competitive internationally and achieve large market shares and profits in international markets (Clougherty and Zhang, 2009). In addition, the national champions ensure a high employment rate and welfare for a significant part of the population and those benefits are safeguarded by powerful trade unions (Economist, 2008 g.). The European Commission's policy, however, goes against the concept of national champions and aims at guaranteeing a regime of competition between companies from different member states of the European Union. For this purpose, national governments cannot offer grants to specific national companies or raise tariffs for specific product categories (Nicolaidis, 2010).

As already stated, through an acquisition with Air France, Alitalia's position in the domestic and European markets would inevitably be reduced and Alitalia would play a minor role in the European market going against the model of the national champion. During the first negotiation at the end of 2006, the offer from Air France

prompted scepticism, in particular, from the extreme left inside the centre-left government, which opposed the redundancies in Air France's plan and accused Air France of being exclusively interested in the rich Italian market, rather than the future of Alitalia (Airfinance Journal, 2008). During the second negotiation at the end of 2007, Air France found the Italian centre-left government at a critical point because they had lost unity inside their political coalition and the centre-right government, led by Mr. Berlusconi, was predicted as the probable winner of the political elections in April 2008 (Scott, 2008). Air France contacted the centre-right coalition and asked its opinion on the acquisition plan for Alitalia (In-depth Interview 6, 2010). The centre-right coalition, nonetheless, had always shown themselves to pursue a policy of protectionism from foreign investment in an open confrontation with the European Commission, which had led to several interventions from the EC anti-trust agency when the centre-right coalition had been governing (Economist, 2008 g.). Moreover, the Northern League party inside the coalition disapproved the agreement because of the planned dismissal of Milan Malpensa's airport as a hub inside the Air France Group (Nativi, 2009). The attractiveness of Milan and the Lombardy region as business centres would suffer because of the lack of direct links with important international destinations, such as India and China (Economist, 2008 c.). As a consequence, the centre-right coalition immediately opposed Air France's request and, during their political campaign, stressed the value of the patriotic initiative of preserving the "Italianness" of Alitalia (Sparaco, 2009), and asked for the intervention of a number of Italian investors for funding and participating in the reorganisation of Alitalia as an alternative to Air France's proposal (Scott, 2008). After the victory of the centre-right coalition in the elections of April 2008, the initiative was concluded with the "Phoenix plan", which completely reorganised Alitalia (Brothers and Povoledo, 2009) (Chapter 7, section 1.3). On the contrary, at the end of 2008, Air France received the political support of the centre-right government, which realised that Air France was the only possible solution to provide the long-haul scope that Alitalia needed in order to bring the Italian carrier back to profitability, as promised during the political campaign. Therefore, the centre-right government supported Air France's proposal for acquiring

a 25 percent share in the new Alitalia (In-depth Interview 6, 2010; Aviation Week & Space Technology, 2009).

From this analysis, it emerges that Air France's decision to abandon Alitalia's acquisition during the first negotiation in 2006 and the second negotiation in 2007, is explained by the ex-ante and ex-post costs, which Air France Group evaluated in the acquisition process (In-depth Interview 6, 2010; In-depth Interview 1, 2007). Economic and strategic benefits were significant and were supported by the already positive results in the existing agreement between the two carriers. The transfer traffic from the Italian market towards Air France's international network and its related traffic economies as well as the integration cost savings, mainly defined the advantages in the acquisition. However, ex-ante costs and ex-post costs were estimated by Air France to be higher than the advantages.

During the first negotiation in December 2006, ex-ante costs were amplified by the privatisation conditions, which prevented the buyer from streamlining Alitalia's network and cutting domestic routes for eight years. Air France management asked the Italian government to relax the obligations in the privatisation in order to reduce the ex-ante costs (In-depth Interview 3, 2007). At the beginning, the Italian government suggested that privatisation conditions could be relaxed if Air France presented a business plan that guaranteed the long-term growth and profitability of the Italian carrier (Schrage, 2007), however, Air France management got increasingly frustrated because the Italian government never specified the extent of such flexibility, keeping "vague promises and uncertain concessions" (In-depth Interview 5, 2007), in part because of the political opposition against a regional feeder role for the Italian carrier. Therefore, in the end, Air France just assumed that all ex-ante costs were to be included in the acquisition and abandoned the negotiation.

Evans-Pritchard (2007) and In-depth Interview 1 (2007) suppose that Air France did not completely abandon its interests in Alitalia. Indeed, Air France Group was believed to support Aeroflot's bid for Alitalia, which unexpectedly joined Alitalia's bidders' group in the second phase (Chapter 7, section 1.3). Aeroflot was already a member of SkyTeam and depended on Air France for accessing the European market. According to this scenario, Air France evaluated excessive costs and risks in acquiring Alitalia, nonetheless, it was ready to invest some resources in supporting Aeroflot's bid. Additionally, Air France Group reduced its risks for organisational diseconomies and ensured returns on its investments, given the economic advantages of maintaining links with Alitalia (Evans-Pritchard, 2007; In-depth Interview 1, 2007). Nevertheless, this assumption was not confirmed by Air France staff (In-depth Interview 4, 2007). If a backroom deal between Air France Group and Aeroflot was concluded, terms for the backroom deal would be difficult to determine, because all the sources of secondary data that were explored did not make any reference to the terms of the backroom deal.

During the second negotiation at the end of 2007, Air France presented an economic offer that was lower than in the first negotiation, in order to discount part of the expected ex-ante and ex-post costs (In-depth Interview 8, 2010). Air France proposed to buy all Alitalia's shares at 82 percent discount on the market value compared to 54 percent in the first negotiation, and offered to acquire Alitalia's bonds at 85 percent of their nominal value compared to full nominal value in the first negotiation (Economist, 2008 b.). Nevertheless, Air France put forward an immediate capital injection of Euro 1bn. in Alitalia compared to Euro 750m. in the first negotiation, this was to be invested in Alitalia's fleet (Nativi, 2008 a.).

Air France suggested that the final bid for the acquisition could improve, if the Italian government granted Air France a certain degree of flexibility in restructuring Alitalia compared to the first negotiation (In-depth Interview 8, 2010; Nativi and Wall, 2008). However, Alitalia's unions reacted adversely to the request of Air France for flexibility and specified that they were ready to make very limited concessions in terms of redundancies and changes in contractual arrangements (Kahn

et al., 2008). The response of the unions increased the expected ex-ante costs for Air France. At that point, Air France contacted the centre-right coalition, which was the probable winner of the political elections in April 2008, and asked for support for its bid for Alitalia (Kahn, 2008). As mentioned before, the centre-right coalition did not support the offer from Air France for political reasons, hence, Air France assumed that Alitalia's workforce would be difficult to reduce and ex-ante costs were too high compared to the economic advantages of the acquisition (In-depth Interview 8, 2010). In addition, Air France complained in several venues that Alitalia had shown an "opaque process in displaying the firm's [Alitalia]'s financial statements", which made the evaluation of Alitalia's assets problematic (In-depth Interview 8, 2010). For these reasons, Air France withdrew its offer from Alitalia in March 2008 (CILT World, 2008).

At the beginning of 2009, Air France participated with a 25 percent stake in the capital of the new Alitalia and maintained its codeshare agreement with the Italian carrier. Air France retains its plans to acquire Alitalia and will probably start a new negotiation process with the group of Italian investors at the end of 2013, when the shares in the new Alitalia will be accessible for purchase (In-depth Interview 8, 2010; In-depth Interview 9, 2010).

The 25 percent stake in Alitalia sets out to secure the codeshare agreement with the Italian carrier, which is a primary strategic issue for Air France, and tries to ensure some operational control over Alitalia. This confirms the arguments of Carney and Dostaler (2006) (Chapter 5, section 6), who indicate that airlines pursue strategic objectives when acquiring shares in their alliance partners, rather than financial returns for their shares.

Air France is concerned that the majority of the Italian investors have no experience in managing an airline and will prioritise gains in share investments over the long-term growth of the company, which Air France necessitates for taking full advantage of the transfer traffic into its long-haul hubs (In-depth Interview 8, 2010). Nonetheless, Air France is exposed to a complex and lengthy process for imposing

its plans on Alitalia, given that the minority position does not guarantee any formal authority and the Italian investors have diverse opinions on the future of Alitalia (Sparaco, 2009).

As argued by Luo and Deng (2009) and Gulati (1995) (Chapter 3, section 6), Air France's minority position in Alitalia has strategic objectives and is not considered as a profitable investment in an organisation, where partners acquire fine-grained information on the partner's assets and decide to invest in it. Furthermore, Air France employs its 25 percent share in Alitalia as a first mover option to acquire Alitalia in the future, if the Italian carrier proves to accomplish its reorganisation process and return to operational efficiency and profitability (Carney and Dostaler, 2006) (Chapter 5, section 6).

The plan to acquire the new Alitalia by Air France in 2013 is supported by the reduction of ex-ante and ex-post costs that the reorganisation of the new Alitalia entails. Indeed, the changes and cuts that Air France envisaged in Alitalia during the integration process correspond in most part to the new structure of Alitalia (In-depth Interview 10, 2010). Some of the unprofitable domestic routes still need to be eliminated compared to the initial plan of Air France, nonetheless, the single hub in Fiumicino and the concentration on short- and middle- haul routes with a reduced workforce, matches the model of regional feeder that Air France considered for Alitalia (In-depth Interview 10, 2010; Wall, 2008; Nativi, 2008 a.). Furthermore, the addition of Air One's domestic network in profitable routes, increases the economic advantages for the acquisition of the new Alitalia by Air France (In-depth Interview 10, 2010; Meichtry, 2009).

Nevertheless, the political scenario will have to necessarily change by 2013, to allow Air France's acquisition. The reorganisation of the new Alitalia cost Italian taxpayers almost Euro 2bn. to maintain its "Italianness" (Economist, 2008 e.), therefore, both Air France and the centre-right or the centre-left coalition will have to submit very strong arguments in order to explain the eventual acquisition of Alitalia by a foreign partner (In-depth Interview 6, 2010).

## SUMMARY

Main findings from the case study can be summarised as following:

### **1) Air France/Alitalia**

Both Air France and Alitalia appeared to be satisfied with their codesharing agreement and Alitalia's membership in SkyTeam. The agreement established that added revenues are to be shared between Air France and Alitalia, hence both carriers could effectively coordinate their corporate accountants and marketing resources in order to achieve the economic objectives of the codeshare. Codesharing benefits primarily stem from the transfer traffic into the long-destinations and the related traffic economies. Air France could process transfer international traffic originating from the Italian market, which is only partially exploited due to Alitalia's limited international network, through its two hubs in Paris Charles de Gaulle and Amsterdam Schiphol. Traffic economies are generated because Air France could use larger aircraft and increase the load factor on long-haul routes, while a dedicated structure for transferring traffic in Charles de Gaulle airport ensures lower operational costs and connecting times. Costs in codesharing exclusively stemmed from the initial incompatibilities between the Alitalia's independent reservation platform Sigma and Air France's and SkyTeam's reservation systems.

Air France management also considered acquiring Alitalia and started two rounds of negotiations with the Italian government in 2006 and 2007. The acquisition would develop around the model of a soft merger and multi-hub structure, where Alitalia's brand and identity would be maintained in order to retain flying rights in the International Bilateral agreements and minimise disruptions in the integration process. In addition, Rome Fiumicino airport would become the Southern

Mediterranean hub inside the Air France Group, while Milano Malpensa airport would play a minor role. The acquisition would secure the codesharing benefits of transfer traffic in the long-term. Moreover, Air France Group could streamline Alitalia's network and transform the Italian carrier into a regional feeder towards Air France Group's international hubs. Duplications in international routes could be eliminated and unprofitable domestic routes could be cut within Alitalia's network.

Nevertheless, Alitalia's acquisition was affected by ex-ante and ex-post costs, which explain Air France's decision to call off the acquisition. Ex-ante costs mainly originated from "indigestible" assets in Alitalia that significantly increased as a result of the conditions that the Italian government imposed during negotiations. During the first negotiation in 2006, the investor in Alitalia had to maintain domestic routes for eight years and preserve Alitalia's overstuffed workforce. During the second negotiation in 2007, unions refused to make significant concessions on redundancies and contractual conditions for Alitalia's workforce. Air France attempted to negotiate reductions to the conditions with the Italian government in order to decrease the ex-ante costs, however, the Italian government refused, partially due to the propensity in the industrial Italian policy to sustain national champions in strategic industries. Conversely, ex-post costs were associated with Alitalia's high debt and poor financial performance, which Air France would inherit in a moment of global financial recession. Moreover, organisational diseconomies could escalate in combination with the necessary reorganisation of Alitalia, however, Air France planned to apply a stepwise approach to integration that could minimise diseconomies.

In conclusion, in 2008, the Italian government sold Alitalia to a group of Italian investors and entirely restructured the Italian carrier. Air France acquired a 25 percent share in the new Alitalia. Air France's minority share aims at ensuring strategic control in Alitalia and securing the existent codeshare agreement with Alitalia. In addition, the minority share is considered as a first mover option for a future acquisition in 2013, when all shares in the new Alitalia will be open for trading. Indeed, the reorganisation of the new Alitalia corresponds to the

modifications that Air France envisaged for the integration process with Alitalia, hence ex-ante and ex-post costs will be reduced in a potential acquisition.

# **CHAPTER 8**

## **Continental Ltd. Case**

## INTRODUCTION

This case study examines the strategic relationships that occurred between Continental and other airlines between 2004 and 2010. Strategic relationships involve codesharing and merger negotiations. This case is restricted to codeshares that comprise major route sections, which is consistent with the research framework in Chapter 6, section 1.

During 2004 and 2010, Continental held two merger negotiations with United Airlines in 2007 and 2010. The first negotiation in 2007 failed and in 2009, United and Continental established a broad codesharing agreement in their international routes. The second negotiation for a merger in 2010 was concluded, subject to the approval of the US regulatory authorities.

This case study encompasses two Sections. Section One will summarise Continental's strategic features and performance. A brief airline history will be followed by Continental's economic and financial results between 2004 and 2010. Continental recovered its financial situation in 2006 after five negative financial years following the September 11, 2001 terrorist attacks. Nonetheless, in 2008 and 2009, Continental's performance deteriorated again due to the downturn in business traffic. Continental concentrated its marketing strategy on superior services towards middle-upper passenger segments and centred its expansion on international markets, particularly transatlantic primary and secondary destinations.

In Section Two, Continental relationships will be examined. The case analyses the complex regulatory process for a merger in the US and evaluates the costs and benefits related to codesharing and merger. The case will seek to explain why Continental abandoned its first negotiation with United, established a codeshare agreement and ultimately settled a merger with United.

## METHODOLOGICAL REMARKS

This case will evaluate the strategic relationships that Continental set up between 2004 and 2010. Embedded case studies will be applied in this research (Chapter 6, section 4.4). Embedded case studies imply that this case study will be divided into sub-units of analysis, which will independently test theory (Stake, 2005).

The unit of analysis is:

- 1) Continental codeshares involving large parts of the network and Continental merger activities.

The sub-unit of analysis is:

- a) Continental-United Airlines codesharing and merger negotiations.

Three different sources of evidence are used to collect data:

*In-depth interviews:*

- a. In 2007, two telephone in-depth interviews with two members of staff of Continental. In-depth interviews had the following timetable:
  - June 27, 2007 20.00-21.30 In-depth Interview 1
  - June 28, 2007 18.00-19.30 In-depth Interview 2
- b. In 2007, one telephone interview with one independent aviation consultant for Hamlin Transportation Consulting, who was previously involved in Continental. The in-depth interview had the following timetable:
  - July 18, 2007 17.00-18.30 In-depth Interview 3
- c. In 2010, three telephone interviews with three members of staff of Continental. In-depth interviews had the following timetable:
  - July 19, 2010 22.00-23.30 In-depth Interview 4
  - July 27, 2010 15.00-17.00 In-depth Interview 5
  - July 30, 2010 20.00-21.30 In-depth Interview 6

*Documents and Archival Records:*

- a. Continental company sources: Continental Investor Reports 2004-2010, Continental Investor Updates and Presentations 2004-2010, Continental Letter to Stockholders 2004-2010, Continental Financial and Traffic Releases 2004-2010, Continental Corporate Charters 2004-2010.
- b. External sources: press material, such as Air Transport World, Airfinance Journal, Airline Business, Airline Industry Information, Aviation Week & Space Technology, which was published between January 2001 and July 2010 involving Continental.

## 8.1. COMPANY CONTEXT

### 8.1.1 Brief History

Continental was founded in 1982 as a combination of four regional carriers, namely Texas Air, Continental, Frontier Regional Express and Eastern Airlines, which operated in the US Southern regions (Brelis, 2001). Continental had significant problems in integrating different airline operations and was unable to achieve a positive financial performance. Consequently, in 1990, Continental was sold in order to avoid bankruptcy proceedings and, in the following four years, Continental posted unsatisfactory results and changed their top management several times (O'Reilly, 1999).

In 1994, the newly appointed CEO, Mr. Bethune, applied an innovative strategy for Continental, defined as the Go Forward Plan, which radically changed marketing, financial and service procedures for the carrier (Brelis, 2001). The Go Forward Plan significantly improved Continental's performance and between 1994 and 2000, Continental experienced positive financial results.

Continental's positive trend was interrupted by the September 11, 2001 terrorist attacks. Along with most US airlines, Continental went through major operational disruption and faced important reductions in traffic. As a consequence, at the end of 2001, Continental announced job redundancies and cuts in workforce wages and benefits (Continental, 2007). Continental's financial results only recovered completely in 2006, however, in 2008 and 2009, Continental went back to negative financial results as a consequence of both the rise in oil prices and the global economic recession.

In August 2003, Continental, Northwest and Delta launched their codeshare alliance, which was followed by Continental's membership in the alliance umbrella, Skyteam

(Chapter 5, section 6) (Goeteyn, 2006). In 2009, Continental established a broad codeshare agreement with United Airlines and abandoned Skyteam for the Star Alliance umbrella (Ranson, 2009).

### **8.1.2 Corporate Performance**

After two unsatisfactory years in 2004 and 2005 (Continental, 2007), Continental returned to profitability in 2006 (Fair Disclosure Wire, 2007 a.), and confirmed its positive financial performance for 2007, reporting US\$198m. net income (Datamonitor, 2009). Nevertheless, Continental's performance declined in 2008, when the carrier posted US\$586m. net losses, and fell again in 2009 with US\$282m. net losses (Reed, 2010 a.).

Continental's profits in 2006 and 2007 were primarily driven by passenger revenues, which had constantly increased since 2002 (Karp, 2007 a.). Revenue growth originated from capacity and load factor increases. Between 2002 and 2007, Continental added the most capacity among US network carriers and had also regularly improved its load factor from 74.1 percent in 2002 to 81.1 percent in 2007 (Schlangenstein et al., 2010).

Nonetheless, in 2008 and 2009, Continental was negatively influenced by the decline in business passengers in both domestic and international routes, as a consequence of the general economic recession (Chapter 4, section 5.1) (Jones, 2010). Business domestic passengers that were loyal Continental customers either switched to economy fares or chose to fly with low-fare carriers in order to save on costs (Karp, 2009 b.), while international business passengers significantly reduced their travel budgets (Prada and Esterl, 2009). However, despite important reductions in revenues, Continental's international operations remained profitable because of the low percentage of first and business class versus economy seats that Continental employed in secondary destinations in transatlantic routes (Chapter 8, section 1.3) (Ranson et al., 2009). Business passengers were not expected to return to pre-

recession levels in the near future, therefore, Continental planned no significant growth for 2010 and 2011 (Reed, 2010 a.). Leisure traffic also experienced a significant decline in Continental, in particular, in off-seasonal periods when economy passengers favoured short holiday breaks (Field, 2009 b.). Moreover, economy passengers took advantage of the extensive fare discounts designed to increase demand during the recession period and brought down the overall profitability of the economy segment (Karp, 2009 a.).

Furthermore, Continental has had problems in controlling its operational costs. Operational costs constantly increased in absolute and relative terms between 2002 and 2009, and since 2005, Continental had the highest unit costs per available seats among US carriers (Air Transport World, 2010 a.). High unit costs could in part be explained by Continental's higher service standards (Chapter 8, section 1.3). In addition, many carriers – such as Delta and Northwest – had the opportunity to reduce their costs in Chapter 11 bankruptcy proceedings, which allowed the carriers to apply rigorous policies of cost cutting and capacity control (Airline Business, 2007 a.). Nonetheless, Continental was affected by excessive labour costs. In 2009, Continental had the highest percentage of labour costs as compared to US network carriers, representing 21.4 percent of operating costs (Carey, 2010 d.). In addition, Continental had a high debt to equity ratio and low credit ratings as compared to airline industry standards, which resulted in a higher interest coverage ratio and ultimately in higher unit costs (Datamonitor, 2009).

### **8.1.3 Corporate Strategy**

Continental's marketing strategy has revolved around high passenger service standards. Continental focuses on continuously improving its operations and services, particularly in the areas of punctuality and baggage delivery (Stoller, 2010), whereas, US and European network carriers have reduced customer services on

domestic flights, Continental has invested significant resources in service improvements and staff training in the domestic market (Jones, 2010).

Continental concentrates most of its marketing resources on the middle-upper section of the market, which is prepared to pay higher fares for higher-quality services. Continental focuses in particular on the US business market segment in both the domestic and international markets (Jones, 2010; Farzad, 2006). Continental has established the largest account management department among US network carriers, which strives to negotiate customised agreements with corporate customers and is flexible in adjusting the fares to accommodate the specific needs of the corporate travellers (Boehmer, 2009 b.; Farzad, 2006). Continental differentiates its strategy in the business segment by implementing a “Business First” class in addition to a single economy section. The “Business First” class is designed to almost match the first-class quality of Continental’s US competitors but it is priced close to business class standards (Reed, 2010 f.). Continental plans to expand in the future towards service-oriented customers outside the US, specifically European business travellers (Esterl, 2009 b.).

Continental had also offered free high-quality full-inboard services on its flights in order to attract the leisure segment (Cramer, 2006). Nevertheless, in 2009, Continental modified its strategy and started charging for meals, baggage and exit row seats in domestic markets (Mouawad, 2010), while leaving most of the in-flight services free of charge in international flights (Deprez, 2009). Continental’s strategy set out to keep its fares competitive against low-fare carriers and obtain additional revenues from economy passengers while the economy class experiences a significant decline in revenues (Reed, 2010 b.; Hinton, 2010 a.).

Continental centres its long-term expansion on international markets, where it is already well-established as 48 percent of its revenues originated from overseas routes in 2009 (Flint, 2010). Continental envisages expanding in primary transpacific and transatlantic destinations, where Continental could employ the new Boeing B787 Dreamliner (Esterl, 2009 b.). The B787 allows reducing costs per passengers and

providing direct connections due to its long-range capabilities and low average fuel consumption (Chapter 4, section 7) (Hinton, 2010 b.). Continental ordered 25 Boeing B787's in 2010 (Esterl, 2009 b.), nevertheless, in 2011, Continental postponed its orders to 2013 waiting for Boeing to solve the main production problems that have affected B787 during its implementation period between 2010 and 2011 (Zhao and Shenhar, 2011) (Chapter 4, section 7.1). In addition, Continental aims to further develop in secondary European destinations that were not previously served with non-stop transatlantic services (Field, 2006). Continental exclusively uses 172-seats Boeing 757's on secondary European destinations in order to provide appropriate capacity at moderate unit costs and offer scheduled services all year round rather than on a seasonal basis (Airfinance Journal, 2009 a.).

Continental specifically set up its international growth toward European destinations from its hub in Newark Liberty Airport, New York. The Newark hub also allows Continental to exploit the New York market, which is the largest and most profitable market in the US in terms of traffic origin and destinations, where Continental has the highest market share (28 percent) among US carriers (Datamonitor, 2009). From its Newark hub, Continental directs both primary European destinations and secondary European destinations. Continental also enlarged its Latin American destinations in its Newark hub in order to attract the Latin American residents in the New York area (Flint, 2010).

Continental is also well-established in the US domestic market, where Continental originates 42 percent of its revenues (Flint, 2010). Continental concentrates on the US Southwest market from its Houston Bush International Airport (Datamonitor, 2009). From the Houston hub, Continental serves profitable business traffic, which generates from affluent Texas energy industries, as well as significant leisure traffic, which is directed toward the US Southwest regions (Schlangenstein et al., 2010). The Houston hub also provides numerous services to Latin America and exploits traffic generated by the large Latin American community in Texas. Houston and Newark hubs allow Continental to be the second largest carrier behind Delta in terms of destinations in the Latin American market (Flint, 2010).

## 8.2. CONTINENTAL STRATEGIC RELATIONSHIPS

Between 2004 and 2010, Continental established several codeshares in order to expand its offer to its customers. Continental formed broad codesharing with Northwest in 2001, followed by a triangular domestic marketing alliance with Delta and Northwest in 2003 (Airfinance Journal, 2007). In 2004, Continental joined Skyteam, following Northwest and Delta memberships in Skyteam (Goeteyn, 2006).

In 2009, Continental set up a broad codeshare agreement with United Airlines and abandoned Skyteam for the Star Alliance, which United belonged to (Casey and Chon, 2010). Eleven Star Alliance members including United and Continental obtained antitrust immunity on international routes from the US Department of Transport in 2009 (Carey and Williamson, 2009 b.).

Between 2004 and 2010, Continental established negotiations for acquisitions with United Airlines. United and Continental went through two phases of negotiations. In the first phase in 2007, United and Continental interrupted the negotiations and chose to maintain their strategic independence (Tita and Meyer, 2006). At the beginning of 2010, United commenced the exploration of a possible merger with US Airways (Flint, 2010), which was later abandoned when Continental contacted United for a possible merger (Airline Business, 2010 a.). The second phase of negotiations was concluded in May 2010 subject to the approval of the US authorities (Mitchell and Carey, 2010 b.). The two carriers set out to close the transaction by the end of 2010 and achieve a single operating certificate from the US Federal Aviation Authority by 2012 (Ranson, 2010).

This case study primarily evaluates the codeshare agreement and the two phases of negotiation between Continental and United Airlines.

## **8.2.1 United Airways – Continental**

During the first negotiation for merger in 2007, United Airlines and Continental considered as an alternative a codeshare agreement involving important sections of their networks (In-depth Interview 2, 2007; Marilyn, 2007). Nonetheless, codeshare plans came to an end after the refusal of Continental to merge with United. In 2008, United and Continental examined again the opportunity to establish a codeshare agreement which was finally implemented in 2009 (Casey and Chon, 2010).

In the remaining part of the section, the advantages and drawbacks of codesharing will be evaluated in order to comprehend why United Airlines and Continental refused at first and then eventually formed the codesharing agreement. The codeshare agreement will be subsequently compared to the merger.

### **8.2.1.1 Codeshare between United Airlines and Continental**

The Continental and United Airlines codeshare could benefit from limited route overlap between the two route networks (Shannon and Schofield, 2010). Limited overlap implies that the two carriers can effectively build new route connections between their networks and offer new destinations through codesharing. An independent study from the US Government Accountability Office (GAO) (GAO Reports, 2010) analysed the overlap between United and Continental in both connection airport pairs and non-stop city pairs. Connection city pairs take into account the combined presence of the two airlines in one destination through one or more stopovers, even if the carriers do not have a direct link into the destination. Conversely, non-stop city pairs consider the overlap in one destination through a direct link (GAO Reports, 2010). In general, overlaps in non-stop pairs are more relevant than in connection pairs because airline passengers save time and possible

inconveniences through a direct flight (In-depth Interview 5, 2010). In operational terms, GAO recorded the presence of overlapping when one overlap in either connection pair or non-stop pair resulted in a loss of one competitor, which is defined as an airline having at least 5 percent of total traffic between airports (GAO Reports, 2010). In the United and Continental codeshare, the overlap in connection city pairs comprised almost 8 percent of the examined routes (1,135 out of 13,515), whereas the overlap in non-stop city pairs included approximately 2 percent of all routes (12 out of 553) (GAO Reports, 2010). Such overlaps are the smallest between two route systems among the US network carriers and very limited, compared to extensive codeshares among European carriers (GAO Reports, 2010; Shannon and Schofield, 2010).

The Continental and United Airlines codeshare could also take advantage from consistent domestic route structures (Shannon and Schofield, 2010). United primarily served the US Western market from its two main hubs in Los Angeles and San Francisco (In-depth Interview 2, 2007), whereas Continental was positioned in the US Southwest market from its hub in Houston (Chapter 8, section 1.3) (Schlangenstone et al., 2010). United could also rely upon a significant presence in the Northeast market in its Dulles hub in Washington DC that matched with Continental's presence in New York (Chapter 8, section 1.3) (Datamonitor, 2009). By codesharing, Continental and United could become market share leaders in six of the ten largest US air travel markets, which comprised a high percentage of business travellers (Reed, 2010 e.).

International markets were also entirely complementary. According to the GAO independent research (GAO Reports, 2010), Continental and United had no overlaps in any city-to-city route in international destinations. Nevertheless, international destinations need to be examined differently from domestic routes on account of the hub-and-spoke structure that both Continental and United employ (In-depth Interview 5, 2010). International passengers transfer from different domestic locations onto international hubs and may consider alternative hubs to an international destination as substitutable because of the long flying times that

international destinations from the US usually entail. In this way, airports that are 2 or 3 flight hours distant can present overlapping markets. For this reason, the Washington Dulles international hub for United and the Newark New York international hub show overlaps if identical European final destinations are considered (In-depth Interview 5, 2010). The GAO independent research (GAO Reports, 2010) pointed out that United and Continental displayed 38 percent substitutable European destinations. However, the Continental positioning in the middle-upper passenger segments and secondary European destinations (Chapter 8, section 1.3) is compatible with United Airlines' basic offer on leisure European primary destinations (In-depth Interview 1, 2007).

In addition, United allowed Continental to have access to the Asian market, particularly from its Los Angeles and Tokyo Marita hubs, where Continental had only a minor presence in the Guam hub toward the Southern and Western Pacific (Flint, 2010). Conversely, Continental was effectively positioned in the Latin American markets through its Newark and Houston hubs (Chapter 8, section 1.3) (Flint, 2010).

Continental and United could gain significant traffic economies of scope by codesharing. The strong presence in metropolitan areas with a high proportion of business passengers could provide feeding traffic to the international hubs of both carriers and improve overall positioning in international markets (Shannon and Schofield, 2010). Economies of scope were amplified because the two sections of markets were geographically adjacent (In-depth Interview 3, 2007). The proximity of two route networks multiplies the opportunities for connections because spoke routes belonging to two different hub-and-spoke systems can be linked. For example, the spoke routes connecting to Washington Dulles for United could be linked to the spoke routes connecting to Newark New York for Continental and employed for feeding United's passengers into different international destinations departing from Newark New York that are offered by Continental (In-depth Interview 3, 2007). United and Continental could also attempt to adjust their scheduling and frequencies in order to increase and enhance the connections between the two networks (In-depth

Interview 4, 2010).

Codesharing between United and Continental could also allow Continental to change its membership in the umbrella alliance (In-depth Interview 6, 2010). Continental was not satisfied with its membership in Skyteam because it had too many overlaps with Delta and Air France in the European and Latin American markets (Conkey and Prada, 2009). In addition, despite its long-term codesharing agreement with Delta, Continental considered the recent merger of Delta with Northwest as a competitive threat (Casey and Chon, 2010) (Chapter 8, section 2.1.2) and planned to move away from Delta and apply alternative competitive strategies (In-depth Interview 6, 2010). United's membership in Star Alliance enabled it to gain access to the Central and Eastern European market where Star member Lufthansa was effectively positioned, while Continental could fill the gap in the New York market for the Star network (Reed, 2010 c.).

As outlined before, in 2009, Continental established a codeshare agreement with United, which was limited to international routes (Casey and Chon, 2010), and applied for anti-trust immunity from the US authorities with the other ten members of Star Alliance (Carey and Williamson, 2009 b.). Continental chose to restrict the codeshare to international routes because it preferred to maintain a gradual approach with United before linking its domestic routes (In-depth Interview 6, 2010). United had indeed shown low levels of customer satisfaction particularly in domestic routes (Flint, 2010), and Continental was not willing to put further pressure on its customers when introducing additional charges on its basic offers (Mouawad, 2010) (Chapter 8, section 1.3). Continental consequently focused its efforts on international routes in order to recover most of its profits in this area (Chapter 8, section 1.2) and wait for the cooperation with United and Star Alliance in general to prove successful (In-depth Interview 6, 2010).

In addition, Continental realised that most of the benefits for codesharing with United could be achieved through revenue sharing because their network had no

overlap. Indeed, joint marketing resources and the commitment from the accounting departments could be guaranteed on complementary routes only with revenue sharing (In-depth Interview 6, 2010). Continental could not establish revenue sharing in domestic routes because of a clause in the Continental pilots' contract that prohibits Continental from sharing revenues with another US carrier in order to prevent outsourcing to other carriers (Casey and Chon, 2010). The contract required a long renegotiation process to be changed, and Continental had to postpone its codeshare agreement for that period (Casey and Chon, 2010). Furthermore, Continental resolved not to put additional pressure on the delicate review process for anti-trust immunity by the Department of Transport (DOT) for Star Alliance (In-depth Interview 6, 2010), which was required in order to apply joint pricing and revenue sharing on international routes (Chapter 5, section 2). Concerns for anti-competitive behaviour would have escalated in the DOT if domestic codesharing between two of the major US network carriers was added to international routes (In-depth Interview 6, 2010).

Despite the cautious approach of Continental, the anti-trust approval for Star Alliance from US authorities was quite contentious. The DOT approved at first the anti-trust immunity and excluded only 6 percent of the international routes (Ranson, 2009). Nonetheless, the US Department of Justice (DOJ), which has no formal authority in the anti-trust decision but significantly influences the DOT (Chapter 5, section 2), intervened after two months' delay beyond the comment period and stressed that the anti-trust immunity should be authorised exclusively for transatlantic routes because Star is the only competitive alternative on Latin American and Pacific routes (Carey et al., 2009). The US DOJ proposal was not accepted by the DOT, which authorised the anti-trust immunity from November 2009 (Chon et al., 2010).

On the transatlantic routes, United, Continental, Air Canada, and Lufthansa planned to establish a joint venture called Atlantic Plus-Plus. The joint venture entailed

jointly managing the marketing strategies on the Atlantic routes as well as coordinating the efforts of the accountants on corporate clients. This was supported by revenue sharing between the four carriers in all the routes that were covered by the agreement (Conkey and Prada, 2009). In the joint venture, revenue sharing was totally independent of the single results of the carriers, therefore, one carrier would achieve 25 percent of the revenues in the Atlantic routes even if it did not accomplish any sales in its routes (In-depth Interview 6, 2010). In addition, the joint venture could decide independently to cut a number of competing flights if load factors were not satisfactory in specific routes (Conkey and Prada, 2009). In this way, the joint venture assumes the characteristics of a virtual merger because it can implement long-term structural cuts to the overall capacity of the carriers (In-depth Interview 6, 2010). Continental estimated that the four carriers could achieve 85 percent of the benefits of a complete merger with the joint venture (Shannon and Schofield, 2010).

Costs related to codesharing were primarily associated with IT incompatibilities between the two carriers. United was the creator and long-term user of the Apollo system, which evolved at United into a new system defined as Travelport, which is compatible with the old Apollo mainframe basis but offers new capabilities to users. Conversely, Continental relied on Shares, which was independently provided by Hewlett-Packard Enterprise Services (Fabey, 2009). The two systems had significant conflicts when managing independent corporate accounts because Shares had a dedicated facility for independent accounts, whereas Travelport relied upon its mainline system (In-depth Interview 2, 2007; In-depth Interview 5, 2010). Continental and United's differences in IT were worsened by their membership in the Star Alliance grouping, which used as a common platform, Amadeus (Fabey, 2009). As a consequence, United and Continental decided to use their booking systems for their own reservations and employ Amadeus for their codeshared bookings (In-depth Interview 5, 2010). Still, two conflicting systems running simultaneously can cause many disruptions and increase reservation timing, hence, both Continental and United were required to find an alternative solution for the future. Ideally, both carriers should adopt Amadeus, but this would require major

investments in infrastructure and training of front-line personnel. In addition, Continental has a long-term and beneficial partnership with Hewlett-Packard in different areas that would be onerous to terminate (In-depth Interview 5, 2010).

Relational factors between the two carriers appeared promising for cooperation. Indeed, both carriers shared corresponding corporate values and performance-oriented corporate cultures, where salary levels were strictly attached to clearly stated results (In-depth Interview 3, 2007). Nonetheless, United's strategy appeared to revolve around network size and scope, whereas Continental's strategy focused on service performances and customer satisfaction (In-depth Interview 6, 2010). The re-organisation of United in 2005 and the major cuts in capacity between 2008 and 2009 (Casey and Chon, 2010) appeared to realign United's strategy with Continental's, nevertheless, the differences in terms of customer-orientation and quality between the two carriers were still significant and could pose a long-term threat to the cooperation (In-depth Interview 6, 2010).

#### **8.2.1.2 Merger between United Airlines and Continental**

The Continental and United merger profited from the lack of overlapping routes similar to codesharing, where Continental and United could add new route connections and destinations to their networks (Shannon and Schofield, 2010). The two carriers would have to renegotiate their labour contracts in a merger, hence they could cancel the clause that limited Continental to share revenues on domestic routes and extend the cooperation to domestic markets (Casey and Chon, 2010). As outlined in codesharing, the two networks were geographically adjacent and offered many opportunities for further connections between spoke routes. Through a merger, United and Continental could simplify their route system and substitute spoke routes with direct connections when one of the two spoke routes had low average passenger numbers. For example, the Chicago hub in United could be connected with Newark

hub by using two spoke routes departing from Cleveland. Cleveland-Chicago has low average passenger numbers because customers in many cases prefer to use the car rather than the air connection. For this reason, the route between Cleveland and Chicago could be eliminated and substituted with a direct connection between Chicago and New York (In-depth Interview 6, 2010). Consequently, the capacity in the two networks could be employed more effectively with improved connections between the hubs (In-depth Interview 6, 2010). Duplications between the regional hubs in Cleveland and Denver could also be eliminated (Shannon and Schofield, 2010).

United and Continental had the potential to reduce their overall capacity by approximately 10 percent in domestic markets with a merger (Ranson, 2010) and bring their operational costs down by 5 percent (Chon et al., 2010).

In international markets, United and Continental could reorganise their destinations and achieve further cost cuts in overseas routes. United and Continental had sought to cut their operational costs with respect to their European competitors, however, they required further opportunities. Continental, in particular, experienced problems restraining its operational costs (Air Transport World, 2010 a.) (Chapter 8, section 1.2), whereas United Airlines had taken advantage of Chapter 11 bankruptcy procedures between 2004 and 2007 (Airline Business, 2007 a.). Continental and United could at first streamline the destinations that could be considered as substitutable for passengers, as underlined for codesharing. Substitutable destinations were primarily located in Washington Dulles and New York Newark hubs towards European destinations.

The international network of the two carriers could also be completely restructured by dividing the international destinations into primary and secondary destinations according to both the average passenger numbers and the potential growth of the routes (In-depth Interview 4, 2010). Primary destinations should be developed mainly towards Asia from United's Tokyo Narita and Los Angeles hubs and from Continental's Houston hubs (Flint, 2010). In primary destinations, Continental and

United could employ the new long-haul capable Boeing B787's Dreamliner that could provide direct connections to Asian destinations from the US (Hinton, 2010 b.). In this manner, Continental and United could open new markets in Asia and reduce the operational costs thanks to both the fuel efficiency of B787's Dreamliner (Hinton, 2010 b.) and the cutbacks in connecting flights. Primary destinations could also be selected for feeding destinations in Europe and Latin America. As for secondary destinations, United and Continental could follow Continental's model of targeting underserved direct destinations in Europe and Latin America and employing narrow body aircraft in order to have moderate unit costs and provide yearly scheduling (Chapter 8, section 1.3) (Airfinance Journal, 2009 a.).

Moreover, the two carriers could allocate their international capacity in hubs that offered growth opportunities. For example, Continental's Houston hub could be further developed, whereas both San Francisco and Chicago had constraints in terms of capacity expansion (Shannon and Schofield, 2010). In conclusion, United and Continental could redesign their domestic routes in order to maximise feeding traffic towards their international hubs, creating significant economies of scope in the route networks (Schlangenstein et al., 2010). Frequencies between direct connections could be increased and coordinated in order to facilitate the links between international hubs, particularly for transfer passengers originating from the Pacific coast towards Europe and from the Atlantic coast towards Asia (In-depth Interview 6, 2010).

The merger offered Continental the opportunity to solve its weaknesses in its growth model (In-depth Interview 5, 2010; In-depth Interview 2, 2007). Continental significantly added capacity between 2002 and 2007 in order to aggressively gain market share (Schlangenstein et al., 2010) (Chapter 8, section 1.2). However, Continental based its capacity expansion on lower initial operational costs and high levels of business traffic (Jones, 2010). Lower initial operational costs originated from lower maintenance costs in using new aircraft and lower average salaries in hiring new employees in the first year, particularly front-line and crew staff (Mifsud et al., 2010). Nevertheless, costs had to necessarily move up over the years in

combination with the high service levels that Continental offered, hence, Continental was unable to grow and keep operational costs down in the long-term (In-depth Interview 5, 2010; In-depth Interview 2, 2007). The merger with United allowed Continental to expand its route network at low operational costs thanks to the savings associated with capacity rationalisation (In-depth Interview 5, 2010). In addition, the significant expansion of the international network through the merger was an effective strategy for regaining market share in the business market, which had dropped to minimal levels in 2008 and 2009 (Boehmer, 2010). In particular, during the recession, large corporations began simplifying their travel agreements and looked for volume contracts in order to save on costs and streamline administrative procedures. Corporations ideally searched for one long-term agreement with an airline that could fulfil all their travel requirements worldwide (Reed, 2010 g.). The combination of United and Continental could offer global coverage to large corporations and disclose new opportunities for agreements taking advantage of Continental's expertise in corporate accounting (Chapter 8, section 1.3) (In-depth Interview 5, 2010).

The merger between Continental and United could enable the carriers to increase fares in part of their networks. The increases could encompass both the domestic overlapping non-stop routes and the international substitutable routes where the companies had no major competitors (Smith, 2010). Fare increases are a controversial issue because the US authorities consider potential rises in fares as a negative anti-competitive effect of the merger (Reed, 2010 g.). Nonetheless, in the case of Continental and United, increases in fares are likely to be limited as a result of the competition in domestic and international routes and the lack of significant overlap between the two networks. If fares increased too significantly, consumers could rapidly switch to low-fare offers in domestic routes, similarly, they could prefer foreign carriers, particularly European flag carriers, in international routes. Low-fare carriers competed in almost 100 routes between United and Continental, while foreign carriers competed in almost 60 percent of the seats on the Atlantic routes and 66 percent on the Pacific routes (Mitchell and Carey, 2010 a.).

The merger between Continental and United was also based on significant competitive motives. In the US airline structure, acquisition can be caused by the so-called “domino effect”. The US airline market is composed of small numbers of airlines and is quite fragmented. At the end of 2007, seven major carriers controlled almost 90 percent of US routes, however, the largest, American Airlines, controlled merely 19 percent of the passenger aviation market. Other players held between 10 percent and 15 percent market share, including Continental with 10 percent market share (Hatfield, 2007). In addition, the US market was exposed to excessive capacity and unnecessary aircraft assets, due to the Chapter 11 bankruptcy proceedings that prevented a number of airlines from bankruptcy and eliminating their capacity from the system (Karp, 2007 b.). This structure ensured no long-term profitability for the US airline industry because carriers continuously reduced their fares in an attempt to improve their load factor. As a consequence, most US carriers structurally achieved low profits and were severely hit by the economic recession starting in 2008 (Datamonitor, 2009). Given the US market situation, if one acquisition between market players occurred, the other network carriers were expected to follow because other network carriers would be unable to compete with inferior route structures against one network carrier with approximately 40 percent market share (Faithfull, 2007 a.). Specifically, Continental was unable to address competition originating from a merger between two other major US network carriers, such as Delta, Northwest, American Airlines, and US Airways. The new merged entity could benefit from expanded domestic connections as well as higher scope and domestic feeding traffic in international routes, similar to the United Airlines and Continental integration. Continental already had problems in challenging competition from American Airlines, which controlled 19 percent of the US market share (In-depth Interview 2, 2007). Indeed, the first merger negotiations in 2007 between United Airlines and Continental started immediately after the US Airways proposal to acquire Delta and were abandoned when US Airways decided to desist from its merger plans (In-depth Interview 2, 2007; Field, 2007 b.). Subsequently, Delta and Northwest merged in October 2008 and the joint unity became operational at the end of 2009 (Field, 2009 a.). The merger between United and Continental could also be

considered as a delayed reaction to the Delta merger in order to maintain competitive positioning in both the domestic and international markets against the enlarged Delta (In-depth Interview 5, 2010; Chon et al., 2010).

The merger between Continental and United would also allow the transfer of managerial expertise from Continental to United in the areas of high quality services and customer assistance (In-depth Interview 6, 2010) (Chapter 8, section 1.3), where United suffered low rankings in different customer surveys (Flint, 2010). The transfer of managerial practices would not be possible in codesharing because it entails major interactions between staff and changes in the operational procedures that only a merger allows (In-depth Interview 6, 2010). Continental could also transfer to United its expertise in corporate accounting and marketing for large corporations (Boehmer, 2010) (Chapter 8, section 1.3). The two carriers agreed to assign the whole responsibility for corporate marketing to Continental's marketing corporate account department and downsize United's, rather than facilitating interactions between the two departments (In-depth Interview 6, 2010). The significant decline of business passengers in 2008 and 2009 (Chapter 8, section 1.2) required immediate responses and the two carriers could not wait for the knowledge transfer to occur. Moreover, corporate accounting did not involve large operational areas as for the quality of services, hence, it could be independently managed by one department with no knowledge transfer required for other areas. Nevertheless, in the long-term, Continental and United planned to integrate Continental's corporate accounting department with some elements of United's department (In-depth Interview 6, 2010).

United and Continental estimated that their merger would generate approximately US\$1.2bn. in additional yearly profits by 2013 (Ranson, 2010). The merged entity could gain US\$900m. in extra revenues in both domestic and international markets and could save at least US\$300m. by eliminating unnecessary capacity and rationalising a number of functions (Flint, 2010). However, the merger benefits

appear to be relatively low as they represent less than 2.8 percent of cumulative revenues and 0.7 percent of cumulative costs for both carriers in 2009 (Tarry, 2010 c.). In addition, the expected benefits of the merger are not significantly different from the margin of forecasting error, given the unpredictability of the integration process and the time horizon involved (Tarry, 2010 c.).

Nevertheless, Continental and United appeared to have a cautious approach to forecasting benefits because the unions could employ merger gains to extend their requests on labour contracts (In-depth Interview 4, 2010; Shannon and Schofield, 2010). In addition, most of the benefits in international routes were already achieved by the joint venture in Star Alliance (Chapter 8, section 2.1.2), and additional labour and integration costs needed to be deducted from the overall benefits (In-depth Interview 4, 2010; Shannon and Schofield, 2010).

Despite apparent economic benefits and strategic motives, the merger between Continental and United was affected by costs and risks that both carriers evaluated in the integration process.

The Continental and United Airlines merger had to be approved through a complicated review process by regulatory authorities. In the US, acquisitions are scrutinised by the Department of Transport (DOT) and the Department of Justice (DOJ) (Chapter 5, section 2) (Reed, 2010 d.). DOT monitors airline transactions and primarily assesses their impact on domestic competition, airline financial performance, and customer service. DOT has no formal authority to prevent acquisitions, nonetheless, its assessment considerably influences the DOJ, which retains primary jurisdiction on acquisitions (FDCH Political Transcripts, 2007). DOT and DOJ are specifically concerned with route overlaps in their evaluations, because route overlaps are eliminated in acquisitions and set off higher fares as well as reductions in services (Schlangenstein et al., 2010).

Acquisitions between US carriers are also scrutinised by the US Congress. The US Congress exerts considerable influence over DOJ and DOT officials, because it retains the ultimate authority to modify laws on airline acquisitions, although it has

no official role on individual cases. The US Congress' primary objective is to preserve airline services for small communities (Mitchell and Carey, 2010 b.; Karp, 2007 b.).

US airline regulators intervene in different ways on airline acquisitions. First, the DOJ can block an acquisition process if it considers there are significant violations to anti-trust laws (Faithfull, 2007 a.). The DOJ can also demand that merged airlines relinquish a number of hubs and routes to potential competitors (Flint, 2010). In addition, US senators can require airlines to maintain services and hubs in specific states, otherwise their state general attorneys could file lawsuits against acquisitions that can significantly slow down the integration process in a merger, although lawsuits ultimately fail (Karp, 2007 b.).

The review process is complex and is influenced by volatile political considerations. During the first negotiation between Continental and United in 2007, the political environment was quite favourable to acquisitions (Carey, 2010 b.). Regulatory authorities acknowledged the necessity for capacity reductions in the US airline market, and considered that mergers were a better option for achieving cuts in capacity than the bankruptcy of the weaker US network carriers (Mifsud et al., 2010). Regulators assumed that bankruptcies were generally chaotic events that could reduce services to small communities and did not necessarily result in the rationalisation of the route networks. Conversely, mergers implied the control of airline managers in the reorganisation of the route networks and produced more favourable outcomes in terms of links to small communities and quality of services (Mifsud et al., 2010). In addition, the second Bush administration (2004-2008) supported the consolidation of large companies in general, in order to enhance the competitiveness of US companies in the global environment (Carey, 2010 b.). In this context, the merger between Delta and Northwest was approved in a relatively rapid way and with no significant conditions imposed on the carriers (Boehmer, 2010). However, in the second negotiation in 2010, the political conditions had changed because the first Obama administration (2008-2012) had shown no support for concentration among companies because consumers might be exposed to low quality of service and higher fares if competition among companies was reduced (Carey,

2010 b.). In addition, in the US Congress, Mr. Oberstar, Chair of the Transportation Committee, had pursued between 2008 and 2010, a strong campaign against consolidation through mergers in the airline industry because of the negative effects on the services to smaller communities (Reed, 2010 d.).

Continental and United would need to confront the adverse political conditions for the approval of their merger and expect a long review process (In-depth Interview 4, 2010; Shannon and Schofield, 2010). As mentioned for codesharing, DOJ had already negatively evaluated the anti-trust immunity for Star Alliance. DOJ has no formal authority in codesharing, but has full authority on mergers and acquisitions, hence, its previously negative opinion is likely to influence the review process (In-depth Interview 4, 2010; Mitchell and Carey, 2010 b.).

Nonetheless, Continental and United Airlines had the least overlap between their domestic networks among US carriers and planned to maintain the majority of the services for smaller communities through their regional subsidiaries. Furthermore, as mentioned above, rises in fares in the overlapping domestic routes could be minimised by the competition from low-fare carriers. Therefore, DOJ would have problems in supporting the total blockage of the merger between the two carriers (In-depth Interview 4, 2010; Ranson, 2010; Chon et al., 2010). DOJ could nonetheless make objections on the market dominance in substitutable routes in the transatlantic and transpacific networks as a result of the merger and could demand both carriers to relinquish slots to their competitors in the main international hubs, in particular in Los Angeles for Asia and in Newark for Europe (Shannon, 2010). The dismissal of slots could significantly hinder the benefits of the merger and offer room for competitors to develop their market offer in United and Continental's main hubs (In-depth Interview 4, 2010; Flint, 2010). Continental and United could therefore be exposed to delays in the merging process as well as reductions in available slots in key international routes as a result of DOJ rulings (In-depth Interview 4, 2010).

The consolidation of the fleets of Continental and United could produce a combination of ex-ante “indigestible assets” and higher operational costs (Chapter 6,

section 1). Continental's fleet was mainly formed by Boeing aircraft, whereas United flew a combination of Boeing and Airbus (Hinton, 2010 b.). Moreover, Continental had already chosen as long-capable aircraft the new Boeing B787 Dreamliner, whereas United had preferred the new Airbus A350 (Chapter 5, section 7) (Shannon and Schofield, 2010). Two different typologies of aircraft increased the operational costs in pilot training as well as maintenance. If United's Airbus aircraft were redeployed in Continental's airports, either additional infrastructure had to be set up for the line and light maintenance or the aircraft had to constantly fly back to United's maintenance centres (GAO Reports, 2010). In addition, the Boeing fleet of the two carriers were equipped with different engines, which implied more complex maintenance and larger, more costly inventory of spare parts in merging the fleet (Shannon and Schofield, 2010).

