Innovation and Capacity Building

Cross-disciplinary Management Theories
for Practical Applications

Edited by Demetris Vrontis, Yaakov Weber, Alkis Thrassou,
S. M. Riad Shams and Evangelos Tsoukatos

Palgrave Studies in Cross-disciplinary Business Research, In Association with EuroMed Academy of Business

Reflecting the growing appetite for cross-disciplinary business research, this series aims to explore the prospects of bringing different business disciplines together in order to guide the exploitation of commercial opportunities and the minimization of business risks. Each book in the series will examine a current and pressing theme and consist of a range of perspectives such as HRM, entrepreneurship, strategy and marketing in order to enhance and move our thinking forward on a particular topic.

Contextually the series reflects the increasing need for businesses to move past silo thinking and implement cross-functional and cross-disciplinary strategies. It acts to highlight the emergence of cross-disciplinary business knowledge and its strategic implications.

Published in conjunction with the EuroMed Academy of Business, books will be published annually and based on the best papers from their conferences. Over the last decade EuroMed have developed a cross-disciplinary academic community which comprises more than 30,000 students and scholars from all over the world.

More information about this series at
http://www.palgrave.com/gp/series/15956

Demetris Vrontis • Yaakov Weber
Alkis Thrassou • S. M. Riad Shams
Evangelos Tsoukatos
Editors

Innovation and Capacity Building

Cross-disciplinary Management
Theories for Practical Applications

palgrave
macmillan

Editors
Demetris Vrontis
School of Business
University of Nicosia
Nicosia, Cyprus

Yaakov Weber
School of Business Administration
College of Management
Rishon Lezion, Israel

Alkis Thrassou
School of Business
University of Nicosia
Nicosia, Cyprus

S. M. Riad Shams
Ural Federal University
Yekaterinburg, Russia

Evangelos Tsoukatos
Department of Accounting and Finance
University of Applied Sciences Crete
(T.E.I. of Crete)
Heraklion, Crete, Greece

Cover illustration: Daniele Levis Pelusi via Unsplash.com

Contents

Notes on Contributors

Jilan Abdalmajid is currently studying for a PhD in Business at the University of Nicosia (Cyprus, EU). She is a senior diplomat at the Mission of the State of Palestine to Ireland and holds responsibilities as a Counsellor and Deputy Head of Mission. She served at the embassy of Palestine in Cyprus for several years and started her diplomatic career at Ministry of Foreign Affairs of the State of Palestine in 1995. She received her Master in Business Administration from CIIM-Cyprus in 2008. She graduated from the American University in Cairo in 1991 and received a BA in Management and Entrepreneurship in 1997 from Al Quds Open University-Palestine.

Bernard Al Osta holds an MA in Business Administration. His research interests include innovation management, customer relationship management and co-creation, and various theoretical fields in both management and marketing. He is currently a PhD student in marketing in France.

Joseph Raymond Azizi holds an MBA in Business Management. He is currently working in the banking industry; his research interests focus on customer orientation and new product and service development. Further interests include customer targeting and customer relationship management in the banking industry.

Lino Barbasso is a Professor of Cognitive Anthropology at Asford University in Clinton Iowa, PhD in Human Neuroscience, Anthropologist at Palo Alto

University, MD in Economy at Columbus University and MBA at