Operational costs in combining the fleets could be reduced if certain types of aircraft were phased out. First, the Airbus in United's fleet could be disposed of and the orders for the new Airbus A350 could be dropped. The disposal of Airbus could accompany the rationalisation of capacity in transatlantic routes (In-depth Interview 4, 2010; Hinton, 2010 b.). Furthermore, United's Boeing fleet was on average older than Continental's, hence the older United Boeings with different typologies of engines could be either disposed of following the cuts in capacity in domestic routes or gradually replaced with newer Boeings with compatible engines (In-depth Interview 4, 2010; GAO Reports, 2010). Nevertheless, the disposed fleet could become an "indigestible" asset (Chapter 6, section 1) for United and Continental in merging their operations. Traditionally, costs related to "indigestible" aircraft were minor because unneeded fleet capacity was easy to relocate to efficient second-handed markets. Indeed, during the first negotiation in 2007 between United and Continental, low-fare carriers Southwest Airlines and JetBlue immediately expressed interest in acquiring released aircraft following a merger deal (Faithfull, 2007 a.). However, during the second negotiation in 2010, the trading of aircraft had become more complex for a combination of different factors (In-depth Interview, 4, 2010; Tarry, 2010 b.). First, the economic recession and the consequent weaker passenger demand induced low-fare carriers to add no capacity and maintain their existing fleet. Low-fare carriers were important purchasers of second-hand aircraft from

network carriers in the US. Also, recent regulatory changes in the large second-hand aircraft markets of India, China, and Brazil had imposed most airlines in these countries to buy new aircraft. In conclusion, new generation aircraft from Boeing and Airbus with low fuel consumption (Chapter 4, section 7) encouraged the airlines to wait for new orders rather than acquire second-hand aircraft (In-depth Interview, 4, 2010; Tarry, 2010 b.). For these reasons, redundant aircraft following a merger could become significant “indigestible” assets for United and Continental and generate high ex-ante costs (In-depth Interview, 4, 2010).

Continental and United guaranteed to maintain their job levels after the merger in both negotiations, despite capacity reductions. A small number of redundancies were expected for headquarters administrative staff, nonetheless, both flying and airport staff were to be retained (Carey and Catan, 2010; In-depth Interview 2, 2007).

Nevertheless, in both negotiations, the workforce in both carriers immediately showed substantial concern about the merger, although it was explicitly communicated that no job cuts were planned (Schlangenstein et al., 2010; Tita and Meyer, 2006). The workforce in both carriers was primarily worried about the integration of seniority lists and pension schemes. Seniority lists determine career advancements and salary levels for the US airline workforce, and comply with different criteria that are difficult to integrate (Shannon and Schofield, 2010; Bachman, 2006).

Continental workers, in particular, feared the full union representation present in United Airlines’ workforce. The majority of Continental workers had long resisted union representation, hence had no union representatives in merger negotiations (Carey, 2010 d.). For this reason, a number of unions attempted to gain union membership in Continental by using the merger prospect (Carey, 2010 d.; Johnsson, 2006). Therefore, Continental was threatened with damaging its labour relationships and finding its workforce unionised at the end of the merger process (In-depth Interview 6, 2010; In-depth Interview 2, 2007). United unions also appeared to favour no merger. Union relationships with United Airlines management were

already damaged by several pay cuts, which unions were forced to accept in Chapter 11 bankruptcy status, and were unwilling to approve integration plans that inevitably led to seniority lists problems (Mitchell and Carey, 2010 b.; Tita and Meyer, 2006).

In addition, contracts for both carriers had to be renewed in 2010 and workers could employ the approval of the merger as a means to regain the salary increases that were blocked in 2007, as a consequence of high oil prices and economic recession (Carey, 2010 d.). United and Continental had no time to pre-negotiate an accord with labour representatives before agreeing the merger, therefore they had to deal with labour consultations in between the integration process, when labour disruptions could amplify the integration problems (In-depth Interview 6, 2010; Airline Business, 2010 b.).

As a consequence of negative labour reactions, the merger between United Airlines and Continental was exposed to major job disruptions and a critical impact on labour relationships for both carriers (In-depth Interview 6, 2010; In-depth Interview 1, 2007). United and Continental estimated that the overall costs for the labour settlement would amount to approximately US\$500m. in order to harmonise labour rates among the two carriers and offer labour incentives (Ranson, 2010).

The merger between United and Continental also entailed significant ex-post costs in terms of organisational diseconomies. United and Continental had to integrate operations that were dispersed across eight different hubs. The various hubs covered a different mix of regional, domestic and long-haul traffic that had diverse characteristics and needs. The connections between hubs and scheduling and frequencies for flights had to be coordinated in order to facilitate the flow of traffic between the two route networks (In-depth Interview 6, 2010).

In the second negotiation in 2010, Continental and United paid more attention to organisational issues than in the first negotiation in 2007. Continental and United had the opportunity to work together in codesharing and realised that organisational issues were more significant than expected (In-depth Interview 6, 2010). Codesharing included only the international flights, therefore, Continental and

United's management expected the organisational problems to escalate when operations in both domestic and international flights had to be fully integrated in the merger (In-depth Interview 6, 2010). For this reason, in 2010, Continental and United set up a Steering Committee with top-management representatives from both airlines that oversaw the Integration Management Office, which represented the main functions of the airlines to be integrated (Carey, 2010 c.). The first task of the Integration Management Office was to focus on the lessons to be learnt from the cooperation in codesharing (In-depth Interview 6, 2010).

Facilities integration could amplify organisational diseconomies. Continental and United had to integrate their maintenance operations even if they would gradually reduce the types of aircraft engines and dispose of the Airbus aircraft. United and Continental followed different procedures for maintenance that could increase the disruptions in maintenance integration. Continental accomplished most of its maintenance operations in its main hubs, whereas United employed minor spoke airports in order to exclusively concentrate on flying activities in its main hubs (In-depth Interview 4, 2010). Moreover, Continental accomplished in-house most of the aircraft modifications and heavy maintenance, while outsourcing most line and engine maintenance to original equipment manufacturers (OEMs) (Tegtmeier, 2010). Conversely, United contracted out its heavy maintenance work and accomplished line and engine maintenance in-house. United was also an active contractor of high-margin services for engines and landing equipment to other airlines, whereas Continental did not solicit maintenance works from other airlines (Tegtmeier, 2010). However, United and Continental could find synergies in combining their maintenance operations that could reduce the integration costs. Indeed, Continental could expand its heavy maintenance operations and incorporate United's Boeing aircraft, whereas United could reduce its client portfolio and accomplish its services for Continental's aircraft (In-depth Interview 4, 2010).

Additionally, as underlined for codesharing, Continental and United Airlines used different reservation protocols that had to be harmonised. After the merger, United and Continental had to adopt one system in order to eliminate potential disruptions in reservations. Amadeus appeared to be the most effective choice since Continental

and United planned to be members of Star Alliance in the long-term (In-depth Interview 4, 2010). During the second negotiation in 2010, Continental and United contacted Hewlett Packard to support Amadeus in the transition to the new reservation system (Fabey, 2010), whereas Apollo would be separated from United and run as an independent company (In-depth Interview 4, 2010). However, the implementation of the Amadeus reservation system could be a complex process and take 2-3 years to fully achieve because both carriers had to train their front-line employees and integrate a mix of outdated mainframe systems with outsourced technology from different providers (GAO Reports, 2010) (Chapter 4, section 6.1). Indeed, Continental extensively relied upon different providers in order to accomplish back-office and customer database activities (Jenner, 2009). During the transition period, problems would be expected, in particular, in the reservation area of large corporations, where United and Continental showed most incompatibilities (In-depth Interview 4, 2010).

The Continental and United merger was also confronted with significant financial issues. During the first negotiation in 2007, Northwest retained veto power if Continental attempted to merge with another airline, due to a special class of preferred Continental shares (Lengell, 2006). Northwest was likely to apply its veto to a Continental/United merger in order to avoid a major competitive threat originating from the merged airlines. Continental could nonetheless avoid Northwest's veto if it acquired United. Continental could convince United Airlines creditors only by offering a 25 percent cash premium above United Airlines share price, which corresponded to a total of approximately US\$14bn. (Tita and Meyer, 2006). Continental could have used US\$4bn. unrestricted cash from United Airlines to cover additional capital, but had to raise US\$10bn. from banks or private equity firms, increasing its already high debt (Chapter 8, section 1.2) and overall cost for capital.

In the second negotiation in 2010, Northwest had lost its veto power on Continental when it had merged with Delta (Field, 2009 a.), because its special class of shares could not be transferred to a new corporate entity, hence Northwest had agreed to

sell the shares back to Continental (In-depth Interview 4, 2010). Continental and United agreed to accomplish an all-stock merger with no premium in order to minimise the financial costs of the merger (Fugazy, 2010). The final share price for the exchange was debated at length because United had taken advantage of several share increases after the merger announcements with US Airways and then with Continental (Carey and Chon, 2010). In the end, the two carriers agreed to fix the share price on the previous 30 day average price, which prevented any major loss in equity value for Continental shareholders (Chon et al., 2010).

Continental and United estimated that the total costs for the integration process were approximately US\$1.2bn. (Shannon and Schofield, 2010), which were entirely balanced out by the expected benefits of the merger by 2013 (Ranson, 2010). However, the estimated costs assumed that no significant organisational diseconomies would emerge, no labour disruptions would occur, and the fleet could be disposed of at its market value (In-depth Interview 5, 2010). Therefore, the cost for the merger might be much higher and Continental and United could be exposed to cash flow problems as a consequence of the merger (In-depth Interview 5, 2010).

To summarise, during the first negotiation in 2007, Continental preferred to remain independent with no external merger approved in the US market (In-depth Interview 2, 2007; Faithfull, 2007 a.). Continental was well-positioned in the US market structure, and preferred to gradually add capacity by 5 percent-7 percent per year (Hensel, 2006). In addition, United had experienced poor financial and operational performances since 2001, despite its recent departure from Chapter 11 bankruptcy status and was required to significantly reduce its capacity on regional routes (Esterl, 2009 a.).

Continental started merger negotiations with United Airlines as a competitive defensive move in order to maintain its positioning in the US market (In-depth Interview 2, 2007; Field, 2007 a.). Continental considered that additional traffic and network economies of scope following codesharing with United Airlines were

inadequate to compete with a newly merged US carrier, and was therefore forced to negotiate a merger in order to increase its network scope. Considering the significant high ex-ante and ex-post costs in the merger as well as United's poor performances, Continental would have merged with United only if one other merger had been approved between US network carriers. Indeed, Continental abandoned its negotiations with United immediately after US Airways had announced the withdrawal of its merger proposal with Delta (In-depth Interview 2, 2007).

During the second negotiation in 2010, United had significantly improved its financial and operational performances since 2007. United had reduced its overall indebtedness by 20 percent and had increased its unrestricted cash by 35 percent while expecting to be back to profitability in 2010 (Carey, 2010 a.). Operationally, United had improved its service quality, had cut its unprofitable regional routes, and substituted a significant part of its oldest fleet (Casey and Chon, 2010). Therefore, financial issues and integration costs were much lower in comparison to the first negotiation. In addition, United and Continental had had the opportunity to work together in international codesharing and the cooperation was considered as very effective by both carriers. Continental's management had consequently softened their scepticism on United's management qualities and eased their doubts on future collaboration in the merger (In-depth Interview 5, 2010). Continental had also been negatively affected by the significant decline in business passengers in 2008 and 2009 and urgently looked for opportunities to enlarge its international network and reduce its operational costs (Chon et al., 2010). The merger with United represented a unique occasion to regain competitiveness and market share in the business segment and obtain more efficient operational levels (In-depth Interview 6, 2010). In conclusion, the merger between Delta and Northwest posed a competitive threat that Continental had problems to confront with its current size and scope, hence it had to rapidly expand and re-establish its competitive position in the US domestic and international markets (Chon et al., 2010). For all these reasons, despite the complex regulatory process and the significant costs, Continental chose to conclude the merger with United in 2010.

## SUMMARY

Main findings from the case study can be summarised as following:

### **1) United /Continental**

The codeshare between Continental and United profited from the limited route overlaps between connection and non-stop pairs as well as consistent route structures and positioning in domestic and international markets. Continental and United could offer a wide number of new route destinations and connections by linking their route networks. Codesharing also allowed the achievement of economies of scope by feeding business traffic into international destinations from the rich metropolitan passenger catchment areas of both carriers. In addition, the geographical proximity of the route networks favoured the links between spoke routes.

United and Continental chose to exclusively link their international routes within the broader Star Alliance umbrella because Continental preferred a more gradual approach to cooperating with United and had a clause in its pilots' contract that prevented revenue sharing in domestic routes. Revenue sharing was considered a priority to achieve the codeshare benefits. In international routes, Continental and United started a joint venture with Lufthansa and Air Canada Star members that resembled a virtual merger because it encompassed revenue sharing and structural cuts. The joint venture had received anti-trust immunity through a complex review process by the US Department of Transport. The codeshare between United and Continental was, however, affected by significant IT incompatibilities and differences in quality services between the two carriers.

The merger between Continental and United enabled the carriers to extend cooperation to domestic routes and rationalise their domestic route systems by

eliminating duplication and substituting spoke routes with direct connections. Scheduling and frequencies could be optimised in order to enhance the transfer traffic into international destinations.

In international routes, Continental and United could streamline their substitutable destinations and restructure their routes into primary and secondary destinations. Primary destinations would mainly develop towards Asia, where the carriers could offer non-stop connections. Conversely, secondary destinations would primarily encompass secondary European and Latin American destinations, where the carriers could employ narrow body Boeing and offer yearly services at lower operational costs. The extended global coverage, which United and Continental could jointly provide, offered new opportunities in the declining market of corporate accounts. The merger with United also allowed Continental to reduce its high operational costs.

In addition to economic motives, the merger between Continental and United was also considered as a defensive competitive move to mergers between other US network carriers. Competition from external mergers threatened Continental's market positioning, because the merged carriers could exploit higher market power and feeding traffic into international destinations that Continental could not match with its current network size and scope.

The merger between Continental and United was, nonetheless, exposed to a complex review process from the US regulatory authorities, which could be influenced by uncertain political issues. The US authorities were unlikely to stop the merger between United and Continental given the limited overlap between their route networks, however, they could impose the release of slots in major international airports to competitors of United and Continental that could compromise the benefits of the merger.

The merger between Continental and United was also affected by ex-ante and ex-post costs. The combined Continental and United fleet showed differences in terms of aircraft manufacturer and engine producer that could increase pilot training and

maintenance costs. United and Continental could eliminate the differences by gradually disposing of part of their fleet, however, the disposed fleet could become an “indigestible” asset because of the recent scarce demand in the second-hand aircraft market. In addition, the Continental and United Airlines workforce reacted negatively to the merger announcement because employees were concerned with the integration of seniority lists and pension schemes. Furthermore, non-unionised Continental staff feared their lack of union representation during merger negotiations in front of a fully-unionised workforce. Hence, Continental and United could be exposed to labour disruptions during the integration process. Merging United Airlines and Continental could also result in significant organisational diseconomies and problems in facilities integration due to the differences in maintenance organisation and reservation protocols.

During the first negotiation in 2007, Continental considered merging with United exclusively to maintain its strategic positioning in the US market after the announcement of possible US Airways’ takeover of Delta. Given the high costs of the merger and United’s poor financial and operational performances, Continental favoured remaining independent and gradually expanding its capacity in international markets with no other merger approved. Continental abandoned negotiations with United when US Airways withdrew its offer to Delta.

In the second negotiations in 2010, the costs of the merger were significantly lower because United had improved its financial and operational situation. The merger with United allowed Continental to recover its market positioning in the declining business market and lower its high operational costs in international markets. In addition, Continental had to rapidly expand its operations in order to counteract the Delta and Northwest merger. Therefore, Continental chose to conclude the merger with United notwithstanding the high integration costs and risks as well as the complex and uncertain procedures for the approval of the merger.

# **CHAPTER 9**

## **Easyjet Ltd. Case**

## INTRODUCTION

This case study evaluates the strategic relationships that Easyjet set up with other airlines between 2000 and 2010. This case exclusively includes codeshare agreements that encompass substantial network sections, in accordance with the research design in Chapter 6, section 1. Between 2000 and 2010, Easyjet established no codeshare agreements, and acquired Go, Deutsche BA, and part of GB Airways. Go and Deutsche were both British Airways subsidiaries, whereas GB Airways was a regional feeder of British Airways. In May 2002, Easyjet concluded the Go acquisition, and in September 2002 purchased from British Airways the option to acquire Deutsche BA by August 2003. In July 2003, Easyjet turned down its option for Deutsche BA and British Airways maintained its subsidiary. In October 2007, Easyjet accomplished the partial acquisition of GB Airways and secured the GB Airways' fleet and slots in London Gatwick airport. The GB Airways' slots in London Heathrow were excluded from the acquisition.

This case study includes two Sections. Section One reviews Easyjet's economic performances and strategic characteristics. Main events in Easyjet's history are outlined, followed by Easyjet's financial and economic results between 1995 and 2010. Easyjet adopts the low-fare carrier business model as part of the EasyGroup brand platform, nonetheless, it focuses on higher-quality airline services as compared to pure low-fare airline services and seeks to appeal to cost-conscious business travellers. Easyjet's marketing strategy revolves around web distribution and significant investments in advertising. Moreover, Easyjet successfully introduced additional services to primary airline offers in the attempt to differentiate its revenue sources. As the low-fare market approaches saturation in Europe, Easyjet primarily plans to diversify its expansion towards Continental Europe by connecting its existing European bases. Easyjet's financial performances and strategic goals are jeopardised by different threats. Easyjet is subject to direct and indirect competition

from British Airways and Ryanair. In addition, low-fare start-ups in Europe threaten Easyjet's market share and airport space. To conclude, growing costs in fuel endanger Easyjet's financial performance and strategic positioning.

Section Two analyses the acquisition process that Easyjet completed in Go and GB Airways. Costs and benefits for codeshare between Easyjet and Go are compared to costs and benefits for acquisition. Codesharing fulfilled no strategic objectives for Easyjet and added administration costs, therefore Easyjet proceeded to exclusively negotiate acquisition with Go. Acquisition benefits exceeded acquisition ex-ante and ex-post costs.

The acquisition of GB Airways is not included in the settings of this research because only minor connections of route networks are involved. Easyjet exclusively concentrated upon the slots in London Gatwick airport when acquiring GB Airways. Costs for the acquisition were limited and counterbalanced the strategic value of the slots in London Gatwick airport.

## METHODOLOGICAL REMARKS

This case evaluates the strategic relationships that Easyjet established with other carriers between 2000 and 2010. Embedded case studies are employed in this study (Chapter 6, section 4.4). Easyjet set up no codesharing agreements between 2000 and 2010; hence this case study exclusively comprises Easyjet's acquisitions.

The unit of analysis is therefore:

- 1) Easyjet's acquisitions.

The sub-units of analysis are:

- a) Go Fly acquisition by Easyjet in 2002.
- b) GB Airways acquisition by Easyjet in 2007.

Data is collected by employing three sources of evidence:

### *In-depth interviews:*

- a. In 2007, three video in-depth interviews were accomplished with three members of Easyjet's staff. All interviews were completed with Skype (©) instant messaging and VoIp software application, using video conferencing features. The interviews had the following timetable:
  - October 10, 2007, 14.00-16.00 In-depth Interview 1
  - October 11, 2007, 17.30-19.00 In-depth Interview 2
  - October 15, 2007, 16.00-17.30 In-depth Interview 3
- b. In 2010, three telephone interviews were completed with three members of Easyjet's staff. The interviews had the following timetable:
  - November 15, 2010, 11.00-12.30 In-depth Interview 4
  - November 17, 2010, 15.00-16.30 In-depth Interview 5
  - November 19, 2010, 10.00-11.15 In-depth Interview 6

*Documents and Archival Records:*

- a. Easyjet's company sources: Easyjet's Investor Reports 2000-2010, Easyjet's Annual Reports and Accounts 2000-2010, Easyjet's Corporate Information Pack 2004-2010.
- b. External sources: press material, such as Air Transport World, Airfinance Journal, Airline Business, Airline Industry Information, Aviation Week & Space Technology, published between January 2000 and October 2010 concerning Easyjet.

## 9.1. COMPANY CONTEXT

### 9.1.1 Brief History

Easyjet was established in October 1995 by Sir Stelios Haji-Iannou and officially started its operations on November 10, 1995. Sir Stelios Haji-Iannou was nominated Easyjet's chairman and CEO at the end of 1995 (Flight International, 2007). In March 1998, Easyjet established its presence in Switzerland by acquiring a 40 percent share of TEA Basel AG, which was re-branded as Easyjet Switzerland and moved its hub from Basel to Geneva (Easyjet, 2007 a.). Easyjet completed its Initial Public Offering (IPO) on the London Stock Exchange in October 2000. In May 2002, Easyjet acquired the low-fare company Go Fly from 3i (Noakes, 2002 a.). Sir Stelios Haji-Iannou resigned as Easyjet Chairman and CEO in November 2002 and was replaced by Mr. Ray Webster. Easyjet's institutional investors had previously asked Sir Stelios Haji-Iannou to resign before completing the Go acquisition (Air Transport World, 2002). In the same year, Easyjet placed the largest aircraft annual order in Europe by leasing 120 Airbus A319's and signing an option for an additional 120 A319's (Baker, 2002 b.). In October 2004, the FL Group holding, which owns Icelandair and Sterling airlines, purchased a 16.9 percent share in Easyjet (Scott and Flanagan, 2007). Analysts (Farber, 2007) presumed that the FL Group planned a takeover bid of Easyjet. Conversely, in April 2006, FL Group sold its Easyjet stake to different institutional investors (Farber, 2007). At the end of 2007, Easyjet acquired the majority of GB Airways, specifically; Easyjet secured the GB Airways' slots in London Gatwick airport and left the GB Airways' slots in London Heathrow to British Airways (Noakes, 2007 c.). In 2010, Easyjet distributed dividends to its shareholders for the first time since its IPO, under the increasing pressure from Sir Stelios Haji-Iannou and other Easyjet investors (Gill, 2010 b.).

At the end of 2010, Easyjet operated in 489 routes through 98 airports and covered 30 countries with 188 aircraft (Ferguson, 2010; Air Transport World, 2010 a.).

### **9.1.2 Corporate Performance**

Between 1995 and 2010, Easyjet continuously delivered positive operational and financial performances. With the exception of 1999 and 2000, Easyjet had reached positive pre-tax profits with 10 percent average growth per year (Gill, 2010 b.; Venkatraman, 2008). Easyjet achieved a pre-tax profit of UK£154.9m. in the period September 2009-2010, with a 181 percent increase as compared to September 2008-2009 (Marketing Week, 2010). Profits in 2010 resulted from improved financial results during the winter period, whereas Easyjet performed worse than expected during the summer season (Management Today, 2010). As compared to its first years of activities, Easyjet appears to minimise its losses during the winter periods, when short-haul leisure journeys decline in Europe by almost 70 percent on average (Marketing Week, 2010), thanks to the higher percentages of business passengers in its traffic composition (Tarry, 2010 a.) (Chapter 9, section 1.3). Business passengers are, in general, less sensitive to seasonal trends (Chapter 4, section 5.1). However, Easyjet tends to achieve less profit during the summer periods due to the average decline in leisure passengers, because of the weaker market conditions and increased capacity in the system (Marketing Week, 2010; Capell, 2007 b.).

Operating revenues were primarily driven by passenger numbers, which were up 23 percent during September 2009-2010 as compared to September 2008-2009 (Gill, 2010 b.). Passenger numbers generally increased in Europe due to a partial economic recovery and expanding demand for intra-European traffic (Dunn and Dunning-Mitchell, 2010). Nevertheless, European domestic expansion had almost reached its structural limit in Europe as Eastern European markets were increasingly covered by low-fare offers (Chapter 9, section 1.3) (Wall, 2010 b.). In addition, revenues grew

gradually less dependent upon passenger numbers because Easyjet had to reduce its average fares in order to maintain acceptable levels of demand during the recession period (Dunn and Dunning-Mitchell, 2010). Passenger growth was combined with high load factors in Easyjet. Load factors were on average 87 percent for September 2009-2010, nonetheless, Easyjet had to sustain load factors during the summer period by increasing promotional activity (Gill, 2010 b.).

Between September 2009 and 2010, Easyjet added 8 percent capacity to its network, for the second year in a row, less than its 15 percent capacity long-term growth objective (Chapter 9, section 1.3) (Gill, 2010 a.). Easyjet appeared to be more cautious in adding capacity to its network as a consequence of the market saturation in Europe (Dunn and Dunning-Mitchell, 2010).

Easyjet's total operating costs decreased by 11 percent in September 2009-2010 after three years of continuing cost increments (Marketing Week, 2010). Cost increments were primarily associated with increases in fuel expenses due to high oil prices during 2008 and 2009 (Chapter 4, section 4.2), despite Easyjet's extensive forward contracts on fuel price (Marketing Week, 2010). If fuel expenses are excluded, Easyjet reduced its costs by 6.4 percent per seat between 2007 and 2010 (Gill, 2010 a.; Pickett, 2008). Specifically, financing costs declined by 13 percent due to increases in percentages of owned aircraft versus leased aircraft (Marketing Week, 2010) and maintenance costs dropped by 14 percent as a result of the reduction in fleet variety (Chapter 9, section 1.3) (Air Transport World, 2010 c.). Conversely, personnel costs rose by 8 percent because Easyjet granted rises in salary rates and completed a major recruitment programme adding 450 cabin crew members in 2010 (Marketing Week, 2010).

### 9.1.3 Corporate Strategy

Easyjet's brand is part of the Easy brand platform, which was established by Sir Stelios Haji-Iannou in 1995. Easy brands are positioned as low-priced propositions with limited inconveniences and adequate quality standards as compared to the average discount offers (McAllister, 2001). In 2010, the Easy brand portfolio comprised 15 brands, including Easyjet, which were launched at different stages by the EasyGroup investment vehicle and covered diversified fields, such as Internet cafes, toiletry products, business office spaces (Parsons, 2010). Sir Stelios Haji-Iannou financially supports new Easy brands at the beginning of their activities and attempts to settle the right business model (McAllister, 2001). Additionally, Sir Stelios Haji-Iannou provides extensive publicity and media coverage for new brands, given his innovative and controversial approach to business.

Easyjet's brand is licensed from EasyGroup. EasyGroup has the right to appoint a coordinator to monitor how Easyjet uses its brand as well as retract its brand license from Easyjet with three years' notice (Rogers and Arnold, 2002). In the original license agreement, Easyjet had to generate at least 75 percent of its revenues from core airline activities and was restricted to form co-branding agreements with other companies (Parsons, 2010). Easy brands normally pay fees to EasyGroup for using the brand name. Nonetheless, Easyjet was exempted to pay royalties to EasyGroup when it accomplished its Initial Public Offering (IPO) in 2000 (Chapter 9, section 1.1), for its contribution in terms of Easy brand recognition and publicity (Campaign, 2002). Sir Stelios Haji-Iannou resigned as chairman and CEO in Easyjet in November 2002, after accomplishing Go acquisition, as recommended by Easyjet's institutional investors (Chapter 9, section 2.2). Nevertheless, in 2010, Sir Stelios Haji-Iannou was still Easyjet's main shareholder (Air Transport World, 2010 c.), since he had increased his share from 15.6 percent during the Easyjet IPO in 2000 to 26.9 percent in 2008 (Ezard, 2008 d.). Between 2008 and 2009, Sir Stelios Haji-Iannou protested several times against Easyjet's diversification into hotels' and credit

cards' fields under the Easyjet's brand (Marketing, 2010 a.; Brownsell, 2008), because Easyjet competed directly with other EasyGroup companies and allegedly breached the licence restrictions for non-core airline activities (Marketing, 2010 a.). The dispute between Sir Stelios Haji-Iannou and Easyjet was settled in 2010 when EasyGroup released Easyjet from its restrictions on non-core airline activities and granted Easyjet the exclusive global right to use its own brand and establish co-branding agreements (Parsons, 2010). In addition, Sir Stelios Haji-Iannou relinquished his right to be appointed as chairman of Easyjet. In exchange, Easyjet agreed to pay EasyGroup 0.25 percent of its revenues and UK£300,000 every year (Travel Trade Gazette, 2010).

Brands that are involved in the travel and tourism industries in EasyGroup – namely Easyjet, EasyHotel, EasyCar, EasyBus and EasyCruise – generally performed satisfactorily (Brownsell, 2010; Reynolds, 2007). Consumers are given the opportunity to design their own holiday packages at reasonable prices choosing among different options. Specifically, Easy travel brands compete in the segment for short holiday breaks in the European market against traditional holiday organisers with established travel packages (Clark, 2006).

Conversely, other brands in EasyGroup achieved disappointing financial and economic results over the years and EasyGroup was forced to withdraw its brands in numerous industries. EasyInternet suffered the worst by losing UK£139m. between 2000 and 2002 before its bankruptcy in 2003, and EasyCar lost UK£41m. in the same period before being exclusively associated with Easyjet's airline services (Kroll, 2004).

Easyjet bases its strategy on the airline low-fare business model (Chapter 4, section 8.2) in compliance with the EasyGroup brand platform concept. Easyjet seeks to minimise costs in different areas and offers airline services at substantially lower fares to short-haul destinations (Gray, 2010; Travel Trade Gazette, 2007).

Easyjet however differs from pure low-fare business model because it seeks to provide higher-quality products to its consumers than pure low-fare counterparts, such as Ryanair (Dennis, 2007). Indeed, Easyjet locates its route nodes in primary airports for at least one leg of the journey, rather than flying in secondary airports and exploiting airport subsidies (Parsons, 2002). Easyjet also invests valuable resources in service features. Easyjet builds frequencies on its routes and links its existing destinations in order to increase its network scope and density (Bainbridge, 2007). In conclusion, Easyjet competes with network carriers for prime-time slots in primary airports in order to offer convenient scheduling to its customers (Gray, 2010; Ball, 2007). Nevertheless, Easyjet selected specific areas to reduce its services in order to keep its costs low. Easyjet maintains flight and cabin crew on-board to a minimum and minimises salaries and training for its staff in order to improve its productivity (Dennis, 2007). Support services, such as catering and ground handling, are contracted out and Easyjet looks for cost advantages rather than quality from its contractors (Arnoult, 2010; Stewart and Michaels, 2003).

Easyjet employs a simplified price policy in order to reduce administrative costs and minimise web distribution problems. Easyjet's prices are fixed according to the booking time with no class distinctions in the aircraft (Cohen, 2010). Tickets are non-refundable; nonetheless, in 2005, Easyjet introduced separate charges to obtain higher flexibility on ticket refunds (Michaels, 2007).

Easyjet specifically targets the business segment in its marketing strategy. In 2010, Easyjet gained approximately a 20 percent share of its passengers in the business travel segment (Gill, 2010b.). Easyjet capitalises upon the increasing preference for business travellers to fly economy class in short-haul destinations in an effort for companies to reduce their travelling costs (Chapter 4, section 5.1) (Tarry, 2010 a.). Easyjet positions its product against network carriers, which fix high prices in short-haul markets for mid-week roundtrips (Sparaco, 2007 b.). Business passengers are primarily attracted by Easyjet's low fares, broad network scope, and high frequencies at primary airports (Tarry, 2010 a.; Huse and Evangelho, 2007). Easyjet plans to expand the business travel segment by 3-5 percent between 2011 and 2013, with an

emphasis on the French and Swiss business markets, where the market penetration for low-fare carrier is lower than the United Kingdom (Gill, 2010 b.).

Easyjet developed specific strategies for targeting business customers. In 2010, Easyjet introduced a flexible fare that allows the passenger to rearrange the air journey any time between one week before to three weeks after the date of departure (Hayhurst, 2010) (Chapter 4, section 5.1). Moreover, Easyjet introduced additional service features for small surcharges, such as speedy boarding, online check-in, and generous hand-baggage allowance (Ferguson, 2010; Bainbridge, 2007). In conclusion, Easyjet retained Go Fly offers toward business passengers after acquisition, which included groups' business bookings and key account management (Chapter 9, section 2.1) (Conference & Incentive Travel, 2002).

Easyjet extensively employs the Internet for its bookings (Harrison, 2010). Distribution strategy is crucial in keeping Easyjet's operational costs low and offering high-quality services. Easyjet's web-reservation system is particularly inexpensive to administer because Easyjet offers a simplified pricing policy in one cabin class (Cohen, 2010). Conversely, network carriers, such as Easyjet's main competitor, British Airways, have difficulties in achieving cost reductions by web distribution because they offer multiple classes and several levels of refunds with numerous aircraft typologies (Kumar, 2006). In 2008, Easyjet chose to broaden its distribution channels to Computer Reservation Systems (CRS's) (Chapter 4, section 6.1), which are primarily employed by corporate accounts for business travel booking. In 2010, Easyjet had established links with the three main CRS channels in the UK, namely Amadeus, Galileo, and Sabre (Harrison, 2010), and accomplished half of the reservations for business passengers with CRS channels (Ferguson, 2010). Easyjet plans to maintain the distribution towards the leisure segment with its own website and employ the CRS distribution exclusively for business passengers. Nonetheless, Easyjet charges high fees for CRS bookings and carefully selects the corporate accounts and travel agencies to add to its CRS network in an effort to limit its distribution costs (Cohen, 2010). Indeed, Easyjet allows business travellers to

book its flexible fares exclusively through CRS in order to reduce the complexities in the website administration (Cohen, 2010).

Easyjet continuously introduced innovative elements in its web distribution. In 2010, Easyjet implemented a dynamic packaging web interface on social networks (McEleny, 2010), where users can make holiday plans with their friends on the social network and coordinate dates and availability (Campaign, 2010). Easyjet also plans to develop a specific site for mobile phones, where customers can book their flights and constantly check for updates on their flights (Shields, 2010).

Easyjet also changed its approach to promotional strategies over the years. Easyjet established its brand by exploiting free publicity from Sir Stelios Haji-Iannou's statements in the press, as well as producing innovative advertising in-house. However, the marketing strategy changed when Mr. David Magliano was appointed Director of Marketing after the Go acquisition in 2002 (Johnson, 2002 b.) (Chapter 9, section 2.1). Mr. David Magliano, previously Go Director of Marketing, realised that the combined airline required systematic advertising methods for competing in diverse markets. Consequently, in 2005, Easyjet appointed Ogilvy Advertising to produce Easyjet's advertising (Reynolds, 2007), which applied standardised promotional strategies, and invested significant resources in advertising as part of its marketing strategy (Dunn and Dunning-Mitchell, 2010).

Between 2005 and 2010, Easyjet introduced ancillary services to basic airline flights in its marketing offer. Easyjet brought in additional services in order to effectively satisfy its passengers' needs, such as advanced seat assignments, rapid boarding, and fast-track parking on airports (Ferguson, 2010; Michaels, 2007).

Easyjet has no plans to introduce its own frequent flier scheme (Chapter 4, section 5.2) because the scheme entails excessive administrative problems for Easyjet's simple low-fare business model (In-depth interview 4, 2010). Nonetheless, in 2010,

Easyjet launched for a small additional fee the Easyjet Plus Card, which includes rapid boarding, one checked luggage, and allocated seating (Ferguson, 2010).

Additionally, Easyjet extended its offer in the short-haul holiday segment by establishing in 2010 a three-year agreement with Low Cost Travel Group, which is the third package holidays' agency in the UK after Thomas Cook and Tui Travel (Grat et al., 2010). The agreement implies that consumers would be able to book Low Cost Travel Group's holiday packages on Easyjet's own website and Low Cost Travel Group would allocate part of its transfers on Easyjet's flights (Gray and Griffiths, 2010). Easyjet aims to target young consumers looking for simple and affordable package holidays. Indeed, young consumers recognise the drawbacks in making separate reservations on the web and increasingly rely upon web travel agents for their holiday planning (Huxley, 2010).

Ancillary services play a significant role in terms of revenues and profits for Easyjet. Easyjet reported a 19 percent contribution from ancillary services on average airline fares between September 2009-2010, up from 11 percent in the corresponding period September 2008-2009 (Edwards, 2010). Ancillary services also allow Easyjet to insulate cyclical and seasonal downturns and appear to have scope for expansion in the near term (Ferguson, 2010). Nevertheless, this source of revenue is limited in the long-term because opportunities for additional services will inevitably terminate and passenger spending will rapidly approach the limit (Tarry, 2010 a.). In addition, Easyjet jeopardises its brand equity by extending its brand to holiday offers because Easyjet gets increasingly associated with traditional tour operators (Gray, 2010).

Easyjet applied a model of organic expansion for its operations. Easyjet constantly fulfilled its objective of expanding by 15 percent rate per year between 1998 and 2008, with the only exception being for the Go acquisition in 2002 (Chapter 9, section 2) (Wall, 2010 b.; Fair Disclosure Wire, 2007 b.). Easyjet assumed that organic growth minimised operational disruptions and kept costs under control (In-depth Interview 1, 2007).

Easyjet took in large part the advantage of the significant growth that the low-fare airline sector experienced in Europe. Between 2002 and 2007, the low-fare sector grew by 35 percent on average per year (Bainbridge, 2007). Nevertheless, between 2008 and 2010, growth rates for the European low-fare sector got closer to 10 percent due to the recession period (Tarry, 2010 a.) and are projected to slow down in the future as the low-fare segment approaches saturation and new markets in Eastern Europe get covered by low-fare offers (Wall, 2010 b.). Furthermore, in 2009, the Easyjet growth strategy was questioned by Sir Stelios Haji-Iannou and a number of Easyjet investors, who argued that Easyjet should focus on improving financial dividends to its shareholders rather than prioritising growth objectives (Wall, 2010 b.). Easyjet had not distributed any dividends to its shareholders since its IPO in 2000 (Chapter 9, section 1.1) and had invested its profits (Chapter 9, section 1.2) in increasing its capacity and airport bases (Wall, 2010 b.). Easyjet's shareholders put increasing pressure on Easyjet's managers and at the end Easyjet chose to distribute dividends in 2010 and slow down its growth to 5 percent between 2009 and 2011 (Gill, 2010 b.).

In addition, Easyjet set out to diversify its expansion in different directions. In particular, Easyjet plans to deploy supplementary capacity on Continental European bases, specifically in France and Switzerland (Dunn and Dunning-Mitchell, 2010). Conversely, Easyjet intends to gradually reduce its growth rate on its core segment of UK to European destinations, where it seeks to exclusively maintain its market share in the long-term, and slowly diminish its investments in UK domestic routes, where little growth is expected (Dunn and Dunning-Mitchell, 2010). Easyjet also concentrates its expansion on connecting its existing European bases, rather than offering new bases, and adding frequencies on its existing routes (Schofield, 2010). In this way, Easyjet broadens its network offer and controls promotional costs, which increase when expanding into new bases.

Dunn and Dunning-Mitchell (2010) outline that Easyjet may consider expanding into the long-haul segment in the future when opportunities for growth in short-haul decline. Easyjet was indeed the first short-haul low-fare to accomplish a transitional step into long-haul by offering middle-range flights from Europe to Northern Africa in 2007 (Gill, 2006). Nonetheless, Easyjet dismissed speculations of expansion into long-haul, and underlined how Easyjet would maintain its core business model and will limit its flights to 3-4 hours, where in-flight services can be kept to the minimum (Harrison, 2010).

Easyjet's fleet is designed to fulfil the requirements for low-fare short-haul operations. Easyjet's fleet comprises exclusively three aircraft types with simple configurations on-board in order to increase economies of scale on maintenance and ground handling as well as facilitate one-class in-flight services (Arnoult, 2010; Travel Trade Gazette, 2006). Easyjet outsources all its heavy maintenance on aircraft, components, and engines, and accomplishes light maintenance operations only in its London airports (Arnoult, 2010).

In July 2010, Easyjet was formed by 149 Airbus 319-100's, 15 Airbus 320's and 10 Boeing 737-700's (Air Transport World, 2010 a.). Easyjet, however, differs from established low-fare carriers because it included in its fleet, two aircraft manufacturer brands: Airbus and Boeing. Easyjet was first among low-fares to establish a major agreement with Airbus, which completely changed Easyjet's growth model (Baker, 2002 b.). In 2002, Easyjet ordered from Airbus 120 A319's, to be delivered within a 7 year period, and secured an option for another 120 A319's (Baker, 2002 b.). Easyjet abandoned the established low-fare business model, which supported one aircraft manufacturer brand (Chapter 4, section 8), nonetheless, the Airbus deal allowed Easyjet to cut operational costs by 10 percent (Daily Telegraph, 2002).

Easyjet's fleet expansion exclusively focuses on converting Airbus options in deliveries in order to fulfil Easyjet's growth objectives. Easyjet terminated orders on Boeing aircraft after the deal with Airbus in 2002, nevertheless, Easyjet will keep its

Boeing fleet until Boeing leases expires in 2011 (Air Transport World, 2010 a.; Fair Disclosure Wire, 2007 b.).

Easyjet's main airport bases are located in the London passenger catchment area. Easyjet started its operations from Luton, where it positioned its headquarters. After acquiring Go, Easyjet chose to maintain and expand its headquarters in Luton, where Go employees were re-allocated (Chapter 9, section 2.1) (Harrison, 2002 b.). Easyjet also kept significant capacity in London Stansted airport, which was Go's main hub, where it competed directly with Ryanair and emergent low-fare start-ups (Campbell, 2002). Easyjet also took advantage of British Airways' strategy to withdraw capacity from London Gatwick airport and replaced British Airways slots (Mason and Alamdari, 2007). In addition, Easyjet acquired GB Airways at the beginning of 2008, primarily to obtain slots in London Gatwick (Chapter 9, section 2.2) (Noakes, 2007 c.). Between 2003 and 2007, London Stansted was the key centre for airline low-fare development in Europe, nonetheless, starting from 2008, London Gatwick gradually substituted London Stansted in the expansion towards continental Europe. Easyjet plans to keep its three London bases indefinitely and focuses its expansion in London Gatwick in the long-term (Harrison, 2010). In addition, from April 2012, Easyjet intends to open a new airport base in Essex, in the Southend of London, and fly on average 10,000 passengers per week primarily towards tourist destinations in Spain, Italy, and Northern Africa (Calder, 2011).

Easyjet is exposed to different strategic threats in fulfilling its economic and structural objectives. First, Easyjet is under increasing pressure from emergent low-fare airlines starting up in Europe. Positive financial results in Ryanair and Easyjet during their years of activities inspired numerous low-fare imitators, particularly in Eastern Europe (Dunn and Dunning-Mitchell, 2010). Proliferation of low-fare airlines results in increasing competition for market share and airport space, and lowers operational efficiency in congested secondary airports (Bokaie, 2007). Nonetheless, between 2008 and 2010, many smaller low-fare carriers in Europe went

bankrupt due to the economic recession, releasing capacity and competitive slots (Dunn and Dunning-Mitchell, 2010). In addition, Easyjet is subject to British Airways' direct competition in its core markets (Jasper and Rothwell, 2010). British Airways modified its strategy as a reaction to the presence of Easyjet, and concentrated on long-haul flights, where low-fare competition is limited (Chapter 4, section 8). Nevertheless, in the short-haul market, British Airways started to imitate low-fare best practices, such as electronic ticketing and web distribution. Moreover, British Airways applied aggressive price strategies on economy class by matching low-fare price levels on a percentage of seats, and maintained the majority of short-haul landing slots in the convenient London Heathrow airport (Jasper and Rothwell, 2010). British Airways' strategy specifically threatened Easyjet's UK-Europe destinations, although British Airways increasingly reduced capacity on numerous flights towards Europe and allowed Easyjet to gain additional market share in different markets (Jasper and Rothwell, 2010).

Ryanair and Easyjet compete only indirectly, since Ryanair chooses secondary airports, whereas Easyjet is located in at least one primary airport per journey. Nonetheless, Ryanair and Easyjet are positioned in the same passenger catchment areas and contend for the leadership of the European low-fare market (Gray, 2010; Bokaie, 2007). In the last few years, Ryanair has maintained a strict low-fare model in its business operations, whereas Easyjet has chosen to differentiate its business model and include elements that are commonly employed by network carriers (Gray and Griffiths, 2010). Easyjet could, nevertheless, jeopardise its brand identity as a low-fare airline and lose its strict focus on cost controlling, which in the long-term may decrease its core advantages over Ryanair (Gray, 2010).

Significant rises in costs also threaten economic performance for Easyjet. Prolonged high levels of fuel prices, which were recorded in 2007 and 2008 (Chapter 4, section 4.2), impact, in particular, on low-fare operations because fuel costs are proportionally higher on total costs (Pickett, 2008). If fuel prices maintain high levels, the low-fare business model will require major adjustments. Easyjet is unlikely to modify its existing offer in the short-term, because its strategic

positioning allows it to increase fares and cover fuel costs, nonetheless, Easyjet will have to re-assess its strategies in the longer term if oil prices severely increase (Dunn and Dunning-Mitchell, 2010).

## 9.2. EASYJET STRATEGIC RELATIONSHIPS

### 9.2.1 Easyjet – Go

In 1998, British Airways established its low-cost unit Go. British Airways reacted to the competitive threat from low-fare carriers and got into the budget air segment (Graf, 2005). Go was an one-hundred-percent subsidiary of British Airways, but had a separate brand and management, with British Airways exclusively performing central administration functions.

Go initially launched its operations from Stansted airport in London, where Go had established its headquarters, and subsequently expanded to Bristol in May 2001. Go offered identical destinations to British Airways, although its destinations originated from London Stansted rather than London Heathrow and Gatwick (Graf, 2005). At the end of 2001, Go offered 36 scheduled services in Britain and mainland Europe with a fleet of 24 Boeing 737-300's (Bond, 2002). In comparison, at the end of 2001, Easyjet operated 40 routes with a fleet of 31 Boeing 737-300's and 737-700's (Cochennec, 2002). Go incurred £40.1m losses in its first two years of activities and gained £4m. gross profit in 2000-2001 and £17m gross profit on £233.7m revenues in 2001-2002 (Air Transport World, 2002). Total passengers in Go rose from 1.88m to 4.3m between 1999 and 2002 (European Venture Capital Journal, 2002).

In 2000, British Airways proceeded to sell its low-fare subsidiary Go. Internal sources (European Venture Capital Journal, 2002) confirmed that British Airways planned to focus on its core activities, and Go operations cannibalised British Airways existing market, rather than opening up new opportunities. Additionally, at the time of the disposal, British Airways had no possibility to predict the September

11, 2001 terrorist attacks and the following economic decline in the aviation industry.

British Airways at first contacted Easyjet and offered Go for between UK£145m. and UK£160m. exclusively in cash (Parsons, 2002). Easyjet refused the offer from British Airways. Reasons for Easyjet's refusal will be explained at the end of the case. Subsequently, KLM approached British Airways, and made a bid for acquiring Go and then merging it with KLM's British low-fare subsidiary Buzz (Graf, 2005). British Airways refused KLM's offer because Buzz and Go's combined operations could threaten British Airways positioning in the London market (Graf, 2005).

In February 2001, British Airways accepted a bid for Go from 3i venture capitalists (Hotten, 2002). As part of a £110m. deal, 3i and Barclays Private Equity bought a .5 percent share in Go, and Go top management acquired the remaining 22.5 percent share (European Venture Capital Journal, 2002), with Go Chief Executive Mrs. Barbara Cassani getting a 4 percent share (Hotten, 2002). In May 2002, Easyjet announced the purchase of Go from 3i and Go management for £390m. (Noakes, 2002 a.). Acquisition costs were estimated to be £276.7m., since Go's available cash amounted to £113.3m. (Bond, 2002). Easyjet covered acquisition costs through a share rights offering (Bond, 2002).

In-depth interview 1 (2007) and In-depth Interview 4 (2010) confirmed that Easyjet exclusively evaluated acquiring Go but did not consider establishing any codesharing agreements with the British Airways subsidiary. Easyjet estimated that only acquisition could fulfil its strategic objectives, and integration benefits were superior to integration costs. Conversely, codesharing with Go delivered no significant economic and strategic advantages, hence Easyjet did not include codesharing in its negotiations with Go and British Airways management.

In the following section, codesharing advantages and costs will be summarised, followed by acquisition benefits and costs.

### 9.2.1.1 Codeshare between Easyjet and Go

Carriers that apply a low-fare business model (Chapter 4, section 8) need to rapidly enlarge their operations as well as increase their passenger totals in order to maintain satisfactory levels of profitability (Bevens, 2007; Pilling and O'Toole, 2002). Low-fare carriers have, on average, modest margins because fares are fixed low by reducing operational costs and profits per ticket. Additionally, low-fare carriers have generally more limited resources than established network carriers when they enter into new markets (Kangis and O'Reilly, 2003). Therefore, low-fare carriers need to rapidly gain high traffic levels, otherwise, their low-margin operations can absorb their limited resources (Tarry, 2010 a.; Dennis, 2007). High traffic levels should also match high load factors, i.e. high ratios of revenue passenger miles to available seat miles, in order to keep costs low (Kangis and O'Reilly, 2003). Low-fare carriers have to rapidly establish their market presence when starting their operations, otherwise they incur financial and economic problems (Sobie, 2010; Gillen and Morrison, 2003).

Low-fare carriers can secure high traffic levels by either creating new market opportunities or taking over market share from network carriers in the short-haul segment (Bond, 2002). Gillen and Morrison (2003) argue that low-fare carriers are "market makers" because low airline fares attract consumers that otherwise would not travel or would choose alternative means of transport to air. Low-fare carriers have to rapidly build up loyalty among consumers that use low-fare services for the first time (Gillen and Morrison, 2003). Moreover, low-fare carriers can challenge network carriers' existing markets. In 2002, low-fare carriers could take advantage of the financial and economic problems that network carriers experienced in the aftermath of September 11, 2001 terrorist attacks (Chapter 4, section 1.2) (Bond, 2002). Indeed, low-fare carriers could rapidly establish their presence in the short-haul market since business and leisure passengers grew sensitive to pricing issues due to the general economic recession in 2002 (Noakes, 2002 a.). Also, network

carriers were unable to redeploy resources to counteract low-fare offers (Bond, 2002).

The necessity for rapid growth for low-fare carriers is also explained by the structural limits on low-fare airline services. In 2010, the low-fare market share represented approximately 30 percent of the overall aviation market in Europe and was estimated to be close to the structural limit (Wall, 2010 b.). In 2002, the low-fare carrier market share amounted to 7 percent (Dennis, 2005). Moreover, the number of large low-fare carriers, which the European market can sustain, is projected not to be higher than two or three (Dunn and Dunning-Mitchell, 2010). Nevertheless, low-fare carrier growth is supported in the long-term by growth in total traffic in Europe. By 2015, traffic in the European route system is estimated to amount to 600m. passengers, from 250m. in 2002 and 380m. in 2010 (Wall, 2010 b.).

Easyjet had to conform to sustained growth requirements as a low-fare carrier, hence it sought to rapidly develop its operations and establish its presence in the European market. According to Easyjet sources (Arends, 2002; The Independent, 2002), in 2002, Easyjet had already established its objective of growing by 15 percent per year between 2002 and 2008 in order to consolidate its presence in the British market and expand its operations in continental Europe (Chapter 9, section 1.3).

As underlined in Chapter 6, section 1.1, codesharing allows exclusive access to route lines, and allied airlines can independently assign fractions of traffic to its partners on the codeshared routes. Therefore, a codesharing agreement did not guarantee the rapid growth rate that Easyjet pursued, because Go could vary assigned traffic over time in codeshared routes (In-depth Interview 4, 2010; In-depth Interview 1, 2007).

However, Easyjet and Go had complementary route networks and consistent market positioning (Euroweek, 2002). Easyjet could get access by codesharing with Go to important destinations in continental Europe, such as Munich and Prague, which were favoured by business travellers (Cattell, 2002). In addition, Go was already

well-established in several cities in Spain and Italy, where Easyjet had difficulties positioning its offer. Spain and Italy were key tourist destinations (Economist, 2002), where Easyjet could gain market share from charter services (Chapter 4, section 8.3).

Easyjet and Go also had similar business models (Bowermaster, 2002). Go was established by British Airways to counteract growing competition from low-fare carriers, and was developed on Easyjet's model (Cochennec, 2002). Go closely resembled Easyjet because it mostly flew to major airports and offered high frequencies in order to target business passengers with convenient scheduling (Cochennec, 2002). Route complementarities with high frequencies and access to main airports increased codesharing benefits.

Nevertheless, Easyjet maintained the Southwest formula of offering no scheduled connecting services in order to reduce operational costs (Sparaco, 2007 b.). Additionally, Easyjet avoided the complexities of long-haul flights and exclusively offered short-haul destinations (Moore and Dunn, 2010). As a consequence, codesharing with Go granted no feeding traffic into long-haul routes and economies of scope were therefore restricted. Scattered networks with no connecting destinations also implied minor density traffic advantages (In-depth Interview 2, 2007).

Parallel routes between Easyjet and Go were limited. Easyjet and Go exclusively overlapped in the Northern Irish-Scottish routes in Britain and had no overlap on continental European routes (Noakes, 2002 a.). Furthermore, overlapping routes were located in markets where the business travelling segment was not significant and additional frequencies delivered irrelevant competitive benefits (Noakes, 2002 a.).

Easyjet's business concept is primarily based on operational simplicity and straightforward market positioning. Easyjet's operations were developed where both demand was strong and high frequencies could attract high percentages of business

travellers, in order to increase cost efficiencies (Tarry, 2010 a.; Parsons, 2002). Codesharing with Go added managerial complexity to Easyjet's operations and introduced organisational diseconomies into the simple Easyjet model (In-depth Interview 5, 2010; In-depth Interview 2, 2007).

Major incompatibilities in distribution intensified organisational diseconomies in codesharing. As underlined in section 1.5, Easyjet concentrated on ticket distribution through the Internet (Harrison, 2010; Dobruszkes, 2006). In 2002, the percentage of web sales amounted to 85 percent (Cochennec, 2002), which was high even for the low-fare business model. In 2002, European web sales for low-fare carriers amounted on average to around 60 percent, whereas Southwest web sales amounted to 30 percent (Economist, 2001). Conversely, Go adopted a diversified distribution policy with 35 percent web sales, and in September 2001 had established a distribution agreement with Galileo Computer Reservation System (CRS) (Chapter 4, section 6.1), in order to trade its tickets through travel agencies independently from British Airways (Noakes, 2002 b.). Two different distribution approaches increased organisational diseconomies in codesharing (In-depth Interview 6, 2010; In-depth Interview 1, 2007).

To summarise, in Easyjet and Go codesharing, the additional managerial complexities on the simple low-fare business model were not compensated for by the alliance's limited economic and competitive benefits. For this reason, Easyjet did not consider codesharing in negotiating at first with British Airways and subsequently with Go management.

### 9.2.1.2 Go Acquisition by Easyjet

Go acquisition primarily offered growth opportunities to Easyjet (Taylor, 2007 b.; Blackrew, 2002). As mentioned before, low-fare carriers are required to rapidly expand in order to be profitable in the long term. Sir Stelios Haji-Iannou, founder and in 2002, chairman of Easyjet, underlined that “the rate at which we want to expand is beyond the limit of safe organic growth [...] we need to acquire Go for keeping our growth assumptions” (The Express, 2002, pp. 47). Easyjet could expand into new routes by acquiring Go with no risks and delays, which were related to investing into a new infrastructure (O’Connor, 2002), because acquisition implied full and indefinite access to route lines (Chapter 6, section 1.2).

Furthermore, Go had an existing market base that Easyjet could exploit. Consumers showed inertia and high risk perception towards low-fare services, hence low-fare carriers required a long time to establish their presence in new markets (Kangis and O’Reilly, 2003). New destinations also demanded significant initial promotional investments. Easyjet avoided consumer inertia and promotional costs by taking advantage of Go’s existing consumers (In-depth Interview 1, 2007).

Go offered Easyjet both higher market share in the British market and access to numerous destinations in continental Europe (Richardson, 2002). In 2002, few European cities were served with low-fare connections (Daily Post, 2002), although European markets were difficult to penetrate because of competition from high-speed railway and highway systems as well as established charter airline operations (Sparaco, 2002).

Easyjet’s plans for growth were also threatened by the lack of available airport slots (Lawton, 2002). Before deregulation in EU aviation space in 1995 (Chapter 4, section 3.2), slots in European airports were preferentially assigned to domestic flag and regional carriers (Wigham, 2005). European flag carriers therefore maintained

control of most slots in the main destination airports, given the “grandfather rights system” for slots (Chapter 4, section 7.2). According to the “grandfather rights system”, carriers can lose control of their slots only if they make no use of them for a prolonged period of time (Moore, 2009).

Easyjet differentiated its offer by providing destinations to main airports (Chapter 9, section 1.3), hence the access to prime-time slots endangered Easyjet’s growth strategy. Easyjet had repeatedly applied for slots in Paris Charles de Gaulle and London Gatwick airports (Boles, 2002), but failed to obtain its required slots. Indeed, both Air France and British Airways refused to hand over slots that they no longer used (Travel Trade Gazette, 2002 a.). For this reason, Easyjet applied for 20,000 annual slots in Paris Orly secondary airport and dismissed Paris Charles de Gaulle (Travel Trade Gazette, 2002 b.). Go’s acquisition secured for Easyjet both full control on route lines and access to route nodes (Chapter 6, section 1), i.e. slots in markets where Easyjet was positioned. Additionally, Go and Easyjet competed between themselves for landing slots, hence Go’s acquisition lessened the pressure on slots for Easyjet (Parsons, 2002).

As mentioned before, Go had established its operational base in London Stansted airport, where it controlled numerous slots (Economist, 2002). Easyjet could add a third main base in London Stansted by acquiring Go, after its bases in Luton and London Gatwick (Harrison, 2010; Campbell, 2002). London Stansted was well-positioned in the London market, nonetheless, it was less attractive for business travellers, given its geographical location (Noakes, 2002 a.). Three airports in London were an effective growth platform for competing in the short haul segment against established network carriers (In-depth Interview 5, 2010; In-depth Interview 3, 2007; Harrison, 2010).

As underlined for codesharing, Easyjet and Go route networks were complementary. Go offered Easyjet’s access to key European destinations, such as Munich and Prague, as well as Spanish and Italian markets. Easyjet planned to utilise Go existing

destinations, and cut only one route Glasgow-Belfast, which Easyjet already covered with high frequencies (Harrison, 2002 a.).

Full control of the Go network allowed maximising network density economies (Bond, 2002; Lawton, 2002). Density economies stemmed from Easyjet's expansion strategy. Easyjet at first introduced one route, then increased route frequency in order to attract price-conscious business travellers (Tarry, 2010 a.; Economist, 2001) (Chapter 4, section 5.1), and, in conclusion, joined specific final destinations and increased its network density (Schofield, 2010). Go destinations offered Easyjet the opportunity to join additional city pairs, increase density economies in its network, and further attract the business segment (In-depth Interview 2, 2007).

The Go acquisition also delivered significant economies of scale in marketing (In-depth Interview 5, 2010). Low-fare carriers spend on average a higher proportion of their costs in marketing as compared to network carriers. As mentioned before, consumers were initially hesitant to take advantage of low-fare offers, and low-fare carriers had to invest substantial resources to challenge consumers' initial perceptions.

Easyjet and Go spent respectively £6.59m. and £8.45m. on advertising and promotion, which corresponded to 85 percent and 104 percent more than British Airways if divided by passenger revenues (Johnson, 2002 a.). Go and Easyjet could consolidate media planning and buying accounts through integration when the Go brand was phased out, and achieve marketing economies of scale (Johnson, 2002 c.). Additionally, Easyjet had produced advertising in-house before acquisition, and outsourced media planning to the external BBJ advertising agency (Johnson, 2002 a.). Easyjet could exploit Go's existing advertising accounts and achieve more economical deals by combining their advertising portfolio (Johnson, 2002 b.) (Chapter 9, section 1.3).

Easyjet could also increase its purchasing power with aircraft manufacturers by acquiring Go (Daily Post, 2002). In 2002, Easyjet planned a major aircraft order to fulfil its growth objectives. In that period, Boeing held almost a monopoly on low-fare carriers and Airbus attempted to break through into the low-fare market. Consequently, Easyjet contacted both manufacturers and exploited its increased size to gain favourable contractual conditions (Bowermaster, 2002). Eventually, Easyjet ordered 120 Airbus A319's as well as an option for 120 Airbus A319's. Both transactions were accomplished at satisfactory contractual terms (Baker, 2002 b.) (Chapter 9, section 1.3).

As mentioned for codesharing, Easyjet and Go had consistent business models, since British Airways developed Go on Easyjet's model (Cochennec, 2002). Nevertheless, when Easyjet and Go were combined, it emerged that Easyjet was operationally more efficient than Go, although Go showed superior on-board and after sales customer services (Rogers and Arnold, 2002; Evening Standard, 2002). Easyjet could therefore streamline Go operations and exploit Go expertise on customer service (In-depth Interview 1, 2007).

Furthermore, Easyjet and Go were both focused on business travel (Chapter 9, section 2), and respectively flew 20 percent and 40 percent of their passengers for business purposes (Gill, 2010 b.; Huse and Evangelho, 2007). Go and Easyjet positioned their offer against network carriers, which fixed high fares on short-haul routes on weekdays. However, Easyjet had been unable to provide business group bookings because of the related administrative costs. Conversely, Go had established travel sales teams and key account management for corporate customers (Graf, 2005; Mason, 2001). Easyjet could incorporate travel sales teams in its staff and improve its offer towards business travellers by acquiring Go (Conference & Incentive Travel, 2002).

The Go acquisition was also supported by important competitive motives. As mentioned before, Go was primarily established by British Airways to compete

against Easyjet (Chapter 9, section 1.3). Go gained a growing market share and represented a serious competitive threat to Easyjet. Easyjet eliminated its main competitor in the British market by acquiring Go, particularly in the London passenger catchment area, and reduced its low-fare competition in the European market (In-depth Interview 2, 2007; Parsons, 2002).

Moreover, the Go acquisition contributed to Easyjet's objective of becoming leader in the low-fare sector against Ryanair. In 2002, Ryanair was the other important player in the low-fare sector and rapidly enlarged its presence in the British and European markets (Johnson, 2002 a.). In 2002, Ryanair and Easyjet competed only indirectly, because no route overlaps existed between the two carriers, but Ryanair and Easyjet were simultaneously positioning their offer in the European market. Easyjet offered higher quality services than Ryanair (Chapter 9, section 1.3) (Baker, 2002 b.), however, Ryanair had a lower cost base and marketed lower fares than Easyjet (Johnson, 2002 a.). In acquiring Go, Easyjet had the opportunity to improve their competitive position against Ryanair by accessing Stansted airport, where Ryanair primarily operated, as well as enlarging their scope in several European destinations (In-depth Interview 2, 2007).

This case is consistent with the research framework, which is presented in Chapter 6, section 2. Easyjet had no regulative restrictions in acquiring Go. Easyjet received full approval from the British competition regulator Office of Fair Trading, which exempted the acquisition from referral to the British Competition Commission (Airline Industry Information, 2002).

Easyjet incurred significant costs in acquiring Go, despite economic and competitive advantages. Acquisition costs made up for ex-ante and ex-post costs.

Ex-ante costs mainly comprised asset valuation issues (Chapter 6, section 1.1). Valuation problems originated from Go's reluctance in disclosing sensitive documents and data on its assets. Go had problems in disclosing sensitive

information because Easyjet was Go's direct competitor and the negotiation outcomes for the acquisition were uncertain (In-depth Interview 1, 2007).

Go's intangible assets also complicated the valuation process. As mentioned before, Go incurred losses between 1998 and 2000, before obtaining organisational independence from British Airways at the end of 2000. Cattell (2002) anticipated different problems for Go's management in running the airline independently. Nonetheless, in 2002, Go went back to profitability, launched new routes in key markets, and kept its unit costs 5 percent lower than Easyjet (O'Connor, 2002). In addition, Go management had developed a valuable brand, which was the second most-recognised in the UK in the low-fare sector after Ryanair (Parsons, 2002). Go management therefore claimed that Go's negative performance was generated by British Airways' strategic interference, whereas Easyjet argued that Go's accomplishments were limited to less than two operational years (In-depth Interview 3, 2007). Moreover, Easyjet planned to phase out the Go brand by spring 2003 (Cunliffe, 2002; Johnson, 2002 a.), and was reluctant to invest significant financial resources in a brand that Easyjet will not use (Parsons, 2002). In conclusion, the valuation price rose due to the persistent refusal of Go CEO Mrs. Barbara Cassani to sell the airline. During negotiations between Go and Easyjet, Mrs. Cassani outlined that the Go brand had potential left and the Go customer base could be built further (Smith, 2002). Mrs. Cassani thus attempted to persuade Go's majority shareholders to reject Easyjet in favour of a stock initial public offering (IPO) for Go (Harrison, 2002 a.).

Valuation issues contributed to move Go's final price up further. At the end of the negotiation, Easyjet invested £390m. for Go, which corresponded to 2.7 times the price that 3i had paid to British Airways in 2001 (Bond, 2002).

The Go acquisition was affected by no "indigestibility problems". Easyjet's growth plans implied that the Go fleet and staff could be completely absorbed by Easyjet (In-depth Interview 5, 2010; In-depth Interview 3, 2007). Easyjet also planned to maintain the entire Go route network and airport infrastructure. Go and Easyjet

overlapped exclusively in two routes, Belfast-Edinburgh and Belfast-Glasgow, where Easyjet reduced capacity. Nonetheless, released capacity was assigned on the Edinburgh-London and Glasgow-London routes (Euroweek, 2002). Therefore, “indigestible assets” proved to be non-existent in the Go acquisition.

Ex-post costs originated from the integration process between Go and Easyjet. Easyjet estimated that integration costs amounted to the £42m., which corresponded to 15 percent of £276.7m. Go value without cash, over a period of two years (In-depth Interview 2, 2007). Easyjet prudently fixed integration costs at £25m. over three years in the legal filing of the acquisition (Parsons, 2002; Bowermaster, 2002). A common booking system was planned to be in place at the end of 2002 (The Express, 2002), whereas network integration was to be finalised by March 2003 (Baker, 2002 b.).

The re-organisation of the distribution system was a primary source of integration costs. In 2002, Easyjet had higher percentages of web distribution as compared to its low-fare counterparts (Cochennec, 2002). Conversely, Go applied a diversified distribution strategy and used a combination of website, telephone, and travel agencies with Galileo Computer Reservation System (CRS) (Chapter 4, section 6.1) (Noakes, 2002 b.). Easyjet planned to keep its web distribution policy in order to lower its distribution costs (Noakes, 2002 a.), given that Easyjet had already higher general costs than its direct low-fare competitors, including Go and Ryanair (In-depth Interview 3, 2007). Therefore, Easyjet proceeded to process Go airline bookings through its existing website easyjet.com and phone number, whereas the Go website, phone centre, and agreement with Galileo were eliminated (Travel Trade Gazette, 2002 c.).

Easyjet had also to relocate headquarters for the combined airline. Go had its headquarters in Stansted and Easyjet was based in Luton. Stansted offices could already accommodate the combined airline’s staff, whereas the Luton offices required new premises (Harrison, 2002 b.). In the end, Easyjet chose to locate its combined headquarters at Luton airport because Easyjet’s employees explicitly

expressed their preference for Luton (In-depth Interview 1, 2007). Additionally, Luton airport offered greater room for expansion as compared to Stansted, where Ryanair and other low-fare carriers competed for office area (In-depth Interview 3, 2007).

The integration process was also complicated by labour disputes. Easyjet expected no layoffs for the Go workforce and was ready to incorporate Go staff in its operational activities (In-depth Interview 4, 2010; Wilkinson, 2002). Despite that, Easyjet faced labour disputes with trade unions. When Go was created, British Airways allowed Go employees to be represented by the Amicus trade union (Graf, 2005). Easyjet's staff in February 2002 voted in favour of being represented by the Transport and General Workers Union (T&G) (People Management, 2002). Easyjet's management was against having two sets of unions in the combined airline, because two unions with dissimilar views could cause difficulties in adjusting the contracts after the acquisition (In-depth Interview 3, 2007). Easyjet argued that Amicus had broader experience with the low-fare carrier's labour environment and proceeded to derecognise T&G (People Management, 2002). Easyjet's decision resulted in strike actions in May 2002 from Easyjet's baggage handlers and cabin crews, who were followed by Easyjet's pilots. T&G also applied to the British Central Arbitration Committee to make its agreement with Easyjet's staff legally binding (People Management, 2002). The British Central Arbitration Committee (CAC) was established in 1975 and acts as the industrial court for arbitrations in Britain if the parties consent. If the parties do not consent, the British labour minister can refer to the CAC for recommendations, although the recommendations are not legally binding and are ultimately settled by the British civil courts (IRS Employment Review, 2005). In June 2002, Easyjet's management acknowledged the right of its employees to choose between T&G and Amicus, and in exchange both unions guaranteed Easyjet flexibility in contract negotiations during the integration process (In-depth Interview 1, 2007).

Easyjet's Human Resources Department applied an intensive communication campaign towards its employees in order to minimise further problems during the

combination process. The Go acquisition was explained to the staff using many channels, such as phone, email, and a specific Internet chatroom (Personnel Today, 2002). Additionally, Easyjet launched a new staff recognition scheme after the acquisition, which was called Go Mad and combined Easyjet's and Go's schemes (Employee Benefits, 2002).

Easyjet's and Go's top management were also reorganised in order to reduce organisational diseconomies and facilitate the integration process. To begin with, Sir Stelios Haji-Iannou, the founder of Easyjet, was asked to hand over his chairman position by Easyjet's institutional investors and shareholders before the airline combination (Air Transport World, 2002). Sir Stelios Haji-Iannou approved the acquisition, however, his views on Easyjet's development were in conflict with Easyjet's institutional investors (Hotten, 2002). Sir Stelios Haji-Iannou intended to limit Easyjet's network growth after the acquisition, and divert resources to other Easy brands, whereas Easyjet's institutional investors perceived the Go acquisition as a starting point for rapid growth (In-depth Interview 2, 2007). Sir Stelios Haji-Iannou resigned as chairman in November 2002 (Birmingham Post, 2002) and was replaced by Sir Colin Chandler (Blackrew, 2002). Sir Stelios Haji-Iannou chose to maintain his 22 percent share in Easyjet, despite being denied a managerial position in the combined airline (Bickerton, 2002).

Go CEO Mrs. Barbara Cassani was also requested to resign. As mentioned before, Mrs. Cassani opposed Easyjet's acquisition and was involved in a prolonged dispute with Easyjet's management, hence her presence in the combined airline could disrupt the integration process (Harrison, 2002 a.). Easyjet sought to keep the remaining senior Go management in the combined airline because the integration process required Go senior management's contribution in order to be successfully accomplished (O'Connor, 2002). For this reason, Easyjet offered attractive incentive packages to key executives at Go (Harrison, 2002 a.), which were mainly composed of shares and depended on performance goals over the period 2003 and 2005 (Harrison, 2002 b.). Go's Chief Operating Officer, Sales and Marketing Director, and

Director of Customer Services accepted the offer and joined Easyjet, receiving £11m. in incentives over a two year period (Harrison, 2002 a.).

Despite labour disruptions and integration problems, the integration process was effectively completed by March 2002 (Baker, 2002 b.; Citarg, 2002). Nevertheless, the estimated £42m. for integration costs rose to £55m. over 3 years (In-depth Interview 2, 2007). Integration costs increased due to initial operational problems that affected Easyjet and Go in summer 2002 and resulted in numerous delays on scheduled flights (Baker, 2002 b.). Delays were primarily caused by the Go pilot and crew rostering system that was erroneously integrated with the Easyjet system (Travel Trade Gazette, 2002 d.). After initial problems, the integration process caused no further service disruptions (Birmingham Post, 2002).

Ex-post costs also included capital expenses for the Go acquisition. Easyjet favoured maintaining a high debt/asset ratio and expanding its fixed assets with revenues from airline operations (Bond, 2002). Easyjet was reluctant to fund the Go acquisition with debts and increase its interest expenses (In-depth Interview 2, 2007). Easyjet analysed the financial market and realised that market capitalisation levels for network carriers were lower than for low-fare carriers (O'Connor, 2002). Consequently, Easyjet relied on the financial market to fund Go's acquisition and issued share rights, which encompassed £276.7m., Go's entire value (European Venture Capital Journal, 2002). Market investors covered Easyjet's share rights issues entirely (Euroweek, 2002). In this way, Easyjet minimised capital costs in acquiring Go.

To conclude, strategic and economic benefits in acquiring Go considerably exceeded acquisition costs, despite the significant valuation and integration problems (In-depth Interview 1, 2007). Nonetheless, if acquisitions benefits clearly exceeded costs, Easyjet's choice of refusing the first offer from British Airways in 2001 requires

further explanation. In 2001, Easyjet considered launching its own Initial Public Offering (IPO) and assumed that the Go acquisition combined with the IPO could excessively stretch managerial resources (Campbell, 2002). In-depth interview 1 (2007) underlined that “the challenge for managing the flotation and the expansion at the same time would have been too much”. Additionally, British Airways exclusively negotiated with potential buyers for Go in cash (Parsons, 2002). Easyjet had in 2001 £200m. available in cash, hence Go’s acquisition would limit Easyjet’s cash availability to £50m. (O’Connor, 2002). Easyjet could thus get exposed to liquidity risks because it had to run an enlarged carrier with integration issues with only 25 percent cash left (In-depth Interview 1, 2007). In March 2002, Easyjet re-evaluated the 3i offer for Go because it had grown its net cash availability to £300m. and financial markets were receptive to financing the acquisition through share rights issues. Consequently, Easyjet proceeded to acquire Go because the financial conditions for the deal had evolved positively and economic and strategic benefits were still advantageous (In-depth Interview 1, 2007).

### **9.2.2 Easyjet – GB Airways**

Gibraltar Airways (GB Airways) was established in 1931 as a branch of MH Bland, which was a Gibraltarian shipping company (Clark and Taylor, 2007). In 1989, GB Airways moved to the UK and established its headquarters and main airline operations in London Gatwick Airport (Clark and Taylor, 2007). GB Airways established a full franchising agreement (Chapter 5, section 1.4) with British Airways (BA) in 1995, which implied that GB Airways operated its flights under the BA booking code. In addition, GB employed the BA fleet livery and class partition, and GB flight crew wore the BA uniform. GB Airways was included in the BA oneworld umbrella alliance constellation (Chapter 5, section 5) and participated to the BA Frequent Flier Programme (Air Transport World, 2008). In exchange, GB Airways paid royalty fees to BA and fed its traffic into the BA network (Air Transport World, 2008). In 2006, GB Airways’ fleet was composed of 15 aircraft,

including 9 Airbus A320's and 6 Airbus A321's, and covered 36 destinations (Air Transport World, 2008). As a comparison, in 2006, Easyjet's fleet was formed of 107 Airbus A319-100's and 30 Boeing B737-700's flying to 133 destinations (Easyjet, 2007 a.). GB Airways experienced negative financial performances between 1999 and 2006, with total losses of £20.1m. in 2005 and £33.2m. in 2006 (Grapes, 2007). At the end of 2006, GB Airways directors decided to sell the company in order to avoid bankruptcy (Airline Business, 2007 d.). British Airways owned a priority buying option on GB Airways as part of the franchising agreement, but it opted against the purchase because it favoured focusing upon the long-haul market (Airline Business, 2007 d.). Easyjet proposed to partially acquire GB Airways for £95m. Easyjet's original bid encompassed the acquisition of GB Airways' slots in London Gatwick and Manchester airports as well as GB Airways' fleet and headquarters, whereas it excluded GB Airways' administrative staff and flying crew as well as GB Airways' slots in London Heathrow airport (Easyjet, 2008). In November 2007, GB Airways negotiated and agreed with Easyjet a higher bid of £103.5m. As compared to the original bid, Easyjet had also to absorb 15 percent of GB Airways' staff (Easyjet, 2008).

The relationship between Easyjet and GB Airways appears to be inconsistent with the setting of this research (Chapter 6, section 1). Easyjet planned to connect with GB Airways on only 16 routes out of 133 with the exclusion of GB routes from and to London Heathrow airport (In-depth interview 6, 2010). The 16 potential connections entailed 5 complementary routes in Manchester airport and 1 complementary route in London Gatwick airport (In-depth interview 6, 2010; Noakes, 2007 c.). Therefore, major connections of route networks were not involved and the acquisition between Easyjet and GB Airways was excluded from the setting of this research.

It is, however, interesting to highlight that the acquisition of GB Airways was explained by the strategic importance of GB slots in London Gatwick airport (In-depth interview 6, 2010; Noakes, 2007 c.). As mentioned in Section 2.1.2, Easyjet had problems in accessing slots in primary airports in order to maintain its growth

strategy (Boles, 2002). Easyjet had acquired in 2005 a number of slots in London Gatwick airport from British Airways when British Airways commenced downsizing its regional network in Britain in favour of long-haul destinations in London Heathrow airport (Mason and Alamdari, 2007) (Chapter 9, section 1.3). Nevertheless, Easyjet required additional slots in London Gatwick airport to sustain its growth in the segment of cost-conscious business passengers flying to European destinations. Indeed, London Gatwick airport was preferred to London Stansted airport by business passengers because of its better airport services and its more convenient location from and to the centre of London. Easyjet had not many opportunities for purchasing slots in Gatwick because British Airways preferred not to offer additional competitive opportunities to Easyjet and other major airlines located in London Gatwick airport had no intention to release their slots (In-depth interview 6, 2010). Consequently, GB Airways' acquisition provided a valuable opportunity for Easyjet to increase the number of slots in Gatwick (In-depth interview 6, 2010; Clark and Taylor, 2007). After the integration of GB Airways, Easyjet indeed became the largest operator at London Gatwick with 24 percent slots share and 29 percent market share in short-haul destinations (Air Transport World, 2008). The sole interest in the slots in London Gatwick clarifies why Easyjet accomplished only a partial acquisition of GB Airways leaving the London Heathrow slots out of the transaction. In addition, Easyjet closed the GB routes in Manchester airport immediately after the acquisition (In-depth interview 6, 2010; Noakes, 2007 c.).

The acquisition of GB Airways had minor costs for Easyjet (In-depth interview 5, 2010). The parallel routes in the two networks were eliminated and were substituted with new destinations towards continental Europe. Easyjet had required to expand the scope of its network (Clark and Taylor, 2007) rather than the frequencies of its British routes, which had only minor strategic relevance for Easyjet (Chapter 9, section 1.3). GB Airways' routes in Manchester airport were also replaced by Easyjet's routes in Liverpool airport, where Easyjet had an adequate base for covering its regional network in Northern England (Noakes, 2007 c.).

GB Airways' fleet was also consistent with Easyjet's because GB Airways included only Airbus in their fleet as were the majority of Easyjet's aircraft (Chapter 9, section 1.3). GB Airways' 9 Airbus A320's were rapidly absorbed into Easyjet's fleet by cancelling a corresponding number of Easyjet's options in Airbus. Nonetheless, GB Airways' 6 Airbus A321's had to be traded because they could only be employed in medium/long-haul destinations (Noakes, 2007 c.), where Easyjet had no intention of expanding (Chapter 9, section 1.3). The 6 Airbus A321's were consequently disposed of in a moment of decline for the second-handed airline market, but Easyjet incurred minor losses because the GB Airways' A321's were relatively new (In-depth interview 6, 2010).

In conclusion, Easyjet agreed to hire 15 percent of GB Airways' staff as part of its acquisition terms (Clark and Taylor, 2007). GB Airways' staff were not considered as an "indigestible" asset (Chapter 6, section 1) because they encompassed flying crew and ground staff that Easyjet required in its expansion strategy (In-depth interview 5, 2010). In addition, GB Airways was readily integrated into Easyjet's staff, avoiding ex-post integration problems because Easyjet left the flying crew and ground staff in London Gatwick airport, where they were accustomed to operating (In-depth interview 5, 2010).

## SUMMARY

Case study sub-unit findings can be summarised as following:

### **1) Easyjet – Go:**

Easyjet considered no codesharing agreement with Go and rather concentrated on acquiring Go. Easyjet was required to rapidly gain traffic levels with high load factors in applying the low-fare business model, and codesharing ensured only a portion of Go traffic. Despite complementary routes and similar business models, codesharing delivered limited economies of scope and density, because Easyjet required no feeding traffic into long-haul flights and offered no on-line connections. Also, codesharing added managerial complexity and organisational diseconomies in Easyjet's simple business model. Organisational diseconomies were reinforced by distribution incompatibilities. Hence, Easyjet's management disregarded codesharing because limited economic benefits did not balance additional organisational diseconomies.

The Go acquisition allowed Easyjet to achieve the necessary rapid growth and expand towards continental Europe, where Easyjet sought to position its offer. Go was already well-established in key European markets, which Easyjet could access with limited investments. Moreover, restrictions in prime-time slots in British and European airports jeopardised Easyjet's differential advantage of providing destinations with main airports, and acquisition ensured Easyjet full access to landing slots.

Acquisition also delivered important density economies in Easyjet's network. Easyjet increased its network scope by linking its route destinations after introducing new routes. Additional routes in Go's network allowed the linking of destinations and

added density economies in the network. Easyjet's positioning towards the business segment also improved due to Go's established travel sales team and key account management.

Additionally, Easyjet significantly reduced competition in British and European markets by acquiring Go. British Airways had indeed established its low-fare subsidiary Go as a competitive reaction to Easyjet. Go maintained its competitive positioning against Easyjet after becoming independent from British Airways. Go's acquisition also contributed to contrasting Easyjet's competition from Ryanair in the European market. The competition between Easyjet and Ryanair is indirect because Ryanair is positioned in secondary airports while Easyjet chooses at least one primary airport in its routes. However, Ryanair and Easyjet share the same passenger segments in many cases and compete for the control of the European low-fare market.

Acquisition was, nonetheless, associated with ex-ante and ex-post costs. Ex-ante costs originated from asset valuation problems on Go's management and brand as well as Go's initial reluctance in disclosing sensitive data to Easyjet. Ex-post costs primarily stemmed from integration costs between the two carriers due to the reorganisation of the distribution system. Indeed, Easyjet eliminated Go's combination of website, telephone, and travel agencies with Galileo Computer Reservation System (CRS), and exclusively concentrated on web distribution in order to reduce operational costs. Labour issues also complicated the integration process. No "indigestible assets" were included in the acquisition and no layoffs were expected, however, Easyjet favoured having one union for the combined airline, and derecognised its existing trade union T&G in favour of Go's trade union, Amicus. Labour disruptions convinced Easyjet's management to reintroduce both unions in exchange for flexibility in contract negotiations in the initial integration process. Capital costs were limited by issuing share rights that encompassed Go's entire value and were entirely covered by market investors.

Acquisition benefits exceeded ex-ante and ex-post costs, therefore Easyjet proceeded to acquire Go. Easyjet had refused a lower offer from British Airways in 2001 because Easyjet had to deal with its initial public offering (IPO) and had insufficient cash coverage. In 2002, the IPO had been successfully accomplished and cash availability had improved, hence Easyjet could move to acquire Go.

## **2) Easyjet – GB Airways:**

The acquisition of GB Airways is not included in the settings of this research because only minor connections of route networks were involved. Indeed, Easyjet considered connecting only 16 routes out of 133 with GB Airways' network, with 6 exclusively complementary routes. Easyjet acquired GB Airways because of the strategic value that GB Airways' slots possessed in London Gatwick airport. Business passengers showed they preferred Gatwick to Stansted airport and Easyjet planned to expand its market for business passengers to continental Europe in Gatwick. Nevertheless, Easyjet had problems in achieving slots in Gatwick, hence, it chose to accomplish a partial acquisition of GB Airways and leave out GB Airways' slots in London Heathrow. Acquisition benefits were superior to costs because Easyjet could switch its options for Airbus A320's with GB Airways' A320's. In addition, Easyjet had to absorb 15 percent of GB Airways' staff according to the acquisition terms. GB Airways' staff encompassed flying crew and ground staff that Easyjet needed for its expansion strategy in Gatwick.

# **CHAPTER 10**

## **Conclusions**

## INTRODUCTION

The review of the literature on alliances and then acquisitions (Chapters 2 and 3), relating to the airline industry (Chapter 5), was instrumental in establishing the research design for this study. The research design directed the empirical data collection and analysis according to the case study methodology, which defined the procedures for correlating the research design with empirical data (Chapter 6) in order to achieve the research objectives (Chapter 1). The empirical evidence was summarised in three case studies (Chapters 7, 8, 9), where the decision process between alliances and acquisitions was evaluated from the viewpoint of one airline.

This Chapter plans to relate the findings in the case studies with the research design in order to establish the decision process between alliances and acquisitions in the airline industry and recognise divergences from the literature, following the case study methodology (Chapter 6, section 4). This Chapter also states the contributions of this research to scholarly studies and specifies the correlations with the founding theories on alliances and acquisitions. In conclusion, this chapter points out the directions that further research should follow as well as the implications and suggestions for regulators and airline practitioners. This Chapter includes six Sections.

Section One underlines the factors that airline decision makers evaluate when choosing between codeshares and acquisitions as they emerge from the comparison between the research design and the empirical evidence. Alliances and acquisitions produce benefits and costs, which are summarised in the decision making model. Acquisitions deliver clear advantages when compared to codeshares only if major sections of the network have to be rationalised, however, they are exposed to higher costs and risks than codeshares. The business models that airlines apply appear to

influence the decision process because network and low-fare carriers show a different propensity for establishing alliances or acquisitions.

Section Two defines the contributions of this research to scholarly studies on alternative forms of governance. The contributions are made at an industrial level, where different degrees of uncertainty and competition in the industry influence the decision makers, and at an organisational level, where the types of economies and operations, the geographical location, and knowledge exchanges shape the decision process. This Section also contributes to scholarly studies on the integration process and minority equity links, which are related to alternative modes of governance. The contributions to general studies on alliances and acquisitions are reviewed in the conclusion to this section.

Section Three relates the research conclusions to the main theories, which defined the theoretical foundations of the research design. This study makes reference to two founding theories, the Transaction Cost Economics theory (TCE) and the Resource Dependence theory. This research confirms the scholastic criticism of both theories.

Section Four explores the areas where further research can be conducted. This study can be applied to broader settings, in particular to different business models, geographical areas, or a combination of both. In this way, generalisations from the research conclusions can be extended. This study can also be expanded to both the subjective motives of airline executives and the relative effects that acquisitions and alliances have on airline stakeholders, such as consumers and distribution channels. Further research can also be applied to evaluate the influence that airline constellations have on the decision process. In conclusion, this research can be extended to industries, such as the telecommunication industry, where economies of scope are more significant than economies of scale and oligopolistic tendencies are evident.

In Section Five, the implications for regulators and airline practitioners are explored. Airline authorities should establish corresponding rules for acquisitions and alliances and coordinate the policies between the US and the EU in the attempt to set up a regulative framework for the entire airline industry. The revision processes for both

acquisitions and alliances should also have a defined time frame and certain outcomes. Airline practitioners should carefully evaluate alliances and acquisitions because the whole airline venture can be jeopardised if they make the wrong choice.

Section Six offers a number of suggestions for airline practitioners to improve the results for alliances and acquisitions. As for alliances, airline practitioners are advised to carefully estimate benefits and costs for both their operations and the overall alliance and how to equally share the benefits. The financial involvement of the routes that are excluded by codesharing is also recommended, in order to avoid external competitive attacks. A project-oriented approach for a number of alliance operations should be applied, where all the departments of the airline are involved in the project. In conclusion, the marketing resources for the business and leisure segments should be balanced for network carriers in the alliance. As for acquisitions, airline practitioners are recommended to define the leadership, structure, and strategic directions of the future organisation in the negotiation process. The relationships with trade unions and the staff should be carefully monitored and communication should be constant with the workforce during the integration process. To conclude, airline practitioners are advised to prudently estimate their financial requirements for an acquisition.

## **10.1. RESEARCH RESULTS IN THE AIRLINE CONTEXT**

Alliances and acquisitions in the airline industry generate strategic and economic benefits as well as costs. Benefits and costs are the factors that airlines examine when they select alliances or acquisitions. The factors, which were established in the research design (Chapter 6, section 1), are compared here with the case study evidence (Chapters 7, 8, 9) in order to determine the decision process model. The section 1.1 contributes to fulfilling the research objective no. 1; section 1.2 contributes to fulfilling research objective no. 2, and section 1.3 contributes to fulfilling research objective no. 3 (Chapter 1, section 2).

### **10.1.1 Codesharing Benefits and Costs**

Codeshares allow carriers to gain access to a percentage of traffic on route lines and exclude the route nodes, which are controlled by the codesharing airlines. The percentage of traffic is the key objective for establishing codeshares (all cases). Advantages for codesharing depend on the ratio between complementary routes and total routes. Higher percentages of complementary routes entail offering more destinations and route connections between networks through codesharing (Alitalia case; Continental case). Complementary routes deliver more value if they involve non-stop route pairs, i.e. direct links between two destinations. Direct links allow passengers to save time and potential disruptions as compared to connection pairs, where passengers have to go through different stopovers to reach their final destinations (GAO Reports, 2010) (Continental case).

Wang and Evans (2002) (Chapter 5, section 1.1) highlight how codesharing is exposed to unexpected changes in terms of codeshared traffic. Nevertheless, Air France and Continental cases show that carriers apply a gradual approach to

codesharing and establish at first links on strategic and international routes and subsequently expand their codeshares to more peripheral and domestic routes (In-depth Interview 3, 2007 Alitalia; In-depth Interview 6, 2010 Continental). After a number of initial adjustments, codesharing traffic appears to be stable, even with major strategic changes and different economic cycles.

Codesharing generates economies of scope between the network connections. Lindstadt and Fauser (2004) (Chapter 5, section 3.1) emphasize that in codesharing, carriers improve their global scope and expand their international destination portfolio with no additional capacity. Continental could get access to United Airlines' Asian destinations (Casey and Chon, 2010) (Continental case), whereas Alitalia solved its lack of scope in international destinations by codesharing with Air France (Brothers and Povoledo, 2009) (Alitalia case). Nonetheless, expansion in international long-haul destinations through codesharing should be considered differently because passengers flying to international destinations may consider alternative departure hubs as substitutable. Long-haul flights imply long flying hours, hence passengers can consider hubs that are 2 or 3 flight hours distant as substitutes in their purchase decision (In-depth Interview 5, 2010 Continental) (Continental case).

Moreover, traffic economies of scope stem from feeding traffic into long-haul destinations. Tretheway (2004) (Chapter 5, section 3.1) argues that codesharing results in higher passenger flows on average for international destinations when short-haul networks are connected into the international hubs. Feeding traffic from the domestic Italian market appears to be the primary economic reason for Air France (In-depth Interview 4, 2007 Alitalia) to be codesharing with Alitalia (Alitalia case). Additionally, United and Continental could match their short-haul links in metropolitan areas with high percentages of business passengers and expand their connections into their international hubs (Shannon and Schofield, 2010) (Continental case).

Carriers also achieve economies of scope when they develop additional city pairs between their codeshared networks (Goh and Yong, 2006) (Chapter 5, section 3.1). Continental and United could offer direct connections between their spoke nodes and avoid giving their passengers at least one stopover before reaching their final destinations (In-depth Interview 3, 2007 Continental) (Continental case). Easyjet and Go also had the possibility to link their final European destinations and expand their presence in the European market (Cattell, 2002) (Easyjet case). Connections between city pairs are fostered when the two route networks are geographically adjacent because carriers exchange traffic between the networks more easily (In-depth Interview 3, 2007 Continental) (Continental case).

Airlines also secure economies of density in codesharing. Additional traffic in the network allows carriers to employ their aircraft more efficiently because they can deploy fewer aircraft with larger capacity when the traffic is directed into the network and distribute their fixed costs over a higher number of passengers (Wan et al., 2009; Dempsey and Goetz, 1992) (Chapter 5, section 3.1). Carriers can also streamline the transfer between routes more effectively with a higher flow of passengers (Wan et al., 2009) (Chapter 5, section 3.1). Furthermore, airlines can position further resources on key and profitable routes, and reduce their presence on partners' routes, where they possess less comparative advantages (Goh and Yong, 2006) (Chapter 5, section 3.1). Empirical evidence shows that carriers change their aircraft typology to achieve lower costs for passengers only on core international routes with minor seasonal trends (In-depth Interview 3, 2007 Alitalia) (Alitalia case). In addition, higher economies of density can be achieved through dedicated structures in the main transferring hubs, where services for the transfer can be concentrated and costs per transfer can be reduced (In-depth Interview 9, 2010 Alitalia) (Alitalia case). In conclusion, carriers are shown to extensively relocate their fleet capacity on routes where they have higher comparative advantage and allow their alliance partners to expand in their secondary routes (In-depth Interview 3, 2007 Continental; In-depth Interview 1, 2007 Alitalia).

Airline passengers also favour the on-line destinations that are established in codesharing to interline destinations. Airline passengers tend to pay higher fares for interline destinations as compared to on-line destinations because each airline seeks to maximise the profits on its routes separately of the other airline. Conversely, passengers can reduce their costs and timing in planning the journey with on-line destinations (Armantier and Richard, 2008) (Chapter 5, section 1.1). In Continental and Alitalia cases, on-line destinations are combined with higher status for Frequent Flier Programme (FFP) (Chapter 5, section 1.5), as well as check-in and baggage handling for the entire codeshared network (In-depth Interview 4, 2010 Continental; In-depth Interview 4, 2007 Alitalia).

Network scope and on-line destinations predominantly appeal to the business segment (Chapter 5, section 5.1), which is the primary marketing objective for codesharing (Alitalia case; Continental case). Both Continental and Alitalia considered the percentages of business passengers as a primary factor when evaluating the consistency of their route structures with their potential codeshare partners (Reed, 2010 e.; In-depth interview 6, 2010 Alitalia) (Alitalia case; Continental case).

Economic benefits for codesharing are achieved more effectively if carriers agree to share their revenues on codeshared routes. Revenue sharing implies that the added revenues that codesharing generates are equally distributed between the partners. Air France and Alitalia set to share their revenues on all their codeshared network (Pilling, 2008) (Alitalia case), whereas Continental and United chose to share their revenues only on Atlantic routes in combination with their Star Alliance members Air Canada and Lufthansa (Conkey and Prada, 2009) (Continental case). Revenue-sharing contributes to define the advantages of codesharing and to maintain the attention on codeshared routes by the airline top-management (In-depth interview 9, 2010 Alitalia). In addition, corporate accountants and marketing units are encouraged to invest equal resources on codeshared routes if added revenues in the alliance are shared (In-depth interview 9, 2010 Alitalia).

Codeshares involving numerous network sections entail significant exchange of resources and fine-grained information between partners, hence they can be classified as co-specialised alliances (Gomes-Casseres, 2003) (Chapter 2, section 5). The range of partners for co-specialised alliances is limited in the airline industry, hence, in some cases, carriers establish codeshares in order to pre-empt their airline competitors settling agreements with the few partners available and avoiding a strategic gridlock. In this case, carriers seek to secure long-term codesharing benefits prior to their direct competitors (Gimeno, 2004) (Chapter 5, section 3.2). In the US, the airline market is constituted by a small number of airlines, where seven carriers control almost 90 percent of the US market and the largest carrier controls just 19 percent (Hatfield, 2007). The US airline market is subject to excessive capacity and fragmentation because the Chapter 11 bankruptcy proceedings have artificially maintained a number of airlines in the market (Karp, 2007 b.) (Chapter 8, section 2.1). In this scenario, US carriers lock their domestic counterparts in codeshare agreements in order to prevent them from achieving too much market power by joining alternative codesharing agreements. Excessive market power poses a threat to the existing hub and spoke system in terms of transfer traffic (In-depth Interview 2, 2007 Continental) (Continental case). Conversely, in Europe, network flag carriers rely upon their domestic short-haul market for feeding traffic into their international routes. Codeshares are formed in order to secure the transfer traffic from adjacent networks into the international hubs and preclude any direct competitor move in adjacent markets. Air France sought to prevent Lufthansa from achieving total control of the Italian transfer traffic (In-depth Interview 8, 2010 Alitalia). Lufthansa had already established an independent brand in the Italian market called Lufthansa Italy (Wall, 2009) (Alitalia case).

Codesharing agreements also involve parallel routes, which airlines already cover in their network. Airlines have the opportunity to add frequencies by codesharing parallel routes (Shaw, 2007) (Chapter 6, section 1.2). Air France and Alitalia increased frequencies between their main hubs Paris, Rome, and Milan, which involved connecting routes with high margin and traffic and no seasonal trends (In-

depth Interview 1, 2007 Alitalia) (Alitalia case). Conversely, United and Continental added frequencies on the transatlantic routes, where United's positioning on leisure passenger segments and primary European destinations was consistent with Continental's offer on middle-upper segments and secondary European destinations (In-depth Interview 4, 2010 Continental) (Continental case). In this way, the carriers improved their positioning toward the business segment, which values frequencies in the airline service (Shaw, 2007) (Chapter 4, section 5.1).

Alitalia and Continental cases also indicate that carriers coordinate their flight scheduling and adjust their frequencies in codesharing parallel routes. This contradicts the existing literature (Park and Zhou, 2005), which assumes that carriers do not reduce frequencies in parallel codesharing, otherwise they grow exposed to unpredictable changes in the codesharing agreement on these routes. In-depth interview 9 (2010 Alitalia) and In-depth Interview 3 (2010 Alitalia) argue that Air France and Alitalia perceived no risk in reducing frequencies because codesharing allowed double branding on the routes and passengers still kept brand awareness, although the airline was not directly operating the flight. Air France and Alitalia also controlled the main connections between the French and the Italian markets with parallel codesharing, hence they had the opportunity to both coordinate the routes in these markets and secure the overall transfer traffic to long-haul destinations (In-depth Interview 9, 2010 Alitalia) (Alitalia case).

The case analysis also reveals that airlines regard the exchange of knowledge as a driving force for codesharing their operations. In particular, airlines value partners that possess expertise in specific management methodologies. Alitalia evaluated Air France's know-how in yield management and revenue-sharing in alliances as a key advantage and proposed establishing a joint team for transferring Air France's expertise to Alitalia (In-depth Interview 7, 2010 Alitalia) (Alitalia case). United needed to improve its performances in terms of customer service, but had experienced organisational problems in accomplishing this task. United planned to exploit Continental's expertise in customer service and use Continental's customer

protocol as a framework for its own reorganisation (In-depth Interview 6, 2010 Continental) (Continental case).

Codeshare benefits can be capitalized only if carriers are capable of cooperating, otherwise carriers lose most of their benefits and endanger their agreement. Cooperation in codesharing depends on relational factors, which change during the alliance life-cycle (Wang and Zajac, 2007; Bierly and Coombs, 2004) (Chapter 5, section 4). Codeshare agreements are established in specific sections of the networks, while airlines compete in the remaining sections. The resulting mix of cooperation and competition can compromise the trust component between the organizations and cause problems in codesharing (Wang and Zajac, 2007) (Chapter 5, section 4). Alitalia (In-depth Interview 7, 2010 Alitalia) and Continental (In-depth Interview 3, 2007 Continental) cases disconfirm that competitive elements damage the relationship between carriers because carriers appear to cooperate effectively although they compete in a number of market sections. Nonetheless, the results are biased because this research is limited to codeshares with extensive scope, i.e. codeshares which involve major sections of the network (Chapter 6, section 1). For this reason, the market sections where carriers compete in the case studies are necessarily limited.

In addition, cooperation in codesharing can be influenced by corporate cultures (Li et al., 2008) (Chapter 5, section 4). The cases show that divergent corporate cultures and organisational approaches may result in problems in codesharing. Air France and Alitalia established an effective collaboration on the basis of a common corporate culture and working environment because their organisations still featured centralized and hierarchical elements (In-depth Interview 6, 2010 Alitalia). Hierarchical structures in both carriers result from the control and political influence of their respective national governments in management, although both governments increasingly reduced control over their national airlines (Brothers and Povoledo, 2009). Still, the different rate of innovation in the structure could threaten the relational factors between the two carriers because Air France appears to introduce new managerial methodologies faster than Alitalia, particularly after its merger with

KLM (In-depth Interview 6, 2010 Alitalia) (Alitalia case). Continental's emphasis on service quality compared to United's focus on network size is a potential threat for the relationship between the carriers (In-depth Interview 6, 2010 Continental), despite the improvements on quality performances for United between 2005 and 2009 (Casey and Chon, 2010) (Continental case).

Stober (2003) argues that carriers are significantly influenced by cultural differences because carriers retain important regional and national characteristics. Regional and national elements are reflected in both the structure and organisation of the carriers and complicate the relationships in international codeshares. Nonetheless, In-depth interview 3 (2007 Continental), In-depth interview 10 (2010 Alitalia), and In-depth interview 2 (2007 Alitalia) sustain that regional and national characteristics played a minor role in the relationship when compared to corporate culture and organisational structure. Indeed, the airline industry has complex organisational tasks and is exposed to significant organisational diseconomies (Wan et al., 2009; Levine, 1987) (Chapter 4, section 2). As a consequence, airline organisations are difficult to combine and differences in working styles cause problems in the alliance relationship (Alitalia case; Continental case).

Codesharing necessitates large initial investments in order to coordinate the traffic exchange. Carriers need to harmonise and conform their IT and passenger handling systems, and finance the marketing campaigns for promoting the new routes (Iatrou and Alamdari, 2005) (Chapter 5, section 4). Initial costs for IT were estimated to be high for Air France and Alitalia (In-depth Interview 5, 2010 Alitalia) as well as for Continental and United (In-depth Interview 2, 2007 Continental). Airline reservation systems are, in general, difficult to coordinate with other systems because they do not possess a compiler/assembler or a desktop (Vinod, 2009). In addition, IT problems increased because Alitalia had chosen to implement its own independent system (Alitalia case), whereas Continental and United employed two independent systems plus a different system for their bookings with their umbrella alliance members (Continental case). In both cases, carriers chose to use two parallel systems working simultaneously for their codeshared reservations, although two parallel

systems caused frequent disruptions and longer time for reservations (In-depth Interview 6, 2010 Alitalia; In-depth Interview 5, 2010 Continental).

Conversely, passenger handling and ground operations as well as check-in procedures necessitated no major initial investments, because the systems already have enough built-in flexibility to sustain new routes (In-depth interview 1, 2007 Alitalia) (In-depth Interview 6, 2010 Continental). In addition, carriers experienced no high marketing expenses associated with codesharing. The Alitalia and Continental cases confirm the existence of economies of scale in marketing in the airline industry (Flint, 1998) (Chapter 5, section 3.1). Carriers associate the codeshared routes with their existing brand and minimise their marketing costs for promoting new routes by taking advantage of scale efficiencies in brand value at minimal unit cost (In-depth interviews 1, 2007 Alitalia) (Alitalia case) (In-depth Interview 2, 2007 Continental) (Continental case).

### **10.1.2 Acquisition Benefits and Costs**

Carriers gain access to both the route lines and the route nodes in acquisitions. Two route nodes are the slots that connect the route line where the traffic is processed. If the carrier administers the two route nodes, it controls the total traffic in the route line (Holloway, 2008) (Chapter 6, section 1.1). In codesharing, partners unilaterally choose the percentage of traffic to share in the route line, whereas in acquisitions, carriers obtain the remaining part of traffic in the route line and choose the traffic in relation to their own strategic priorities (Chapter 6, section 1.1). All cases confirm that carriers value the traffic differential and long-term traffic control as the primary advantages for acquisitions as compared to codesharing.

Access to airport slots in acquisitions shows its relevance when a new market entrant attempts to expand its market presence. Easyjet planned to build its offer in primary European destinations in order to improve its positioning toward the business

segment and demanded new slots (Dunn and Dunning-Mitchell, 2010; Lawton, 2002). However, the European network carriers exploited the existing “grandfather rights” airport regulation (Moores, 2009) (Chapter 4, section 7.1) and refused to release their slots. The US and European network carriers have already established their route connections to their main hubs and are less interested in accessing new slots (Wigham, 2005). Instead, Easyjet had to secure both Go’s and GB Airways’ slots through acquisition, in order to accomplish its growth strategy in Europe. Indeed, Easyjet acquired GB Airways primarily for the strategic importance of GB slots in London Gatwick airport (In-depth interview 6, 2010; Noakes, 2007 c.) (Easyjet case).

Carriers also have the possibility to restructure their network and redistribute their traffic flow among their main hubs in acquisitions. Continental and United could divide their international destinations into primary and secondary destinations according to the strategic relevance of their routes and employ the new long-haul capable Boeing aircraft for direct connections in primary destinations, while assigning narrow body aircraft to secondary destinations (Hinton, 2010 b.). In this way, the two carriers could open new market opportunities and reduce their operational costs due to the higher efficiency in their fleet configuration (Airfinance Journal, 2009 a.). In addition, Continental and United could redistribute their international capacity in hubs that offered growth opportunities (Shannon and Schofield, 2010) (Continental case). Conversely, Air France had the opportunity to apply its model of soft merger and multi-hub structure by acquiring Alitalia (Flottau et al., 2009). A soft merger implies that the merged airlines maintain their brands and their flying rights from their hubs (Ezard, 2008 b.), while the holding group manages the network in a multi-hub structure. The multi-hub structure entails that the merged carriers operate one hub that connects the domestic spoke routes into the international destinations. In addition, the one hub specialises in an international geographical area in an effort to focus marketing resources and improve the efficiencies of the network (Del Canho and Engelfriet, 2008). Through the merger, Air France could drastically reduce Alitalia’s presence in Malpensa airport and

transform Fiumicino airport in the Southern hub for the Air France group (In-depth Interview 4, 2007 Alitalia) (Alitalia case).

In acquisitions, carriers can maximize all the economies of scope and density available in combining the airline networks. Airlines can exploit the traffic differential as compared to codesharing, capitalize on both the extended global reach and feeding traffic (Holloway, 2008; Business Travel World, 2005; Lindstadt and Fauser, 2004), and make a more efficient use of routes with higher comparative advantage (Clougherty, 2002) (Chapter 5, section 10). The evidence in the cases for economies of scope and density is already mentioned in the codesharing section (Chapter 10, section 1.1). Continental and United had to extend their global reach through the merger in order to regain market share in the business market, which had experienced a major decline in 2008 and 2009 (Boehmer, 2010). In the economic slowdown, large corporations began searching for volume contracts in order to reduce their travel costs and streamline administrative procedures. Volume contracts would ideally involve one airline that could cover all the global destinations for the corporation (Reed, 2010 g.). The merger between United's and Continental's international networks could offer global coverage to large corporations and disclose new opportunities for corporate agreements (In-depth Interview 5, 2010 Continental) (Continental case).

Acquisitions allow for reducing capacity and cutting duplications in the merged routes. In codesharing, capacity has to be maintained in parallel routes because carriers are required to retain a certain number of flights to keep their slots according to the "grandfather rights" regulation (Chapter 4, section 7.1). Additionally, frequency reductions in parallel routes imply that carriers will permanently lose their market share in these routes if their partners cease the codesharing agreement. Conversely, the acquisition allows cuts in capacity in parallel routes where additional frequency is unnecessary, and achieves significant operational savings (Kiefer, 2005) (Chapter 5, section 10.1).

Continental had the opportunity to cut capacity in different sections of its international network in merging with United, in particular in transatlantic routes that could be considered substitutable with United's routes (In-depth Interview 5, 2010 Continental) (Chapter 10, section 1.1) (Continental case). In addition, United and Continental could streamline their route networks and substitute spoke routes with direct connections when one of the two spoke routes had low average passenger numbers (In-depth Interview 6, 2010 Continental). Continental had repeatedly attempted to cut its operational costs, which were on average higher than its main US counterparts and its European competitors. The merger with United offered the opportunity to expand Continental's route network at low operational costs given the efficiencies associated with capacity rationalisation (In-depth Interview 5, 2010 Continental).

In addition, Air France had the possibility to streamline the Alitalia network, emphasize its feeder role in their international hubs, and cut Alitalia's duplicated routes in the long-haul market, where Air France was already well-established and required no further scope (Aviation Week & Space Technology, 2006). In this way, Air France could allocate their capacity more efficiently and improve the load factor in the system (Alitalia case).

Acquisitions are established for a combination of economic advantages and strategic objectives. Acquisitions can be interpreted as defensive competitive moves in a number of cases (Forbes and Lederman, 2009; Airline Business, 2005 a.) (Chapter 5, section 10). Airlines often depend on their adjacent regional or domestic markets in order to ensure feeding traffic into their long-haul networks. Airlines are consequently susceptible to the competitive threat of other airlines, which can establish their presence in the adjacent markets and transfer traffic flow to their own international hubs. Therefore, airlines can proceed to acquire carriers that control their adjacent markets and avoid any competitive threat (Forbes and Lederman, 2009) (Chapter 6, section 1.1). Air France sought to prevent Lufthansa from getting control of the Italian feeding market by acquiring Alitalia (Wall, 2009). Lufthansa could reinforce its market presence in the European long-haul market close to the

main Air France Group's Amsterdam and Paris international hubs (Wall, 2009; In-depth Interview 8, 2010 Alitalia) (Alitalia case).

Acquisitions are also carried out in order to keep competitors from achieving excessive network scope and market power. United and Continental planned their merger as a consequence of acquisition negotiations between their US competitors. The US market is fragmented because no market player controls more than 20 percent network share (Hatfield, 2007). If two or more carriers merge and reach 40 percent market share, competitors can merge in a domino effect because they will be unable to compete with limited network scope (Faithfull, 2007 a.). The combination between Continental and United could be considered as a delayed competitive reaction to the merger between Delta and Northwest in 2009, in the attempt to maintain sufficient network scope and protect the transfer traffic into core hubs against Delta (In-depth Interview 5, 2010 Continental; Chon et al., 2010) (Continental case).

Nevertheless, the cases also show acquisitions that are established or planned as offensive competitive moves. Easyjet applied a low-fare model, which entailed low margins and costs, in order to offer reduced fares to gain market share (Tarry, 2004; D'Aveni, 1995) (Chapter 4, section 8.2). Low margins and limited available assets forced Easyjet to grow rapidly in the low-fare market, otherwise Easyjet could run out of resources. Therefore, Easyjet offensively acquired its main direct competitor Go and incorporated its assets and consumer base into the Easyjet organisation (In-depth interview 2, 2007 Easyjet; Parsons, 2002). Furthermore, Go's acquisition was a component of the indirect confrontation between Easyjet and Ryanair for leadership of the European low-fare market. Ryanair and Easyjet competed indirectly because they had different marketing positions, nonetheless, the low-fare sector in Europe had structural limits for growth, and low-fare carriers had to establish their market presence before the low-fare market stabilised (Johnson, 2002 a.) (Easyjet case).

Acquisitions are also explained by the long-term exchange of knowledge between carriers. Empirical evidence shows that carriers tend to value and exchange managerial expertise and methodologies in an acquisition. Easyjet had lower operational costs than Go, nevertheless, Go offered higher quality consumer services and possessed relevant expertise in business group bookings, where Go had set up key account and travel sales teams for business consumers (Graf, 2005; Mason, 2001). Therefore, Easyjet planned to assimilate Go's superior competence in consumer services with the acquisition and streamlining of Go's booking system, and reduce operational costs (Conference & Incentive Travel, 2002) (Easyjet case). Furthermore, Alitalia valued Air France's managerial expertise in the areas of passenger transfer and in-flight services, in an effort to reduce its operational costs (Kahn et al., 2008). However, the complete knowledge transfer required both the reorganisation of Alitalia operations and an extensive interaction between Air France and Alitalia, which were exclusively feasible in the acquisition (In-depth Interview 7, 2010 Alitalia) (Alitalia case). In conclusion, Continental had the opportunity to transfer effective managerial methodologies in service quality and customer assistance, where United experienced low performances (In-depth Interview 6, 2010 Continental; Flint, 2010).

The integration process between the two carriers in an acquisition involves a series of problems and costs that can neutralise the acquisition of economic and competitive benefits. Acquisition costs in the airline industry are constituted by ex-ante and ex-post costs (Chapter 5, section 11).

Ex-ante costs in the airline industry primarily originate from the difficulties in evaluating the carrier's managerial expertise and brand equity (Baker, 2003) (Chapter 5, section 11), which can result in "adverse selection" and transaction losses (Ravenscraft and Scherer, 1987) (Chapter 3, section 2). The cases demonstrate that the problems in estimating the managerial resources stem from disagreements between carriers in assessing airline performance. Go's management argued that its negative economic outcomes were caused by the strategic interference from British Airways' management. Go returned to profitability after British Airways had

released its control of Go (O'Connor, 2002), nonetheless, Easyjet disputed that positive results were temporary and not entirely related to Go's management (In-depth interview 1, 2007 Easyjet) (Easyjet case). During the first negotiation between United and Continental in 2007, Continental disapproved of United's strategy (In-depth Interview 1, 2007 Continental) and attributed to the United management a number of erroneous financial choices (Tita and Meyer, 2006). However, during the second negotiation in 2010, the effective cooperation in codesharing between United and Continental helped to improve the evaluation of United's management by Continental (In-depth Interview 5, 2010 Continental; Casey and Chon, 2010).

Carriers can also face lack of consensus on brand equity value (Baker, 2003) (Chapter 5, section 11). The Alitalia brand was broadly recognised in both the domestic and European markets, given its long monopoly as a flag carrier in the Italian market. Nevertheless, Air France believed that Alitalia brand equity was overestimated because Alitalia had experienced frequent operational problems as a consequence of low-quality services and labour disputes (In-depth Interview 1, 2007 Alitalia). Alitalia was also gradually associated with being a public corporation, which Italian consumers perceived as unreliable and inefficient (Ciuspino, 2007) (Alitalia case).

"Indigestibility problems" compose the ex-ante costs in addition to the valuation problems. "Indigestibility problems" are generated by the acquired assets that are redundant after the acquisition (Hennart, 1988) (Chapter 3, section 2). Carriers are occasionally required to downsize the operations of the acquired airline in order to fully achieve the acquisition benefits. Operational downsizing is frequently associated with workforce redundancies, which are employed in the inessential routes. Empirical evidence shows that labour regulations in many countries impede labour contracts from being discontinued in the short-term, thus the workforce has to be retained and unnecessary costs are added to the acquisition. Alitalia's "indigestible" labour force was a key problem for the Air France acquisition. Air France anticipated reducing the Alitalia routes and re-adjusting the Alitalia network in accordance with Air France's long-haul destinations (Flottau et al., 2009). For this

reason, Air France planned to significantly cut the Alitalia workforce, which was already oversized for its operations (Dunn, 2010). Nevertheless, the strict Italian labour laws and the strong opposition from both trade unions and political parties, precluded the workforce reductions in the short-term (Nativi, 2009; Airfinance Journal, 2008) and increased the ex-ante costs for Air France (In-depth Interview 9, 2010 Alitalia) (Alitalia case).

The combination of different typologies of aircraft as well as redundant routes in acquisitions can also lead to “indigestible” unnecessary aircraft, which are inherited by the joint organisation. Different typologies of aircraft increase the operational costs in maintenance and pilot training, whereas aircraft in redundant routes are difficult to redeploy in the combined route network. Notwithstanding, certain types of aircraft or aircraft on redundant routes can be phased out in order to reduce operational costs. Teichert et al. (2008) assume that fleet can be readily allocated to other airlines on account of an efficient second-hand aircraft market. Nonetheless, the Continental and Alitalia cases show that the disposal of aircraft had become more difficult in recent years because of a weaker demand from both low-fare carriers and the emerging markets of India, China, and Brasil (In-depth Interview, 4, 2010 Continental; Tarry, 2010 b.). Therefore, unnecessary aircraft following an acquisition could become significant “indigestible” assets for the joint carriers and result in high ex-ante costs (Alitalia case; Continental case).

The cases suggest that aviation regulatory authorities have a tendency to intervene in the acquisition process even if the acquisitions are officially approved. The cases in this research were chosen in a framework where carriers are allowed to formally establish acquisitions (Chapter 6, section 2), hence regulatory interference should be excluded. Nonetheless, aviation authorities still influence the acquisition procedures if the acquisition raises concerns on competition and essential airline services. Air France faced problems with the Italian authorities when proposing its first bid to Alitalia in 2007, although Air France was explicitly encouraged by the Italian government to make an offer. However, the Italian government had imposed purchasing conditions on Alitalia to maintain the Italian domestic network in place

(Hooper, 2007). In the following negotiation in 2008, different political parties urged Air France to maintain most international destinations in Milan Malpensa's airport (Nativi, 2009). Air France had therefore to keep redundant airline services as well as the double-hub structure in Fiumicino and Malpensa airports in case of acquisition (Nativi, 2009; Hooper, 2007) (Alitalia case). In addition, United and Continental were exposed to a complex acquisition revision process, which had no established procedures and was significantly influenced by volatile political conditions (Schlangenhein et al., 2010). In the US, the process is complicated by the uncertain relationship between the US Department of Justice (DOJ) and the US Congress. The US Congress has no right to directly intervene in the acquisition revision process, nevertheless, it retains the ultimate authority to change the laws on airline acquisition, hence the US Department of Justice (DOJ) waits for US Congress guidelines before taking the final decision on the acquisition (Mitchell and Carey, 2010 b.). The US Congress is influenced by the general political position of the administration on consolidations of large companies. United and Continental experienced the revision of position from the second Bush administration (2004-2008), which fully supported mergers between large companies, to the first Obama administration (2008-2012), which opposed mergers in order to protect US consumers (Carey, 2010 b.). DOJ could not block the merger process between United and Continental because of the minor overlap between their network, however, DOJ could impose an order to relinquish slots in their main international hubs, given the United and Continental's predominant control in a number of international destinations (Shannon, 2010) (Continental case).

As a consequence, in both cases, the carriers were unable to rationalize their networks and eliminate unnecessary capacity, hence the regulatory intervention curtailed the acquisition benefits.

Acquisitions in the airline industry also encompass relevant ex-post costs (Chapter 5, section 11). Carriers gain no benefits from scale economies and they rather incur notable diseconomies when their size increases (Airline Business, 2003 b.; Flint, 1998; Levine, 1987) (Chapter 4, section 2). Organisational diseconomies originate

from the complexities in the airline operations, which are applied in scattered market sections and diverse passenger segments (Economist, 2005 b.). Organisational diseconomies can counterbalance the network scope economies when size increases in acquisitions (Chapter 6, section 1.2). Both the Alitalia (In-depth Interview 6, 2010 Alitalia) and Continental (In-depth Interview 2, 2007 Continental) cases support the existence of substantial organisational and administrative inefficiencies in the acquisitions, even if the carriers planned to reorganise their structure. In particular, organisational inefficiencies appeared to be extensive for Air France because, during the first negotiation in 2007, Air France needed to complete the integration process between the former KLM and Air France organisations (In-depth Interview 3, 2007 Alitalia) and, during the second negotiation in 2010, Alitalia had to accomplish its complete reorganisation in conjunction with the acquisition (In-depth Interview 6, 2010 Alitalia). Conversely, Easyjet was less exposed to organisational diseconomies than network carriers in the acquisition (Baker, 2002 b.), because of the relative simplicity of the low-fare business model (Tarry, 2004). Go and Easyjet also had very complementary networks (Euroweek, 2002), hence no route re-organisation was necessary (Easyjet case).

Nonetheless, the empirical evidence suggests that the exact point where the organisational diseconomies occur, is difficult to identify and depends on the specific characteristics of the carriers. Organisational diseconomies appear to be determined at first by the differences in the reservation and booking system. Carriers may achieve important cost savings and improve their reservation processes if they implement a common reservation platform in acquisitions. Nonetheless, carriers have to reset their reservation systems when they merge and incur significant operational disruptions during the integration process (In-depth Interview 8, 2010 Alitalia; Beirne, 2006) (Alitalia case; Continental case). Easyjet and Go employed simple reservation systems because they both offered short-haul routes and simplified fare policies for their customers, hence, they readily integrated their booking systems (Travel Trade Gazette, 2007). However, Easyjet and Go encountered problems in integrating their distribution systems because they had to harmonise traditional and innovative distribution methods. Easyjet primarily used the web distribution (Dobruszkes, 2006), whereas Go employed telephone and travel agencies' bookings

along with the web distribution (Noakes, 2002 b.). Eventually, Easyjet eliminated Go's telephone and travel agencies distribution and processed the bookings through its own website and telephone line (Travel Trade Gazette, 2002 c.) (Easyjet case).

Maintenance units and passenger handling operations cause minor difficulties in the integration process because they are designed to incorporate additional operations when the carriers expand. Still, the costs for combining the maintenance and ground units increase if the carriers show major differences in accomplishing their maintenance routines in terms of outsourcing and outside contracting (Tegtmeier, 2010; Nativi, 2008 b.) (Alitalia case; Continental case).

Cases prove that labour issues can generate significant ex-post costs in acquisitions. The acquisition negotiations and announcements invariably set off negative reactions from the workforce, which could lead to labour disruptions in the integration process and compromise the labour relationships (Schlangenstein et al., 2010; Nativi, 2008 a.; Wilkinson, 2002). In addition to job redundancies, the airline workforce grew concerned about the integration of the contractual conditions after the acquisition. Continental staff were distressed by the combination of the seniority lists and pension schemes during the acquisition negotiations (Shannon and Schofield, 2010). Seniority lists and pension schemes in the US have flexible regulations and significantly differ among airlines, hence they are difficult to integrate (Shannon and Schofield, 2010; Bachman, 2006) (Continental case). Conversely, Alitalia's workforce opposed Air France's plan to change key positions in the organisation and redeploy Alitalia management inside the Air France Group, despite Air France's proposal to introduce a rigorous process for selection (In-depth Interview 6, 2010 Alitalia) (Alitalia case). In conclusion, Go's staff enjoyed similar contractual conditions to their British Airways counterparts and feared having their contracts changed to Easyjet's less attractive conditions (Graf, 2005). Easyjet exploited its position as a start-up in the low-fare market and employed strict conditions in terms of salaries and contracts in comparison to the established network carriers (Jarach, 2004) (Easyjet case).

The response of the unions was invariably critical to the acquisition plan. The acquisition put further pressure on United's conflicting relationships with their unions, which were unwilling to make any concessions to senior management. United's unions were reluctant to approve further reductions in the labour conditions, after the salary cuts that the United management had imposed in Chapter 11 bankruptcy status (Mitchell and Carey, 2010 b.; Tita and Meyer, 2006). The majority of Continental employees had no union representation, nonetheless, its employees feared that the unions would favour their union members during the merger negotiations and would ignore the Continental workforce's requests (Carey, 2010 d.). Indeed, trade unions exploited the concerns of the Continental workforce and proposed union membership to Continental during the merger negotiations with United. As a consequence, Continental could lose its non-union status and damage its positive industrial relationships at the end of the merger process (Carey, 2010 d.; Johnsson, 2006) (Continental case). Alitalia trade unions opposed any job cuts and made clear that the government should favour the acquirer that envisaged maintaining both the Alitalia workforce levels and the routes, even if reductions were supported by economic and strategic arguments. Trade unions showed no flexibility in all the negotiations for the merger and challenged the Air France plan to transform Alitalia into a regional feeder for the Air France international hubs (Nativi, 2009; Kahn et al., 2008) (Alitalia case). Easyjet experienced labour conflicts because Go's and Easyjet's employees were represented by different unions, respectively Amicus (Graf, 2005) and Transport and General Workers Union (T&G) (People Management, 2002). Easyjet preferred to have one union in order to simplify the contractual negotiations after the acquisition (In-depth interview 1, 2007 Easyjet), hence it exclusively recognised Amicus, which had broad experience with low-fare carriers. Easyjet's workforce protested and reacted with a strike action plan (People Management, 2002). Easyjet eventually allowed its employees to choose their union representatives and both trade unions ensured a certain degree of flexibility in contractual negotiations after the acquisition (In-depth interview 1, 2007 Easyjet) (Easyjet case).

Carriers are required to finance the acquisition and provide a large amount of capital, which generate high financial expenses. The cost of capital constitutes the main part of the financial expenses in acquisitions (Eiteman et al., 2006) (Chapter 6, section 1.1). The airline industry has low operating margins, which are on average 6 percent (Tarry, 2004), whereas carriers would require a minimum of 10 percent operating margins to balance their financial expenses (Schofield and Wall, 2010; Tarry, 2007) (Chapter 4, section 1.2).

Consequently, the available financial resources are, in general, inadequate for funding acquisitions and carriers have difficulties in gaining capital from institutional investors, given the low margins in the airline industry. Empirical evidence shows that banks apply restrictions to funding when the economy slows down because financial performance for carriers is significantly related to economic cycles (Business Travel World, 2009) (Chapter 4, section 1).

Air France possessed large financial resources due to its positive economic results between 1997 and 2007 (Barber, 2007). Air France had the possibility to put forward the necessary capital for Alitalia, nevertheless, it grew increasingly cautious about its financial situation as its fuel hedges expired in 2008 (Fabey, 2008) and banks restrained access to funding in 2009 (Meichtry, 2009) (Alitalia case). During the first negotiation in 2007 between Continental and United, Northwest owned a special class of Continental shares and could apply a veto to Continental's mergers (Lengell, 2006). Continental could avoid Northwest's veto only by fully acquiring United. However, Continental had to substantially count on banks and increase its already high debts/assets ratio and overall cost of capital (Tita and Meyer, 2006). In the second negotiation in 2010, Northwest had lost its veto power on Continental, therefore, United and Continental devised an all-stock merger with no premium in order to avoid the restrictions that banks had applied on funding between 2008 and 2010 and reduce the financial costs. Nevertheless, the final share price became a controversial issue among the carriers and substantially delayed the negotiation process (Carey and Chon, 2010) (Continental case). Conversely, Easyjet exploited the positive climate that low-fare carriers had established in the financial market because of their favourable economic results (O'Connor, 2002), and turned to

institutional investors to support the Go acquisition, which was entirely covered by share rights issues (Euroweek, 2002). At the time of the acquisition, market capitalisation levels for low-fare carriers were considerably higher than for network carriers (O'Connor, 2002) (Easyjet case).

The evidence in the cases also confirms that the reorganisation in acquisitions requires a long period before acquisition benefits are achieved, and organisational diseconomies are particularly significant in the first period of the acquisition. Therefore, the carrier's financial resources are under further pressure because the cost of capital is recovered by the acquisition benefits after a long period and organisational diseconomies may necessitate further capital (Tita and Meyer, 2006; In-depth Interview 3, 2007 Alitalia; Baker, 2002 b.) (all cases).

Opposition to the acquisition is also explained by subjective motives, which emerge during the cases. Regulatory authorities and national governments indirectly exert pressure on carriers in cross-border acquisitions. Flag and regional carriers, and the domestic network that they serve, generate significant external economic benefits and touch strategic national interests, because they constitute important defence and emergency reserves. Additionally, national airlines are still regarded as prestige symbols for the country (Holloway, 2008) (Chapter 4, section 3.1). Therefore, governments and regulation authorities frequently use their political and economic influence to prevent their national carriers from being acquired by foreign carriers. The Italian government applied pressure to prevent Alitalia from being downgraded in terms of size and scope and preserve Alitalia's domestic network and hubs structure, although the proposed rationalisation of Alitalia was based on solid economic reasoning (Ezard, 2008 a.; Moore, 2006). The approach of the Italian government reflects the general Italian attitude on industrial policy. Italian governments sustain the institution of national champions with large domestic operations in strategic industries. Large domestic operations should guarantee the national champions to be competitive in international markets and achieve large profits and high employment rates for the Italian population (Clougherty and Zhang, 2009; Economist, 2008 g.). In addition, the Italian centre-right coalition emphasised

in their political campaign, the patriotic value of the “Italianness” of Alitalia and demanded that a number of Italian investors contribute to the reorganisation of Alitalia, rather than allowing Alitalia to be acquired by Air France (Sparaco, 2009; Scott, 2008) (Alitalia case).

Carriers have the propensity to establish codesharing with minority links, which are defined as equity exchanges between codesharing partners that amount to less than 50 percent of the shares (Wahyuni and Karsten, 2006). Codesharing with equity links can be divided into unidirectional, when a partner unilaterally acquires shares in the codesharing airline, or bi-directional, when two partners exchange their shares in codesharing (Tae and Park, 1997) (Chapter 5, section 6). Air France and Alitalia accomplished a bi-directional equity link when establishing their codeshare agreement in 2001, which encompassed a 2 percent share exchange. Alitalia and Air France also agreed on having membership on each other’s board (Betts, 2007). The share exchange was limited because of the modest financial returns in Alitalia and constituted a symbolic signal of shared commitment in the alliance (In-depth Interview 3, 2007 Alitalia). In 2009, Air France acquired a 25 percent stake in the newly reorganised Alitalia and was assigned the exclusive foreign partnership with the Italian carrier. Air France intended to protect its codeshare agreement with Alitalia and achieve some operational control on Alitalia through its minority position. Air France was indeed concerned that new investors in Alitalia had no interest in the long-term development of Alitalia, while Air France retained Alitalia’s feeding traffic in its international hubs as its strategic priority (In-depth Interview 8, 2010 Alitalia) (Alitalia case).

From the case, it emerges that equity links have the strategic goal of cementing the codesharing and showing commitment to partnership. Share exchanges are initially limited because of the average minor financial returns in the airline industry (Tarry, 2004) (Chapter 4, section 1.3), and constitute no economic investment in the other carrier. However, share percentages can increase if the carrier strives for operational control in the other carrier and equity links can reinforce the strategic importance of the codeshare agreement.

### 10.1.3 Decision Process between Codesharing and Acquisitions

The key factors that airline decision makers employ to evaluate codesharing and acquisitions emerged in the previous section by comparing the research design and the evidence from the cases.

The benefits and costs, that are associated with codesharing, are summarised in Table 10.1. The main differences between Table 6.1 in Chapter 6, which summarises the benefits and costs for codesharing in the research design, and Table 10.1 are underlined.

**TABLE 10.1**

#### **Codeshare's key factors**

|  |
|--|
| <p><i>Codeshare benefits</i></p> <ul style="list-style-type: none"><li>○ Economic<ul style="list-style-type: none"><li>- Portion of network traffic on complementary routes</li><li>- Density economies on complementary routes<ul style="list-style-type: none"><li>○ <u>Concentration on routes with higher output per unit</u></li><li>○ <u>Deployment of fewer aircraft with larger capacity</u></li></ul></li><li>- Economies of scope on complementary routes<ul style="list-style-type: none"><li>○ Global reach</li><li>○ Feeding traffic</li><li>○ <u>Connections between city pairs and spoke routes</u></li></ul></li><li>- <u>Adjustment of frequencies on parallel routes</u></li></ul></li><li>○ Competitive/Strategic<ul style="list-style-type: none"><li>- Secure future economic benefits against competitors</li><li>- <u>Avoid competitors from achieving excessive network scope</u></li><li>- <u>Avoid competitors from gaining feeding traffic into long-haul routes</u></li><li>- <u>Exchange of knowledge/Managerial methodologies</u></li></ul></li></ul> <p><i>Codeshare costs</i></p> <ul style="list-style-type: none"><li>○ Relational factors<ul style="list-style-type: none"><li>- <u>Differences on corporate culture</u></li></ul></li><li>○ Initial implementation costs</li></ul> |
|--|

- Harmonisation of reservation (IT) systems

It emerges from Table 10.1 that airlines apply strategies as if the codesharing implied an indefinite relationship between carriers and was not exposed to sudden termination. Partners re-allocate capacity and modify their aircraft typologies in their networks and increase or reduce frequency according to the other partner's requirements. In addition, costs associated to codesharing are more limited than expected, partners appear to effectively cooperate and are exposed only to differences in their corporate culture and IT systems.

Conversely, the benefits and costs, that are associated with acquisitions for the overall network, are summarised in Table 10.2. The main differences between Table 6.2 in Chapter 6, which summarises the benefits and costs for acquisitions in the research design, and Table 10.2 are underlined.

**TABLE 10.2**

**Acquisition's key factors**

*Acquisition benefits*

- Economic
  - Total traffic on complementary routes
  - Full access to route nodes
  - Traffic re-distribution among hubs
  - Total economies of density in complementary routes
  - Total economies of scope in complementary routes
  - Network rationalisation on parallel routes
  - Eliminate redundant capacity
- Competitive/Strategic
  - Defensive competitive move
    - Avoid competitors from securing transfer traffic on core hubs in adjacent markets
    - Maintain sufficient network to compete against merged competitors
  - Offensive move
    - Direct acquisition of main competitor
  - Exchange knowledge
    - Managerial methodologies

*Acquisition costs*

- Ex-ante
  - Valuation for intangible assets
    - Brand and managerial assets
  - Indigestibility assets
  - Labour regulations restraining the workforce downsizing
  - Redundant fleet
    - Problems in the second-handed aircraft market
- Ex-post
  - Interference from regulatory authorities
    - Maintain capacity in the network
  - Organisational diseconomies
  - IT and maintenance incompatibilities
  - Labour problems
    - Service disruptions
    - Compromise labour relationships
  - High cost of capital
    - Lack of financial resources
    - Difficult to rely upon market capitalisation

It emerges from Table 10.1 that acquisitions are established in order to gain control of airport slots, which are essential for new market entrants. Acquisitions are also employed in order to remove unprofitable and secondary routes that are not overlapping in the network and move capacity to airport hubs with growth potential and better traffic composition. Acquisitions are however exposed to higher costs than anticipated, in particular in the areas of regulative intervention, redundant fleet, labour issues, and IT and maintenance incompatibilities.

This research concludes that acquisitions provide superior economic benefits as compared to codesharing, with no interference from the airline regulation authorities. Nonetheless, it emerges from the cases that the differential between acquisition and codesharing benefits, is generally limited. In complementary routes, the differences between acquisitions and codesharing exclusively consist of the additional traffic on route lines that acquisitions entail, plus the economies of scope and density related to the additional traffic. In parallel routes, acquisitions enable carriers to eliminate unnecessary capacity and gain cost savings. Empirical evidence suggests that the advantages for acquisitions in parallel routes are much less than the academic literature suggests (Kiefer, 2005) (Chapter 5, section 10.1), because in codesharing, carriers already reduce their frequencies and reposition their traffic among their network hubs, even if codesharing agreements entail no long-term commitment for the carriers. As a result, acquisitions offer evident advantages compared to codesharing exclusively, if it is necessary to streamline several sections of the network in order to better allocate capacity in the network and reduce operational costs.

Acquisitions are associated with high costs of implementation and significant risks during the integration process as compared to codesharing. In the implementation phase, ex-ante costs are primarily formed by valuation problems for management and brand intangible assets as well as “indigestible” assets for fleet and labour, which are

in general higher than the codesharing initial costs for harmonising the reservation and booking systems. Furthermore, during the integration process, carriers can incur significant organisational diseconomies, labour disruption, and high capital costs, which are in general more costly than relational problems in codesharing.

Hence, this research demonstrates how acquisitions are mostly preferred to codesharing for strategic and competitive reasons. First, acquisitions are chosen when carriers need to rapidly enlarge their market share and expand their operations. Low-fare carriers in particular require to rapidly grow, given their low margins and low initial resources, and how acquisitions ensure added capacity and access to route nodes (Easyjet case). Access to route nodes is less relevant for network carriers because their networks are already established. Additionally, rapid growth is necessary to balance unexpected increases in the network scope from competitors as a consequence of another acquisition (Continental case). Acquisitions are also favoured over codesharing when carriers set out to indefinitely control key feeding traffic to their international hubs in their adjacent markets and prevent their competitors from establishing their presence in these markets (Alitalia case).

#### **10.1.4 Business Models**

This research confirms that carriers tend to select their preferred governance structure according to their business model (Chapter 4, section 8). The majority of network carriers establish wide-ranging codeshares with numerous partners, whereas low-fare carriers employ no codesharing agreements in their strategy.

The Alitalia and Continental cases demonstrate that codesharing delivers major advantages in terms of network scope and density to network carriers (Chapter 10, section 1.1). Indeed, network carriers increase their global destinations in codesharing and expand their offer in different market sections, where their partners have developed market knowledge and brand awareness. In addition, network

carriers differentiate their market presence in different passenger segments and exploit the available economies in their networks (Chapter 4, section 8.1). Conversely, the Easyjet case shows that low-fare carriers have no preference for codesharing. Easyjet applies a distinct strategy as compared to pure low-fare carriers because it offers primary destinations and higher-quality services at low fares in the European short-haul market (Gray, 2010). In this way, Easyjet positions its offer toward the business segment, which constituted 20 percent of its total passengers in 2010 (Gill, 2010 b.). Still, Easyjet achieves no advantages in codesharing in terms of network scope and feeding traffic because it provides scattered routes and no long-haul destinations, which require transfer traffic in order to achieve adequate load factors (In-depth interview 2, 2007 Easyjet). Codesharing benefits are limited to additional connections between existing destinations, which generate economies of scope in the network (Cattell, 2002). In Easyjet's case, business passengers are primarily attracted by low fares, ancillary services on demand, and high frequencies in primary destinations, hence codesharing induces no improvement in the market positioning toward the business segment (Chapter 10, section 1.1).

It can be concluded that the benefits are higher than the disadvantages and risks in codesharing in numerous instances for network carriers. Codeshares allow network carriers to achieve key strategic objectives and improve their market offer for business passengers, whereas codeshare disadvantages are associated with initial costs for harmonising the IT systems and problems in the codeshare relationship, which can be avoided if corporate cultures are consistent between carriers (Alitalia case; Continental case). Conversely, the limited codeshare benefits are, in general, inferior to the disadvantages for low-fare carriers. Indeed, codeshares add managerial complexity to the simple low-fare business model (In-depth interviews 4, 2010 Easyjet), and diversified distribution strategies are difficult to harmonise in codesharing (In-depth interview 1, Easyjet 2007) (Easyjet case).

In the long-term, codeshares will increase their relative importance for network carriers as low-fare carriers, such as Easyjet, further set their offer in the business segment and network carriers respond to the low-fare competitive threat. Network carriers will gradually focus their comparative advantages on their global networks and codeshares will provide the required feeding traffic and expansion in international market sections (Alitalia case; Continental cases).

Codeshares are also set to emerge in the low-fare context if a number of low-fare carriers establish their presence in long-haul flights (Chapter 4, section 8.2). Low-fare carriers in the long-haul market may capitalize on feeding traffic from short-haul, low-fare carriers; hence codeshares between low-fare carriers will be evaluated if long-haul low-fare carriers prove their sustainability in the long-term. Nevertheless, codeshares will be limited to feeding traffic in order to avoid organisational complexities in the simplified low-fare model. Consequently, codeshares will exclude the reallocation of capacity and density economies, and preclude agreements with network carriers. In this way, codeshare benefits will compensate for the organisational complexities and will become a strategic opportunity for low-fare carriers (In-depth interview 4, 2010 Easyjet).

Alitalia and Continental cases establish that for network carriers, acquisitions are devised to gain access to both the total traffic between the route nodes and the economies of scope and density relating to the two networks (Chapter 10, section 1.2). Additionally, acquisitions enable network carriers to eliminate redundant capacity and streamline the hub structures in order to improve the system revenues and achieve cost savings (Chapter 10, section 1.2). Nevertheless, acquisitions involve significant high ex-ante and ex-post costs, hence, acquisitions are considered for strategic and competitive reasons by network carriers (Chapter 10, section 1.3). Conversely, the Easyjet case shows that low-fare carriers necessitate rapid growth because of their low margins per passenger and limited initial resources (Pilling and O'Toole, 2002; Kangis and O'Reilly, 2003). The potential for low-fare traffic in the airline market also has structural limitations, therefore, low-fare carriers need to promptly establish their market presence (Sparaco, 2007 b.). Acquisitions allow low-

fare carriers to support their growth and obtain market share from low-fare consumers, which require high initial marketing investments (In-depth interview 1, 2007 Easyjet). Furthermore, low-fare carriers demand access to airport slots, where network carriers are established, and necessitate additional fleet (Bowermaster, 2002), especially if they offer their services from primary airports as in the Easyjet case (Parsons, 2002). Acquisitions provide long-term access to airport slots and additional capacity for low-fare carriers. Significant advantages in acquisitions correspond to lower costs for low-fare carriers. Low-fare carriers benefit from their being newly established enterprises and from setting up more flexible contracts with their employees than highly-unionised network carriers, which can be readily adjusted in the acquisition (Jarach, 2004). Labour redundancies are also restricted given the high growth requirements for low-fare carriers, and the fleet can be entirely absorbed because the fleet composition is simplified in the low-fare model (In-depth interview 3, 2010 Easyjet). Moreover, organisational diseconomies in merging the operations are less relevant for low-fare carriers because of the simpler low-fare operations. Low-fare carriers are, in general, less exposed to the high cost for capital in acquisitions because financial investors have favoured low-fare airline ventures due to their higher profitability; therefore, low-fare carriers can employ market capitalisation for funding their acquisitions (O'Connor, 2002). Low-fare carriers generate external economic benefits, however, they are not regarded as prestige symbols for the country, because they are detached from the national identity (Holloway, 2008). Low-fare airline networks are scattered and exclusively involve transportation of passengers, hence, they are not considered as defence and emergency reserves for the country (Jarach, 2004). Therefore, low-fare carrier acquisitions are not pressured by governments and regulation authorities, which tend to influence strategies for network carriers.

To conclude, acquisitions deliver key benefits and are less exposed to costs and risks. Consequently, low-fare carriers tend to establish acquisitions and disregard codeshare agreements to fulfil their strategic objectives.

## **10.2. IMPLICATIONS FOR THE LITERATURE**

This research reviews the decision process of airline organisations when choosing between alliances and acquisitions. This research shows that with no regulation, the decision process has differing results because the elements under evaluation vary according to the specific organisation, thus the airline executives choose alliances or acquisitions on a case-by-case basis. This research, nonetheless, contributes to the scholarly studies that explore the factors behind alternative modes of governance at an industrial and organisation level. The scholarly studies on alternative modes of governance are summarised in section 4, Chapter 3. Sections 2.1 and 2.2 contribute to fulfilling research objective no. 4, section 2.3 contributes to fulfilling research objective no. 5, sections 2.4 and 2.5 contribute to fulfilling research objective no. 6 (Chapter 1, section 2).

### **10.2.1 Industrial Level**

Airline organisations favour alliances to acquisitions in order to minimise the high degree of uncertainty in the airline industry, as argued by Datta et al. (2009), Wang and Zajac (2007), and Hoskisson and Busenitz (2001). However, the degree of uncertainty in the industry mainly originates from high political and economic instability (Chapter 4, sections 1-2-3), rather than the level of technology and change (Datta et al., 2009, Hagedoorn and Duysters, 2002; Vanhaverbeke et al., 2002). The aircraft manufacturing industry frequently introduces technological innovation and change into the industry (Browne, 2010) (Chapter 4, section 7), nonetheless, the airline organisations mainly use alliances in order to enlarge their scope and hedge the political and economic risks in different market regions (all cases). Airline organisations require flexibility and employ alliances in order to maintain a flexible structure as economic cycles and political threats modify the competitive scenario.

Alliances also avoid the risks of organisational complexities in acquisitions. In addition, opportunities for growth still exist in the airline industry because the airline services can expand against alternative modes of transport, as demonstrated by the growth of low-fare carriers (Chapter 4, section 8.2), and profit margins depend upon the network scope (Chapter 4, section 2) rather than simple corporate size (Hagedoorn and Duysters, 2002; Vanhaverbeke et al., 2002). Nonetheless, acquisitions can be instrumental in providing enough scope and size for the new technological bases that the aviation industry introduces. New typologies of aircraft, such as Airbus A380 and Boeing B747 Dreamliner (Sparaco, 2010; Coburn, 2010) increase the average size and long-haul capability of the fleet, therefore acquisitions can generate higher feeding traffic and more direct long-haul destinations in order to fully exploit the new aircraft (Continental case).

Airline organisations also apply alliances rather than acquisitions in order to reduce competitive conflicts, and acquisitions are not preferred in highly competitive scenarios in order to decrease confrontation with direct competitors, as argued by Wang and Zajac (2007) and Dyer et al. (2004). Airline organisations eliminate adverse price marketing strategies in alliances and commit long-term resources with their direct competitors as they modify their frequencies and scheduling in their network during the alliance. Alliances modify the profit margins because profit margins depend on the network scope in the airline industry, hence alliances are favoured over acquisitions in a concentrated industry (contrary to Wang and Zajac, 2007 and Hennart and Reddy, 1997) if the benefits related to the rationalisation are inferior to the advantages of the network expansion.

Organisational forms in the airline industry seem to follow specific trends and occur in waves in certain periods of time. Hence, airline organisations seem to imitate the organisational decisions of their competitors and focus on alliances or acquisitions in specific periods of time. This research validates the “bandwagon effects” for competitive reasons that Vanhaverbeke et al. (2002) identify in their studies and disconfirms Arikan and McGahan’s (2010) and Osborn and Hagedoorn’s (1997)

views on organisations looking for rules of conduct. Indeed, “bandwagon effects” occur in acquisitions when one major competitor announces the intention to acquire another airline. Airlines react by planning subsequent acquisitions in order to prevent the competitor from controlling excessive network scope and feeding traffic. Nevertheless, in accordance with Vanhaverbeke et al. (2002), the airline industry shows contrasting empirical evidence of “bandwagon effects” because numerous negotiations follow the announcement of one acquisition, however, the negotiations are terminated if the competitors withdraw the announcement. The negotiations can therefore start in order to put pressure on regulators rather than copying competitors’ strategies.

This research also proposes that the business model that organisations apply, influences the form of governance that the organisations select (Chapter 10, section 1.4). The organisations that implement a cost-leadership strategy prefer acquisitions over alliances primarily because they require rapid growth in the market and are less exposed to organisational diseconomies, whereas organisations that apply a differentiated strategy favour alliances over acquisitions because they base their competitive advantage on scope economies and incur organisational complexities when they expand their operational size.

### **10.2.2 Organisation Level**

This research extends the proposition that acquisitions are preferred over alliances when organisations plan to achieve economies of scale (Haleblian et al., 2009; Hoffmann and Schaper-Rinkel, 2001; Garette and Dussauge, 2000). The airline industry experienced limited scale effects (Chapter 4, section 2), nevertheless, acquisitions are chosen when airline organisations require to streamline and rationalise their network operations. Economies of scale are not the objective of the rationalisation process, nonetheless, acquisitions are instrumental in eliminating capacity and achieving reductions in functional costs. In alliances, operations are relocated between airline organisations and the number of operations arranged

among the networks because operations can be readily readjusted if the alliances are terminated. Nonetheless, if the operations are permanently removed, the airline organisations will face major difficulties in reintegrating them, due to the regulative and functional constraints in the airline industry (Chapter 4, sections 2 and 3). As a consequence, acquisitions are favoured to apply permanent changes to the operations because alliances are exposed to instability and uncertainty in their life-cycle (Wiklund and Shepherd, 2009).

In accordance with Bleeke and Ernst (1991) and Bekier et al. (2001), alliances are selected over acquisitions when airline organisations expand into new geographical markets. Airline organisations tend to concentrate their resources on their core operations and rely upon their partners for covering external geographical markets, where partners possess superior market presence and expertise. In this way, airline organisations reduce the necessary resources and minimise competitive conflicts when diversifying into new geographical areas. Conversely, acquisitions require major investments, which could subtract key resources from core activities, and increase organisational diseconomies in the network. Airline organisations appear to manage independently core operations, establish strategic alliances in close and significant geographical markets, and settle agreements with limited scope in peripheral geographic markets, where airlines involve few routes and have exclusive access to specific markets (Wang and Evans, 2002) (Chapter 5, section 1).

This research challenges the conclusions that the integration process is less complex between organisations in the same industry because corporate cultures and operational routines are similar (Hennart and Reddy, 1997), and similar technologies reduce information asymmetry and opportunistic behaviour (Gomes-Casseres, 1998). For these reasons, acquisitions should be facilitated between organisations in the same industry. Conversely, airline organisations, despite homogeneous technological assets (Chapter 4, section 7), reflect major differences in their corporate cultures and operational routines, which generate significant organisational diseconomies. Additionally, information asymmetry for specific intangible assets is observed in the

cases and results in significant controversies during the acquisition negotiations (Baker, 2003) (Chapter 10, section 1).

Airline strategies confirm that organisations choose acquisitions over alliances when core activities and operations are involved, in line with Lee and Lieberman (2010), Hagedoorn and Duysters (2002), Bleeke and Ernst (1991), and Harbison and Pekar (1999). Organisations would be exposed to major risks if core activities and operations were disrupted, therefore, they employ acquisitions in order to avoid the potential opportunistic behaviour and instability in alliances. Airline organisations adopt acquisitions in order to control the core feeding traffic in adjacent markets, which is essential in sustaining the long-haul routes in the network.

This research offers no specific contributions on the propensity for acquisitions or alliances between organisations from different countries. According to Hagedoorn and Sadowski (1999), acquisitions are favoured in order to gain control and lower monitoring costs, whereas Vanhaverbeke et al. (2002) and Schraeder and Self (2003) argue that alliances are preferred because pre-acquisition inspections are more complex in foreign countries and corporate values and operations are dissimilar between foreign organisations. Airline organisations show major differences in corporate cultures and operational systems that are independent from the geographical location, and appear to be modestly influenced by national cultural differences, despite the significant nationalistic features of airline organisations as a result of existing regulation (Chapter 4, section 3).

This study confirms that airline organisations exchange knowledge in alliances (Chapter 2, section 5). The exchange concerns tacit knowledge, which is defined as non-verbalisable, intuitive and unarticulated knowledge (Polanyi, 1962, in Nielsen, 2005). Tacit knowledge in the airline industry involves more managerial expertise and methodologies rather than technological capabilities, in contrast with Letterie et

al. (2008) and Lambe and Spekman (1997). In the airline industry, innovative technological bases are introduced externally by the aviation industry (Chapter 4, section 7), hence airlines do not establish alliances for developing new technologies. Nevertheless, alliance partners are employed to gain knowledge in the maintenance and ground handling units when new typologies of aircraft are introduced and airlines look for new maintenance routines. In addition, airlines require innovations and modifications in secondary services and distribution systems that are learnt during the alliance. Airline decision makers (Alitalia and Continental in-depth interviews) confirm that a “learning framework” and formal procedures favour the exchange of managerial expertise, where learning problems can be effectively solved, as recommended by Nielsen (2007) and Morrison and Mezentseff (1997). However, the exchange of tacit knowledge appears to be more effective in acquisitions, because acquisitions allow a more prolonged interaction and a managerial re-organisation if necessary (Alitalia and Continental in-depth interviews). Inkpen et al.’s (2000) conclusions are therefore confirmed, acquisitions can be a useful means for transferring knowledge, although managerial methodologies rather than technological capabilities are transferred in this instance.

### **10.2.3 The Evolutionary Process and Equity Exchanges**

This research provides significant insights into the integration process and minority equity links, which are related to scholarly studies on alliances and acquisitions as alternative forms of governance. Scholarly research on the integration process is summarised in Chapter 3, section 4, whereas research on minority equity links is summed up in Chapter 3, section 5.

In the airline industry, alliances contribute to identifying further synergies to capitalise upon if organisations proceed to a full acquisition. Airlines gain significant cost reductions if they reduce capacity in parallel and redundant routes (Chapter 10,

section 1), notwithstanding, airline organisations are hesitant to permanently cut capacity because capacity is difficult to restore in the airline industry (Chapter 4, sections 2 and 3). Alliances will favour subsequent acquisitions if opportunities for rationalisation are recognised because airlines can proceed to acquisitions and apply permanent changes to their network.

In addition, Gulati et al. (2009) and Vanhaverbeke et al. (2002) argue that alliances allow the gathering of information about partners, thus the acquisition ex-ante costs for information asymmetry on assets and valuation problems reduce as a consequence of the alliance relationship. Acquisition ex-post costs can also decrease because the organisations gain knowledge on the partner's routines and operational standards. Therefore, acquisition costs are diminished by alliance cooperation, hence acquisitions between alliance partners can be fostered. The research findings support an evolutionary process in alliances, i.e. the predictable evolution of alliances into full mergers. Codesharing appears to emphasise both the opportunities in terms of feeding traffic and similarities in business strategy and working style, hence, potential organisational diseconomies in the integration process become less relevant. Additionally, cooperation in codesharing lowers the perceptual differences in both operational costs and service performances among carriers (Alitalia case; Continental case). For these reasons, cooperation in alliances can reinforce arguments in favour of acquisitions among the airline decision makers.

This study, nevertheless, challenges the assumption that alliances are employed as phased investments with a future exercise date in concentrated industries (Oxley et al., 2009; Kogut, 1991). Organisations in concentrated industries have their limited potential acquisition targets, hence they establish alliances in order to pre-empt their competitors from acquiring their potential targets. Acquisitions will be accomplished when the acquisition costs will be delineated and financial resources will become available. Nonetheless, airline organisations appear not to establish alliances as phased divestitures for acquisitions. Airline organisations set alliances for competitive reasons, however, they seek to prevent their competitors from achieving the alliance benefits rather than to lock potential acquisition targets.

Airline strategies confirm that alliances tend to evolve in acquisitions only in limited cases, and alliances and acquisitions are independent and mutually exclusive choices in the airline industry, as argued by Wang and Zajac (2007), Reuer and Zollo (2005), Bierly and Coombs (2004), and Hagedoorn and Sadowsky (1999).

Airline organisations confirm that equity links are independent investments and constitute no attempt for a progressive full control in the other organisation (Dalziel, 2009). Equity links are exclusively employed in the airline industry to signal commitment and build trust in the alliance relationship and are negotiated either in conjunction with the alliance agreement or after a major expansion in the network involved in the agreement. The minority equity links in the airline industry are not regarded as financially profitable investments. Airlines in alliances can gain information on the real value of their partner assets and reduce opportunistic behaviour in asset evaluation, consistently with Gulati et al. (2009) and Allen and Phillips (2000), nonetheless, equity investments have purely strategic and symbolic purposes because of the low margins in the airline industry (Chapter 4, section 1). Investments in the airline industry usually focus on hedging the major costs, particularly the fuel costs (Chapter 4, section 4.2), and upgrading the fleet (Chapter 4, section 7), rather than diversifying the investment portfolio in other airlines. Additionally, airline organisations show limited opportunistic behaviour and demonstrate reciprocal trust in the alliance agreements, which is confirmed by the significant reallocations in frequencies in their network (Chapter 10, section 1). For this reason, airline organisations require no major equity investments in order to put pressure on the other airlines for complying with the alliance agreement.

This research validates the proposition that equity links are less common for partners in the same industry, in accordance with Filson and Morales (2004).

#### **10.2.4 Contributions to Scholarly Studies on Alliances**

The research results of this study can be compared and contribute to the scholarly studies on strategic alliances, which are reviewed in Chapter 2.

Codesharing in the airline industry substantiates the assumption that alliances are established for gaining resources that are indivisible and unavailable in secondary markets, consistent with Dyer and Sigh (1998) (Chapter 2, section 4). Routes are part of the overall network of the airlines, which develop their market positions in order to fulfil their strategic objectives. Given the operational and regulative constraints in the airline industry (Chapter 4, sections 2 and 3), the routes are unavailable in secondary markets.

Extensive codesharing (Chapter 5, section 1) can be classified as an integration alliance, where resources are jointly used in order to produce synergies in the partnership (Chen and Tseng, 2005) (Chapter 2, section 4). When two airlines cooperate in codesharing, they exchange traffic and gain synergies in terms of feeding traffic and increased scope.

Alliances in the airline industry are also applied in order to minimise strategic uncertainty, in accordance with Oxley et al. (2009) and Burgers et al. (1993) (Chapter 2, section 4). In the airline industry, uncertainty primarily originates from competition and codesharing allows to lock in competitors and avoid adverse competitive strategies, particularly aggressive price marketing strategies in parallel routes (Wakeam, 2003) (Chapter 5, section 3).

Alliances between airline organisations prove that informal safeguards are critical in the development of the alliance relationship. Multiple independent connections between the organisation evolve in the relationship, which are difficult to plan in

advance and have to be carefully managed, as outlined by Slowinski et al. (1995) (Chapter 2, section 6). Airlines tend to rely upon no formal safeguards in the form of economic hostages, such as equity exchanges (Chapter 10, section 2.3) and alliance-specific investments (Dyer and Singh, 1998), and formal contracts rarely establish guidelines for the relationship and are limited to the routes involved in the codesharing. As a consequence, informal relational factors are employed for regulating the cooperation, hence they are crucial for achieving the alliance objectives (Chapter 10, section 2.1).

This research does not investigate the relative importance of the specific relational determinants in the informal safeguards. Still, in the in-depth interviews in the Alitalia and Continental cases, reciprocal trust is indicated as the key relational factor for preventing opportunistic behaviour, as mentioned by Li et al. (2008), Reuer et al. (2006), and Murray and Kotabe (2005) (Chapter 2, section 6.1). Conflicts in the airline industry generally emerge from process controversies, which originate from differences in corporate culture and managerial methodologies (Poulymenakou and Prasopoulou, 2004; Jehn, 1994) (Chapter 2, section 6.4). Airline organisations confirm that frequent conflicts result in mistrust and can compromise the whole relationship, as suggested by Ghosh (2004). To conclude, positive relational determinants are confirmed to be significantly related to high performances in alliances, consistent with Nakos and Brouthers (2008) and Pansiri (2008).

This study posits that airline organisations should choose their partners according to market complementarity and resource compatibility. Airline organisations should select partners that share consistent organisational values and demonstrate compatible resources, in line with Mitsuhashi and Greve (2009) (Chapter 2, section 9). Gulati et al. (2009), Chang et al. (2008), and Emden et al. (2005) (Chapter 2, section 5) point out that organisations learn to cooperate and acquire a set of learning skills for developing alliances. A previous involvement in alliances indicates a positive approach toward cooperation and facilitates the relationship in the alliance. Partners with a previous involvement in alliances should therefore be favoured in the selection process. The Continental and Alitalia cases reaffirm that a previous

experience in alliances enhances cooperation, and carriers tend to employ similar methodologies that they had previously learnt in their long-lasting alliance relationship for counteracting their problems, in accordance with Pangarkar (2009) (Chapter 2, section 5).

During the alliance negotiations, the airline organisations are recommended to define the initial investments in the Information Technology (IT) and reservation areas, which are the critical areas at the beginning of the cooperation (Chapter 10, section 1.1), because the investments are significant and create exit barriers. Additionally, the alliance negotiation should specify the long-term advantages for investments, as suggested by Shawoll (2002) and Palati (2002) (Chapter 2, section 10). The initial investments should also be included in the initial contract in order to reduce following controversies, in line with Jiang et al. (2008) (Chapter 2, section 10).

Airline organisations appear to confirm that process controls favour cooperation in comparison to output controls, in accordance with Nakos and Brouthers (2008) (Chapter 2, section 11). Process controls primarily concern the general behaviour of partners in cooperating (Aulakh et al., 1996), whereas output controls concentrate upon the alliance results (Celly and Frazier, 1996). Excessive output controls tend to weaken the relationship because results in codesharing are complex to separate and depend on the overall structure of the network, whereas process controls improve the relationship because they show interest in the alliance (Alitalia case).

Airline organisations establish alliances in order to gain market opportunities. Opportunities always exist in the marketplace, hence alliances are infrequently terminated because the main objectives are fulfilled. Instability in the alliance encompasses major unplanned changes in the cooperation (Beamish and Inkpen, 1995) and results in variations in the governance structure of the alliance (Bierly and Coombs, 2004) (Chapter 2, section 12). In the airline industry, instability affects the

net benefits of the alliance because airline organisations will be unable to secure their market positions under unstable conditions. Therefore, this research confirms that the long-term stability of the alliance could be an effective indicator for alliance performance and alliance success, in line with Jiang et al. (2008) (Chapter 2, section 12). Additionally, airlines are inclined to expand their codesharing to other routes if their agreement is successful and include further operations, such as joint Frequent Flier Programmes (FFP's) (Chapter 5, section 1.5), as argued by Beamish and Inkpen (1995) (Chapter 2, section 12). Conversely, airlines apply no downsizing to their codeshared routes even if the alliance is not successful, contrary to Beamish and Inkpen (1995) (Chapter 2, section 12), but will maintain the agreement until the termination of the alliance.

To conclude, airline organisations show that alliance problems (Reuer and Zollo, 2005) (Chapter 2, section 12), which can result in the alliance termination and weaken the alliance performances, primarily originate from relationship issues (Chapter 10, section 1.1), as suggested by Li et al. (2008). Airlines experience conflicts and compromise their cooperation if they fail to manage their relational factors. Conversely, alliances in the airline industry tend to be stable despite major changes in the airline strategies, contrary to Reuer and Zollo (2005) (Chapter 2, section 12), and high competition outside the alliance, contrary to Bierly and Coombs (2004) and George and Farris (1999) (Chapter 12, section 1).

### **10.2.5 Contributions to Scholarly Studies on Acquisitions**

This study provides interesting insights to the general studies on acquisitions, which are reviewed in Chapter 3, sections 1 and 2.

During the acquisition negotiations, airline organisations experience problems in the valuation of intangible assets, in line with Ranft and Marsh (2008) and Chi (1994) (Chapter 3, section 2), which interfere with the acquisition process because the

organisations will trade their assets only if the evaluation of the assets corresponds to the negotiation price (Balakrishnan and Koza, 1993) (Chapter 3, section 2). In the airline industry, intangible assets primarily involve tacit knowledge in the form of managerial capabilities, which are problematic to estimate (Chapter 10, section 1.2). The evaluation of managerial capabilities encompasses the evaluation of the airline's previous performance, which combines strategic components and financial indices. Airline organisations have difficulties in agreeing on the value of their managerial capabilities, particularly in the area of strategy, which influences the future direction of the merged airline organisation. In many cases, controversies concern the service quality and operational costs, which determine the types of services to implement for the joint organisation (Chapter 10, section 1.2). Additionally, airline executives argue on the reasons behind negative financial performances, which can be associated either with poor management or with negative economic cycles (Chapter 10, section 1.2).

Acquisitions in the airline industry are also influenced by "indigestible" assets, which are redundant assets that offer no contribution to the airline service process after acquisition, in accordance with Beamish and Banks (1987) and Hennart (1988) (Chapter 3, section 2). Airline organisations are primarily affected by indigestible assets in the labour force. Labour is theoretically a "digestible" asset because it can be readily separated from other assets in the acquisition process. Nevertheless, labour regulations, especially in Europe, establish that labour contracts cannot be dismissed in the short-term and become indigestible assets if the workforce cannot be re-employed in the merged airline. The acquisition negotiations can be disrupted by complex discussions with the workforce over defining the number of acceptable redundancies following acquisition (Chapter 10, section 1.2).

In addition, the airline fleet can become "indigestible" if it is not re-employed in the joint network. In general, airline organisations rely upon an efficient second-hand aircraft market, hence the fleet can be disposed of at fair value in the market and aircraft can be readily transferred between airline organisations (Teichert et al., 2008). However, in the airline industry, efficient second-hand aircraft markets exist

exclusively when the economic cycle is positive and airline organisations add capacity in their network, otherwise, aircraft can be significantly devalued and receive no offer (Chapter 10, section 1.2). In this case, “digestible” assets can become “indigestible” according to the environmental conditions and the characteristics of the assets.

It emerges from the in-depth interviews that airline executives are concerned with the organisational culture in acquisitions, as argued by Kotter and Heskett (1992) (Chapter 3, section 2). Nevertheless, contrary to Chatterjee et al. (1992) (Chapter 3, section 2), inconsistencies in existing values and procedures, rather than the lack of flexibility of the organisations, generate organisational problems. Airline organisations appear to rapidly adjust to changes if they find corresponding values in other organisations, otherwise organisational problems can increase the diseconomies in the integration process. In addition, as pointed out by Reus and Lamont (2009), organisational differences in airline structures may have enriching effects because airlines appear to learn different methodologies in their interaction.

Airline organisations in particular face task challenges when they merge their operations, as in Brannen and Peterson (2009) and Marks and Mirvis (1992) (Chapter 3, section 2). Accounting and administrative practices are readily combined, nonetheless, information systems cause many problems in the integration. Information systems in the airline industry are formed by reservation systems, which use different protocols and require significant investments to combine, and luggage and passenger handling systems, which are more flexible to adjust.

Workforce issues can result in significant acquisition ex-post costs for airline organisations, in addition to “indigestible” problems. The acquisition is negatively perceived by the airline workforce, which interferes with the integration process and fails to support the joint efforts for combining the organisations, as outlined by Reus and Lamont (2009) and Buono (2003). The workforce in the airline industry grows significantly anxious for the integration of the contractual conditions, which

determine seniority lists and pension schemes, and proceeds in some cases to industrial action interrupting the airline service. In addition, lack of motivation and cooperation in the integration process results in dysfunctions in the work units and potential organisational diseconomies.

Trade unions in the airline industry always react unfavourably to acquisition and add pressure on the workforce to oppose the integration. The non-unionised workforce also worry that unions will exclusively defend the interests of unionised labour and airline executives will follow the requests of the trade unions.

In conclusion, top management in the acquired organisation can disapprove the acquisition and abandon the organisation after acquisition (Haleblian et al., 2009). Top management can hold key managerial capabilities that can be useful to the joint organisation. This research confirms that the top management experiences problems in adapting to the new corporate culture and strategies, as pointed out by Salama et al. (2003) (Chapter 3, section 2). This research, however, contradicts Burkart et al. (1997), who argue that joint ownership conflicts with performance-based incentive schemes (Chapter 3, section 2). The airline organisations readily adjust incentive schemes and maintain, in most cases, incentives for top management.

This study confirms that acquisitions generate significant financial problems for airlines, in line with Fredd (2005) (Chapter 3, section 2). Airline organisations achieve, on average, low operational margins (Chapter 4, section 1) and primarily rely upon bank loans rather than market capitalisation. In many cases, market investors disregard the airline industry because of its cyclical economic downturns, and financial institutions tend not to support acquisitions. Therefore, airline organisations have problems funding acquisitions and face financial problems after the acquisition (Fredd, 2005) (Chapter 3, section 2). The European low-fare carriers between 1999 and 2004 constituted an exception because market investors grew increasingly interested in their high operating margins and were ready to invest. Easyjet promptly exploited the market availability and completely funded its acquisition in Go through market investors (Easyjet case).

Airline organisations also confirm that benefits in the acquisitions are available only in the long-term, whereas costs and organisational diseconomies occur in the short-term and add pressure on the post-acquisition financial situation.

### **10.3. LINKS TO THE LITERATURE**

This study bases its main research assumptions on different theoretical approaches, which define the methods that organisations employ to establish their connections. Connections between organisations are instrumental in achieving their strategic objectives and influence their evolution in the competitive environment. This study (Chapter 6, section 1) refers in particular to two main theories, the Transaction Cost Economics theory (TCE) (Williamson, 1979, 1981, 1985, 1991) and the Resource Dependence theory (Rumelt, 1984; Wernerfelt, 1984). Both theories confirm that under specific circumstances, alliances and acquisitions are alternative and sometimes competitive forms of governance for achieving the most efficient structure or acquiring the necessary combination of resources (Chapter 2, section 2; Chapter 3, section 1). This study contributes to establish a theoretical framework on the connections between organisations and offers innovative perspectives on both theories. This section is instrumental in fulfilling the research objective no. 7 (Chapter 1, section 2).

As for Transaction Cost Economics theory, this study points out that acquisitions are the most efficient form of governance when airline organisations secure external routes. Acquisitions allow organisations to minimise their production costs, particularly if the two networks have significant duplications and organisations have to streamline their routes. Efficiencies are indeed relevant when organisations require to cut their assets because of duplication.

Contracts are inadequate to encompass the complexities of the exchanges between different routes in two networks because route specifications constantly evolve

according to the service requirements and the management and marketing of specific routes and are combined in the strategy of the airline. Consequently, airlines exclude contracts for exchanging routes. Internal development of routes entails the highest production costs because of the infrastructure requirements that the airline industry is subject to. New routes require terminal facilities as well as baggage and ground handling systems in place, plus additional marketing and administrative costs for the airline, hence internal development is the least efficient option and is not included in the decision process if other options are available. Regulation issues are excluded in this research framework (Chapter 6, section 2), nevertheless, access to slots in airports involves a lengthy authorisation process even if access to slots is not restrained by the “grandfather rights” (Chapter 5, section 10).

Alliances in the form of codesharing are close in terms of efficiency to acquisitions, primarily because assets can be shared at low marginal costs. Indeed, at the beginning of codesharing cooperation, organisations exclusively incur costs for coordinating their reservation systems, hence the overall production costs increase to a minor extent, as outlined by Hennart (1988) (Chapter 3, section 1). Additionally, airlines appear to minimise coordination problems in alliances because informal safeguards limit the opportunistic behaviour during the alliance life-cycle. Opportunistic behaviour is restricted, despite airlines significantly competing in the sections that are excluded by codesharing, because airlines develop a portfolio of relationships that controls the propensity for airlines to behave opportunistically. Airlines are also exposed to intense bargaining at the beginning of codesharing, nevertheless, the bargaining gradually decreases when codeshared operations are combined in networks. In conclusion, airline organisations limit their production costs because they implement strategies as if the alliances ensured an indefinite commitment, rather than being exposed to sudden termination. For example, airlines move assets among their hubs or permanently reduce capacity in their network in codesharing, although they get exposed to changes in the partner strategy with no formal guarantee (Chapter 10, section 1).

Conversely, acquisitions imply that assets are in some cases shared at higher marginal costs than alliances due to asset valuation issues and “indigestible” assets.

Moreover, acquisitions can result in high coordination costs due to the organisational diseconomies in the airline industry (Chapter 4, section 2) that increase the overall production costs. Therefore, the relative efficiency between alliances and acquisitions depends on the correlation between duplicated assets and marginal costs for sharing the assets. Nevertheless, relational factors between the organisations influence the relative efficiency of the two forms of governance.

This research confirms the criticisms made of the Transaction Cost Economics theory. Indeed, Transaction Cost Economics theory can be exclusively applied to static efficiency, as pointed out by Ghoshal and Moran (1996) and Zajac and Olsen (1993) (Chapter 2, section 2), and disregards both the relational factors in the alliances and the coordination problems in the acquisitions, which play a significant role in determining the production costs, in line with Globerman and Nielsen (2007) (Chapter 2, section 2).

As for the Resource-Based approach, this study argues that acquisitions are the most effective form of governance for gaining resources in networks because acquisitions allow for control of both the network line and the two network nodes. Consequently, the organisations gain indeterminate control of the network line and can independently fix the capacity in the line. Moreover, acquisitions are effective governance forms because they entail separating the duplicated resources in the network and eliminating them if the duplicated resources are unnecessary in achieving competitive advantages.

Conversely, airline organisations are unable to employ market exchanges in order to achieve their network resources because network lines are inextricably combined in other airline organisations and are unfeasible for short-term exchanges. Internal development is also impractical because airline organisations are entrenched in their network hubs, where nodes are primarily located, and are generally unwilling to release nodes to their competitors. This research excludes regulation issues (Chapter 6, section 2), nonetheless, nodes are in many cases unavailable due to the “grandfather rights” in airports (Chapter 5, section 10).

Alliances enable partners to gain access to the network lines, however, network nodes are excluded by the codesharing and airline organisations are subject to unpredictable changes in the agreement that can compromise the access to the resources. In addition, the access to network lines is partial because airline partners retain part of the control in the network line and release control according to their strategic priorities. Nevertheless, alliances consent to effectively combining the resources in the network if resources are complementary and are employed in accordance with the strategic requirements of the alliance partners. Alliances also allow the exploitation of synergies that originate from the combination of the complementary resources in the form of economies of scope and density. In conclusion, airline organisations permanently reallocate resources in order to achieve competitive advantages, although alliances secure only partial control of the network lines. Consequently, the competitive advantages that can be gained through alliances can be inferior to acquisitions to a limited extent. Additionally, acquisitions in some cases imply high costs for sharing the resources, which originate from valuation problems, “indigestible” resources, and diseconomies of organisation. Therefore, acquisitions are more effective than alliances in gaining external resources only if significant duplications in the networks exist. Moreover, the acquisitions can be favoured because the resources have a crucial strategic value for organisations. Indeed, the airline organisations apply acquisitions if they plan to indefinitely control a number of resources when the resources are associated with key competitive advantages.

This research supports the criticisms of the Resource-Based approach. Organisations are encouraged to share resources and maximise their synergies in alliances, rather than prevent other organisations from gaining full access to the resources, in line with Gulati (2007) (Chapter 2, section 2). Relational informal mechanisms in the alliances will indeed offer the airline organisations the opportunity to maximise their synergies and achieve similar advantages to acquisitions.

## 10.4. AREAS FOR FURTHER RESEARCH

This study can be analysed in broader settings in order to improve the generalisations arising from the research conclusions (Chapter 6, section 4). In particular, this study can be extended to different business models, geographical areas, or a combination of both. In the airline industry, the main business models that carriers apply are network strategies, low-cost strategies, and regional and charter strategies (Chapter 4, section 8). In addition, airline carriers cover three main regional markets, the US market, the European Union market, and the Asian market (Chapter 4, section 1).

Low-fare carriers differentiated their offer on the long-haul marketplace and achieved encouraging financial results, although their business model is still to be proven in the market (Chapter 4, section 8.2). Long-haul low-fare carriers evaluate the opportunity to establish tactical codesharing with low-fare carriers involved in the short-haul market, and are set to consider more complex codeshare agreements if they continue to expand. Further research on the codeshare agreements between long-haul and short-haul carriers would contribute to examining more effectively the role of network economies for low-fare carriers.

In addition, the analysis of acquisitions and codesharing of short-haul low-fare carriers can cover the US market, where low-fare carriers play a significant role, particularly Southwest, which was first to be established (Chapter 4, section 8.2). This study analyses only the strategic behaviour of Easyjet, which is a major market player in the European low-fare market and offers higher-quality services than its pure low-fare competitors, such as Ryanair (Gray, 2010) (Chapter 9, section 1.3).

As mentioned in Chapter 5, section 9, regional carriers are often acquired by network carriers during their expansion. Nevertheless, the propensity to acquire regional carriers appears to be different across geographical areas. The European network carriers are inclined to acquire their regional carriers, whereas the US network carriers tend to sell off their regional subsidiaries and create independent carriers.

The strategic importance of domestic markets in Europe for feeding traffic into international routes probably explains the different behaviour between European and US carriers, nonetheless, environmental and economic factors should be further explored to comprehend the reasons for the acquisition of regional carriers.

In conclusion, the investigation of airline alliances and acquisitions should cover the Asian market region. The Asian market has significant potential for market growth (Chapter 4, section 1.2), nevertheless, the economic recession could slow the expansion in capacity and prompt a consolidation process among the airlines.

This research focuses exclusively on the benefits and costs which those alliances and acquisitions generate for the airlines. Yet, alliances and acquisitions also have significant effects on airline stakeholders, where further research can be directed. Firstly, consumers can have their available services modified by alliances or acquisitions in terms of fares, number of destinations in the network, and frequencies per destination. A number of studies (Lin, 2008; Goh and Yong, 2006; Hassin and Shy, 2004; Brueckner, 2003; Oum et al., 2004; Oum et al., 2000; Park and Zhang, 2000; Park, 1997) (Chapter 5, section 7) evaluate the effects of alliances on consumers, however, no existing study estimates the relative impact of alliances or acquisitions on consumers. This research can also be extended to the comparative effects that alliances and acquisitions have on the general economy in terms of aggregate demand and market outcomes. In conclusion, the channels of distribution (Chapter 4, section 6) in the airline industry are affected by the propensity of the airlines to form alliances or acquisitions, hence further research would be useful to evaluate whether alliances or acquisitions favour travel agencies or website distribution providers.

Further investigation is necessary in order to explore the subjective motives and beliefs that airline executives experience during the decision process. In the cases, airline executives were shown to be influenced by subjective perceptions, which played a significant role in the selection and negotiation processes and evolved

differently as the airline organisations worked together. Qualitative methods helped distinguish between the objective and subjective reasons in the decision process and the subjective negative reactions of the management to acquisitions were classified as ex-post costs in the acquisition process. Nevertheless, the exclusive exploration of the more subjective qualitative methods will be useful in gaining a complete comprehension of the elements in the decision process.

Additionally, connections between the political agendas and managerial priorities would be an interesting area of investigation. Politicians exert a significant pressure on the airline executives because the airlines still have a strategic role in the nation's infrastructure and economy (Chapter 4, section 1), especially in partially state-controlled airlines. The influence of the politicians in the decision process is an important factor when evaluating subjective motives.

This research exclusively explores the dyadic exchanges between airline organisations and the case studies were limited to two actors (Chapter 6, section 1). The alliance constellations (Chapter 5, section 5) were excluded in the decision making process for research purposes and were classified as benefits or drawbacks for the alliances or acquisitions. The membership in an alliance constellation could be evaluated either as an advantage if the alliance constellation was consistent with the airline strategy, or as a disadvantage if the alliance constellation resulted in incompatibilities in the information system. Nevertheless, the alliance constellations play a major role in the airline competitive environment as alliance constellations allow for a global scope and become a key component in consumer choice (Chapter 5, section 5). Hence, alliance constellations significantly influence the airline's individual strategies and their decision process between alliances and acquisitions.

Alliance constellations can be classified as inter-organisational networks, which are connected in a network fashion and are arranged by market mechanisms (Zeffane, 1994; Miles and Snow, 1992) (Chapter 2, section 7). Gulati and Gargiulo (1999) argue that external networks influence precursors, processes, and outcomes in alliances (Chapter 2, section 7), hence further research is necessary in order to

appreciate how the alliance constellations shape the decision process between alliances and acquisitions in the airline industry.

Furthermore, Walter et al. (2007) and Gulati (1998) reasons that the external network has an effect on the information flow between network members because it encourages the exchange of minute information and tacit knowledge (Chapter 2, section 7). Luo and Deng (2009) and Walker et al. (1999) point out that information efficiently circulates in industries where organisations are all interconnected and relationships will be based upon social constraints, which prevent opportunistic behaviour. An organisation will lose its reputation in engaging in opportunistic behaviour because the information will instantly spread in the network. In this research, airline organisations were observed to have limited opportunistic behaviours and engage in cooperative strategies, despite the significant competitive elements outside the alliance. Further research will be instrumental in evaluating whether airline behaviour is to be associated with the interconnections in the airline industry as well as the information exchanges and social constraints in the external networks. Additionally, Gulati (1998) argues that cultural problems are multiplied by external networks because of the interconnections in the information. Further research could confirm whether the problems for cultural differences in the airline industry are related to the external network structure.

Acquisitions and alliances are compared in a context where network economies play a primary role. The airline industry features economies of scope and density (Chapter 4, section 2), which increase the advantages of large route networks and produce synergies when networks are connected (Chapter 10, section 1). Economies of scale are conversely minor in the airline industry, hence the operational size secures no benefits for the airline (Chapter 4, section 2). This research should be extended to industries that depend on network economies and show oligopolistic tendencies that are related to network economies. The telecommunications industry has, for example, similar characteristics to the airline industry, where communication lines are connected in a network fashion and are coordinated by market mechanisms. The relevance of economies of scope and density in the telecommunication industry

should be evaluated during the decision process between alliances and acquisitions, and the research results will confirm or disconfirm that economies of network and organisational diseconomies have a primary role in the choice of governance forms in network industries.

## **10.5. RESEARCH IMPLICATIONS**

### **10.5.1 Implications for National and Extra-National Authorities**

The research findings (Alitalia case; Continental case) indicate that the airline regulative authorities at both national and international levels interfere with the decision process between alliances and acquisitions, even if the research framework excludes conditions where alliances or acquisitions are banned (Chapter 6, section 2). Regulative authorities intervene in the decision process for anti-trust considerations and political motives, and influence the factors under investigation by the airlines.

Political priorities and competitive structures are a prerogative of governments, however, this research suggests that the regulative authorities should adjust their intervention in order to minimise the problems for the airlines. Alliance partners are restrained from establishing joint fares and coordinate their frequencies in their destinations for competitive reasons. Regulative authorities can exempt the airlines from these obligations after the examination of the competitive effects (Knibb, 2009; Brueckner, 2003) (Chapter 5, section 2), nevertheless, the air transport authorities generally implement a complex evaluation process with uncertain outcomes. Additionally, the US and EU authorities consider the competitive effects differently adding complexities to international alliances. Indeed, the US tends to concentrate upon the effects on geographical regions, whereas the EU emphasises the overall effects on individual city pairs. The market of reference is consequently different because competition in geographical regions concerns leisure traffic, whereas

competition within individual city pairs concerns business passengers (Knibb, 2009) (Chapter 5, section 2).

The air transport authorities are recommended to apply clearer rules with determined outcomes and coordinate the policies between the US and EU, in particular after the constitution of the US/EU “Open Skies” agreement (Yu-Chun et al., 2009) (Chapter 4, section 3.2). The implementation of common rules between the US and EU for competitive policies on alliances can constitute a framework for the entire airline industry. The examination process should also have a defined time frame, because in the airline industry, competitive conditions change rapidly and airlines are required to take prompt decisions.

Acquisitions are also under scrutiny for competitive reasons by airline authorities. In addition, acquisitions are strictly monitored because they can result in capacity cuts in specific destinations that have no alternative means of transport. Civil airlines are also considered as an essential national reserve for emergency or military uses, hence airline authorities seek to avoid the national airlines from being dismantled (Chapter 4, section 1). The airline acquisitions are therefore exposed to a complex examination process, where economic and political considerations are interrelated, that slows down the acquisition negotiation process and becomes an ex-ante cost for the acquisition (Chapter 10, section 1.2). The air transport authorities should implement more transparent and consistent examination procedures in coordination with the examination of alliances, hence the decision process between alliances and acquisitions will be influenced by regulation to a lesser extent and economic factors will play the major role. Objective regulative procedures will also prevent airline competitors from negotiating acquisitions in a “bandwagon effect” in order to put pressure on airline authorities (Chapter 10, section 1.2). The same considerations apply for acquisitions on the coordination of policies between the US and the EU in the attempt to establish a framework for the entire airline industry. Furthermore, the political priorities should be carefully evaluated and in some cases minimised. Considerations of the national airline as a symbol for the entire nation are anachronistic, in particular after the introduction of the “open skies” agreements in

the EU and between the US and EU (Chapter 4, section 3.2), and can result in major losses for the public finances if an acquisition with sound economic reasoning is denied for political motives.

### **10.5.2 Implications for Practitioners**

The empirical evidence in this study (all cases) demonstrates that airline practitioners are required to carefully evaluate alliances and acquisitions before finalising their decision process. A poor choice can compromise the network competitive positioning and the existence of the whole airline venture. In particular, acquisitions are associated with ex-ante and ex-post costs that expose the airline to operational disruptions and financial problems. The potential costs for the acquisition need to be identified at the beginning of the negotiation, and compared with the benefits, which are in general available only in the long-term. Acquisitions are especially effective when numerous routes are duplicated because acquisitions ensure the necessary stability for streamlining the network. Otherwise, practitioners in network airlines should consider alliances given that alliances present less strategic risks and costs and normally develop fewer organisational problems.

## **10.6. SUGGESTIONS FOR PRACTITIONERS**

Airline practitioners are recommended to constantly review the revenue-added benefits and costs of the alliances which they have established. The estimation of the alliance benefits requires a combination of quantitative factors because the economies of scope and density in the network are difficult to identify. In many cases, the airlines exclusively compute the traffic that they gain in the codeshared routes, nonetheless, they disregard the additional economies that the alliance

generates in the network. Additionally, airline practitioners should estimate the theoretical upper limit of the alliance benefits and compare it to the existing benefits. In this way, potential relational and organisational problems can be identified more effectively in the alliance and appropriate measures can be implemented.

In general, airlines seek to estimate the benefits and costs of the alliance for their own operations and they tend to exclude the total benefits that the alliance delivers. Therefore, airline practitioners may implement strategies that are inconsistent with the long-term objectives of the alliance. Alliance projects that generate revenue losses for the individual airlines should be carefully evaluated if the losses are compensated by the overall benefits to the other airlines. For example, airlines could choose to apply the alliance project in any case and agree to share the additional revenues according to different criteria, such as market share, profits, and total revenues.

Airlines are shown not to compete in the routes that are excluded by the codeshare agreement and implement no aggressive price marketing strategies on these routes (Chapter 10, section 1.1). However, the routes that are not involved in extensive codesharing (Chapter 5, section 1) receive less resources in the areas of marketing, sales and services from the alliance partners and they get exposed to the competitive attacks of external airlines (Alitalia case). Partners in the alliance could solve the problem with the financial involvement of all the routes in the network, including the routes that are not covered by the alliance, because the airlines will be encouraged to invest resources in the entire route system. Limited percentages of financial commitment in all the routes may be effective in directing marketing and promotional resources on the routes of the partner with no codesharing coverage.

As mentioned in Section 1.1, the alliance relationship is influenced by relational factors that potentially undermine the benefits of the alliance. As a consequence, airlines are suggested to set exact objectives and appropriate activities in order to ensure the full comprehension of the partner's corporate culture and organisational

approach. Prolonged staff exchanges between partners in different areas are useful in establishing a common cultural environment in the alliance. Frequent communication with the partner workforce should also be encouraged with the introduction of intranet and internet systems between the partners, where staff can post their doubts on the alliance operations and report possible solutions to alliance problems.

Empirical evidence (Alitalia case; Continental case) shows that a number of alliances and alliance constellations (Chapter 5, section 5) have applied a project-oriented organisational approach for alliance operations in order to reduce conflicts and long negotiations in the alliance relationship. Specific alliance operations are assigned a project, which has a defined time frame and resources for its accomplishment. The project is independent from the airline operations and it is possible to modify the airline organisation if it is specified in the objectives of the project. The project-oriented approach appears to be more effective than the functional approach, where different airline departments experience problems in balancing their assigned tasks with the alliance operations.

Airlines either establish a specific department for the alliances or leave the alliance management to different departments, normally the Marketing and Sales Department. In the former case, the alliance department is, in general, able to effectively accomplish the alliance operations and minimise the problems in the alliance, in particular for the reservation system. In the latter case, independent departments have problems in combining the department operations with the alliance necessities, in line with the functional organisation arguments. Therefore, the independent departments should be supported by the entire airline organisation, which should be constantly informed of the evolution of the alliance and should be incentivised to satisfy the general needs of the alliance. The alliance department or the functional departments are suggested to pay particular attention to the frontline and primary service staff, which should be trained to provide uniform service standards to the customers of the partner airlines.

Alliances between network carriers (Chapter 10, section 1.3) are designed to improve positioning in the business segment, which is sensitive to the network scope and frequencies (Chapter 4, section 5.1). Nevertheless, airlines get exposed to competitive threats in the leisure segment when they establish codesharing agreements. Indeed, airlines tend to focus their marketing resources to promote new available routes to business customers and take away resources from the leisure segment, which is responsive to sales promotions in the short-haul market. In this way, the network airlines get vulnerable to competitive attacks from short-haul low-fare airlines (Chapter 4, section 8), which exploit the diminishing marketing resources and implement aggressive sales promotions. Network carriers are recommended to balance their marketing efforts when they enter into a partnership and maintain resources in the leisure segment, which is increasingly receptive to the network scope on particular destinations.

As for acquisition, airline practitioners should agree on the future leadership, ownership structure, and strategic directions of the joint organisation before the implementation of an acquisition. No clear guidelines can result in continuous consultations during the integration process and intensify the organisational diseconomies, which are significant in the airline industry (Chapter 10, section 1.2). Additionally, airlines are recommended to define the exact time framework for the combination of the activities, which should be strictly observed, and apply a project-oriented approach for the activities, in line with the alliances. Empirical evidence (Easyjet case) confirms that an exact time framework helps minimise the organisational diseconomies and provides an incentive for concentrating key resources upon the integration process. Moreover, time is a sensitive issue for acquisitions because the airline share value decreases severely during the negotiation process and airlines are exposed to competitive attacks from other airlines. In conclusion, airlines should apply a stepwise method when integrating their operations, as already demonstrated in the Air France-KLM merger (Alitalia case). Carriers are recommended to identify functional areas that require full integration in

order to achieve synergies and concentrate their managerial resources in their integration. The remaining functional areas that do not require full integration can be coordinated similarly to a codeshare agreement. In this way, carriers can focus their efforts in minimising organisational diseconomies in a limited number of functional areas and fully achieve the available synergies.

All cases demonstrate that trade unions react unfavourably to acquisitions and interfere with the integration process. Trade unions also negatively influence the workforce attitude towards the acquisition. For this reason, the representatives of trade unions should be included at the very beginning in the acquisition process and their reactions should be carefully monitored by the airline executives. Airline executives should look for acceptable compromises with the trade unions, where immediate losses in terms of revenues are compensated for a seamless integration process.

Acquisitions are negatively perceived by the workforce independently from the trade union responses, because the workforce gets concerned about potential redundancies and changes to the seniority lists and pension schemes as a consequence of the acquisition (all cases). The negative reaction of the workforce can result in labour disruptions and reduced commitment to the activities of the integration (Chapter 10, section 1.2). Consequently, airline executives should monitor industrial relationships from the beginning of the acquisition process and constantly communicate with the staff. The communication should be accomplished with as many channels as possible, such as phone, emails, intranets, letters, and should constantly reassure the workforce that the integration process will not entail any modification to industrial relationships after the negotiation process. The communication should also stress the new career opportunities that the acquisition opens as well as the general benefits for the airline. Moreover, airline executives are advised to design joint incentive schemes and seniority lists at the beginning of the integration process, which should encompass the existing privileges for the workforce. In this way, staff perceive no fracture in the industrial relationship during the integration process.

Airlines frequently experience financial problems during the integration process because acquisitions imply high financial expenses (Chapter 10, section 1.2). The airline practitioners are recommended to cautiously estimate the financial requirements for acquisitions in order to avoid potential problems. Firstly, acquisitions produce benefits only in the long-term after prolonged transitory periods, which are commonly underestimated by airline executives. High organisational diseconomies in the initial integration process can also drain major financial resources from the airline organisations. Organisational diseconomies are usually difficult to estimate during the negotiation process. In conclusion, airline practitioners should prudently evaluate their financial risk exposure in terms of changes in major airline costs, such as jet fuel (Chapter 4, section 4.2), which can imply a lack of financial resources when organisational diseconomies are at their peak in the two-three years following the acquisition.

## SUMMARY

This study shows that in the civil airline industry, acquisitions are able to achieve superior economic advantages when compared to alliances in a deregulated research framework. The additional economic advantages in acquisitions are, however, restricted because airlines allocate capacity and reduce frequencies between their networks in alliances, although the alliances offer no guarantee for the long-term. Therefore, the difference between the acquisition and alliance benefits is significant only if airlines necessitate the rationalisation of numerous routes and maximise their network economies.

Acquisitions generate relevant ex-ante costs and high risks during the combination as opposed to alliances, which are exclusively exposed to relational problems after the initial coordination costs for the IT systems. As a consequence, acquisitions are for the most part chosen over alliances for strategic and competitive motives, primarily rapid expansion of the operations, response to sudden growth of the direct competitors, and indeterminate control of feeding traffic into the international hubs.

This research confirms that airlines select alliances over acquisitions because they require a flexible structure in an unpredictable environment. Airlines also implement alliances rather than acquisitions in an attempt to decrease the level of competition, even if the airline industry displays highly competitive markets. Additionally, the business model that airlines apply influences the decision process between alliances and acquisitions. Low-fare carriers favour acquisitions and avoid alliances because acquisitions ensure rapid market growth and alliances add administrative complexities to their simple model, whereas network carriers appear to establish broad alliances in order to increase their network scope and are exposed to high organisational diseconomies when they establish acquisitions.

This research emphasizes that acquisitions are chosen over alliances when airlines require to streamline their operations, despite the limited scale economies in the airline industry. Acquisitions allow a decrease in operational costs with limited scale effects by cutting unnecessary capacity and restructuring the networks. Airlines are inclined to favour alliances over acquisitions when diversifying into new geographical areas in order to focus their core resources on their key markets and employ the networks of their partners for more distant routes. Conversely, airlines tend to choose acquisitions over alliances when central operations and activities are involved in order to exclude the potential instability and opportunistic behaviour in the alliance relationship. This study also questions the assumption that acquisitions between organisations in the same industry entail a less complex integration process, because airlines experience significant organisational diseconomies in implementing the acquisition.

To conclude, this research offers no support to the potential evolution of alliances into full mergers between partners. On the contrary, cooperation in alliances can emphasise differences in operational costs and corporate culture, which can reduce the incentives for proceeding to acquisition. This study also confirms that equity links are in the airline industry independent investments, which intend to signal commitment and build trust in the alliance, rather than implying gradual full control in the other organisation.

## References

Abrahamson, M. (1982), *Social research methods*, Prentice Hall, Upper Saddle River, New Jersey, USA.

Adams, M. (2007), "Senators to explore airline merger", *USA Today*, Jan. 22, pp. 4-5.

Adams, G.R. and Schvaneveldt, J.D. (1991), *Understanding Research Methods*, 2<sup>nd</sup> Ed., Longman Group, United Kingdom.

Agarwal, S. and Ramaswami, S.N. (1992), "Choice of foreign market entry mode: Impact of ownership, location and internalization factors", *Journal of International Business Studies*, 1<sup>st</sup> Quarter, Vol. 23, Issue 1, pp. 1-27.

Air Cargo World (2008), "Merger Mania", *Air Cargo World*, Feb., Vol. 98, Issue 2, p2.

Air Cargo World (2010), "Low-cost carriers make their pitch for cargo", *Air Cargo World*, Feb., Vol. 100, Issue 2, pp. 4-6.

Air Transport World (1999), "KLM/Alitalia: a 'new industrial model'", *Air Transport World*, Sep., Vol. 36, Issue 9, pp. 19-21.

Air Transport World (2002), "Easyjet to buy GO, may add Deutsche BA", *Air Transport World*, Jun., Vol. 39, Issue 6, p7.

Air Transport World (2005), “Air France-KLM Group”, *Air Transport World*, Feb., Vol. 42, Issue 2, pp. 26-27.

Air Transport World (2006), “World Airline Report”, *Air Transport World*, Jul., Vol. 43, Issue 7, pp. 74-83.

Air Transport World (2008), “Easyjet”, *Air Transport World*, Jul., Vol. 45, Issue 7, p82.

Air Transport World (2009), “News Briefs: Financial results, new deals, and reports from every corner of the globe”, *Air Transport World*, Feb., Vol. 46, Issue 2, pp. 9-21.

Air Transport World (2010a.), “World Airline Financial Results”, *Air Transport World*, Jan., Vol. 47, Issue 1, pp. 37-40.

Air Transport World (2010b.), “Individual Airline Fleets”, *Air Transport World*, Jul., Vol. 47, Issue 7, pp. 95-107.

Air Transport World (2010c.), “News Briefs”, *Air Transport World*, Nov., Vol. 47, Issue 11, pp. 9-20.

Airfinance Journal (2007), “Five SkyTeam alliance members seek antitrust immunity, again”, *Airfinance Journal*, Mar., Issue 298, p5.

Airfinance Journal (2008), “Alitalia accepts Air France/KLM takeover offer totalling €747 million”, *Airfinance Journal*, Apr., Issue 309, p35.

Airfinance Journal (2009a.), "Continental reports \$136 million loss", *Airfinance Journal*, Apr. 20, p57.

Airfinance Journal (2009b.), "Export credit for A320s leased to Alitalia", *Airfinance Journal*, Sep. 28, p26.

Airline Business (2003a.), "Carriers on road to consolidation", *Airline Business*, Jun., Vol. 19, Issue 6, p14.

Airline Business (2003b.), "Who should decide?", *Airline Business*, Dec., Vol. 19, Issue 12, p7.

Airline Business (2005a.), "Coming together", *Airline Business*, Apr., Vol. 21, Issue 4, p7.

Airline Business (2005b.), "Alliances are still a unstable affair", *Airline Business*, Aug., Vol. 18, Issue 6, pp. 42-45.

Airline Business (2007a.), "Bye bye bankruptcy?", *Airline Business*, Mar., Vol. 23, Issue 3, p9.

Airline Business (2007b.), "Signs of softness", *Airline Business*, Jun., Vol. 23, Issue 6, pp. 80-81.

Airline Business (2007c.), “The Southwest effect”, *Airline Business*, May, Vol. 23, Issue 5, p7.

Airline Business (2007d.), “...as GB buy boosts Gatwick hub”, *Airline Business*, Dec., Vol. 23, Issue 12, p19.

Airline Business (2008a.), “AirTran slows expansion”, *Airline Business*, Apr., Vol. 24, Issue 4, p16.

Airline Business (2008b.), “Consolidation spurs Ryanair ambitions”, *Airline Business*, Oct., Vol. 24, Issue 10, p16.

Airline Business (2009a.), “Hail Alitalia!”, *Airline Business*, Feb., Vol. 25, Issue 2, p9.

Airline Business (2009b.), “Oneworld prioritises cost savings”, *Airline Business*, Jul., Vol. 25, Issue 7, p14.

Airline Business (2009c.), “Watch Out For Hybrids”, *Airline Business*, Mar., Vol. 25, Issue 3, p57.

Airline Business (2009d.), “SkyTeam moves to the next level”, *Airline Business*, Aug., Vol. 25, Issue 8, p8.

Airline Business (2009e.), "Airline Alliance Survey", *Airline Business*, Sep., Vol. 25, Issue 9, pp. 56-60.

Airline Business (2009f.), "American's Agenda", *Airline Business*, Dec., Vol. 25, Issue 12, p70.

Airline Business (2010a.), "Missed the boat", *Airline Business*, Apr., Vol. 26, Issue 4, p74.

Airline Business (2010b.), "The Perfect Couple", *Airline Business*, Jun., Vol. 26, Issue 6, pp. 73-74.

Airline Business (2010c.), "Airline Alliance Survey", Sep., Vol. 26, Issue 9, pp. 32-44.

Airline Industry Information (2001a.), "Alitalia in talks with several carriers", *Airline Industry Information*, Feb. 21, p10.

Airline Industry Information (2001b.), "Continental Express IPO announced Airline", *Airline Industry Information*, Jul. 11, pp. 12-13.

Airline Industry Information (2002), "EasyJet takeover approved by UK regulator", *Airline Industry Information*, Jul. 17, [Online], Available at: [http://galenet.galegroup.com.proxy.library.csi.cuny.edu/servlet/BCRC?vrsn=unknown&locID=nysl\\_me\\_cosi&srchtp=glb&c=1&ste=25&tab=2&tbst=tsAS&mst=easyJet+takeover+approved+by+UK+regulator&docNum=A89150257&bConts=0](http://galenet.galegroup.com.proxy.library.csi.cuny.edu/servlet/BCRC?vrsn=unknown&locID=nysl_me_cosi&srchtp=glb&c=1&ste=25&tab=2&tbst=tsAS&mst=easyJet+takeover+approved+by+UK+regulator&docNum=A89150257&bConts=0), downloaded: Oct. 11, 2007.

Akerlof, G.A. (1970), "The market for 'lemons': qualitative uncertainty and the market mechanism", *Quarterly Journal of Economics*, Aug., Vol. 84, Issue 3, pp. 488-500.

Al-Laham, A. and Souitaris, V. (2008), "Network embeddedness and new-venture internationalization: Analyzing international linkages in the German biotech industry", *Journal of Business Venturing*, Sep., Vol. 23, Issue 5, pp. 567-586.

Allen, J.W. and Phillips, G.M. (2000), "Corporate Equity Ownership, Strategic Alliances, and Product Market Relationships", *The Journal of Finance*, Dec., Vol. 55, Issue 6, pp. 2791-2815.

American Express (2003), *Airline miles and credit card responses*, American Express Investment Relations, El Paso, Texas, USA, Sep.

Amit, R. and Schoemaker, P.J.H. (1993), "Strategic Assets And Organizational Rent", *Strategic Management Journal*, Jan., Vol. 14, Issue 1, pp. 33-46.

Anand, J. and Delios, A. (2002), "Absolute and Relative Resources as Determinants of International Acquisitions", *Strategic Management Journal*, Feb., Vol. 23, Issue 2, pp. 119-134.

Anand, J., Oriani, R. and Vassolo, R.S. (2010), "Alliance Activity as a Dynamic Capability in the Face of a Discontinuous Technological Change", *Organization Science*, Nov.-Dec., Vol. 21, Issue 6, pp. 1213-1232.

Andal-Ancion, A. and Yip, G. (2005), "Smarter ways to do business with the competition", *European Business Forum*, Spring, Issue 21, pp. 32-36.

Anderson, E. and Gatignon, H. (1986), "Modes of foreign entry: A transaction cost analysis and propositions", *Journal of International Business Studies*, Fall, Vol. 17, Issue 3, pp. 1-26.

Anderson, E. and Weitz, B. (1992), "Determinants of continuity in conventional industrial channel dyads", *Marketing Science*, Feb., Vol. 8, Issue 2, pp. 310-323.

Anderson, J.C. and Narus, J.A. (1990), "A model of distributor firm and manufacturer firm working partnerships", *Journal of Marketing*, Jan., Vol. 54, Issue 1, pp. 42-58.

Aneshensel, C.S. (2002), *Theory Based Data Analysis for the Social Sciences: Undergraduate Research Methods & Statistics in the Social Sciences*, Pine Forge Press, Sage Publications, Inc., Thousand Oaks, California, USA.

Anselmo, J.C. (2005), "Katrina's Wake: Jet fuel is back to pre-hurricane prices, but that's hardly a bargain for airlines", *Aviation Week & Space Technology*, Sep. 19, Vol. 163, Issue 11, p28.

Antoniou, A. (1991), "Economies of scale in the airline industry: The evidence revisited", *Logistics and Transportation Review*, Feb., Vol. 27, Issue 2, pp. 159-184.

Arends, B. (2002), "Big Plane Order Helps Easyjet to Grow", *Daily Mail, London, UK*, Oct. 15, p13.

Arias, J.T. (1995), "Do networks really foster innovation?", *Management Decision*, Nov., Vol. 33, No. 9, pp. 52-56.

Arikan, A. and McGahan, A.M. (2010), "The development of capabilities in new firms", *Strategic Management Journal*, Jan., Vol. 31, Issue 1, pp. 1-18.

Armantier, O. and Richard, O. (2008), "Domestic airline alliances and consumer welfare", *RAND Journal of Economics*, Fall, Vol. 39, Issue 3, pp. 875-904.

Arnoult, S. (2010), "The MRO Quandary", *Airline Business*, Nov., Vol. 26, Issue 11, pp. 48-50.

Ashkenas, R.N. and Francis, S.C. (2000), "Integration managers: Special leaders for special times", *Harvard Business Review*, Nov.-Dec., Vol. 78, Issue 6, pp. 108-116.

Aulakh, P.S., Kotabe, M. and Sahay, A. (1996), "Trust and performance in cross-border marketing partnerships: A behavioral approach", *Journal of International Business Studies*, Special Issue, Vol. 27, Issue 5, pp. 1005-1032.

Avian, T. (2003), "Multinational and strategic alliances", *Academy of Management Executive*, Nov., Vol. 2, Issue 11, pp. 13-27.

Aviation Week & Space Technology (2000), “KLM Royal Dutch Airlines and Alitalia”, *Aviation Week & Space Technology*, Aug. 7, Vol. 153, Issue 6, p24.

Aviation Week & Space Technology (2006), “Another Italian Government rescue”, *Aviation Week & Space Technology*, Oct. 16, Vol. 165, Issue 15, p23.

Aviation Week & Space Technology (2008a.), “Critical Opportunity Missed To Learn From Airbus’ Mistakes”, *Aviation Week & Space Technology*, Jan. 21, Vol. 168, Issue 3, p58.

Aviation Week & Space Technology (2008b.), “Airline Merger: Take It Slow”, *Aviation Week & Space Technology*, Apr. 7, Vol. 168, Issue 14, p66.

Aviation Week & Space Technology (2008c.), “Life Support Won’t Work”, *Aviation Week & Space Technology*, May 5, Vol. 168, Issue 18, p70.

Aviation Week & Space Technology (2008d.), “Italy’s Air One bolsters long-haul plans”, *Aviation Week & Space Technology*, Jun. 9, Vol. 168, Issue 23, p22.

Aviation Week & Space Technology (2009), “Alitalia nearing partnership with Air France”, *Aviation Week & Space Technology*, Jan. 12, Vol. 170, Issue 2, p18.

Bachman, J. (2006), “Airline Mergers: Ready for Takeoff?”, *Business Week Online*, Dec. 22, p9.

Bachman, J. (2008), "Why Is This Plane Still Flying?", *Business Week Online*, Apr. 11, p4.

Bachman, J. (2009), "Regional Airlines: Scrambling for New Strategies", *Business Week Online*, Dec. 8, p2.

Bailey, C.A. (2006), *A Guide to Qualitative Field Research*, 2<sup>nd</sup> Ed., Pine Forge Series in Research Methods and Statistics, Pine Forge Press, Sage Publications, Inc., Thousand Oaks, California, USA.

Bainbridge, J. (2007), "Cheap flights expand reach", *Marketing*, Apr. 4, pp. 30-31.

Baker, C. (2002a.), "Taking control", *Airline Business*, May, Vol. 18, Issue 5, pp. 50-52.

Baker, C. (2002b.), "easy does it", *Airline Business*, Dec., Vol. 18, Issue 12, pp. 28-32.

Baker, C. (2003), "Decision time", *Airline Business*, Aug., Vol. 19, Issue 8, pp. 31-34.

Baker, C. (2006), "Beleaguered Alitalia gets unlikely vote of confidence", *Airline Business*, Mar., Vol. 22, Issue 3, p19.

Baker, C. (2007), "Italy in a rush to sell Alitalia stake", *Airline Business*, Jan., Vol. 23, Issue 1, p20.

Baker, C. and Field, D. (2003), "Where are they now?", *Airline Business*, Jul., Vol. 19, Issue 7, pp. 42-45.

Balakrishnan, S. and Koza, M. (1993), "Information asymmetry, adverse selection and joint-ventures: Theory and evidence", *Journal of Economic Behaviour & Organization*, Jan., Vol. 20, Issue 1, pp. 99-117.

Ball, C.P. (2007), "Rethinking Hub versus Point-to-Point Competition: A Simple Circular Airline Model", *Journal of Business & Economic Studies*, Spring, Vol. 13, Issue 1, pp. 73-87.

Balmer, J.M.T., Stuart, H. and Greyser, S.A. (2009), "Aligning Identity and Strategy: Corporate branding at British Airways in the late 20th century", *California Management Review*, Spring, Vol. 51, Issue 3, pp. 6-23.

Barber, T. (2006), "Alitalia chief urged to resign", *The Financial Times*, London, UK, Section: Companies Europe, Oct. 12, p28.

Barber, T. (2007), "Door still open to Franco-Dutch bid for Alitalia", *The Financial Times*, London, UK, Section: Companies Europe, Jan. 31, p28.

Barber, T. and Buckley, N. (2007), "Aeroflot may not go solo in its quest for Italian carrier", *The Financial Times, London, UK*, Section: Companies Europe, Apr. 4, p26.

Barber, T. and Done, K. (2006), "Air France-KLM in talks with Alitalia", *The Financial Times, London, UK*, Section: Companies Europe, Nov. 24, p24.

Barber, T. and Michaels, A. (2007a.), "Bidders ask Rome for free hand in Alitalia sale", *The Financial Times, London, UK*, Section: Companies International, Jan. 29, p26.

Barber, T. and Michaels, A. (2007b.), "Eleven groups may go on to bid for Alitalia", *The Financial Times, London, UK*, Section: Companies International, Jan. 30, p24.

Barbera, A. (2007), "Alitalia ai privati: I paletti di Bianchi", *La Stampa*, Jan. 31, pp. 17-18.

Barla, P. and Constantatos, C. (2006), "On The Choice between Strategic Alliance and Merger in the Airline Sector: The Role of Strategic Effects", *Journal of Transport Economics & Policy*, Sep., Vol. 40, Issue 3, pp. 409-424.

Barney, G. (2007), "Continental Airlines", *Fortune*, Feb. 4, Vol. 155, Issue 6, p46.

Barney, J.B. (1988), "Returns to bidding firms in mergers and acquisitions: Reconsidering the relatedness hypothesis", *Strategic Management Journal*, Summer, Special Issue: Strategy Content Research, Vol. 9, Issue 2, pp. 71-78.

Barney, J.B. (2010), *Gaining and Sustaining Competitive Advantage*, 4<sup>th</sup> Ed., Prentice Hall, Upper Saddle River, New Jersey, USA.

Barzun, J. and Graff, H.F. (2003), *The Modern Researcher*, 6<sup>th</sup> Ed., Wadsworth Publishing, Florence, Kentucky, USA.

Battena, J.A. and Xuan, V.V. (2009), “An analysis of the relationship between foreign direct investment and economic growth”, *Applied Economics*, Jun., Vol. 41, Issue 13, pp. 1621-1641.

Baumol, W.J., Panzar, J.C. and Willig, R.D. (1992), *Contestable Markets and the Theory of Industry Structure*, Harcourt Brace Jovanovich, New York, New York, USA.

Beamish, P.W. (1988), *Multinational Joint Venture in Developing Countries*, Routledge, London, UK.

Beamish, P.W. and Banks, J.C. (1987), “Equity joint ventures and the theory of the multinational enterprise”, *Journal of International Business Studies*, Summer, Vol. 18, Issue 2, pp. 1-16.

Beamish, P.W. and Inkpen, A.C. (1995), “Keeping International Joint Ventures Stable and Profitable”, *Long Range Planning*, Jun., Vol. 28, Issue 3, pp. 26-36.

Beirne, M. (2006), "Marketing Takes a Hit Amidst Airline Mergers", *Brandweek*, Nov. 27, Vol. 47, Issue 44, p6.

Bekier, M.M., Bogardus, A.J. and Oldham, T. (2001), "Why mergers fail", *The McKinsey Quarterly*, Issue 4, pp. 6-10.

Bell, M. and Lindenau, T. (2009), "Restful Remedies", *Airline Business*, Jun., Vol. 25, Issue 6, pp. 44-46.

Benestante, K. (2005), "Airline industry looking for ways to fight soaring fuel costs", *Platts Oilgram Price Report*, Section: Market to Market, Oct. 6, Vol. 83, No. 193, p12.

Berg, B.L. (2006), *Qualitative Research Methods for the Social Sciences*, 6<sup>th</sup> Ed., Allyn & Bacon, Boston, USA.

Besley, S. and Brigham, E.F. (2005), *Essentials of Managerial Finance*, 13<sup>th</sup> Ed., Thomson Publishing, London, UK.

Bethune, M. (2004), *Financial condition of airline industry*, Federal Document Clearing House Congressional Testimony, Section: Capitol Hill Hearing Testimony, Committee: House Transportation, Jun. 3.

Betts, P. (2007), "Spinetta's flight", *The Financial Times*, London, UK, Section: Companies Europe, Jan. 18, p24.

Bevens, N. (2007), "Low-fare giants dive on mixed news", *The Scotsman*, Nov. 8, p38.

Bickerton, D. (2002), "Stelios and Easyjet to part in November", *Travel Trade Gazette, UK & Ireland*, Section: News, Sep. 23, p29.

Bierly, P.E. and Coombs, J.E. (2004), "Equity alliances, stages of product development, and alliance instability", *Journal of Engineering and Technology Management*, Sep., Vol. 21, Issue 3, pp. 191-214.

Bierly, P.E. and Gallagher, S. (2007), "Explaining Alliance Partner Selection: Fit, Trust and Strategic Expediency", *Long Range Planning*, Apr., Vol. 40, Issue 2, pp. 134-153.

Birmingham Post (2002), "EasyJet boss makes early departure after speedy takeover of Go", *Birmingham Post*, Sep. 14, p15.

Bisignani, G. (2008), "Downbeat outlook for world airlines", *Business Travel World*, Jan., p5.

Blackrew, M. (2002), "Last month in the markets: A round-up of corporate deals", *Corporate Finance*, Jun., Issue 211, p7.

Bleeke, J. and Ernst, D. (1991), "The way to win in cross-border alliances", *Harvard Business Review*, Nov.-Dec., Vol. 69, Issue 6, pp. 127-135.

Bleeke, J. and Ernst, D. (1995), "Is your strategic alliance really a sale", *Harvard Business Review*, Jan.-Feb., Vol. 73, Issue 1, pp. 97-105.

Blitz, J. (2000), "Alitalia in talks with rival airlines", *The Financial Times, London, UK*, Sep. 19, pp. 26-30.

Blois, K. (1998), "A Trust Interpretation of Business to Business Relationships: a Case-Based Discussion", *Management Decision*, Vol. 36, Issue 5-6, pp. 302-308.

Boehmer, J. (2009a.), "GDS CEOs Assess Changed Airline Negotiating Dynamics", *Business Travel News*, Sep. 14, Vol. 26, Issue 13, p12.

Boehmer, J. (2009b.), "Continental Tops Buyer Survey As Industry Cuts Service", *Business Travel News*, Nov. 23, Vol. 26, Issue 17, pp. 14-18.

Boehmer, J. (2010), "New United Divides Buyers", *Business Travel News*, May 17, Vol. 27, Issue 5, pp. 1-24.

Bokaie, J. (2006), "Returns policy", *Marketing*, May 17, p15.

Bokaie, J. (2007), "News Analysis: Budget carriers in identity crisis", *Marketing*, Aug. 8, p80.

Boles, T. (2002), "Easyjet Stalled by Lack of Slots at Airports in London, Paris", *Knight Ridder/Tribune Business News*, Oct. 20, p2.

Bond, D. (2002), "EasyJet Paces Sweep By Low-Cost Carriers", *Aviation Week & Space Technology*, Jul., Vol. 157, Issue 1, p67.

Boule, W. and Crimsted, L. (1978), "Deregulation issues in the airline industry", *Journal of Transportation*, Summer, Vol. 3, No. 4, pp. 145-187.

Bourdieu, P. and Wacquant, L. (1992), *An invitation to reflexive sociology*, University of Chicago Press, Chicago, Illinois, USA.

Bowermaster, D. (2002), "EasyJet-Go Fly proposal looks good for Boeing", *The Seattle Times*, May 17, p1.

Bowman, E.H. and Hurry, D. (1993), "Strategy through the option lens: an integrated view of resource investments and the incremental-choice process", *Academy of Management Review*, Oct., Vol. 18, Issue 4, pp. 760-782.

Boyd, E.A. and Bilegan, I.C. (2003), "Revenue Management and E-Commerce", *Management Science*, Oct., Vol. 49, Issue 10, pp. 1363-1386.

Brakman, S., Garretsen, H., Van Marrewijk, C. and Van Witteloostuijn, A. (2006), *Nations and Firms in the Global Economy: An Introduction to International Economics and Business*, Cambridge University Press, Cambridge, UK, Mar.

Brannen, M.Y. and Peterson, M.F. (2009), "Merging without alienating: Interventions promoting cross-cultural organizational integration and their limitations", *Journal of International Business Studies*, Apr., Vol. 40, Issue 3, pp. 468-489.

Brelis, M. (2001), "Continental Airlines CEO Sparks Stunning Turnaround with Empowered Workforce", *Knight-Ridder/Tribune Business News*, Jun. 3, pp. 28-29.

Bremner, C. (2005), "Two new carriers enter the battle for transatlantic travellers", *Economist, U.S. Edition*, Oct. 15, pp. 14-18.

Bronder, C. and Pritzl, R. (1992), "Developing strategic alliances: A conceptual framework for successful co-operation", *European Management Journal*, Dec., Vol. 10, Issue 4, pp. 412-421.

Brothers, C. and Povoledo, E. (2009), "Alitalia Sells a Stake as It Makes Its Return", *New York Times*, Jan. 13, p1.

Brouthers, K.D. and Brouthers, L.E. (2003), "Why service and manufacturing entry mode choices differ: the influence of transaction cost factors, risk and trust", *Journal of Management Studies*, Jul., Vol. 40, Issue 5, pp. 1179-1204.

Brouthers, K.D., Brouthers, L.E. and Wilkinson, T.J. (1995), "Strategic Alliances; Choose Your Partners", *Long Range Planning*, Jun., Vol. 28, Issue 3, pp. 18-25.

Browne, C. (2010), "Peerless Dreamliner charts a new course for air travel", *Travel Trade Gazette, UK & Ireland*, Jul. 23, Issue 2922, p12.

Browne, M. and Fox, J.T. (2009), "Bringing Europe Back", *Travel Agent*, Jan. 19, Vol. 334, Issue 2, pp. 40-45.

Brownsell, A. (2008), "EasyJet angers founder with brand extensions", *Marketing*, Aug. 20, p3.

Brownsell, A. (2010), "Not as easy as it looks", *Marketing*, Jul. 28, p17.

Brueckner, J.K. (2001), "The Economics of International Codesharing: An Analysis of Airline Alliances", *International Journal of Industrial Organization*, Dec., Vol. 19, Issue 10, pp. 1475-1498.

Brueckner, J.K. (2003), "International airfares in the age of alliances: The effects of codesharing and antitrust immunity", *Review of Economics & Statistics*, Feb., Vol. 85, Issue 1, pp. 105-118.

Brunger, W.G. (2010), "The impact of the Internet on airline fares: The Internet Price Effect", *Journal of Revenue & Pricing Management*, Jan., Vol. 9, Issue 1-2, pp. 66-93.

Buckley, P.J., Glaister, K.W., Klijn, E. and Tan, H. (2009), "Knowledge Accession and Knowledge Acquisition in Strategic Alliances: The Impact of Supplementary and Complementary Dimensions", *British Journal of Management*, Dec., Vol. 20, Issue 4, pp. 598-609.

Buono, A.F. (1997), "Enhancing strategic partnerships; Intervening in network organizations", *Journal of Organizational Change Management*, Vol. 10, Issue 3, pp. 251-266.

Buono, A.F. (2003), "SEAM-less post-merger integration strategies: a cause for concern", *Journal of Organizational Change Management*, Vol. 16, Issue 1, pp. 90-98.

Burgers, W.P., Hill, C.W. and Chan Kim, W. (1993), "A Theory of Global Strategic Alliances: The Case of the Global Auto Industry", *Strategic Management Journal*, Sep., Vol. 14, Issue 6, pp. 419-432.

Burgess, R.G. (1982), *Field Research: Contemporary Social Research*, HarperCollins Publishers Ltd., Glasgow, Scotland, UK.

Burkart, M., Gromb, D. and Panunzi, F. (1997), "Large shareholders, monitoring, and the value of the firm", *Quarterly Journal of Economics*, Aug., Vol. 112, Issue 3, pp. 693-728.

Burrell, R.G. and Morgan, G. (1979), *Sociological paradigms and organisational analysis*, Ashgate Publications, Aldershot, Hampshire, UK.

Burt, R.L. (1995), *Structural holes: The social structure of competition*, Harvard University Press, Cambridge, Massachusetts, USA.

Business Travel World (2004), "EU approves BA-Iberia link", *Business Travel World*, Jan., Vol. 21, Issue 1, pp. 6-7.

Business Travel World (2005), "Can Lufthansa inject some efficiency into Swiss?", *Business Travel World*, Apr., Vol. 22, Issue 4, p17.

Business Travel World (2007), "The young ones: on the hot list", *Business Travel World*, Sep., Vol. 24, Issue 18, p16.

Business Travel World (2009), "Europe's cold chill fails to deter deals", *Business Travel World*, Feb., Vol. 26, Issue 8, p7.

Business Week Online (2006), "Air France-KLM Slides on Alitalia Deal Talk", *Business Week Online*, Nov. 27, p1.

Buyck, C. (2010), "World Airport Report", *Air Transport World*, Sep., Vol. 47, Issue 9, pp. 28-54.

Byrd, A. (1999), "Flying the friendly skies? Alliances among airlines serving Orlando International Airport", *Orlando Business Journal*, Feb. 26, Vol. 15, Issue 40, pp. 25-27.

Calder, S. (2011), "The only way is Essex for easyjet, it seems", *Travel Trade Gazette, UK & Ireland*, Jun. 23, Issue 2964, p25.

Cameron, D. (2005), "Congress plan threatens open skies pact", *The Financial Times, London, UK*, Dec. 13, p12.

Cameron, D. and Kiviniemi, P. (2009), "EU Probes Cooperation of Airlines", *Wall Street Journal - Eastern Edition*, Apr. 21, Vol. 253, Issue 92, pB5.

Campaign (2002), "Go pushes easyJet into regular ad fold", *Campaign, UK*, May 31, p20.

Campaign (2010), "The social experience economy", *Campaign, UK*, Jun. 25, p7.

Campbell, A. (2002), "EasyJet goes for it, but will cost be high? First major move in no-frills sector consolidation, although DBA will be challenge", *Flight International*, May 14, p19.

Capell, K. (2007a.), "London-Hong Kong, Cheap, With Meals?", *Business Week Online*, Feb. 15, p25.

Capell, K. (2007b.), “A Rough Flight for Discount Airlines”, *Business Week Online*, May 14, p24.

Carey, S. (2010a.), “United Takes Strength into Talks”, *Wall Street Journal - Eastern Edition*, Apr. 20, Vol. 255, Issue 91, pp. B1-B5.

Carey, S. (2010b.), “Airline Deal Faces Close Look”, *Wall Street Journal - Eastern Edition*, May 18, Vol. 255, Issue 115, pB2.

Carey, S. (2010c.), “Continental and United Set Integration Team”, *Wall Street Journal - Eastern Edition*, May 20, Vol. 255, Issue 117, pB2.

Carey, S. (2010d.), “Merger Won’t End Obstacles Facing Carriers”, *Wall Street Journal - Eastern Edition*, Jun. 11, Vol. 255, Issue 135, pB4.

Carey, S., Cameron, D. and Michaels, D. (2009), “United-Continental Plan Opposed”, *Wall Street Journal - Eastern Edition*, Jun. 30, Vol. 253, Issue 151, pB2.

Carey, S. and Catan, T. (2010), “UAL, Continental Detail Deal”, *Wall Street Journal - Eastern Edition*, May 4, Vol. 255, Issue 103, pB2.

Carey, S. and Chon, G. (2010), “Continental Board Meets To Discuss UAL Merger”, *Wall Street Journal - Eastern Edition*, Apr. 29, Vol. 255, Issue 99, pB4.

Carey, S. and Williamson, E. (2009a.), "Airline Case Shows U.S. Antitrust Stance", *Wall Street Journal - Eastern Edition*, Jul. 2, Vol. 253, Issue 153, pB3.

Carey, S. and Williamson, E. (2009b.), "Star Alliance Fires Back at Justice Department", *Wall Street Journal - Eastern Edition*, Jul. 7, Vol. 254, Issue 5, pB2.

Carney, M. and Dostaler, I. (2006), "Airline ownership and control: A corporate governance perspective", *Journal of Air Transport Management*, Mar., Vol. 12, Issue 2, pp. 63-75.

Carr, C. (1999), "Globalisation, strategic alliances, acquisitions, and technology transfer: Lessons from ICL/Fujitsu and Rover/Honda and BMW", *R&D Management*, Oct., Vol. 29, Issue 4, pp. 405-422.

Cartwright, S. and Cooper, C.L. (1993), "The role of culture compatibility in successful organization", *Academy of Management Executive*, May, Vol. 7, Issue 2, pp. 57-70.

Caruso, L. (2009), "Airline Alliances Hit Turbulence", *National Journal*, Oct. 24, p4.

Caruso-Cabrera, M., Westgate, R. and Fogarty, M. (2006), "Airline M&A Analysis", *CNBC/Dow Jones Business Video Analyst Interview*, Dec. 21.

Casey, S. and Chon, G. (2010), "UAL, Continental Talks Continue but Hit Snag", *Wall Street Journal - Eastern Edition*, Apr. 26, Vol. 255, Issue 96, pp. B1-B2.

Cattell, B. (2002), "EasyJet takes Go", *The Daily Deal*, May 17, pp. 7-8.

Celly, K.S. and Frazier, G.L. (1996), "Outcome-based and behavior-based coordination efforts in channel relationships", *Journal of Marketing Research*, May, Vol. 33, Issue 2, pp. 200-210.

Chan, P.S and Wong, A. (1994), "Global Strategic Alliances and Organizational Learning", *Leadership & Organization Development Journal*, Vol. 15, Issue 4, pp. 31-36.

Chang, S.C., Chen, S.S and Lai, J.H. (2008), "The effect of alliance experience and intellectual capital on the value creation of international strategic alliances", *Omega*, Special Issue on Knowledge Management and Organizational Learning, Apr., Vol. 36, Issue 2, pp. 298-316.

Chang, Y.C. and Williams, G. (2002), "European major airline' strategic reactions to the Third Package", *Transport Policy*, Apr., Vol. 9, Issue 2, pp. 129-142.

Chathoth, P.K. (2004), "The evolution of embeddedness within the alliance structure in a non-equity hospitality alliance", *Journal of Services Research*, Apr., Vol. 4, No. 1, pp. 139-151.

Chatterjee, S. (1992), "Sources of value in takeovers: Synergy or restructuring implications for target and bidder firms", *Strategic Management Journal*, May, Vol. 13, Issue 4, pp. 267-286.

Chatterjee, S., Lubatkin, M.H., Schweiger, D.M. and Weber, Y. (1992), "Cultural differences and shareholder value in related mergers: Linking equity and human capital", *Strategic Management Journal*, Jun., Vol. 13, Issue 5, pp. 319-334.

Chen, H.M. and Tseng, C.H. (2005), "The performance of marketing alliances between the tourism industry and credit card issuing banks in Taiwan", *Tourism Management*, Feb., Vol. 26, Issue 1, pp. 15-24.

Chen, S.F. and Hennart, J.F. (2004), "A hostage theory of joint ventures: Why do Japanese investors choose partial over full acquisitions to enter the United States", *Journal of Business Research*, Oct., Vol. 57, Issue 10, pp. 1126-1134.

Chi, T. (1994), "Trading in strategic resources: Necessary conditions, transaction cost problems, and choice of exchange structure", *Strategic Management Journal*, May, Vol. 15, Issue 4, pp. 271-290.

Chon, G., Carey, S. and Catan, T. (2010), "United, Continental to Combine", *Wall Street Journal - Eastern Edition*, May 3, Vol. 255, Issue 102, pp. B1-B4.

Ciborra, C. (1991), "Alliances as learning experiments: Cooperation, competition, and change in high-tech industries", in Mytelka, L.K. (Eds.), *Strategic partnerships and the world economy*, Pinter, London, UK, pp. 51-77.

CILT World (2008), "Alitalia left at the altar", *CILT World*, Apr., Issue 18, p8.

Citarg, L. (2002), "EasyJet and Go merge seat sales", *The Daily Express*, Dec. 17, p52.

Cittanova, M.L. (2007), "Air France n'est pas candidat a la privatisation d'Alitalia", *Les Echos*, Jan. 30, pp. 67-68.

Ciuspino, A. (2007), "Ma quale brand strategy, le aziende pubbliche devono cambiare management", *Il Sole 24 Ore*, Feb. 18, pp. 34-41.

Clark, K. and Ofek, E. (1994), "Mergers as a means of restructuring distressed firms - An empirical investigation", *Journal of Financial and Quantitative Analysis*, Dec., Vol. 29, Issue 4, pp. 541-565.

Clark, L. and Taylor, I. (2007), "GB buyout will reduce budget airlines to two", *Travel Weekly, UK*, Nov. 2, p14.

Clark, N. (2006), "EasyGroup to reposition cruises and buses", *Marketing*, Dec. 6, p5.

Clark, N. (2008), "Alitalia Takes Offer For Buyout", *New York Times*, Mar. 17, p1.

Clougherty, J.A. (2002), "US domestic airline mergers: The neglected international determinants", *International Journal of Industrial Organization*, Apr., Vol. 20, Issue 4, pp. 557-577.

Clougherty, J.A. and Zhang, A. (2009), "Domestic rivalry and export performance: Theory and evidence from international airline markets", *Canadian Journal of Economics*, May, Vol. 42, Issue 2, pp. 440-468.

Coburn, D. (2010), "Battle of the Heavyweights", *Popular Mechanics*, Jul., Vol. 187, Issue 7, p16.

Cochennec, Y. (2002), "Budget airlines snuggle up", *Interavia Business & Technology*, Jun., Vol. 57, Issue 664, pp. 33-34.

Coff, R.W. (1997), "How buyers cope with uncertainty when acquiring firms in knowledge-intensive industries: Caveat emptor", *Organization Science*, Mar.-Apr., Vol. 10, Issue 2, pp. 144-161.

Cohen, A. (2010), "EasyJet Steps Up Pursuit of Corporate Biz", *Business Travel News*, Sep. 6, Vol. 27, Issue 11, p4.

Cohen, W.M. and Levinthal, D.A. (1994), "Fortune Favors the Prepared Firm", *Management Science*, Feb., Vol. 40, Issue 2, pp. 227-251.

Cohn, M. (2005), "Despite woes, U.S. airlines prove resilient: Failure of one carrier not likely to hurt industry", *Baltimore Sun Company*, Section: Business, Sep. 11, p1.

Coleman, J.L., Heckathorn, D.D. and Maser, S.M. (1989), "A bargaining theory approach to default provisions and disclosure rules in contract law", *Harvard Journal of Law Public Policy*, Fall, Vol. 12, Issue 3, pp. 637-709.

Coleman, J.S. (1988), "Social capital in the creation of human capital", *American Journal of Sociology*, Vol. 94, Supplement: Organizations and Institutions, pp. S95-S120.

Collins, J.D., Holcomb, T.R., Certo, S.T., Hitt, M.A. and Lester, R.H. (2009), "Learning by doing: Cross-border mergers and acquisitions", *Journal of Business Research*, Dec., Vol. 62, Issue 12, pp. 1329-1334.

Compart, A. (2010), "Who Owns Slots?", *Aviation Week & Space Technology*, May 10, Vol. 172, Issue 18, p48.

Conference & Incentive Travel (2002), "Easyjet eyes groups market post merger", *Conference & Incentive Travel*, Jun. 18, p4.

Conkey, C. and Prada, P. (2009), "Continental Wins Nod to Join Star Alliance", *Wall Street Journal - Eastern Edition*, Apr. 8, Vol. 253, Issue 81, pB4.

Consumer Reports (2010), "8 ways to land a great airfare", *Consumer Reports*, Jun., Vol. 75, Issue 6, pp. 22-23.

Continental (2007), *2006 Annual Report to Stockholders*, Continental Publications, Houston, Texas, USA.

Contractor, F.J. and Kundu, S.K. (1998), "Modal choice in a world of alliances: Analyzing organizational forms in the international hotel sector", *Journal of International Business Studies*, 2<sup>nd</sup> Quarter, Vol. 29, Issue 2, pp. 325-357.

Contractor, F.J. and Lorange, P. (1993), "Why should firms cooperate? The strategy and economics basis for cooperative ventures", in Reuer, J.J. (Eds.), *Strategic alliances: Theory and evidence*, Oxford University Press, Oxford, UK, pp. 19-47.

Cook, K. and Emerson, R.M. (1978), "Power, equity, and commitment in exchange networks", *American Sociological Review*, Oct., Vol. 43, Issue 5, pp. 721-739.

Cordle, I.P. (1999), "Airline Alliances Raise Serious Safety Questions", *Knight-Ridder/Tribune Business News*, May 11 [Online], Available at: [http://www.accessmylibrary.com/coms2/summary\\_0286-6634854\\_ITM](http://www.accessmylibrary.com/coms2/summary_0286-6634854_ITM), downloaded Oct. 18, 2006.

Corker, B. (2002), "EasyJet boss makes early departure after speedy takeover of Go", *Birmingham Post, UK*, Section: Business, Sep. 14, p15.

Cornett, M.M. and Tehranian, H. (1992), "Changes in corporate performance associated with bank acquisitions", *Journal of Financial Economics*, Apr., Vol. 31, Issue 2, pp. 211-234.

Coulter, A. (2006), "Continental Cousins", *Travel Trade Gazette, UK & Ireland*, Section: Supplement, May, pp. 10-16.

Cowan, R. and Jonard, N. (2009), "Knowledge portfolios and the organization of innovation networks", *Academy of Management Review*, Apr., Vol. 34, Issue 2, pp. 320-342.

Crabtree, B.F. and Miller, W.L. (1992), "A template approach to text analysis: Developing and using code books", in Crabtree, B.F. and Miller, W.L. (Eds.), *Doing qualitative research*, Sage Publications, Inc., Thousand Oaks, California, USA, pp. 83-109.

Cramer, J. (2006), "Continental Airlines: Chairman & CEO Interview", *CNBC/Dow Jones Business Video*, Aug. 15.

Creswell, J.W. (1994), *Research Design: Qualitative and Quantitative Approaches*, Sage Publications, Inc., Thousand Oaks, California, USA.

Creswell, J.W. (1997), *Qualitative Inquiry and Research Design: Choosing among Five Traditions*, Sage Publications, Inc., Thousand Oaks, California, USA.

Creswell, J.W. (2008), *Research Design: Qualitative, Quantitative, and Mixed Methods Approaches*, 3<sup>rd</sup> Ed., Sage Publications, Inc., Thousand Oaks, California, USA.

Creswell, J.W. and Plano Clark, V.L. (2006), *Designing and Conducting Mixed Methods Research*, Sage Publications, Inc., Thousand Oaks, California, USA.

Crockett, R.O. (2007), "The Orbitz Merry-Go-Round", *Business Week Online*, Dec. 17, p2.

Culpan, R. (1989), "Export Behavior of Firms: Relevance of Firm Size", *Journal of Business Research*, May, Vol. 18, Issue 3, pp. 207-218.

Cunliffe, P. (2002), "Go name goes as easyJet consolidates takeover", *Express, UK*, Oct. 8, p53.

D'Aveni, R. (1995), *Hypercompetition*, Free Press, New York, New York, USA.

Daily Post (2002), "easyJet takeover gets the Go ahead", *Daily Post, Liverpool, UK*, Jun. 18, p19.

Daily Telegraph (2002), "Hand in hand, Easyjet and Airbus are flying into the great unknown", *Daily Telegraph, London, UK*, Oct. 15, p9.

Dalziel, M. (2009), "Forgoing the Flexibility of Real Options: When and Why Firms Commit to Investment Decisions", *British Journal of Management*, Sep., Vol. 20, Issue 3, pp. 401-412.

Daniel, C. (2005), "Lesson of a downturn: It helps to have rich friends. While the US industry has accumulated more than Dollars 30bn in losses, there have been no liquidations", *The Financial Times, London, UK*, Section: Aerospace, Jun. 13, pp. 2-3.

Darby, M. and Simone, G. (2006), "Good relations", *Airline Business*, Mar., Vol. 22, Issue 3, pp. 54-57.

Das, T.K. and Teng, B.S. (1998), "Between Trust and Control: Developing confidence in partner cooperation in alliances", *Academy of Management Review*, Jul., Vol. 23, Issue 3, pp. 491-512.

Das, T.K. and Teng, B.S. (2000), "A Resource-Based Theory of Strategic Alliances", *Journal of Management*, Vol. 26, Issue 1, pp. 31-62.

Das, T.K. and Teng, B.S. (2002), "Alliance Constellations: A social exchange perspective", *Academy of Management Review*, Jul., Vol. 27, Issue 3, pp. 445-456.

Datamonitor (2007a.), *Global Airlines Industry Profile*, Datamonitor Reports, Datamonitor Europe, London, UK, May.

Datamonitor (2007b.), *Alitalia-Linee Aeree Italiane S.p.A; Company Profile*, Datamonitor Reports, Datamonitor Europe, London, UK, Jul.

Datamonitor (2009), *Continental Airlines Inc. SWOT Analysis*, Datamonitor Reports, Datamonitor Europe, London, UK, Oct.

Datta, D.K., Musteen, M. and Herrmann, P. (2009), "Board Characteristics, Managerial Incentives, and the Choice between Foreign Acquisitions and International Joint Ventures", *Journal of Management*, Aug., Vol. 35, Issue 4, pp. 928-953.

David, R.J. and Han, S.K. (2004), "A systematic assessment of the empirical support for transaction cost economics", *Strategic Management Journal*, Vol. 25, Issue 1, pp. 39-58.

Davis, A. (2009), "Rebuilding Antitrust", *Mergers & Acquisitions: The Dealer Maker's Journal*, May, Vol. 44, Issue 5, pp. 52-72.

De Lollis, B. (2008), "U.S. gets all-VIP flights to Asia", *USA Today*, Section: Money, Mar. 3, p4.

Del Canho, D. and Engelfriet, J. (2008), "Flying higher - together", *Business Strategy Review*, Spring, Vol. 19, Issue 1, pp. 34-37.

Dempsey, P.S. and Goetz, A.R. (1992), *Airline Deregulation and Laissez Faire Mythology*, Quorum Books, Westport, Connecticut, USA.

Dennis, N. (2005), "Industry consolidation and future airline network structures in Europe", *Journal of Air Transport Management*, May, Vol. 11, Issue 3, pp. 175-183.

Dennis, N. (2007), "End of the Free Lunch? The responses of traditional European airlines to the low-cost carrier threat", *Journal of Air Transport Management*, Sep., Vol. 13, Issue 5, pp. 311-321.

Deprez, E.E. (2009), "Coffee, Tea, or Doggie Hoodie", *Business Week*, Oct. 12, Issue 4150, pp. 64-65.

Deroian, F. (2008), "Dissemination of spillovers in cost-reducing alliances", *Research in Economics*, Mar., Vol. 62, Issue 1, pp. 34-44.

Dobruszkes, F. (2006), "An Analysis of European low-cost Airlines and their Networks", *Journal of Transport Geography*, Jul., Vol. 14, Issue 4, pp. 249-264.

Dobson, A.P. (1995), *Flying in the face of competition: the policies and diplomacy of airline regulatory reform in Britain, the USA and the European Community, 1968-94*, Avebury Aviation, Ashgate Publications, Hants, UK.

Dodgson, M. (1993), "Learning, Trust, and Technological Collaboration", *Human Relations*, Jan., Vol. 46, Issue 1, pp. 77-95.

Doganis, A. (1991), *Flying off course: The economics of international airlines*, 2<sup>nd</sup> Ed., Routledge, London, UK.

Doganis, R. (2010), "Hanging in the balance", *Airline Business*, Mar., Vol. 26, Issue 3, pp. 30-33.

Done, K. (2005), "Business model going places? Premium airlines lay down a challenge for the big network carriers", *The Financial Times*, London, UK, Section: Comment, Oct. 14, pp. 17-20.

Donoghue, J. (2005), "A new kind of normal", *Air Transport World*, Jan., Vol. 42, Issue 1, pp. 34-39.

Dooley, G. (2008), "Three Cheers for the New Delta", *Travel Agent*, Dec. 8, Vol. 333, Issue 12, p70.

Douglas, M. and Miller, P. (1979), "Aviation and Oligopolies", *Journal of Transportation*, Aug., Vol. 3, No. 4, pp. 273-287.

Dow, D. and Larimo, J. (2009), "Challenging the Conceptualization and Measurement of Distance and International Experience in Entry Mode Choice Research", *Journal of International Marketing*, Vol. 17, Issue 2, pp. 74-98.

Doz, Y.L. (1996), "The evolution of cooperation in strategic alliances: Initial conditions or learning processes?", *Strategic Management Journal*, Summer, Vol. 17, Special Issue: Evolutionary Perspectives on Strategy, pp. 55-83.

Doz, Y.L. and Hamel, G. (1998), *Alliance Advantage: The Art of Creating Value Through Partnering*, Harvard Business School Press, Boston, Massachusetts, USA.

Drago, W.A. (1997), "When strategic alliances make sense", *Industrial Management & Data Systems*, Vol. 97, Issue 1-2, pp. 53-57.

Dunn, G. (2008), "Alliances stress relevance", *Airline Business*, Nov., Vol. 24, Issue 11, p13.

Dunn, G. (2009a.), "Relaunched Alitalia flies into battle", *Airline Business*, Jan., Vol. 25, Issue 1, p16.

Dunn, G. (2009b.), "Air France-KLM wins Alitalia race", *Airline Business*, Feb., Vol. 25, Issue 2, p15.

Dunn, G. (2009c.), "Consolidation enters end game", *Airline Business*, Aug., Vol. 25, Issue 8, p16.

Dunn, G. (2009d.), "Painful Progress", *Airline Business*, Sep., Vol. 25, Issue 9, pp. 44-50.

Dunn, G. (2010), "Coming to the party", *Airline Business*, Mar., Vol. 26, Issue 3, pp. 26-28.

Dunn, G. and Dunning-Mitchell, L. (2010), "Coming Of Age", *Airline Business*, May, Vol. 26, Issue 5, pp. 50-55.

Dushnitsky, G. and Shaver, J.M. (2009), "Limitations to inter-organizational knowledge acquisition: the paradox of corporate venture capital", *Strategic Management Journal*, Oct., Vol. 30, Issue 10, pp. 1045-1064.

Dussauge, P., Garrette, B. and Mitchell, W. (2000), "Learning from competing partners: Outcomes and durations of scale and link alliances in Europe, North America and Asia", *Strategic Management Journal*, Feb., Vol. 21, Issue 2, pp. 99-126.

Dyer, J.H., Kale, P. and Singh, H. (2004), "When to ally and when to acquire", *Harvard Business Review*, Jul.-Aug., Vol. 82, Issue 7-8, pp. 108-115.

Dyer, J.H. and Singh, H. (1998), "The Relational View: Cooperative Strategy and Sources of Interorganizational Competitive Advantage", *The Academy of Management Review*, Oct., Vol. 23, Issue 4, pp. 660-679.

Easterby-Smith, M., Thorpe, R. and Lowe, A. (2002), *Management Research: An Introduction*, SAGE Series in Management Research, Sage Publications, Inc., Thousand Oaks, California, USA.

Easyjet (2007a.), "Key events in our history", [Online], *Available at:* [http://www.easyjet.com/EN/About/Information/infopack\\_keyevents.html](http://www.easyjet.com/EN/About/Information/infopack_keyevents.html), downloaded Nov. 30.

Easyjet (2007b.), "2007 preliminary results", [Online], *Available at:* [http://www.easyjet.com/EN/Investor/investorrelations\\_financialreports.html](http://www.easyjet.com/EN/Investor/investorrelations_financialreports.html), downloaded Nov. 30.

Easyjet (2008), "Annual Reports and Accounts 2007", *Easyjet plc. Publications*, London Luton Airport Offices, UK.

Economist (2001), "The Squeeze on Europe's Air Fares", *Economist*, May 26, Vol. 359, Issue 8223, pp. 57-58.

Economist (2002), "Spread your Wings: Low-cost airlines", *Economist, US Edition*, May 11, pp. 36-37.

Economist (2003), “Open Skies and Flights of Fancy”, *Economist*, Oct. 4, Vol. 369, Issue 8344, pp. 65-67.

Economist (2005a.), “Lining up for Profits: World Airlines”, *Economist, US Edition*, Section: Special Report, Nov. 12, pp. 1-3.

Economist (2005b.), “A surprising Boom: The Airline Industry”, *Economist, US Edition*, Section: Leader, Nov. 12, p2.

Economist (2006), “The Italian Exception”, *Economist*, Oct. 14, Vol. 381, Issue 8499, p71.

Economist (2007a.), “Ready for Take-Off”, *Economist*, Jun. 16, Vol. 383, Issue 8542, pp. 8-10.

Economist (2007b.), “In the Land of Free Flight”, *Economist*, Special Section: Airlines, Jun. 16, Vol. 383, Issue 8542, pp. 5-8.

Economist (2007c.), “Alliances are still struggling to achieve the huge cost benefits they promised”, *Economist*, Sep. 17, Vol. 383, Issue 8549, pp. 18-23.

Economist (2008a.), “A Normal Industry?”, *Economist*, Feb. 16, Vol. 386, Issue 8567, pp. 69-70.

Economist (2008b.), "Rapid Descent", *Economist*, Mar. 22, Vol. 386, Issue 8572, p73.

Economist (2008c.), "Good Money after Bad", *Economist*, Apr. 26, Vol. 387, Issue 8577, p68.

Economist (2008d.), "Miracle Postponed", *Economist*, Aug. 9, Vol. 388, Issue 8592, pp. 58-60.

Economist (2008e.), "On a Wing and a Taxpayer's Prayer", *Economist*, Sep. 6, Vol. 388, Issue 8596, p61.

Economist (2008f.), "Shredding money", *Economist*, Sep. 20, Vol. 388, Issue 8598, pp. 77-78.

Economist (2008g.), "Creeping along", *Economist*, Sep. 27, Vol. 388, Issue 8599, p66.

Edwards, H. (2010), "Rebranding made Easy", *Marketing*, Jun. 16, p18.

Eisenhardt, K.M. (1989), "Agency Theory: An Assessment and Review", *The Academy of Management Review*, Jan., Vol. 14, Issue 1, pp. 57-74.

Eisenhardt, K.M. and Schoonhoven, C.B. (1996), "Resource-Based View of Strategic Alliance Formation: Strategic and social effects in entrepreneurial firms", *Organization Science*, Mar.-Apr., Vol. 7, No. 2, pp. 136-150.

Eiteman, D.K., Stonehill, A.L. and Moffett, M.H. (2006), *Multinational Business Finance*, 11<sup>th</sup> Ed., Addison Wesley, London, UK.

Emden, Z., Yaprak, A. and Cavusgil, S.T. (2005), "Learning from experience in international alliances: Antecedents and firm performance implications", *Journal of Business Research*, Jul., Vol. 58, Issue 7, pp. 883-892.

Employee Benefits (2002), "Easyjet Go MAD awards", *Employee Benefits*, Oct., p10.

Encyclopaedia of Global Industries (2005), *Air Transportation*, Encyclopaedia of Global Industries, Thomson Gale, Farmington Hills, Michigan, USA.

Esterl, M. (2009a.), "Southwest Searches for Deals after Loss of Frontier", *Wall Street Journal - Eastern Edition*, Aug. 20, Vol. 254, Issue 43, pB1.

Esterl, M. (2009b.), "Co-Pilot Takes the Controls at Continental. With New Year, President Jeff Smisek assumes job of CEO, setting sights on growth, profitability, Internet services", *Wall Street Journal - Eastern Edition*, Dec. 31, Vol. 254, Issue 154, pB1.

Europe Business Review (1999), "KLM and Alitalia combine", *Europe Business Review*, Oct.-Dec., Vol. 2, Issue 9, p23.

European Policy Analyst (2009), “Legislative Watch List”, *European Policy Analyst*, Oct., pp. 52-70.

European Venture Capital Journal (2002), “Go Triumph for 3i”, *European Venture Capital Journal*, Jun., Issue 93, p23.

Euroweek (2002), “EasyJet launches £277m issue”, *Euroweek*, May 17, Issue 3, p4.

Evans, M. (2005), “Why aviation fuel tax shouldn’t take off”, *Western Mail*, Section: Business, Sep. 3, pp. 34-35.

Evans-Pritchard, A. (2006a.), “Alitalia Sale Conditions 'will attract only kamikaze bids'”, *The Daily Telegraph, London, UK*, Section: City, Dec. 30, p10.

Evans-Pritchard, A. (2006b.), “Cash-starved Alitalia 'out of control with no parachutes'”, *The Daily Telegraph, London, UK*, Section: City, Oct. 11, p13.

Evans-Pritchard, A. (2007), “Lufthansa eyes European rivals”, *The Daily Telegraph, London, UK*, Section: City, Apr. 9, p2.

Evening Standard (2002), “EasyJet Lavishes Praise on Newly-Acquired Rival Go”, *Evening Standard, London, UK*, Aug. 1, p3.

Ezard, K. (2008a.), “Stemming The Flow”, *Airline Business*, Mar., Vol. 24, Issue 3, pp. 34-35.

Ezard, K. (2008b.), "Europe's new Order emerges", *Airline Business*, Oct., Vol. 24, Issue 10, p17.

Ezard, K. (2008c.), "Wringing Out the Costs", *Airline Business*, Nov., Vol. 24, Issue 11, pp. 66-70.

Ezard, K. (2008d.), "Stelios in EasyJet Power Struggle", *Airline Business*, Dec., Vol. 24, Issue 12, p16.

Ezard, K., Panariello, A. and Dunning-Mitchell, L. (2007), "Growth Path", *Airline Business*, Aug., Vol. 23, Issue 8, pp. 75-85.

Fabey, M. (2008), "Rocketing Fuel Slows Airlines", *Traffic World*, Mar. 31, Vol. 272, Issue 13, p29.

Fabey, M. (2009), "Continental, United will seek shared I.T. platform under Star", *Travel Weekly*, Jul. 27, Vol. 68, Issue 30, p14.

Fabey, M. (2010), "United-Continental Reservation System Business is up for Grabs", *Travel Weekly*, May 17, Vol. 69, Issue 20, p8.

Fair Disclosure Wire (2006a.), "Southwest Airlines at Raymond James 2006; Growth Airline Conference", *Fair Disclosure Wire, Quarterly Earnings Reports*, Jan. 26 [Online], Available at: <http://search.epnet.com/login.aspx?direct=true&db=bwh&an=32U0778677010FDW>, downloaded Feb.18, 2006.

Fair Disclosure Wire (2006b.), "Preliminary 2006 Easyjet plc Earnings: Conference Call", *Fair Disclosure Wire, Quarterly Earnings Reports*, Nov. 14, pp. 1-17.

Fair Disclosure Wire (2006c.), "Interim 2006/2007: Air France-KLM Earnings Conference Call Final", *Fair Disclosure Wire, Quarterly Earnings Reports*, Nov. 23, pp. 1-18.

Fair Disclosure Wire (2007a.), "Q4 2006 Continental Airlines Earnings Conference Call", *Fair Disclosure Wire, Quarterly Earnings Reports*, Jan. 18, pp. 1-21.

Fair Disclosure Wire (2007b.), "Interim 2007 Easyjet plc Earnings Presentation", *Fair Disclosure Wire, Quarterly Earnings Reports*, May 9, pp. 1-24.

Faithfull, M. (2007a.), "No more US Six Appeal?", *Business Travel World*, Jan., pp. 18-20.

Faithfull, M. (2007b.), "New Sky Thinking", *Business Travel World*, Sep., pp. 14-16.

Fama, E.F. and Jensen, M.C. (1983), "Separation of Ownership and Control", *Journal of Law and Economics*, Jun., Vol. 26, Issue 2, pp. 301-326.

Farber, A. (2007), "EasyJet puts Gadget onto Vista Desktops", *New Media Age*, Jul. 26, p10.

Farzad, R. (2006), "Continental's Surprising Ascent", *Business Week*, Jul. 31, Issue 3995, p30.

Faulkner, D. (1996), *International Strategic Alliances, co-operating to compete*, McGraw-Hill Publishing Co., New York, New York, USA.

Favour, H. (2004), *Operations and Interorganizational Factors*, University of Brisbane Press, Brisbane, Australia.

FDCH Political Transcripts (2007), *Sen. Daniel K. Inouye holds a hearing on airline mergers*, FDCH Political Transcripts, Senate Commerce, Science And Transportation Committee, Washington, DC, USA, Jan. 24.

Feldman, J.M. (1998), "Time for a rethink", *Air Transport World*, Jan., Vol. 35, Issue 1, pp. 49-52.

Fenner, U. (2003), *The Cooperative Venture Formation Processes: Characteristics and Impact on Performance*, Wharton School, University of Pennsylvania, Pennsylvania, USA.

Ferguson, M. (2010), "Corporate contender", *Buying Business Travel*, May-Jun., Issue 44, pp. 36-37.

Field, D. (2005), "Under Wraps", *Airline Business*, Nov., Vol. 21, Issue 11, pp. 31-32.

Field, D. (2006), "US Carriers in major Transatlantic Push", *Airline Business*, Nov., Vol. 22, Issue 11, p11.

Field, D. (2007a.), "Merger Fever hits US Carriers", *Airline Business*, Jan., Vol. 23, Issue 1, p13.

Field, D. (2007b.), "US Airways refuses to drop Delta Takeover Bid", *Airline Business*, Feb., Vol. 23, Issue 2, pp. 28-30.

Field, D. (2008), "Premium Model alive and kicking", *Airline Business*, Feb., Vol. 24, Issue 2, p11.

Field, D. (2009a.), "Shrink to Fit", *Airline Business*, Feb., Vol. 25, Issue 2, pp. 20-23.

Field, D. (2009b.), "US Carriers face murky Outlook", *Airline Business*, Mar., Vol. 25, Issue 3, pp. 52-53.

Field, D. and Pilling, M. (2004), "Team Spirit", *Airline Business*, Sep., Vol. 20, Issue 9, pp. 46-48.

Filson, D. and Morales, R. (2004), "Equity links and information acquisition in biotechnology alliances", *Journal of Economic Behavior & Organization*, Jan., Vol. 59, Issue 1, pp. 1-28.

Fiorino, F. (2006), "Searching for Salvation", *Aviation Week & Space Technology*, Dec. 11, Vol. 165, Issue 23, p38.

Flight International (2007), "Directory: World Airlines", *Flight International*, Apr. 3, pp. 75-76.

Flint, P. (1998), "Is bigger better?", *Air Transport World*, Mar., Vol. 35, Issue 3, pp. 31-32.

Flint, P. (2007), "Take What They Will Give You", *Air Transport World*, May, Vol. 44, Issue 5, p5.

Flint, P. (2009), "When Better Is Best", *Air Transport World*, Feb., Vol. 46, Issue 2, p5.

Flint, P. (2010), "Merger of Equals", *Air Transport World*, Jun., Vol. 47, Issue 6, pp. 47-49.

Flores, R.G. (1998), "Competition and Trade in Services: The Airlines' Global Alliances", *World Economy*, Nov., Vol. 21, Issue 8, pp. 1095-1108.

Flottau, J. (2005), "The Great Divide: Uncertainty persists over how U.S., Europe can bridge differences regarding open skies agreement", *Aviation Week & Space Technology*, May 30, Vol. 162, Issue 22, p48.

Flottau, J. (2009), "Wake-Up Call", *Aviation Week & Space Technology*, Oct. 12, Vol. 171, Issue 14, pp. 40-44.

Flottau, J. (2010a.), “Déjà vu”, *Aviation Week & Space Technology*, Feb. 15, Vol. 172, Issue 7, pp. 22-23.

Flottau, J. (2010b.), “Last One Standing”, *Aviation Week & Space Technology*, Apr. 26, Vol. 172, Issue 16, pp. 41-42.

Flottau, J., Nativi, A. and Wall, R. (2009), “Open Questions”, *Aviation Week & Space Technology*, Jan. 19, Vol. 170, Issue 3, p40.

Flottau, J. and Wall, R. (2010), “Quality Control”, *Aviation Week & Space Technology*, Jan. 18, Vol. 172, Issue 3, pp. 22-23.

Flouris, T. and Swidler, S. (2004), “American Airlines’ Takeover of TWA: An ex-post analysis of financial market information”, *Journal of Air Transport Management*, May, Vol. 10, Issue 3, pp. 173-180.

Foddy, W. (1994), *Constructing Questions for Interviews and Questionnaires: Theory and Practice in Social Research*, Cambridge University Press, Cambridge, UK.

Fontana, A. and Frey, J.H. (2000), “The Interview: From structured text to negotiated text”, in Denzin, W.K. and Lincoln, H.R. (2005) (Eds.), *The SAGE Handbook of Qualitative Research*, 3<sup>rd</sup> Ed., Sage Publications, Inc., Thousand Oaks, California, USA, pp. 645-672.

Foray, D. (1991), "The Secrets of Industry are in the Air: Industrial cooperation and the organizational dynamics of the innovative firm", *Research Policy*, Oct., Vol. 20, Issue 5, pp. 393-405.

Forbes, S.J. and Lederman, M. (2009), "Adaptation and Vertical Integration in the Airline Industry", *American Economic Review*, Dec., Vol. 99, Issue 5, pp. 1831-1849.

Forsyth, G. (1999), "Integrators beware: Panalpina and Swissair have taken the airline-forwarder relationship to new level with jointly owned company", *American Shipper*, Jun., Vol. 41, Issue 6, pp. 40-42.

Foust, D. (2007), "Delta's Big Bet on Foreign Flying", *Business Week Online*, May 7, p2.

Foust, D. and Capell, K. (2008), "Survival of the Biggest", *Business Week*, Feb. 25, Issue 4072, pp. 28-29.

Foust, D., Woellert, L. and Grow, B. (2006), "Now Boarding: Merger Mania", *Business Week*, Nov. 11, Issue 4011, p36.

Fredd, K. (2005), "Financial Issues for Merged Enterprises in the Post-Merger Process", *Strategic Management Journal*, Aug., Vol. 34, Issue 6, pp. 18-35.

Fugazy, D. (2010), "Restructuring Referees", *Mergers & Acquisitions: The Dealermaker's Journal*, Jul., Vol. 45, Issue 7, pp. 24-25.

Gallacher, J. (1997), "Power to the Plans", *Airline Business*, Sep., Vol. 4, Issue 1, pp. 34-35.

GAO Reports (2010), "Issues raised by the Proposed Merger of United and Continental Airlines", *GAO Reports*, May 27, pp. 1-26.

Garette, B. and Dussauge, P. (2000), "Alliances Versus Acquisitions: Choosing the Right Option", *European Management Journal*, Feb., Vol. 18, Issue 1, pp. 63-69.

Garrow, L. (2009), "Online Travel Data: A goldmine of new opportunities", *Journal of Revenue & Pricing Management*, Mar., Vol. 8, Issue 2-3, pp. 247-254.

Gartner, D.L. and Schmutzler, A. (2009), "Merger Negotiations and ex-post Regret", *Journal of Economic Theory*, Jul., Vol. 144, Issue 4, pp. 1636-1664.

Gatignon, H. and Anderson, E. (1988), "The Multinational Corporation's Degree of Control over Foreign Subsidiaries: An empirical test of a transaction cost explanation", *Journal of Law, Economics, and Organization*, Fall, Vol. 4, Issue 2, pp. 305-336.

Geewax, M. (2005), "Airline Industry must change drastically", *The Atlanta Journal*, Section: Business, Sep. 29, p3.

Geoffrey, T. (2009), "ATM's Green Tint in Europe", *Air Transport World*, Sep., Vol. 46, Issue 9, pp. 73-77.

George, A.L. and Bennett, A. (2005), *Case Studies and Theory Development in the Social Sciences*, BCSIA Studies in International Security, The MIT Press, Cambridge, Massachusetts, USA.

George, V.P and Farris, G. (1999), "Performance of Alliances: Formative stages and changing organizational and environmental influences", *R&D Management*, Oct., Vol. 29, Issue 4, pp. 379-389.

Geringer, J.M. (1990), *Trends and Traits of Canadian Joint Ventures*, Investment Canada, Ottawa, Canada.

Geringer, J.M. and Hebert, L. (1989), "Control and Performance of International Joint Venture", *Journal of International Business*, Summer, Vol. 20, Issue 2, pp. 235-254.

Gerring, J. (2006), *Case Study Research: Principles and Practices*, Cambridge University Press, Cambridge, UK.

Gessing, P.J. (2005), "Re-Deregulate the Airlines", *National Review*, Aug. 15, p13.

Ghemawat, P. and Nalebuff, B. (1990), "The Devolution of Declining Industries", *Quarterly Journal of Economics*, Feb., Vol. 105, Issue 1, pp. 167-186.

Ghosh, A. (2004), "Learning in Strategic Alliances: A Vygotskian perspective", *The Learning Organization*, Vol. 11, Issue 4-5, pp. 302-311.

Ghoshal, S. and Moran, P. (1996), "Bad for Practice: A critique of the transaction cost theory", *Academy of Management Review*, Jan., Vol. 21, Issue 1, pp. 13-47.

Gialloreto, L. (1998), *Strategic Airline Management: The global war begins*, Pitman Publishing, London, UK.

Gill, J. and Johnson, P. (2002), *Research Methods for Managers*, 3<sup>rd</sup> Ed., Sage Publications, Inc., Thousand Oaks, California, USA.

Gill, R. (2006), "No-Frills Battle for Marrakesh", *Travel Trade Gazette, UK & Ireland*, Oct. 13, Issue 2738, p91.

Gill, R. (2010a.), "Snow and Ash batter EasyJet", *Travel Trade Gazette, UK & Ireland*, May 14, Issue 2912, p16.

Gill, R. (2010b.), "Business travel on EasyJet's radar", *Travel Trade Gazette, UK & Ireland*, Nov. 19, Issue 2936, p14.

Gill, T. (1999), "KLM Aims for Commitment", *Airline Business*, Jan., Vol. 15, Issue 7, p1.

Gillen, D. and Morrison, W.G. (2003), "Bundling, Integration and the delivered price of Air Travel: Are low cost carriers full service competitors?", *Journal of Air Transport Management*, Jan., Vol. 9, Issue 1, pp. 15-23.

Gillen, D. and Morrison, W.G. (2005), "Regulation, Competition and Network Evolution in Aviation", *Journal of Air Transport Management*, May, Vol. 11, Issue 3, pp. 161-174.

Gils, A.V. and Zwart, P. (2004), "Knowledge Acquisition and Learning in Dutch and Belgian SMEs: The Role of Strategic Alliances", *European Management Journal*, Dec., Vol. 22, Issue 6, pp. 685-692.

Gimeno, J. (2004), "Competition within and between Networks: The contingent effect of competitive embeddedness on alliance formation", *Academy of Management Journal*, Dec., Vol. 47, Issue 6, pp. 820-842.

Glaser, D.C. and Strauss, A.L. (1999), *The Discovery of Grounded Theory: Strategies for qualitative research*, Aldine Publishing, Chicago, Illinois, USA.

Glisson, L.M. and Cunningham, W.A. (1996), "Airline Industry Strategic Alliances: Marketing and policy implications", *International Journal of Physical Distribution & Logistics Management*, Vol. 26, Issue 3, pp. 26-34.

Globerman, S. and Nielsen, B.B. (2007), "Equity versus non-equity international strategic alliances involving Danish firms: An empirical investigation of the relative importance of partner and host country determinants", *Journal of International Management*, Dec., Vol. 13, Issue 4, pp. 449-471.

Goeteyn, G. (2005), "Opening up the Transatlantic", *Airline Business*, Feb., Vol. 160, Issue 20, pp. 74-75.

Goeteyn, G. (2006), "Issues Raised by the US Department of Transportation's Decision in the Skyteam Case: A Comparative Analysis", *Air & Space Law*, Sep., Vol. 30, Issue 4-5, pp. 291-308.

Goetz, A.R. (2002), "Deregulation, Competition, and antitrust implications in the US Airline Industry", *Journal of Transport Geography*, Mar., Vol. 10, Issue 1, pp. 1-18.

Goh, M. and Yong, J. (2006), "Impacts of code-share alliances on airline cost structure: A truncated third-order translog estimation", *International Journal of Industrial Organization*, Jul., Vol. 24, Issue 4, pp. 835-866.

Gomes-Casseres, B. (1989), "Ownership Structures of Foreign Subsidiaries: Theory and Evidence", *Journal of Economic Behavior & Organization*, Jan., Vol. 11, Issue 1, pp. 1-25.

Gomes-Casseres, B. (1998), *The Alliance Revolution: The new shape of business rivalry*, Cambridge, Harvard University Press, Cambridge, Massachusetts, USA.

Gomes-Casseres, B. (2003), "Constellation Strategy: Managing alliance groups", *Ivey Business Journal*, May-Jun., Vol. 67, Issue 5, pp. 1-6.

Gordon, G.G. (1991), "Industry Determinants of Organizational Culture", *Academy of Management Review*, Apr., Vol. 16, Issue 2, pp. 396-415.

Gossing, S. and Nilsson, J.H. (2010), "Frequent Flyer Programmes and the Reproduction of Aeromobility", *Environment & Planning A*, Jan., Vol. 42, Issue 1, pp. 241-252.

Government Accountability Office (GAO) (2005), *Aviation safety: Oversight of Foreign Code-Share Safety Program Should Be Strengthened*, Government Accountability Office United States (GAO) Reports, Washington, DC, USA, Aug., pp. 1-58.

Govindasamy, S. (2010), "China Eastern opts for SkyTeam", *Airline Business*, May, Vol. 26, Issue 5, p22.

Graf, L. (2005), "Incompatibilities of the Low-Cost and Network Carrier Business Models within the same airline grouping", *Journal of Air Transport Management*, Sep., Vol. 11, Issue 5, pp. 313-327.

Granovetter, M. (1985), "Economic Action and Social Structure: The problem of embeddedness", *American Journal of Sociology*, Nov., Vol. 91, Issue 3, pp. 481-510.

Grapes, G. (2007), "GB's slim profits hastened sale", *Travel Trade Gazette, UK & Ireland*, Nov. 2, Issue 2791, p4.

Grat, C., Gill, R. and Griffith, S. (2010), "Snow, Strikes, Money, Mergers and Dreams", *Travel Trade Gazette, UK & Ireland*, Dec. 17, Issue 2940, p10.

Gray, C. (2008), "Maxjet's customer loss is Silverjet's Gain", *Travel Trade Gazette, UK and Ireland*, Jan. 11, Issue 2745, p25.

Gray, C. (2010), "EasyJet ponders end to boarding gate scrums", *Travel Trade Gazette, UK & Ireland*, Oct. 29, Issue 2933, p5.

Gray, C. and Griffiths, S. (2010), "EasyJet/Low Cost deal threat to indy agents", *Travel Trade Gazette, UK & Ireland*, Nov. 12, Issue 2935, p5.

Grekere, M. (2008), "Europe and the US will need presidential elections for a final word", *Airline Business*, Mar., Vol. 42, Issue 3, pp. 13-18.

Groenewege, A.D. (1996), *Compendium of International Civil Aviation*, International Aviation Development Corporation, Montreal, Quebec, Canada.

Gubrium, J.F. and Holstein, J.A. (2001), *Handbook of Interview Research: Context & Method*, Sage Publications, Inc., Thousand Oaks, California, USA.

Gudmundsson, S.V., de Boer, E.R. and Lechner, C. (2002), "Integrating frequent flyer programs in multilateral airline alliances", *Journal of Air Transport Management*, Nov., Vol. 8, Issue 6, pp. 409-417.

Gudmundsson, S.V. and Lechner, C. (2006), "Multilateral airline alliances: Balancing strategic constraints and opportunities", *Journal of Air Transport Management*, May, Vol. 12, Issue 3, pp. 153-158.

Guild, E. (2003), "Mile High Clubs", *Business Travel World*, Section: Airlines, Apr., pp. 24-27.

Gulati, R. (1995), "Does familiarity breed trust? The implication of repeated ties for contractual choice in alliances", *Academy of Management Journal*, Feb., Vol. 38, No. 1, pp. 85-112.

Gulati, R. (1998), "Alliances and Networks", in Reuer, J.J. (2004) (Eds.), *Strategic Alliances: Theory and Evidence*, Oxford University Press, Oxford, UK, pp. 378-416.

Gulati, R. (2007), *Managing Network Resources: Alliances, Affiliations, and Other Relational Assets*, Oxford University Press, Oxford, UK, May.

Gulati, R. and Gargiulo, M. (1999), "Where do interorganizational networks come from", *The American Journal of Sociology*, Mar., Vol. 104, No. 5, pp. 1439-1493.

Gulati, R., Lavie, D. and Singh, H. (2009), "The nature of partnering experience and the gains from alliances", *Strategic Management Journal*, Nov., Vol. 30, Issue 11, pp. 1213-1233.

Gulati, R. and Singh, H. (1998), "The Architecture of Cooperation: Managing coordination costs and appropriation concerns in strategic alliances", *Administrative Science Quarterly*, Dec., Vol. 43, Issue 4, pp. 781-814.

Gulati, R.S., Sytch, M. and Mehrotra, P. (2008), "Breaking Up is Never Easy: Planning for Exit in A Strategic Alliance", *California Management Review*, Summer, Vol. 50, Issue 4, pp. 147-163.

Habermas, J. (1970), "Knowledge and Interest", in Emmet, D. and MacIntyre, A. (1971) (Eds.), *Sociological Theory and Philosophical Analysis*, Macmillan, London, UK, pp. 108-134.

Hagedoorn, J. (1995), "A Note on International Market Leaders and Networks of Strategic Technology Partnering", *Strategic Management Journal*, Mar., Vol. 16, Issue 3, pp. 241-250.

Hagedoorn, J. and Duysters, G. (2002), "External sources of innovative capabilities: The preference for strategic alliances or mergers and acquisitions", *Journal of Management Studies*, Mar., Vol. 39, Issue 2, pp. 167-188.

Hagedoorn, J. and Narula, R. (1996), "Choosing organizational modes of strategic technology partnering: International and sectoral differences", *Journal of International Business Studies*, 2<sup>nd</sup> Qtr., Vol. 27, Issue 2, pp. 265-284.

Hagedoorn, J. and Sadowski, B. (1999), "The transition from strategic technology alliances to mergers and acquisitions: An exploratory study", *Journal of Management Studies*, Jan., Vol. 36, Issue 1, pp. 87-107.

Haleblian, J., Devers, C.E., McNamara, G., Carpenter, M.A. and Davison, R.B. (2009), "Taking Stock of What We Know About Mergers and Acquisitions: A Review and Research Agenda", *Journal of Management*, Jun., Vol. 35, Issue 3, pp. 469-502.

Hamel, G. (1991), "Competition for competence and inter-partner learning within international strategic alliances", *Strategic Management Journal*, Summer, Vol. 12, Special Issue: Global Strategy, pp. 83-103.

Hamlin, G.W. (2009), "Capacity Cuts and Consolidation hold key to healthy U.S. airline industry", *Aviation Week & Space Technology*, Jul. 13, Vol. 171, Issue 2, p50.

Hancock, D.R. and Algozzine, R. (2006), *Doing Case Study Research: A Practical Guide for Beginning Researchers*, Teachers College Press, New York, New York, USA.

Hanlon, J.P. (1996), *Global Airlines: Competition in a transnational industry*, Butterworth-Heinemann, Oxford, UK.

Harbison, J.R. and Pekar, P. (1999), "Harnessing the Power of Alliances and Acquisitions", *Directorship*, Mar., Vol. 25, Issue 3, pp. 6-8.

Harford, J. and Li, K. (2007), "Decoupling CEO Wealth and Firm Performance: The case of acquiring CEOs", *Journal of Finance*, Apr., Vol. 62, Issue 2, pp. 917-949.

Harrigan, K.R. (1986), *Managing for Joint Venture Success*, Lexington Books, Lexington, Massachusetts, USA.

Harrigan, K.R. (1988a.), “Strategic Alliances and Partner Asymmetries”, *Management International Review (MIR)*, Special Issue, Vol. 28, Issue 4, pp. 53-72.

Harrigan, K.R. (1988b.), “Joint Ventures and Competitive Strategy”, *Strategic Management Journal*, Mar.-Apr., Vol. 9, Issue 2, pp. 141-158.

Harrison, A. (2010), “EasyJet: No End to Trade Tension”, *Travel Trade Gazette, UK & Ireland*, Feb. 26, Issue 2902, p6.

Harrison, M. (2002a.), “Cassani quits after EasyJet buys rival Go”, *The Independent, London, UK*, May 17, p23.

Harrison, M. (2002b.), “EasyJet passes Go and sets up £10m Bonus Pool”, *The Independent, London, UK*, Aug. 2, p21.

Harrison, J.S., Hitt, M.A., Hoskisson, R.E. and Ireland, R.D. (2001), “Resource Complementarity in Business Combinations: Extending the logic to organizational alliances”, *Journal of Management*, Vol. 27, Issue 6, pp. 679-690.

Harvey, M.G. and Luscht, R.F. (1995), “A Systematic Assessment of Potential International Strategic Alliance Partners”, *International Business Review*, Jun., Vol. 4, Issue 2, pp. 95-112.

Haspeslagh, P.C. and Jemison, D.B. (1991), *Managing Acquisitions: Creating value through corporate renewal*, Free Press, Simon & Schuster, New York, New York, USA.

Hassin, O. and Shy, O. (2004), "Code-Sharing Agreements and Interconnections in Markets for International Flights", *Review of International Economics*, Aug., Vol. 12, Issue 3, pp. 337-352.

Hatfield, D. (2007), "What Airline Passengers want most of all", *Inside Tucson Business*, Jun. 25, Vol. 17, Issue 2, p6.

Hayes, R.H., Wheelwright, S.C. and Clark, K.B. (1988), *Dynamic Manufacturing: Creating the Learning Organization*, Free Press, New York, New York, USA.

Hayhurst, L. (2008), "Superbrand lastminute to reward investors", *Travel Trade Gazette, UK & Ireland*, Mar. 7, Issue 2705, pp. 18-19.

Hayhurst, L. (2010), "Easyjet's Focus on Business Travellers 'Heralds shift in airline's strategy'", *Travel Weekly, UK*, Nov. 26, Issue 2045, p70.

Healy, P.M., Palepu, K.G. and Ruback, R.S. (1992), "Does Corporate Performance improve after mergers", *Journal of Financial Economics*, Apr., Vol. 31, Issue 2, pp. 135-175.

Heath, N. (2004), "Horizontal Strategic Alliances in technologically uncertain environments", *Journal of Business Research*, Aug., Vol. 57, Issue 7, pp. 911-946.

Heiden, M. (2005), "Are Airports ready to play the Alliance Game?", *Aviation Week & Space Technology*, Aug. 11, Vol. 154, Issue 3, pp. 56-62.

Hemphill, T.A. (2000), "Airline Marketing Alliances and U.S. Competition Policy: Does the Consumer Benefit?", *Business Horizons*, Mar., Vol. 43, Issue 2, pp. 17-24.

Hennart, J.F. (1988), "A Transaction Costs Theory of Equity Joint Ventures", *Strategic Management Journal*, Jul.-Aug., Vol. 9, Issue 4, pp. 361-374.

Hennart, J.F. and Reddy, S. (1997), "The Choice between Mergers/Acquisitions and Joint Ventures: The case of Japanese investors in the United States", *Strategic Management Journal*, Jan., Vol. 18, Issue 1, pp. 1-12.

Hennart, J.F. and Reddy, S. (2000), "Digestibility and asymmetric information in the choice between acquisitions and joint ventures: Where's the beef?", *Strategic Management Journal*, Feb., Vol. 21, Issue 2, pp. 191-193.

Hensel, B. (2006), "Airline wants to go it alone: Continental CEO says carrier prefers the current course", *Houston Chronicle*, Sep. 27, p1.

Hersen, M. and Barlow, D.H. (1976), *Single Case Experimental Designs: Strategies for studying behaviour*, Pergamon Press, Elsevier Publishers, Oxford, UK.

Hill, L. (1999), "Global Challenger", *Air Transport World*, Dec., Vol. 36, Issue 12, pp. 52-55.

Hinton, C. (2010a.), "Delta and Continental Raise Luggage Fees", *Wall Street Journal - Eastern Edition*, Jan. 13, Vol. 255, Issue 10, pD3.

Hinton, C. (2010b.), "Airbus Sales in Limbo If a Merger Happens", *Wall Street Journal - Eastern Edition*, Apr. 28, Vol. 255, Issue 98, pB3.

Hoaglin, D.C., Mosteller, F. and Tukey, J.W. (2000), *Understanding Robust and Exploratory Data Analysis*, John Wiley & Sons, New Jersey, USA.

Hocker, J.L. and Wilmot, W.W. (1985), *Interpersonal Conflict*, 2<sup>nd</sup> Ed., William C. Brown, Dubuque, Iowa, USA.

Hoffmann, W.H. and Schaper-Rinkel, W. (2001), "Acquire or Ally? A strategy framework for deciding between acquisition and cooperation", *Management International Review (MIR)*, 2<sup>nd</sup> Quarter, Vol. 41, Issue 2, pp. 131-159.

Holloway, S. (2008), *Straight and Level: Practical airline economics*, 3<sup>rd</sup> Ed., Ashgate Publishing, Aldershot, Hampshire, UK.

Hooper, J. (2007), "Aeroflot joins in auction for Alitalia: Russian airline's offer takes markets aback", *The Guardian, London, UK*, Section: Guardian Financial Pages, Apr. 3, p24.

Hoover's Company (2007), "Alitalia Linee Aeree Italiane S.p.A", *Hoover's Company In-depth Records*, Jan. 30 [Online], Available at: <http://www.lexisnexis.com.proxy.library.csi.cuny.edu/us/lnacademic/search/companyDossiersubmitForm.do>, downloaded Feb. 18, 2007.

Hoskisson, R.E. and Busenitz, L.W. (2001), "Market Uncertainty and Learning Distance in Corporate Entrepreneurship Entry Mode Choice", in Hitt, M.A., Ireland, R.D., Camp, S.M. and Sexton, D.L. (2002) (Eds.), *Strategic entrepreneurship: Creating a new integrated mindset*, Blackwell Publishers, Oxford, UK, pp. 90-101.

Hotten, R. (2002), "EasyJet to take over Go in £400m Deal", *The Times, UK*, May 4, p52.

Houston, J.F., James, C.M. and Ryngaert, M.D. (2001), "Where do Merger Gains come from? Bank mergers from the perspective of insiders and outsiders", *Journal of Financial Economics*, May-Jun., Vol. 60, Issue 2-3, pp. 285-331.

Howe, K. and Eisenhart, M. (1990), "Standards for qualitative (and quantitative) research: A prolegomenon", *Educational Researcher*, May, Vol. 19, Issue 4, pp. 2-9.

Hughes, D. (2008), "Europe's Traffic Growth Slowing", *Aviation Week & Space Technology*, Mar. 24, Vol. 168, Issue 12, pp. 40-41.

Huse, C. and Evangelho, F. (2007), "Investigating business traveller heterogeneity: Low-cost vs. full-service airline users?", *Transportation Research Part E: Logistics and Transportation Review*, May, Vol. 43, Issue 3, pp. 259-268.

Husserl, E. (1946), *Phenomenology*, in Encyclopaedia Britannica, 4<sup>th</sup> Ed., Vol. 17, pp. 699-702.

Huxley, L. (2010), "Opinion is divided over easyJet Holidays", *Travel Weekly, UK*, Nov. 12, Issue 2043, p3.

Iatrou, K. and Alamdari, F. (2005), "The Empirical Analysis of the Impact of Alliances on Airline Operations", *Journal of Air Transport Management*, May, Vol. 11, Issue 3, pp. 127-134.

Inkpen, A.C. (1996), "Creating Knowledge through Collaboration", *California Management Review*, Sep., Vol. 39, Issue 1, pp. 123-140.

Inkpen, A.C. and Beamish, P.W. (1997), "Knowledge, Bargaining Power and the Instability of Joint Ventures", *Academy of Management Review*, Jan., Vol. 22, Issue 1, pp. 177-202.

Inkpen, A.C., Sundaram, A.K. and Rockwood, K. (2000), "Cross-border acquisitions of US technology assets", *California Management Review*, Spring, Vol. 42, Issue 3, pp. 50-71.

International Air Transport Association (1989), *How international airline fares and rates are made: An account of the functions and organisation of the traffic conferences of the International Air Transport Association*, International Air Transport Association (IATA) Publications, Geneva, Switzerland.

International Air Transport Association (2003), *Evolution of fares in the global airline industry*, International Air Transport Association (IATA) Publications, Geneva, Switzerland.

International Air Transport Association, Aviation Information and Research (2005), *IATA Passenger and Freight Forecast 2005-2009*, International Air Transport Association (IATA), Aviation Information and Research, Geneva, Switzerland.

IRS Employment Review (2005), "ICE warning", *IRS Employment Review*, Aug. 12, Issue 829, p3.

International Air Transport Association (2008), *Annual Report*, International Air Transport Association (IATA) Publications, Geneva, Switzerland.

Jala, I. (2008) "View from the Top", *Airline Business*, Apr., Vol. 24, Issue 4, p9.

Jameson, A. (1994), *Building Consumer Loyalty*, Boston Document Publications, Boston, Massachusetts, USA.

Jandik, T. and Kali, R. (2009), "Legal systems, information asymmetry, and firm boundaries: Cross-border choices to diversify through mergers, joint ventures, or strategic alliances", *Journal of International Business Studies*, May, Vol. 40, Issue 4, pp. 578-599.

Jarach, D. (2004), "Future Scenarios for the European Airline Industry: A marketing-based perspective", *Journal of Air Transportation*, Vol. 9, Issue 2, pp. 23-39.

Jarillo, J.C. (1989), "Entrepreneurship and Growth: The strategic use of external resources", *Journal of Business Venturing*, Mar., Vol. 4, Issue 2, pp. 133-147.

Jarillo, J.C. and Stevenson, H.H. (1991), "Co-operative Strategies: The payoffs and the pitfalls", *Long Range Planning*, Feb., Vol. 24, Issue 1, pp. 64-70.

Jarratt, D.G. (1998), "A strategic classification of business alliances: A qualitative perspective built from a study of small and medium-sized enterprises", *Qualitative Market Research: An International Journal*, Vol. 1, Issue 1, pp. 39-49.

Jasper, C. (1999), "EC gives conditional approval to KLM/Alitalia deal: Financial, organisational, and legal integration", *Flight International*, Aug. 18, p27.

Jasper, C. and Rothwell, S. (2010), "British Airways Seeks a Bride to Regain Altitude", *Bloomberg Businessweek*, Sep. 13, Issue 4195, pp. 24-25.

Javorcik, B.S. and Saggi, K. (2010), "Technological Asymmetry among Foreign Investors and Mode of Entry", *Economic Inquiry*, Apr., Vol. 48, Issue 2, pp. 415-433.

Jaworowski, R. (2006), "Finding the Right Fit", *Aviation Week & Space Technology*, Jan. 16, Vol. 164, Issue 3, pp. 56-60.

Jaworowski, R. (2010), "Break in the Clouds", *Aviation Week & Space Technology*, Jan. 25, Vol. 172, Issue 4, pp. 70-76.

Jehn, K.A. (1994), "Enhancing effectiveness: an investigation of advantages and disadvantages of value-based intragroup conflict", *International Journal of Conflict Management*, Jul., Vol. 5, Issue 3, pp. 223-238.

Jenner, G. (2009), "Mutual Benefit", *Airline Business*, May, Vol. 25, Issue 5, pp. 48-50.

Jiang, X. and Li, Y. (2008), "The relationship between organizational learning and firms' financial performance in strategic alliances: A contingency approach", *Journal of World Business*, Jul., Vol. 43, Issue 3, pp. 365-379.

Jiang, X., Li, Y. and Gao, S. (2008), "The Stability of Strategic Alliances; Characteristics, factors and stages", *Journal of International Management*, Jun., Vol. 14, Issue 2, pp. 173-189.

Johnson, B. (2002a.), "Easyjet climbs to the top with Go: Easyjet's takeover is likely to be the first of many market consolidations", *Marketing Week*, May 9, Vol. 25, Issue 19, p7.

Johnson, B. (2002b.), "Magliano to head Easyjet marketing", *Marketing Week*, May 23, Vol. 25, Issue 21, p5.

Johnson, B. (2002c.), "EasyJet in £22m review as it prepares to axe Go", *Marketing Week*, Oct. 3, Vol. 25, Issue 40, pp. 12-13.

Johnson, B. and Christensen, L.B. (2007), *Educational Research: Quantitative, Qualitative, and Mixed Approaches*, 3<sup>rd</sup> Ed., Sage Publications, Inc., Thousand Oaks, California, USA.

Johnsson, J. (2006), "Merger Prospect sparks Union Push", *Crain's Chicago Business*, Oct. 9, Vol. 29, Issue 41, p24.

Jonas, D. (2005), "Airline M&A underway on both Sides of the Atlantic", *Business Travel News*, Jul. 18, Vol. 22, Issue 13, p8.

Jones, C. (2010), "Airlines get ready for return of elite fliers", *USA Today*, Mar. 16, pp. 6B-7B.

Jones, L. (1997), "Alitalia in for a Rough Ride", *Airline Business*, Mar., Vol. 13, Issue 3, p8.

Jones, L. (1998), "Clubable class books slots for take-off", *The European*, Sep., pp. 18-20.

Kaduck, R.J. (1997), "Canadian Carrier Strategies and the 1995 open skies agreement", *Journal of Air Transport Management*, Jul., Vol. 3, Issue 3, pp. 145-153.

Kahan, H. (1990), "One on Ones should sparkle like the Gems they are", *Marketing News*, Sep. 3, pp. 8-9.

Kahn, G. (2008), "Air France-KLM withdraws Its Offer for Alitalia", *Wall Street Journal - Eastern Edition*, Apr. 22, Vol. 251, Issue 94, pB3.

Kahn, G., Moloney, L. and Celeste, S. (2008), "Berlusconi Calls for an Italian Buyer of Alitalia", *Wall Street Journal - Eastern Edition*, Mar. 20, Vol. 251, Issue 66, pB6.

Kale, P., Dyer, J. and Singh, H. (2002), "Alliance Capability, Stock Market Response and Long-Term Alliance Success: The role of the alliance function", *Strategic Management Journal*, Aug., Vol. 23, Issue 8, pp. 747-767.

Kale, P. and Singh, H. (2009), "Managing Strategic Alliances: What do We know now, and where do We go from Here?" *Academy of Management Perspectives*, Aug., Vol. 23, Issue 3, pp. 45-62.

Kangis, P. and O'Reilly, M.D. (2003), "Strategies in a Dynamic Marketplace: A case study in the airline industry", *Journal of Business Research*, Feb., Vol. 56, Issue 2, pp. 105-111.

Karp, A. (2004), "Airlines Pairing Off", *Air Cargo World*, Jan., Vol. 94, Issue 1, pp. 20-25.

Karp, A. (2007a.), "Low Growth, High Profits", *Air Transport World*, Mar., Vol. 44, Issue 3, pp. 57-59.

Karp, A. (2007b.), "Is US Consolidation Inevitable?", *Air Transport World*, Jun., Vol. 44, Issue 6, pp. 49-52.

Karp, A. (2009a.), "Were They Tough Enough? US airlines made difficult decisions last year that paid off in the first quarter, but more may need to be done to get through the year", *Air Transport World*, Jun., Vol. 46, Issue 6, pp. 63-66.

Karp, A. (2009b.), "The Vanishing Business Traveler", *Air Transport World*, Nov., Vol. 46, Issue 11, pp. 55-58.

Kauser, S. and Shaw, V. (2004), "The Influence of behavioural and organisational Characteristics on the Success of International Strategic Alliances", *International Marketing Review*, Vol. 21, Issue 1, pp. 17-52.

Kernen, J. (2006), "Airline Sector Analysis: 5 Years after 9/11", *Analyst Wire*, Sep. 11.

Khan, A.E. (1970), *The economics of regulation: Principles and Institutions*, The MIT Press, Cambridge, Massachusetts, USA.

Khanna, T., Gulati, R. and Nohria, N. (1999), "The dynamics of learning alliances: Competition, cooperation, and relative scope", in Reuer, J.J. (2004) (Eds.), *Strategic alliances: Theory and evidence*, Oxford University Press, Oxford, UK, pp. 267-295.

Kiefer, M. (2005), *Outlook for Commercial Airline Industry*, FDCH Congressional Testimony, Committee Name: House Transportation and Infrastructure, Washington, DC, USA, Sep. 28.

Kilcarr, S.S. (1997), "The Price of Alliances", *Air Cargo World*, Sep., Vol. 87, Issue 9, pp. 38-43.

Killing, J.P. (1982), "How to make a global joint venture work", *Harvard Business Review*, May-Jun., Vol. 60, Issue 3, pp. 120-128.

Kingsley-Jones, M. (1999), "KLM reveals plans for cargo alliance: Alitalia Northwest Airlines Alliance", *Flight International*, Dec. 9, p9.

Kinney, T.C. and Taylor, J.R. (1995), *Marketing Research: An Applied Approach*, 5<sup>th</sup> Ed., McGraw-Hill Inc., New York, New York, USA.

Klaus, B. (2007), "Lufthansa is ready to conquer Europe", *Die Spiegel*, Jan. 18, pp. 27-28.

Klein, B. (1980), "Transaction costs determinants of "unfair" contractual arrangements", *American Economic Review*, May, Vol. 70, Issue 2, pp. 356-362.

Klein, B., Crawford, R.G. and Alchian, A.A. (1978), "Vertical integration, appropriable rents and the competitive contracting process", *Journal of Law & Economics*, Oct., Vol. 21, Issue 2, pp. 297-326.

Kleymann, B. and Seristo, H. (2004), *Managing Strategic Airline Alliances*, Ashgate Publishing, Aldershot, Hampshire, UK.

Knibb, D. (2009), "In A Spin Over Immunity Pacts", *Airline Business*, Dec., Vol. 25, Issue 12, pp. 20-21.

Knibb, D. (2010), "Breaking the Bilateral Web", *Airline Business*, May, Vol. 26, Issue 5, pp. 32-37.

Knorr, A. and Arndt, A. (2004), "Alliance Strategy and the Fall of Swissair: A Comment", *Journal of Air Transport Management*, Mar., Vol. 10, Issue 2, pp. 119-123.

Kogut, B. (1991), "Joint Ventures and the option to expand and acquire", *Management Science*, Jan., Vol. 37, Issue 1, pp. 19-33.

Koh, J. and Venkatraman, N. (1991), "Joint Venture Formations and stock market reactions: An assessment in the information technology sector", *Academy of Management Journal*, Dec., Vol. 34, Issue 4, pp. 869-892.

Koka, B.R. and Prescott, J.E. (2008), "Designing Alliance Networks: The influence of network position, environmental change, and strategy on firm performance", *Strategic Management Journal*, Jun., Vol. 29, Issue 6, pp. 639-661.

Kotler, P. (1991), *Marketing Management: Analysis, Planning, Implementation, Control*, 7<sup>th</sup> Ed., Prentice Hall, Englewood Cliffs, New Jersey, USA.

Kotter, J.P. and Heskett, J.L. (1992), *Corporate Culture and Performance*, The Free Press, New York, New York, USA.

Koza, M. and Lewin, A.Y. (1998), "The co-evolution of strategic alliances", *Organization Science*, May-Jun., Vol. 9, Issue 3, pp. 255-264.

Krantz, M. (2007), "Airline Introduces Routes to Underserved U.S. Cities", *Meeting News*, Mar. 26, Vol. 31, Issue 4, p12.

Kroll, L. (2004), "Easy.com, Easy Go", *Forbes*, Dec. 13, Vol. 174, Issue 12, pp. 138-140.

Ku, E.C.S. and Yi, W.F. (2009), "Knowledge sharing and customer relationship management in the travel service alliances", *Total Quality Management & Business Excellence*, Dec., Vol. 20, Issue 12, pp. 1407-1421.

Kulat, R. (2005), "Europe's Largest Aviation Maintenance Event Features Strategies and Technologies for Expanding Commercial Airline Industry Focused on Cost, Performance", *PR Newswire, US*, Aug. 1, p1.

Kumar, N. (2006), "Strategies to fight Low-Cost Rivals", *Harvard Business Review*, Dec., Vol. 84, Issue 12, pp. 104-112.

Kumar, R. and Nti, K.O. (1998), "Differential learning and interaction in alliance dynamics: A process and outcome discrepancy model", *Organization Science*, May-Jun., Vol. 9, Issue 3, pp. 356-367.

Kynourgiopoulou, V. (2006), "Are Low-Fares becoming cheaper Network Carriers", *Airline Business*, Jun., Vol. 26, Issue 2, pp. 12-19.

Laitner, S. and Minder, R. (2005), "US and EU hopeful of deal on liberalising air travel", *The Financial Times*, London, UK, Section: International Economy, Oct. 22, p7.

Lambe, C.J. and Spekman, R.E. (1997), "Alliances, external technology acquisitions, and discontinuous technological change", *Journal of Production and Innovation Management*, Mar., Vol. 14, Issue 2, pp. 102-116.

Lane, C. and Bachmann, R. (2000), *Trust within and between organisations: Conceptual Issues and Empirical Applications*, Oxford University Press, Oxford, UK.

Larraine, S. (2000), "More than Mergers", *Industry Week*, Dec. 6, Vol. 249, Issue 11, p25.

Lau, C.M., Yiu, D.W., Yeung, P.K. and Lu, Y. (2008), "Strategic orientation of high-technology firms in a transitional economy", *Journal of Business Research*, Jul., Vol. 61, Issue 7, pp. 765-777.

Lawton, T.C. (2002), *Cleared for Take-Off: Structure and strategy in the low fare airline business*, Ashgate Studies in Aviation Economics and Management, Ashgate Publications, Aldershot, Hampshire, UK, Sep. 2002.

Lazzarini, S.G. (2007), "The Impact of Membership in competing Alliance Constellations: Evidence on the operational performance of global airlines", *Strategic Management Journal*, Apr., Vol. 28, Issue 4, pp. 345-367.

Learmount, D. (1998), "Alliances force pace on safety", *Flight International*, Apr. 2, pp. 12-13.

Learmount, D. (2004), "IATA forecasts growth, but adds profit warning", *Flight International*, Section: News, Air Transport, Dec. 21, p14.

Lecraw, D.J. (1983), "Performance of transnational corporations in less developed countries", *Journal of International Business Studies*, Spring-Summer, Vol. 14, Issue 1, pp. 15-33.

Lee, D. (2003), "Concentration and price trends in the US domestic airline industry: 1990-2000", *Journal of Air Transport Management*, Mar., Vol. 9, Issue 2, pp. 91-101.

Lee, G.K. and Lieberman, M.B. (2010), "Acquisition vs. internal development as modes of market entry", *Strategic Management Journal*, Feb., Vol. 31, Issue 2, pp. 140-158.

Lengell, S. (2006), "Obstacle looms in United-Continental deal", *Washington Times*, DC, Dec. 14, pp. 13-15.

Letterie, W., Hagedoorn, J., van Kranenburg, H. and Palm, F. (2008), "Information gathering through alliances", *Journal of Economic Behavior & Organization*, May, Vol. 66, Issue 2, pp. 176-194.

Levine, M.E. (1987), "Airline competition in deregulated markets: Theory, firm strategy and public policy", *Yale Journal of Regulation*, Spring, Vol. 4, Issue 2, pp. 393-494.

Levinson, N.S. and Asahi, M. (1995), "Cross-national alliances and interorganizational learning", *Organizational Dynamics*, Autumn, Vol. 24, Issue 2, pp. 50-63.

Levy, A. and Farzad, R. (2010), "Priceline.com", *Bloomberg Businessweek*, Jun. 21, Issue 4184, pp. 57-58.

Lewicki, R.J. and Bunker, B.B. (1995), "Trust relationships: A model of trust development and decline", in Bunker, B. and Rubin, J.Z. (1995) (Eds.), *Conflict, Cooperation and Justice*, Jossey-Bass, San Francisco, California, USA, pp. 133-173.

Li, D., Eden, L., Hitt, M.A. and Ireland, R.D. (2008), "Friends, Acquaintances, or Strangers? Partner selection in R&D alliances", *Academy of Management Journal*, Apr., Vol. 51, Issue 2, pp. 315-334.

Li, Y. and Liao, X. (2007), "Decision support for risk analysis on dynamic alliance", *Decision Support Systems*, Jan., Vol. 42, Issue 4, pp. 2043-2059.

Lin, M.H. (2008), "Airline alliances and entry deterrence", *Transportation Research Part E: Logistics and Transportation Review*, Jul., Vol. 44, Issue 4, pp. 637-665.

Lincoln, Y.S. and Guba, E.G. (1986), "But is rigorous, trustworthiness and authenticity in naturalistic evaluation", *New Directions for Program Evaluation*, Jun., Vol. 4, Issue 30, pp. 73-84.

Lindstadt, H. and Fauser, B. (2004), "Separation or integration? Can network carriers create distinct business streams on one integrated production platform?", *Journal of Air Transport Management*, Jan., Vol. 10, Issue 1, pp. 23-31.

Lodon, M. (2007), "Long-haul low-fares are getting into the market", *Business Week Online*, Dec. 28, pp. 14-15.

Lorange, P. (1996), "Interactive Strategies, Alliances and Partnerships", *Long Range Planning*, Aug., Vol. 29, Issue 4, pp. 581-584.

Lorange, P. and Roos, J. (1992), *Strategic Alliances: Formation, Implementation and Evolution*, Blackwell Publishers, John Wiley & Sons, New Jersey, USA.

Lott, S. (2005), "Air Traffic Congestion Moving to Boiling Point", *Aviation Week & Space Technology*, Section: Arrivals, Oct. 3, Vol. 163, Issue 13, p46.

Lott, S. and Taylor, A. (2005), "What Happens To Regionals' Costs When Growth Stops?", *Aviation Week & Space Technology*, Jan. 10, Vol. 162, Issue 2, p46.

Love, P.E. and Gunasekaran, A. (1999), "Learning alliances: A customer-supplier focus for continuous improvement in manufacturing", *Industrial and Commercial Training*, Vol. 31, Issue 3, pp. 88-96.

Luna, J.D. (2010), "Oneworld granted antitrust immunity", *Airfinance Journal*, Feb., Issue 327, p27.

Lunnan, R. and Haugland, S.A. (2008), "Predicting and measuring alliance performance: A multidimensional analysis", *Strategic Management Journal*, May, Vol. 29, Issue 5, pp. 545-556.

Luo, Y. (2008a.), "Procedural fairness and interfirm cooperation in strategic alliances", *Strategic Management Journal*, Jan., Vol. 29, Issue 1, pp. 27-46.

Luo, Y. (2008b.), "Structuring interorganizational cooperation: The role of economic integration in strategic alliances", *Strategic Management Journal*, Jun., Vol. 29, Issue 6, pp. 617-637.

Luo, X. and Deng, L. (2009), "Do Birds of a Feather Flock Higher? The Effects of Partner Similarity on Innovation in Strategic Alliances in Knowledge-Intensive Industries", *Journal of Management Studies*, Sep., Vol. 46, Issue 6, pp. 1005-1030.

Lyle, C. (2003), "A Free world", *Airline Business*, Feb., Vol. 19, Issue 2, pp. 60-64.

Lyles, M.A. (1994), "The impact of organizational learning on joint venture formation", *International Business Review*, Dec., Vol. 3, Issue 4, pp. 459-467.

Lynch, R.P. (1993), *Business Alliances Guide: The hidden competitive weapon*, John Wiley & Sons, New Jersey, USA.

Maldutis, J. (2006), "Airline Bankruptcies Have Run Amok", *Aviation Week & Space Technology*, Aug. 21, Vol. 165, Issue 8, p62.

Mamaghani, F. (2009), "Impact of E-commerce on Travel and Tourism: An Historical Analysis", *International Journal of Management*, Dec., Vol. 26, Issue 3, pp. 365-375.

Management Today (2010), "Sector by Sector", *Management Today*, Dec., pp. 41-49.

Marketing (2010a.), "Method in Stelios' Madness", *Marketing*, Jul. 21, p25.

Marketing (2010b.), "More than Miles", *Marketing*, Aug. 18, pp. 29-30.

Marketing Week (2010), "easyJet sets sights on business travel market", *Marketing Week*, Nov. 18, Vol. 33, Issue 47, p9.

Marilyn, A. (2007), "Senators to explore airline merger", *USA Today*, Jan. 22, p3.

Marks, M.L. and Mirvis, P.H. (1992), "Rebuilding after the Merger: Dealing with survivor sickness", *Organizational Dynamics*, Autumn, Vol. 21, Issue 2, pp. 18-32.

Marshall, C. and Rossman, G.B. (1999), *Designing Qualitative Research*, 3<sup>rd</sup> Ed., Sage Publications, Inc., Thousand Oaks, California, USA.

Mason, K.J. (2001), "Marketing low-cost airline services to business travellers", *Journal of Air Transport Management*, Mar., Vol. 7, Issue 2, pp. 103-109.

Mason, K.J. and Alamdari, F. (2007), "EU network carriers, low cost carriers and consumer behaviour: A Delphi study of future trends", *Journal of Air Transport Management*, Sep., Vol. 13, Issue 5, pp. 299-310.

Matlack, C. (2008), "Airbus Gains Altitude", *Business Week Online*, Jan. 17  
[Online], Available at:  
[http://www.businessweek.com/globalbiz/content/jan2008/gb20080116\\_787048.htm](http://www.businessweek.com/globalbiz/content/jan2008/gb20080116_787048.htm),  
downloaded Jun. 18, 2008.

Mayer, K.J. and Argyres, N.S. (2004), "Learning to contract: Evidence from the personal computer industry", *Organization Science*, Jul.-Aug, Vol. 15, No. 4, pp. 394-410.

McAllister, J.F.O. (2001), "Easy All over Europe", *Time, Europe*, Jul. 23, Vol. 158, Issue 4, pp. 44-45.

McCartney, S. (2010a.), “Shopping for Perks among the Big Airline Alliances”, *Wall Street Journal - Eastern Edition*, Jul. 8, Vol. 256, Issue 6, pp. D1-D2.

McCartney, S. (2010b.), “The Middle Seat: Tempted by Miles? Do the Math”, *Wall Street Journal - Eastern Edition*, Aug. 19, Vol. 257, Issue 5, pD1.

McCutchen, W.W. Jr., Swamidass, P.M. and Teng, B.S. (2008), “Strategic Alliance Termination and Performance: The role of task complexity, nationality, and experience”, *The Journal of High Technology Management Research*, Jan., Vol. 18, Issue 2, pp. 191-202.

McEleny, C. (2010), “easyJet set to sell flights from within its Facebook Page”, *New Media Age*, Apr. 1, p3.

Meade, L., Liles, D.H. and Sarkis, J. (1997), “Justifying Partnering: Strategic Alliances and a Prerequisite for Virtual Enterprising”, *International Journal of Management Science*, Vol. 25, No. 1, pp. 29-42.

Meichtry, S. (2009), “New Alitalia flies crowded skies: The carrier, under new ownership, must do battle with its low-cost rivals”, *Wall Street Journal - Eastern Edition*, Jan. 13, pB2.

Melbourne, K. (2005), *Forming cooperative arrangements in uncertain environments*, University of Bay Press, Brisbane, Australia.

Mellat-Parast, M. and Digman, L.A. (2008), "Learning: The interface of quality management and strategic alliances", *International Journal of Production Economics*, Aug., Vol. 114, Issue 2, pp. 820-829.

Meyer, K.E., Wright, M. and Pruthi, S. (2009), "Managing knowledge in foreign entry strategies: A resource-based analysis", *Strategic Management Journal*, May, Vol. 30, Issue 5, pp. 557-574.

Michaels, A. (2006), "Business Chief warns on Sale of Alitalia", *The Financial Times*, London, UK, Section: Europe, Dec. 19, p6.

Michaels, D. (2010), "EU Accelerates Plans for 'Single Sky' System", *Wall Street Journal - Eastern Edition*, Jun. 23, Vol. 25, Issue 145, pA10.

Michaels, J.W. (2001), "Don't Buy, Bond Instead", *Forbes*, May 21, Vol. 167, Issue 12, p20.

Michaels, J.W. (2007), "Super Carriers", *Aviation Week & Space Technology*, Jul. 16, Vol. 167, Issue 3, pp. 67-72.

Mifsud, P., Cordle, V. and Bonilla, C.E. (2010), "United and Continental is a big win for all stakeholders", *Airfinance Journal*, May, Issue 329, p6.

Miles, R.E. and Snow, C.C. (1992), "Causes of failure in network organizations", *California Management Review*, Vol. 34, Issue 4, pp. 53-72.

Miller, A.N. (1995), "British Privatization: Evaluating the Results", *Columbia Journal of World Business*, Winter, Vol. 30, Issue 4, pp. 82-98.

Miller, D. and Shamsie, J. (1996), "The resource-based view of the firm in two environments: The Hollywood film studios from 1936 to 1965", *Academy of Management Journal*, Jun., Vol. 39, Issue 3, pp. 519-543.

Milmo, D. (2006), "Deal talk swirls round the air industry as too many carriers fight for a space in the skies", *The Guardian, London, UK*, Section: Guardian Financial Pages, Nov. 25, p37.

Mitchell, J. and Carey, S. (2010a.), "Airlines State Case for Deal", *Wall Street Journal - Eastern Edition*, May 28, Vol. 255, Issue 124, pB2.

Mitchell, J. and Carey, S. (2010b.), "CEOs Defend United-Continental Deal", *Wall Street Journal - Eastern Edition*, Jun. 17, Vol. 255, Issue 140, pB3.

Mitsuhashi, H. and Greve, H.R. (2009), "A Matching Theory of Alliance Formation and Organizational Success: Complementarity and compatibility", *Academy of Management Journal*, Vol. 52, No. 5, pp. 975-995.

Monczka, R.M., Peterson, K.J., Handfield, R.B. and Ragatz, G.L. (1998), "Success factors in strategic supplier alliances: The buying company perspective", *Decision Sciences*, Summer, Vol. 29, Issue 3, pp. 553-577.

Moore, M. (2006), "Prodi joins rescue talks for 'out of control' Alitalia as losses hit €221m", *The Daily Telegraph, London, UK*, Section: City Transport, Oct. 17, pp. 67-70.

Moores, V. (2009), "Terminal Illness", *Airline Business*, Jun., Vol. 25, Issue 6, pp. 50-56.

Moores, V. and Dunn, G. (2010), "Uneven Bounce", *Airline Business*, Jul., Vol. 26, Issue 7, pp. 36-38.

Moores, V., Ranson, L. and Yeo, G.L. (2010), "The last Drop", *Airline Business*, Jan., Vol. 26, Issue 1, pp. 34-37.

Morgan, R.M. and Hunt, S.D. (1994), "The commitment-trust theory of relationship marketing", *Journal of Marketing*, Jul., Vol. 58, Issue 3, pp. 20-38.

Morrell, P.S. and Pilon, R.V. (1999), "KLM and Northwest: A survey of the impact of a passenger alliance on cargo service characteristics", *Journal of Air Transport Management*, Jul., Vol. 5, Issue 3, pp. 153-160.

Morrison, M. and Mezentseff, L. (1997), "Learning Alliances: A new dimension of strategic alliances", *Management Decision*, Vol. 35, Issue 5-6, pp. 351-357.

Mouawad, J. (2010), "Air Merger with a Note of Urgency", *New York Times*, May 4, p1.

Murray, J.Y. and Kotabe, M. (2005), "Performance Implications of Strategic Fit between Alliance Attributes and Alliance Forms", *Journal of Business Research*, Nov., Vol. 58, Issue 11, pp. 1525-1533.

Nakos, G. and Brouthers, K.D. (2008), "International alliance commitment and performance of small and medium-size enterprises: The mediating role of process control", *Journal of International Management*, Jun., Vol. 14, Issue 2, pp. 124-137.

Nativi, A. (2008a.), "Take It or Leave It", *Aviation Week & Space Technology*, Mar. 24, Vol. 168, Issue 12, p39.

Nativi, A. (2008b.), "Split Personality", *Aviation Week & Space Technology*, Sep. 1, Vol. 169, Issue 8, p38.

Nativi, A. (2008c.), "Crossing the Rubicon", *Aviation Week & Space Technology*, Dec. 22, Vol. 169, Issue 24, p30.

Nativi, A. (2009), "No Champion for Ciampino", *Aviation Week & Space Technology*, Feb. 2, Vol. 170, Issue 5, p45.

Nativi, A. and Wall, R. (2008), "Takeover Talks", *Aviation Week & Space Technology*, Jan. 7, Vol. 168, Issue 1, pp. 37-38.

Nativi, A. and Wall, R. (2009), "Recovery Risks", *Aviation Week & Space Technology*, Jun. 8, Vol. 170, Issue 23, p38.

Neill, J.D., Pfeiffer, G.M. and Young-Ybarra, C.E. (2001), "Technology R&D alliances and firm value", *The Journal of High Technology Management Research*, Autumn, Vol. 12, Issue 2, pp. 227-237.

Neuman, W.L. (1991), *Social Research Methods: Qualitative and Quantitative Approaches*, Allyn & Bacon, Boston, USA.

Neuman, W.L. (2005), *Social Research Methods: Qualitative and quantitative approaches*, 6<sup>th</sup> Ed., Allyn & Bacon, Boston, USA.

Newman, V. and Chaharbaghi, K. (1996), "Strategic Alliances in Fast-moving Markets", *Long Range Planning*, Dec., Vol. 29, Issue 6, pp. 850-856.

Nicolaides, P. (2010), "State Aid, Advantage and Competitive Selection: What Is a Normal Market Transaction?", *European State Aid Law Quarterly*, Mar., Vol. 9, Issue 1, pp. 65-78.

Nielsen, B.B (2005), "The role of Knowledge Embeddedness in the Creation of Synergies in Strategic Alliances", *Journal of Business Research*, Sep., Vol. 58, Issue 9, pp. 1194-1204.

Nielsen, B.B. (2007), "Determining international strategic alliance next term performance: A multidimensional approach", *International Business Review*, Jun., Vol. 16, Issue 3, pp. 337-361.

Noakes, G. (2002a.), "No-frills sales at the end", *Travel Trade Gazette, UK & Ireland*, May 13, Issue 2513, p4.

Noakes, G. (2002b.), "Trade awaits final details of merger", *Travel Trade Gazette, UK & Ireland*, Jun. 24, Issue 2519, p51.

Noakes, G. (2007a.), "Flybe launches online frequent-flyer scheme", *Travel Trade Gazette, UK & Ireland*, Jun. 1, Issue 2769, p8.

Noakes, G. (2007b.), "No-frills will grow but at slower rate", *Travel Trade Gazette, UK & Ireland*, Aug. 10, Issue 2779, p8.

Noakes, G. (2007c.), "EasyJet says growth at Gatwick is its strategy", *Travel Trade Gazette, UK & Ireland*, Nov. 2, Issue 2791, p4.

Nohria, N. and Garcia-Pont, C. (1991), "Global strategic alliances and industry structure", *Strategic Management Journal*, Summer, Vol. 12, Issue 3, pp. 105-124.

Norris, G. (2010), "Systematic Change", *Aviation Week & Space Technology*, Mar. 1, Vol. 172, Issue 9, pp. 46-49.

O'Connor, A. (2002), "Easyjet expands European network with Go", *European Venture Capital Journal*, Jun., Issue 93, pp. 40-41.

O'Connor, W.E. (2000), *An Introduction to Airline Economics*, 6<sup>th</sup> Ed., Greenwood Press, Praeger Publishers, Westport, Connecticut, USA.

O'Reilly, B. (1999), "The Mechanic Who Fixed Continental: Believe it or not, CEO Gordon Bethune, a former Navy mechanic, has made Continental the best airline in the U.S.", *Fortune*, Dec. 20, Vol. 140, Issue 12, pp. 176-183.

Oburai, P. and Baker, M.J. (1999), "Strategic Alliances and Supplier Partnerships", in Baker, M.J. (Eds.), *The IEBM Encyclopaedia of Marketing*, International Thomson Publishing Companies, Stamford, Connecticut, USA, pp. 145-186.

Oh, J.G. (1996), "Global Strategic Alliances in the Telecommunications Industry", *Telecommunications Policy*, Nov., Vol. 20, Issue. 9, pp. 713-720.

Organisation for Economic Co-operation and Development (OECD) (2003), *Technology Investments in the European Union Industrial Context*, Organisation for Economic Co-operation and Development (OCSE) Publications, Paris, France.

Osborn, G. (2000), "Austrian may buy Lauda Air stake off, Lufthansa", *Flight International*, Oct. 31, pp. 24-25.

Osborn, G. (2003), "Freedom to Fly", *Flight International*, Mar. 11 [Online], Available at: <http://www.flightglobal.com/pdfarchive/view/2003/2003-09%20-%201332.html>, downloaded Aug. 18, 2007.

Osborn, R.N. and Hagedoorn, J. (1997), "The institutionalization and evolutionary dynamics of inter-organizational alliances and network", *Academy of Management Journal*, Apr., Vol. 40, Issue 2, pp. 261-278.

Osborne, A. (2006), "Flying the flag still rules in airline takeovers", *The Daily Telegraph*, London, UK, Section: City Transport, Nov. 24, p4.

Ouchi, W.G. (1979), "A conceptual framework for the design of organizational control mechanisms", *Management Science*, Sep., Vol. 25, Issue 9, pp. 833-848.

Oum, T.H., Park, J.H., Kim, K. and Yu, C. (2004), "The effect of horizontal alliances on firm productivity and profitability: Evidence from the global airline industry", *Journal of Business Research*, Aug., Vol. 57, Issue 8, pp. 844-853.

Oum, T.H., Park, J.H. and Zhang, A. (2000), *Globalization and Strategic Alliances: The Case of the Airline Industry*, Pergamon, Elsevier-Science, New York, New York, USA.

Outsourced Logistics (2008), "SkyTeam Alliance Gets Antitrust Immunity", *Outsourced Logistics*, Jul., Vol. 1, Issue 2, p10.

Oxley, J.E. (1997), "Appropriability hazards and governance in strategic alliances: A transaction cost approach", *Journal of Law, Economics, and Organization*, Oct., Vol. 13, Issue 2, pp. 387-409.

Oxley, J.E., Sampson, R.C. and Silverman, B.S. (2009), "Arms Race or Détente? How Interfirm Alliance Announcements Change the Stock Market Valuation of Rivals", *Management Science*, Aug., Vol. 55, Issue 8, pp. 1321-1337.

Palati, M. (2002), "The Art of Negotiation", *Advanced Strategic Management*, Vol. 18, Issue 7, pp. 89-101.

Panariello, A. and Sobie, B. (2008), "Atlantic Storm", *Airline Business*, Apr., Vol. 24, Issue 4, pp. 58-62.

Pangarkar, N. (2009), "Do Firms Learn from Alliance Terminations? An Empirical Examination", *Journal of Management Studies*, Sep., Vol. 46, Issue 6, pp. 982-1004.

Pansiri, J. (2008), "The effects of characteristics of partners on strategic alliance performance in the SME dominated travel sector", *Tourism Management*, Feb., Vol. 29, Issue 1, pp. 101-115.

Pantelia, N. and Sockalingam, S. (2005), "Trust and Conflict within virtual inter-organizational alliances: A framework for facilitating knowledge sharing", *Decision Support System*, Jun., Vol. 39, Issue 4, pp. 599-617.

Paran, G.D. (1999), *Marketing in Airlines*, Melbourne University Publications, Melbourne, Australia.

Park, J.H. (1997), "The Effects of Airline Alliances on Markets and Economic Welfare", *Transportation Research Part E: Logistics and Transportation Review*, Sep., Vol. 33, Issue 3, pp. 181-195.

Park, J.H. and Cho, D.S. (1997), "The Effect of Strategic Alliance on Performance: A study of international airline industry", *Journal of Air Transport Management*, Jul., Vol. 3, Issue 3, pp. 155-164.

Park, J.H. and Zhang, A. (1998), "Airline Alliances and Partner Firms' Outputs", *Transportation Research Part E: Logistics and Transportation Review*, Dec., Vol. 34, Issue 4, pp. 245-255.

Park, J.H. and Zhang, A. (2000), "An empirical analysis of global airline alliances: Cases in North Atlantic markets", *Review of Industrial Organization*, Jun., Vol. 16, Issue 4, pp. 367-384.

Park, S.H. and Zhou, D. (2005), "Firm Heterogeneity and Competitive Dynamics in Alliance Formation", *Academy of Management Review*, Jul., Vol. 30, Issue 3, pp. 531-554.

Parker, D. (2009), "Debate: History of Privatization", *Public Money & Management*, May, Vol. 29, Issue 3, pp. 140-142.

Parkhe, A. (1998), "Understanding Trust in International Alliances", *Journal of World Business*, Fall, Vol. 33, Issue 3, pp. 219-240.

Parsons, N. (2002), "Going Places: The European low-cost market has always been fast changing, but easyJet's decision to buy its competitor Go will change the market overnight", *Airfinance Journal*, Jun., pp. 14-15.

Parsons, R. (2010), "Stelios paves EasyJet's way into joint marketing deals", *Marketing Week*, Oct. 14, Vol. 33, Issue 42, p8.

Patton, M.Q. (1987), *How to use qualitative methods in evaluation*, Centre for Study of Evaluation, University of California, Los Angeles, California, USA, Sage Publications, Inc., Thousand Oaks, California, USA.

Pekar, P. and Margulis, M.S. (2003), "Equity Alliances take Centre Stage", *Business Strategy Review*, Jun., Vol. 14, Issue 2, pp. 50-62.

Pender, L. (1999), "European Aviation: The emergence of franchised airline operations", *Tourism Management*, Oct., Vol. 20, Issue 5, pp. 565-574.

Pennac, J. (2003), *How to Form and Manage Successful Strategic Alliances*, McGraw-Hill, New York, New York, USA.

People Management (2002), "EasyJet staff threaten strike action over union recognition", *People Management*, Sep. 12, Vol. 8, Issue 18, pp. 12-13.

Perman, S. (1998), "Allied Air Force: Merger between Continental and Delta may be the first of several airline consolidations", *Time, US Edition*, Feb. 9, Vol. 151, Issue 5, pp. 76-78.

Perry, M.L., Sengupta, S. and Krapfel, R. (2004), "Effectiveness of horizontal strategic alliances in technologically uncertain environments: Are trust and commitment enough?", *Journal of Business Research*, Sep., Vol. 57, Issue 9, pp. 951-956.

Personnel Today (2002), "EasyJet's communications actions helped allay fears over Go takeover", *Personnel Today*, Oct. 22, p10.

Pfeffer, J. and Nowak, P. (1976), "Joint Ventures and Interorganizational interdependence", *Administrative Science Quarterly*, Sep., Vol. 21, Issue 3, pp. 398-418.

Pfeffer, J. and Salancik, G. (1978), *The External Control of Organizations: A Resource Perspective*, Harper & Row, New York, New York, USA.

Pickett, G. (2008), "Ryanair and easyJet will ride this storm", *Travel Trade Gazette, UK & Ireland*, Aug. 1, Issue 2828, p11.

Pilling, M. (2005), "Oil Prices and the global economy will dictate prospects for carriers", *Flight International*, Section: Features, Airlines, Jan. 4, p26.

Pilling, M. (2008), "Uniting Force", *Airline Business*, Jan., Vol. 24, Issue 1, pp. 26-29.

Pilling, M. and O'Toole, K. (2002), "Let Battle Commence", *Airline Business*, Jun., Vol. 18, Issue 6, pp. 30-31.

Piluno, M. (2010), "Miles remain a strong Currency", *Airline Business*, Apr., Vol. 26, Issue 4, p40.

Pisano, G.P. (1989), "Using equity participation to support exchange: Evidence from the biotechnology industry", *Journal of Law, Economics and Organization*, Spring, Vol. 5, Issue 1, pp. 109-126.

Pla-Barber, F.J. (1985), *Licensing in international strategy: A guide for planning and negotiations*, Quorum Books, Greenwood Press, Westport, Connecticut, USA.

Pla-Barber, F.J., Sanchez-Peinado, E. and Madhok, A. (2010), "Investment and Control Decisions in Foreign Markets: Evidence from Service Industries", *British Journal of Management*, Sep., Vol. 21, Issue 3, pp. 736-753.

Plugs, H. (2004), "Staff and Incentives in a Strategic Alliance", *Organization Science*, Vol. 16, No. 7, pp. 611-617.

Pogliotti, G. (2007), "Bersani has two months to close Alitalia sale", *Il Sole 24 Ore*, Jan. 30, p32.

Polanyi, M. (1962), *Personal Knowledge: Towards a post-critical philosophy*, Routledge and Kegan Paul, London, UK.

Popham, P. (2006), "Air France-KLM in merger talks with Italian carrier Alitalia", *The Independent, London, UK*, Section: Business, Nov. 24, p48.

Popper, K. (1959), *The Logic of Scientific Discovery*, Harper & Row, New York, New York, USA.

Poppo, L. and Zenger, T. (2002), "Do formal contracts and relational governance function as substitutes or complements?", *Strategic Management Journal*, Aug., Vol. 23, Issue 8, pp. 707-725.

Porter, M.E. (1985), *Competitive Advantage: Creating and sustaining superior performance*, The Free Press, New York, New York, USA.

Porter, M.E. and Fuller, M. (1986), "Coalitions and Global Strategy", in Porter, M.E. (1986), (Eds.), *Competition in global industries*, Harvard Business School Press, Boston, Massachusetts, USA, pp. 315-344.

Poulymenakou, A. and Prasopoulou, E.A. (2004), "Adopting a lifecycle perspective to explain the transition from technological innovation to alliance management", *Management Decision*, Vol. 42, Issue 9, pp. 1115-1130.

Powell, W.W., Koput, K.W. and Smith-Doerr, L. (1996), "Interorganizational collaboration and the locus of innovation: Networks of learning in biotechnology", *Administrative Science Quarterly*, Mar., Vol. 41, Issue 1, pp. 116-145.

PR Newswire (2005), "World Aviation Leaders to Convene at the Inaugural Las Vegas World Aviation Forum in October: an Industry Turned Upside Down", *PR Newswire, US*, Apr. 12, p1.

PR Newswire (2010), "KPMG research shows use of joint ventures and strategic alliances to increase: Nearly 80 percent of US executives will use collaborations to achieve growth goals", *PR Newswire, US*, Feb. 27, pp. 17-28.

Prada, P. and Esterl, M. (2009), "Airlines Predict More Trouble, Broaden Cuts", *Wall Street Journal - Eastern Edition*, Jun. 12, Vol. 253, Issue 136, pB1.

Prandoni, S. (1998), "The patriotic islands in the globalised village: Airline companies executives", *Il Sole 24 Ore*, Section: Business, Aug. 5, pp. 9-13.

Preloin, M. (2007), "Air France/KLM proposes common branding in Skyteam", *Journal of Air Transportation*, Apr., Vol. 13, Issue 4, pp. 12-18.

Professional Engineering (2008), "Boeing 747-8 set for fast build: Parts making starts for aircraft set to rival Airbus superjumbo after rapid design process", *Professional Engineering*, Mar. 19, Vol. 21, Issue 5, pp. 10-11.

Puck, J.F., Holtbrügge, D. and Mohr, A.T. (2009), "Beyond entry mode choice: Explaining the conversion of joint ventures into wholly owned subsidiaries in the People's Republic of China", *Journal of International Business Studies*, Apr., Vol. 40, Issue 3, pp. 388-404.

Rajasekar, J. and Fouts, P. (2009), "Strategic alliances as a competitive strategy", *International Journal of Commerce & Management*, Vol. 19, Issue 2, pp. 93-114.

Ranft, A.L. and Marsh, S.J. (2008), "Accessing Knowledge through Acquisitions and Alliances: An Empirical Examination of New Market Entry", *Journal of Managerial Issues*, Spring, Vol. 20, Issue 1, pp. 51-67.

Ranson, L. (2007), "What's Next?", *Aviation Week & Space Technology*, May 21, Vol. 166, Issue 19, p75.

Ranson, L. (2009), "Star gets tentative transatlantic nod", *Airline Business*, May, Vol. 25, Issue 5, p12.

Ranson, L. (2010), "United forces the Merger Pace", *Airline Business*, Jun., Vol. 26, Issue 6, pp. 10-11.

Ranson, L., Sobie, B. and Kirby, M. (2009), "Cutting To Fit", *Airline Business*, Jun., Vol. 25, Issue 6, pp. 34-42.

Rao, B.P. and Reddy, S.K. (1995), "A Dynamic Approach to the Analysis of Strategic Alliances", *International Business Review*, Dec., Vol. 4, Issue 4, pp. 499-518.

Rapoport, A. (1974), *Game Theory as a Theory of Conflict Resolution*, Springer, Amsterdam, Netherlands.

Ravenscraft, D.J. and Scherer, F.M. (1987), *Mergers, Sell-Offs, and Economic Efficiency*, Brooking Institutions, Washington, DC, USA.

Reed, D. (2010a.), "Continental, Southwest land profits", *USA Today*, Jan. 1, p2B.

Reed, D. (2010b.), "Last big airline drops free food", *USA Today*, Mar. 16, p1B.

Reed, D. (2010c.), "Irked US Airways ends merger talks with United", *USA Today*, Apr. 23, p3B.

Reed, D. (2010d.), "United, Continental near merger", *USA Today*, Apr. 30, p1B.

Reed, D. (2010e.), "United, Continental plan merger", *USA Today*, May 3, p1B.

Reed, D. (2010f.), "What will new United be like?", *USA Today*, May 10, p6B.

Reed, D. (2010g.), "Does this...plus this...equal higher airfares?", *USA Today*, Jun. 22, pp. 1B-3B.

Reid, D., Bussiere, D. and Greenway, K. (2001), "Alliance formation issues for knowledge-based enterprises", *International Journal of Management Reviews*, Mar., Vol. 3, Issue 1, pp. 79-100.

Renda, A. (2010), "Competition-regulation interface in telecommunications: What's left of the essential facility doctrine", *Telecommunications Policy*, Feb., Vol. 34, Issue 1-2, pp. 23-35.

Reuer, J.J. (1999), "Strategic alliance research: Progress and prospects", in Reuer, J.J. (2004) (Eds.), *Strategic alliances: Theory and Evidence*, Oxford University Press, Oxford, UK, pp. 1-18.

Reuer, J.J. (2001), "From Hybrids to Hierarchies: Shareholder wealth effects of joint venture partner buyouts", *Strategic Management Journal*, Jan., Vol. 22, Issue 1, pp. 27-44.

Reuer, J.J., Arino, A. and Mellewigt, T. (2006), "Entrepreneurial alliances as contractual forms", *Journal of Business Venturing*, May, Vol. 21, Issue 3, pp. 306-325.

Reuer, J.J. and Ragozzino, R. (2008), "Adverse selection and M&A design: The roles of alliances and IPOs", *Journal of Economic Behavior & Organization*, May, Vol. 66, Issue 2, pp. 195-212.

Reuer, J.J. and Shen, J.C. (2003), "The Extended Merger and Acquisition Process: Understanding the Role of IPOs in Corporate Strategy", *European Management Journal*, Apr., Vol. 21, Issue 2, pp. 192-198.

Reuer, J.J. and Zollo, M. (2005), "Termination Outcomes of Research Alliances", *Research Policy*, Feb., Vol. 34, Issue 1, pp. 101-115.

Reus, T.H. and Lamont, B.T. (2009), "The double-edged Sword of Cultural Distance in International Acquisitions", *Journal of International Business Studies*, Oct.-Nov., Vol. 40, Issue 8, pp. 1298-1316.

Reynolds, J. (2007), "When the going's not so easy", *Marketing Week*, Feb. 15, Vol. 30, Issue 7, pp. 26-27.

Richardson, D. (2002), "Takeover looks good for business", *Travel Trade Gazette, UK & Ireland*, Jun. 3, Issue 2516, p36.

Richardson, D. (2010), "Is the grass greener on the other side?", *Travel Trade Gazette, UK & Ireland*, Feb. 5, Issue 2899, pp. 36-37.

Richarge, L. and Scott, B. (2003), "Is Culture the major challenge in strategic alliances?", *The Financial Times, London, UK*, Sep., pp. 89-104.

Ring, P.S. and Van de Ven, A.H. (1992), "Structuring cooperative relationships between organizations", *Strategic Management Journal*, Oct., Vol. 13, No. 7, pp. 483-498.

Rogers, D. and Arnold, M. (2002), "Go director to take top role after easyJet deal", *Marketing*, May 23, p5.

Rose, S. (1998), "Cloudy skies: What planned airline marriages will really mean to frequent-flier programs", *Money*, Oct., Vol. 27, Issue 10, pp. 201-203.

Rosiello, A. (2004), *Strategic alliances in the biotechnology industry: A TCE and resource-based view*, Doctoral Research, Department of Economics, University of Strathclyde, Glasgow, Scotland, UK.

Rumelt, R.P. (1984), "Towards a strategic theory of the firm", in Lamb, R.B. (1984) (Eds.), *Competitive Strategic Management*, Prentice-Hall, Englewood Cliffs, New Jersey, USA, pp. 556-570.

Ryan, G.W. and Bernard, H.R. (2000), *Data Management and Analysis Method*, in Denzin, W.K. and Lincoln, H.R. (Eds.), *The SAGE Handbook of Qualitative Research*, 3<sup>rd</sup> Ed., Sage Publications, Inc., Thousand Oaks, California, USA, pp. 56-90.

Saglietto, L. (2009), "Airline alliances", *Competitiveness Review*, Vol. 19, Issue 4, pp. 304-322.

Salama, A., Holland, W. and Vinten, G. (2003), "Challenges and opportunities in mergers and acquisitions: Three international case studies - Deutsche Bank-Bankers Trust; British Petroleum-Amoco; Ford-Volvo", *Journal of European Industrial Training*, Vol. 27, Issue 6, pp. 313-321.

Saorty, K. (2008) "Emirates will fly first A380 to JFK", *Air Transport World*, Apr., Vol. 45, Issue 4, p9.

Schlangenstein, M., Credeur, M.J., Hughes, J. and Bliss, J. (2010), "United and Continental Reach for the Sky", *Bloomberg Businessweek*, May 10, Issue 4178, pp. 19-20.

Schofield, A. (2005a.), "Aircraft Manufacturers See 36% Profit Rise", *Aviation Daily*, Section: News, Nov. 8, Vol. 362, No. 27, p6.

Schofield, A. (2005b.), "DOT Bullish On Ownership Proposal, but Questions remain", *Aviation Daily*, Section: News, Nov. 9, Vol. 362, No. 25, p2.

Schofield, A. (2008), "Traffic Trauma", *Aviation Week & Space Technology*, Mar. 17, Vol. 168, Issue 11, pp. 60-62.

Schofield, A. (2009), "Global Gloom", *Aviation Week & Space Technology*, Jul. 13, Vol. 171, Issue 2, pp. 44-48.

Schofield, A. (2010), "Low-Cost Leader", *Aviation Week & Space Technology*, Jul. 12, Vol. 172, Issue 26, p54.

Schofield, A. and Wall, R. (2010), "Gaining Speed", *Aviation Week & Space Technology*, Jun. 14, Vol. 172, Issue 23, p28.

Schraeder, M. and Self, D.R. (2003), "Enhancing the Success of Mergers and Acquisitions: An Organizational Culture Perspective", *Management Decision*, Vol. 41, Issue 5, pp. 511-522.

Schrage, Y. (2007), "Italian government to collect Alitalia non-binding bids around mid-March", *AFX International Focus*, Jan. 31, p21.

Schreiner, M., Kale, P. and Corsten, D. (2009), "What really is alliance management capability and how does it impact alliance outcomes and success?", *Strategic Management Journal*, Dec., Vol. 30, Issue 13, pp. 1395-1419.

Scott, M. (2008), "The Agony of Italy's 'Cursed Airline'", *Business Week Online*, Apr. 4, p16.

Scott, M. and Flanagan, C. (2007), "Europe's Midsize Airlines Are Getting Squeezed", *Business Week Online*, Aug. 15 [Online], Available at: [http://www.businessweek.com/globalbiz/content/aug2007/gb20070814\\_643939.htm](http://www.businessweek.com/globalbiz/content/aug2007/gb20070814_643939.htm), downloaded at Nov. 30, 2007.

Segil, L. (1998), "Strategic alliances for the 21st Century", *Strategy & Leadership*, Sep.-Oct., Vol. 26, Issue 4, pp. 12-16.

Shah, D., Rust, R.T., Parasuraman, A., Staelin, R. and Day, G.S. (2006), "The Path to Customer Centricity", *Journal of Service Research*, Nov., Vol. 9, Issue 2, pp. 113-124.

Shah, R.H. and Swaminathan, V. (2008), "Factors Influencing Partner Selection In Strategic Alliances: The moderating role of alliance context", *Strategic Management Journal*, May, Vol. 29, Issue 5, pp. 471-494.

Shamdasani, P.N. and Sheth, J.N. (1995), "An experimental approach to investigating satisfaction and continuity in marketing alliances", *European Journal of Marketing*, Vol. 29, Issue 4, pp. 6-23.

Shane, F. (2005), "US Liberalization: More important than ever", *US Fed News*, 13<sup>th</sup> Annual International CEO Conference, U.S. Department of Transportation, May 9, pp. 7-14.

Shannon, D. (2010), "Here We Go Again", *Aviation Week & Space Technology*, Apr. 12, Vol. 172, Issue 14, p40.

Shannon, D. and Schofield, A. (2010), "Fit To Be Tied?", *Aviation Week & Space Technology*, May 10, Vol. 172, Issue 18, p20.

Shannon, M. (2005), "Airline losses forecast leaps 25%", *Flight International*, Section: Air Transport, Sep. 20, p6.

Shaw, S. (2007), *Airline Marketing and Management*, 6<sup>th</sup> Ed., Ashgate Publications, Aldershot, UK.

Shawoll, L. (2002), "A Revisioned Three-Game Scenario", *Academic Management Journal*, Vol. 43, Issue 2, pp. 449-477.

Sharma, D.D. (1998), "A model for governance in international strategic alliances", *Journal of Business and Industrial Marketing*, Vol. 13, Issue 6, pp. 511-528.

Shellock, D. (2006), "Air France turbulence caused by Alitalia talks", *The Financial Times, USA Edition*, Section: FT Markets, Nov. 24, p30.

Sheth, J.N. and Parvatiyar, A. (1995), "Relationship marketing in consumer markets: Antecedents and consequences", *Journal of the Academy of Marketing Science*, Fall, Special issue: Relationship marketing, Vol. 23, No. 4, pp. 255-271.

Shields, R. (2010), “easyJet plans m-commerce sites as flyers use phones to assess delays”, *New Media Age*, Jun. 3, p7.

Shifrin, C. (2000), “Continental splits with Northwest out of court: Northwest Airlines has agreed to sell back its controlling stake in Continental Airlines to settle a US antitrust suit that was already on trial in Detroit”, *Airline Business*, Dec., Vol. 18, Issue 4, p14.

Silverman, D. (2004), *Qualitative Research: Theory, Method and Practice*, 2<sup>nd</sup> Ed., Sage Publications, Inc., Thousand Oaks, California, USA.

Simpkins, E. (2005), “Bankrupt! US airlines have lost more than \$30bn over the past four years”, *Sunday Telegraph, London, UK*, Section: City, Sep. 18, p3.

Simpson, B. (2003), “Weathering severe turbulence”, *Credit Card Management*, Oct., Vol. 16, Issue 2, pp. 14-20.

Slowinski, G., Oliva, E.R. and Lowenstein, L.J. (1995), “Medusa Alliances: Managing Complex Interorganizational Relationships”, *Business Horizons*, Jul.-Aug., Vol. 38, Issue 4, pp. 48-52.

Skaperdas, S. (1998), “On the formation of alliances in conflict and contests”, *Public Choice*, Jul., Vol. 96, No. 1-2, pp. 25-42.

Smith, A.K. (2010), “Air travelers face higher fees-again”, *Kiplinger's Personal Finance*, Jul., Vol. 64, Issue 7, p16.

Smith, C. (2002), "Brand champions are at the heart of easyJet-Go tussle", *Marketing Magazine*, May, 16, p17.

Smith, L. (1979), "An evolving logic of participant observation, educational ethnography and other case studies", in Schulman, L. (1979) (Eds.), *Review of Research in Education*, F.E. Peacock Publications, pp. 316-377.

Smith, P.A. (2010), "Will oil break the \$150 barrel barrier?", *Middle East*, Aug.-Sep., Issue 414, pp. 31-35.

Sobie, B. (2010), "Attention Deficit", *Airline Business*, Mar., Vol. 26, Issue 3, pp. 36-38.

Sorensen, C. (2010), "Ready for take-off", *Maclean's*, May 31, Vol. 123, Issue 20, pp. 35-36.

Sparaco, P. (1999), "Alitalia, KLM Launch Near-Merger Venture", *Aviation Week & Space Technology*, Aug. 9, Vol. 151, Issue 11, pp. 34-36.

Sparaco, P. (2002), "Low-Cost Carriers Steal The European Show", *Aviation Week & Space Technology*, Nov. 18, Vol. 157, Issue 21, pp. 59-62.

Sparaco, P. (2004), "A Lot To Be Lost: More red ink looms for European airlines despite a robust upswing in traffic", *Aviation Week & Space Technology*, Nov. 15, Vol. 161, Issue 19, p39.

Sparaco, P. (2007a.), "Italy's Error", *Aviation Week & Space Technology*, Feb. 12, Vol. 166, Issue 7, p108.

Sparaco, P. (2007b.), "Breeding a Hybrid?", *Aviation Week & Space Technology*, May 7, Vol. 166, Issue 18, p72.

Sparaco, P. (2008a.), "A Lifestyle Choice", *Aviation Week & Space Technology*, Feb. 4, Vol. 168, Issue 5, p48.

Sparaco, P. (2008b.), "Consolidation, Finally", *Aviation Week & Space Technology*, Oct. 6, Vol. 169, Issue 13, p66.

Sparaco, P. (2009), "Italy's Wasted Opportunity", *Aviation Week & Space Technology*, Jan. 5, Vol. 170, Issue 1, p39.

Sparaco, P. (2010), "In the Beginning...", *Aviation Week & Space Technology*, Jun. 28, Vol. 172, Issue 24, p69.

Spekman, R., Forbes, T.M., Isabella, L.A. and Macavoy, T.C. (1998), "Alliance Management: A view from the past and a look to the future", *Journal of Management Studies*, Nov., Vol. 35, Issue 6, pp. 747-772.

Spekman, R. and Sawhney, K. (1995), "Toward a conceptual understanding of the antecedents of strategic alliances", in Wilson, D.T. and Moller, K.E. (1995) (Eds.), *Business Marketing: An interaction and network perspective*, Kluwer Publications, Berlin, Germany, pp. 98-132.

Spence, M. (1974), "Competitive and optimal response to signals: An analysis of efficiency and distribution", *Journal of Economic Theory*, Mar., Vol. 7, Issue 3, pp. 296-332.

Spiegel, P. (2000), "Airline Industry has Justice on its Tail as Antitrust Trial open", *The Financial Times*, London, UK, Nov. 1, p12.

Staff, A.M. (2005), "Challenges ahead: Despite a cyclical recovery in traffic, the pressure for change is unlikely to let up over the coming year", *Airline Business*, Section: Comment, Jan. 1, Vol. 159, Issue 18, p11.

Stake, R.E. (1995), *The Art of Case Study Research*, Sage Publications, Inc., Thousand Oaks, California, USA.

Stake, R.E. (2005), *Multiple Case Study Analysis*, The Guilford Press, New York, New York, USA.

Stevenson, D. (2010), "Mobile Technology Declared to be Business Travel's Third Revolution", *Travel Weekly*, UK, Jun. 4, pp. 78-79.

Steward, C. (1999), *Developing Strategic Partnership: How to Leverage More Business from Major Customers*, Gower Publishing Ltd., Hampshire, UK.

Stewart, D. and Michaels, K. (2003), "LCC Growth: Implications for the Suppliers", *Aviation Strategy*, Mar. 17, pp. 7-19.

Stober, A. (2003), "Who soars in open skies? Our view of the impacts of anti-trust immunity, and international market deregulation on global alliances, consumers, and policy makers", *Journal of Air Transportation*, Vol. 8, No. 1, pp. 111-134.

Stoller, G. (2010), "Fliers less irked at airlines", *USA Today*, Jun. 8, p3B.

Strauss, A. and Corbin, J. (1990), *Basics of Qualitative Research: Grounded Theory Procedure and Techniques*, 2<sup>nd</sup> Ed., Sage Publications, Inc., Thousand Oaks, California, USA.

Swaminathan, V. and Moorman, C. (2009), "Marketing Alliances, Firm Networks, and Firm Value Creation", *Journal of Marketing*, Sep., Vol. 73, Issue 5, pp. 52-69.

Sylvers, E. (2006), "Air France Begins Talks On a Deal With Alitalia", *New York Times*, Section: Business/Financial Desk, Nov. 24, pp. 3-4.

Tae, H.O. and Park, J.H. (1997), "Airline Alliances: Current status, policy issues, and future directions", *Journal of Air Transport Management*, Jul., Vol. 3, Issue 3, pp. 133-144.

Talbot, D. (2010), "Reinventing the Commercial Jet", *Technology Review*, Mar.-Apr., Vol. 113, Issue 2, pp. 80-81.

Tarry, C. (2004), "The difficult part is yet to come: Profit rather than traffic alone remains the key to airline prosperity", *Tourism & Hospitality Research*, Mar., Vol. 5, Issue 1, pp. 79-83.

Tarry, C. (2007), "Rendezvous with Reality", *Airline Business*, Sep., Vol. 23, Issue 9, pp. 84-85.

Tarry, C. (2010a.), "Low-Cost Commodity", *Airline Business*, Feb., Vol. 26, Issue 2, pp. 28-30.

Tarry, C. (2010b.), "Feeling under depreciated", *Airline Business*, Apr., Vol. 26, Issue 4, pp. 60-61.

Tarry, C. (2010c.), "Can Mergers deliver real Value?", *Airline Business*, Jun., Vol. 26, Issue 6, pp. 58-59.

Tarry, C. (2010d.), "Summer yields brighter days", *Airline Business*, Sep., Vol. 26, Issue 9, pp. 60-61.

Taylor, I. (2007a.), "Alitalia bidding war underway", *Travel Weekly, UK*, Feb. 23, p14.

Taylor, I. (2007b.), “Easy Jet celebrates life online”, *Travel Weekly, UK*, Apr. 20, p21.

Taylor, I. (2007c.), “Southwest eyes traditional methods”, *Travel Weekly, UK*, Apr. 27, p21.

Taylor, S.J. and Bogdan, R. (1998), *Introduction to Qualitative Research Methods*, 3<sup>rd</sup> Ed., John Wiley & Sons, Inc., USA.

Teece, D.J. (1992), “Competition, Cooperation and Innovation: Organizational arrangements for regimes of rapid technological progress”, *Journal of Economic Behavior & Organization*, Jun., Vol. 18, Issue 1, pp. 1-25.

Teece, D.J. and Pisano, G. (1994), “The Dynamic Capabilities of Firms: An Introduction”, *Industrial and Corporate Change*, Vol. 3, Issue. 3, pp. 537-556.

Teece, J.T. (1987), “Profiting from technological innovation: Implications for integration, collaboration and public policy”, in Teece, J.T. (1987) (Eds.), *The Competitive Challenge*, Ballinger, Cambridge, Massachusetts, USA, pp. 1-27.

Tegtmeier, L.A. (2010), “MRO Mixed Strategies”, *Aviation Week & Space Technology*, May 10, Vol. 172, Issue 18, p20.

Teichert, T., Shehu, E. and von Wartburg, I. (2008), "Customer Segmentation Revisited: The case of the airline industry", *Transportation Research Part A: Policy and Practice*, Jan., Vol. 42, Issue 1, pp. 227-242.

The Daily Express (2002), "EasyJet fights to secure Go deal", *The Daily Express*, London, UK, May 13, p47.

The Economist Intelligence Unit (2006), *Country Profile 2006 - Italy: Transport, Communications, and the Internet*, The Economist Intelligence Unit Limited, London, UK, Aug., pp. 26-27.

The Financial Times (2007), "The Russians are coming", *The Financial Times*, London, UK, Section: Lex Column, Apr. 12, p18.

The Independent (2002), "EasyJet and Go report Rise in Passengers", *The Independent*, London, UK, Jun. 12, p20.

Thomas, J. (1992), *Doing Critical Ethnography*, Sage Publications Inc., Thousand Oaks, California, USA.

Thompson, J. (2006), "Low-cost carriers slam over-priced airports", *Airline Business*, Oct., Vol. 22, Issue 10, p21.

Thornton, C. (2000), "Unstable Alliances", *Flight International*, May 9, pp. 3-5.

Tita, B. and Meyer, G. (2006), "Desperate UAL seeks a Partner", *Crain's Chicago Business*, Dec. 18, Vol. 29, Issue 51, pp. 1-8.

Tiwana, A. (2008), "Do bridging ties complement strong ties? An empirical examination of alliance ambidexterity", *Strategic Management Journal*, Mar., Vol. 29, Issue 3, pp. 251-272.

Todeva, E. and Knoke, D. (2005), "Strategic Alliances and Models of Collaboration", *Management Decision*, Vol. 43, Issue 1, pp. 123-148.

Toh, R.S. and Raven, P. (2003), "Perishable Asset Revenue Management: Integrated Internet Marketing Strategies for the Airlines", *Transportation Journal*, Summer, Vol. 42, Issue 4, pp. 30-43.

Travel Trade Gazette (2000), "Europa joins Wings alliance", *Travel Trade Gazette, UK & Ireland*, Jan. 31, p24.

Travel Trade Gazette (2002a.), "EasyJet blames BA for lack of Gatwick Slots", *Travel Trade Gazette, UK & Ireland*, Feb. 11, p64.

Travel Trade Gazette (2002b.), "EasyJet shareholders back Go deal", *Travel Trade Gazette, UK & Ireland*, Jun. 24, p3.

Travel Trade Gazette (2002c.), "Easyjet awaits final Details of Merger", *Travel Trade Gazette, UK & Ireland*, Jun. 24, p51.

Travel Trade Gazette (2002d.), “EasyJet backtracks as it axes two Go services”, *Travel Trade Gazette, UK & Ireland*, Aug. 26, p4.

Travel Trade Gazette (2006), “EasyJet to grow after profits hit £129m”, *Travel Trade Gazette, UK & Ireland*, Nov. 17, p7.

Travel Trade Gazette (2007), “EasyJet eyes 40% growth”, *Travel Trade Gazette, UK & Ireland*, May 11, p4.

Travel Trade Gazette (2008), “Slots to be valued”, *Travel Trade Gazette, UK & Ireland*, May 23, Issue 2818, p14.

Travel Trade Gazette (2010), “EasyJet clear for non-flight growth”, *Travel Trade Gazette, UK & Ireland*, Oct. 15, Issue 2931, p12.

Tretheway, M.W. (2004), “Distortions of Airline Revenues: Why the network airline business model is broken”, *Journal of Air Transport Management*, Jan., Vol. 10, Issue 1, pp. 3-14.

Trochim, W.M. (1989), “Outcome Pattern Matching and Program Theory”, *Evaluation and Program Planning*, Vol. 12, Issue 4, pp. 355-366.

Tsang, E.W.K. (1998), “Motives for Strategic Alliance: A resource based perspective”, *Scandinavian Journal of Management*, Mar., Vol. 14, Issue 3, pp. 207-221.

Tsang, E.W.K. (1999), "A Preliminary Typology of Learning in International Strategic Alliances", *Journal of World Business*, Fall, Vol. 34, Issue 3, pp. 211-229.

Tucker, A. and Panariello, A. (2007), "Steady Progress on Profits", *Airline Business*, Oct., Vol. 23, Issue 10, p80.

Turismo Italia (2010), *Annual Report on Tourism Trends in Italy*, Turismo Italia, Minister of Treasury, Rome, Italy, pp. 17-26.

Turney, R. (1999), "Fitting Pieces: Coordinating freighter services and flights is just the start of an alliance between KLM Cargo and Alitalia Cargo", *Air Cargo World*, Feb., Vol. 89, Issue 2, pp. 18-19.

Unnikrishnan, M. (2010), "Market Focus", *Aviation Week & Space Technology*, May 3, Vol. 172, Issue 17, p14.

Uzzi, B. (1987), "Social Structure and Competition in Interfirm Networks: The Paradox of Embeddedness", *Administrative Science Quarterly*, Mar., Vol. 42, Issue 1, pp. 35-67.

Uzzi, B. (1996), "The Sources and Consequences of Embeddedness for the Economic Performance of Organizations: The Network effect", *American Sociological Review*, Aug., Vol. 61, No. 4, pp. 674-698.

Vanhaverbeke, W., Duysters, G. and Noorderhaven, N. (2002), "External Technology Sourcing Through Alliances or Acquisitions: An Analysis of the Application-Specific Integrated Circuits Industry", *Organization Science*, Nov.-Dec., Vol. 13, Issue 6, pp. 714-733.

Varadarajan, P.R. and Cunningham, M.H. (1995), "Strategic Alliances: A synthesis of conceptual foundations", *Journal of the Academy of Marketing Science*, Fall, Vol. 23, No. 4, pp. 282-296.

Venkatraman, A. (2008), "EasyJet profits hit by high fuel prices", *Marketing Week*, Nov. 13, Vol. 31, Issue 46, p68.

Vinod, B. (2009), "Distribution and Revenue Management: Origins and Value Proposition", *Journal of Revenue and Pricing Management*, Mar., Vol. 8, Issue 2-3, pp. 117-133.

Vlaar, P., De Vries, P. and Willenborg, M. (2005), "Why Incumbents Struggle to Extract Value from New Strategic Options: Case of the European Airline Industry", *European Management Journal*, Apr., Vol. 23, Issue 2, pp. 154-169.

Vyas, N.M., Shelburn, W.L. and Rogers, D.C. (1995), "An Analysis of Strategic Alliances: Forms, Functions and Framework", *Journal of Business and Industrial Marketing*, Vol. 10, Issue 3, pp. 47-60.

Wagner, C.M., Huber, B., Sweeney, E. and Smyth, A. (2005), "B2B e-marketplaces in the airline industry: Process drivers and performance indicators", *International Journal of Logistics: Research & Applications*, Dec., Vol. 8, Issue 4, pp. 283-297.

Wagner, R. and Muller, G. (2009), "Making Mergers Work", *Gallup Management Journal Online*, May 5, p1.

Wahyuni, S. and Karsten, L. (2006), "How Successful Will the KLM-Air France Partnership Become? Lessons learned from the KLM-Northwest Alliance", *Problems and Perspectives in Management*, Vol. 4, Issue 1, pp. 111-122.

Wakeam, J. (2003), "The Five Factors of a Strategic Alliance", *Ivey Business Journal*, May-Jun., Vol. 67, Issue 5, pp. 1-5.

Walker, G., Kogut, B. and Shan, W. (1999), "Social capital, structural holes and the formation of an industry network", in Reuer, J.J. (2004) (Eds.), *Strategic Alliances: Theory and Evidence*, Oxford University Press, Oxford, UK, pp. 417-445.

Wall, R. (2007), "LCC or LLP", *Aviation Week & Space Technology*, Jul. 16, Vol. 167, Issue 3, pp 49-50.

Wall, R. (2008), "EC on Alitalia", *Aviation Week & Space Technology*, Nov. 17, Vol. 169, Issue 19, p44.

Wall, R. (2009), "Italian Experiment", *Aviation Week & Space Technology*, Oct. 12, Vol. 171, Issue 14, p44.

Wall, R. (2010a.), “Regulatory Overreach?”, *Aviation Week & Space Technology*, Apr. 19, Vol. 172, Issue 15, p45.

Wall, R. (2010b.), “Maturing Models”, *Aviation Week & Space Technology*, Jun. 7, Vol. 172, Issue 22, p43.

Wall, R. (2010c.), “Easing Chronic Pain”, *Aviation Week & Space Technology*, Jul. 19, Vol. 172, Issue 27, p114.

Wall, R. (2010d.), “Parallel Processing”, *Aviation Week & Space Technology*, Jul. 19, Vol. 172, Issue 27, p113.

Wall, R. and Barrie, D. (2005), “Open to Interpretation: U.S. and EU restart open skies talks in optimistic environment, but time will tell”, *Aviation Week & Space Technology*, Section: Air Transport, Oct. 24, Vol. 163, Issue 16, pp. 34-35.

Wall Street Journal (2009), “Alitalia SpA”, *Wall Street Journal - Eastern Edition*, Jan. 20, Vol. 253, Issue 15, pB4.

Walsh, B. (2009), “Getting Air Traffic Under Control”, *Time, UK*, Oct. 19, Vol. 174, Issue 15, pp. 6-8.

Walter, J., Lechner, C. and Kellermanns, F.W. (2007), "Knowledge Transfer between and within Alliance Partners: Private versus collective benefits of social capital", *Journal of Business Research*, Jul., Vol. 60, Issue 7, pp. 698-710.

Wan, X., Zou, L. and Dresner, M. (2009), "Assessing the Price Effects of airline alliances on parallel routes", *Transportation Research Part E: Logistics and Transportation Review*, Jul., Vol. 45, Issue 4, pp. 627-641.

Wang, L. and Zajac, E.J. (2007), "Alliance or acquisition? A dyadic perspective on interfirm resource combinations", *Strategic Management Journal*, Dec., Vol. 28, Issue 13, pp. 1291-1317.

Wang, Z.H. and Evans, M. (2002), "Strategic classification and examination of the development of current airline activities", *Journal of Air Transportation*, Vol. 7, Issue 3, pp. 73-101.

Warren, C. and Karner, T.X. (2004), *Discovering Qualitative Methods: Field Research, Interviews, and Analysis*, Oxford University Press, New York, New York, USA.

Webster, F.E. (1992), "The Changing Role of Marketing in the Corporation", *The Journal of Marketing*, Oct., Vol. 56, No. 4, pp. 1-17.

Webster, P. (2007), "Government satisfied with Alitalia bid total, sees privatisation within months", *AFX International Focus*, Jan. 30, pp. 2-3.

Wernerfelt, B. (1984), "A Resource-Based View of the Firm", *Strategic Management Journal*, Apr.-Jun., Vol. 5, Issue 2, pp. 171-180.

Westgate, R. and Fogarty, M. (2006), "Aviation Sector M&A Analysis", *CNBC/Dow Jones Business Video Analyst Interview*, Aug. 31.

Wheatcroft, A.E. (1964), *Air Transport Policy*, Michael Joseph Publications, London, UK.

White, L.J. (1979), "Economies of Scale and the question of natural monopoly in the airline industry", *Journal of Air Law and Commerce*, Spring, Vol. 44, Issue 3, pp. 545-573.

Wigham, R. (2005), "Safety is a big issue for Britain's air traffic controllers, and legislation is being created to introduce Europe-wide regulatory, safety and competency standards", *Employers Law*, Section: Features, Jul. 3, pp. 12-14.

Wiklund, J. and Shepherd, D.A. (2009), "The Effectiveness of Alliances and Acquisitions: The Role of Resource Combination Activities", *Entrepreneurship: Theory & Practice*, Jan., Vol. 33, Issue 1, pp. 193-212.

Wiley, J. (2010), "Single European Sky ATM Research", *Business & Commercial Aviation*, May, Vol. 106, Issue 5, p65.

Williamson, O.E. (1979), "Transaction Cost Economies: The governance of contractual relations", *The Journal of Law & Economics*, Oct., Vol. 22, No. 2, pp. 233-261.

Williamson, O.E. (1981), "The Economics of Organization: The Transaction Cost Approach", *The American Journal of Sociology*, Nov., Vol. 87, No. 3, pp. 548-577.

Williamson, O.E. (1985), *The Economic Institutions of Capitalism*, Free Press, New York, New York, USA.

Williamson, O.E. (1991), "Comparative Economic Organization: The analysis of discrete structural alternatives", *Administrative Science Quarterly*, Jun., Vol. 36, Issue 2, pp. 269-296.

Withiam, G. (2008), "Online packages' value counters price transparency", *Hotel & Motel Management*, Jan. 7, Vol. 223, Issue 1, pp. 8-20.

Wittmann, C.M., Hunt, S.D. and Arnett, D.B. (2009), "Explaining alliance success: Competences, resources, relational factors, and resource-advantage theory", *Industrial Marketing Management*, Oct., Vol. 38, Issue 7, pp. 743-756.

Wood, S. and Gallacher, J. (1998), "Hold your horses!", *Airline Business*, Jun., Vol. 14, Issue 6, pp. 42-75.

World Trade (2010), "IATA Revises Estimate for 2010, More Upbeat", *World Trade*, Apr., Vol. 23, Issue 4, p12.

Wray, B., Palmer, A. and Bejou, D. (1994), "Using neural network analysis to evaluate buyer-seller relationship", *European Journal of Marketing*, Vol. 28, Issue 10, pp. 32-48.

Xiaoli, Y. and Shanley, M. (2008), "Industry Determinants Of The "Merger Versus Alliance" Decision", *Academy of Management Review*, Apr., Vol. 33, Issue 2, pp. 473-491.

Xinhua News Agency (2000), "Alitalia Takes Tough Line With Ex-Partner KLM", *Xinhua News Agency*, Jun. 12, pp. 13-15.

Yasuda, H. (2004), "Formation of strategic alliances in high-technology industries: Comparative study of the resource-based theory and the transaction-cost theory", *Technovation*, Jul., Vol. 25, Issue 7, pp. 763-770.

Yin, R.K. (1994), *Case Study Research: Design and Methods*, 2<sup>nd</sup> Ed., Applied Social Research Methods Series, Sage Publications, Inc., Thousand Oaks, California, USA.

Yin, R.K. (2002), *Case Study Research: Design and Methods*, 3<sup>rd</sup> Ed., Applied Social Research Methods Series, Sage Publications, Inc., Thousand Oaks, California, USA.

Yin, X. and Shanley, M. (2008), "Industry Determinants of the 'Merger versus Alliance' Decision", *Academy of Management Review*, Apr., Vol. 33, No. 2, pp. 473-491.

Yoshino, M.Y. and Rangan, U.S. (1995), *Strategic Alliances: One entrepreneurial approach of globalisation*, Harvard Business School Press, Boston, Massachusetts, USA.

Young, J.A., Gilbert, F.W. and McIntyre, F.S. (1996), "An Investigation of Relationalism across a Range of Marketing Relationships and Alliances", *Journal of Business Research*, Feb., Vol. 35, Issue 2, pp. 139-151.

Yu-Ching, C., Fang-Yi, L. and Chow-Ming, Y. (2010), "Choosing between wholly-owned subsidiaries and joint ventures of MNCs from an emerging market", *International Marketing Review*, Vol. 27, Issue 3, pp. 338-365.

Yu-Chun, C., Williams, G. and Chia-Jui, H. (2009), "An Ongoing Process: A Review of the Open Skies Agreements between the European Union and the United States", *Transport Reviews*, Jan., Vol. 29, Issue 1, pp. 115-127.

Zajac, E.J. and Olsen, C.P. (1993), "From Transaction Cost to Transaction Value Analysis: Implications for the study of interorganizational strategies", *Journal of Management Studies*, Jan., Vol. 30, Issue 1, pp. 131-145.

Zeffane, R.M. (1994), "Inter-organizational Alliance and Networking: The role of technology", *Leadership & Organization Development Journal*, Vol. 15, Issue 7, pp. 28-32.

Zeffane, R.M. (1995), "The Widening Scope of Inter-Organizational Networking: Economic, Sectoral and Social Dimensions", *Leadership & Organization Development Journal*, Vol. 16, Issue 4, pp. 26-33.

Zhang, A. and Zhang, Y. (2006), "Rivalry between strategic alliances in the airline industry", *International Journal of Industrial Organization*, Mar., Vol. 24, Issue 2, pp. 287-301.

Zhao, Y. and Shenhar, A. (2011), "Why 787 Slips Were Inevitable", *Aviation Week & Space Technology*, Feb. 28, Vol. 173, Issue 8, p58.

Zhao, H. and Zhu, G. (1998), "Determinants of ownership preference of international joint ventures: New Evidence from Chinese manufacturing industries", *International Business Review*, Dec., Vol. 7, Issue 6, pp. 569-589.

# **APPENDIX 1**

## **Example of a Contact Letter**

|                     |                                |
|---------------------|--------------------------------|
| <i>Mr/Mrs X</i>     | Alessandro Signorini           |
| <i>Job Position</i> | John Cabot University, Rome    |
| <i>Department</i>   | Department of Business Studies |
| <i>Company Y</i>    | Via della Lungara, 223         |
| <i>Address</i>      | 00163 Rome                     |
|                     | Italy                          |

Rome, *Date*

Dear Mr/Mrs X,

I am Alessandro Signorini, researcher in the Marketing Department of the University of Strathclyde in Glasgow, Scotland, UK. I also work as Assistant Professor of Marketing for the John Cabot University, Rome.

The research project that I am currently undertaking sets out to examine alliances and acquisitions in the airline industry by evaluating the strategic factors that are associated with both modes of governance. In addition, I am developing a decision model that can be useful for airlines in choosing between alliances and acquisitions at a fixed point in time.

In my research, I am keen to collaborate with airline companies to investigate the decision making process of airline executives in the specific field of the development and management of alliances and acquisitions.

In my studies, I have noted that *Company Y* has been significantly committed to establishing tactical and strategic partnerships with other carriers in order to achieve its strategic objectives. Therefore, I am wondering if *Company Y* would be interested in exploring any possibilities of cooperation on academic research to our mutual benefit?

My research project can offer your company a careful and independent evaluation of current alliances and potential acquisitions as well as suggest a model that can contribute to selecting either alliances or acquisitions with other carriers.

To achieve my research objectives, it is necessary to interview 4-6 members of your executive and managerial staff, who are preferably involved in the alliance formation and decision process. The interviews will last one hour; all the data collected will be treated in the strictest confidence, which can be guaranteed by a confidentiality agreement, if you so wish.

At the end of my studies, I am willing to present my findings to all interested executives within your organisation.

I hope you will be prepared to co-operate with my research. It will, of course, be my pleasure to talk to you personally about my research. My contact details are:

- 1 Phone: +39-06-XXX XXXX
- 2 Fax: +39-06-XXX XXXX
- 3 Email: [XXXXXX@strath.ac.uk](mailto:XXXXXX@strath.ac.uk)

Thank you for your time and consideration

Yours sincerely,

Mr Alessandro Signorini  
Researcher, University of Strathclyde  
Assistant Professor of Marketing, John Cabot University, Rome

## **APPENDIX 2**

### **Example of a Confidentiality Agreement**

Rome, *Date*

**To Whom It May Concern:**

I assure you that I will treat the information I will get from in-depth interviews with Members of Staff of *Company Y* in the strictest confidence.

The data will be protected according to best academic practice; therefore, I state I will handle with discretion and treat with great sensitivity, any information that has been passed to me confidentially. I am ready to inform *Company Y* of every publication I will seek to produce in future in which *Company Y* is involved and I am willing to ask for explicit approval by *Company Y* before such publication enters production.

Furthermore, I will maintain the anonymity of the respondents interviewed.

Mr Alessandro Signorini  
Researcher  
Department of Marketing  
University of Strathclyde

## **APPENDIX 3**

### **Interview Checklist**

- 1) What are the main advantages than can be achieved through codesharing?
  - a) What do you think about economies of scope and density between the route networks?
  - b) Do you believe that production and marketing economies of scale are involved?
  - c) Would you employ codesharing to prevent your competitors from establishing alliances with other airlines?
  - d) Would you use codesharing to avoid aggressive price strategies in parallel routes?
  
- 2) What are the main disadvantages for codesharing?
  - a) Do you identify any disadvantage related to the codesharing instability?
  - b) Is it possible to achieve long-term strategic objectives with codesharing?
  - c) What are the areas where you require more resources when implementing the codesharing?
  - d) Are relationship factors influencing the performances of the codeshare? What are the crucial factors in the relationship with the codesharing partners?
  - e) Are capacity duplications affecting the results in codesharing?
  
- 3) What are the main advantages for acquisitions in the airline industry?
  - a) Are total control of traffic and related traffic economies key advantages in acquisitions?
  - b) Would you use acquisitions for competitive reasons? If yes, in which cases?
  - c) Would you apply acquisitions for eliminating capacity between networks?

- 4) What are the main disadvantages for acquisitions in the airline industry?
- a) What are the main initial costs for an acquisition?
  - b) Would you experience problems in evaluating the other airline? Which are the components of the airline that are more difficult to evaluate?
  - c) Would you end up with unneeded assets in an acquisition? Which are the assets of the other organisation that are more likely to be redundant?
  - d) What are the key costs during the integration process? Do you expect diseconomies when the size of the airline increases? If yes, what are the characteristics in the other airline that minimise the organisational problems?
  - e) How do you believe that the trade unions and the workforce would react to an acquisition? Would they be ready to accept the acquisition and cooperate with it? Do you think that you would be confronted with service disruptions as a consequence of an acquisition?
  - f) Would you regard the financial expenses associated to an acquisition as a major threat for your organisation?
  - g) How do you consider the intervention of airline regulators in acquisitions?
- 4) Would you employ minority equity exchanges in codesharing? What are the main reasons for the equity exchanges?
- 5) Do you think that the codesharing could evolve in a full acquisition? If yes, in which cases?
- 6) Would you consider the knowledge exchange between airline organisations a significant benefit in codeshares and acquisitions? Would you prefer acquisitions or alliances for exchanging knowledge?

7) If the regulation preventing alliances and acquisitions was eliminated in the EU and the US, do you assume that airlines would consequently establish a significant number of acquisitions?

8) Empirical evidence shows that low-fare carriers and network carriers have a different propensity for alliances and acquisitions. Low-fare carriers tend to favour acquisitions, whereas network carriers prefer alliances, despite the same regulation framework. Could you suggest any reason for that?

# **APPENDIX 4**

## **Coding Framework**

|          |   |
|----------|---|
| Code #1  | Additional traffic/Traffic control  |
| Code #2  | Access to slots   |
| Code #3  | Complementary and parallel routes   |
| Code #4  | Domestic and international routes   |
| Code #5  | Network economies <ul style="list-style-type: none"> <li>- Feeding traffic (traffic into long-haul)</li> <li>- Passenger transferring</li> <li>- Extended destinations</li> </ul> |
| Code #6  | Economies of scale <ul style="list-style-type: none"> <li>- Production side</li> <li>- Marketing</li> </ul>   |
| Code #7  | Route duplications/overlapping  |
| Code #8  | Streamlining/rationalizing network routes   |
| Code #9  | Additional frequencies  |
| Code #10 | Lessening and preventing competition <ul style="list-style-type: none"> <li>- Offensive/defensive competitive strategies</li> </ul>   |
| Code #11 | Umbrella alliances/alliance constellations  |
| Code #12 | Corporate/national culture  |
| Code #13 | Knowledge transfer/transfer of managerial methodologies   |
| Code #14 | Trust/conflicts/commitment to the alliance  |
| Code #15 | IT/reservation systems  |
| Code #16 | Distribution systems  |
| Code #17 | Ground and passenger handling units   |
| Code #18 | Aircraft maintenance methods  |
| Code #19 | Asset valuation/brand value   |
| Code #20 | Workforce/trade unions/industrial relations   |
| Code #21 | Top management integration  |
| Code #22 | Unnecessary/redundant assets after integration  |
| Code #23 | Fleet typologies  |

|          |   |
|----------|---|
| Code #24 | New aircraft models                                 |
| Code #25 | Organizational problems/diseconomies in integration |
| Code #26 | Financial issues after the acquisition              |
| Code #27 | Regulation/Airline regulative authorities           |
| Code #28 | Political priorities influencing decision making    |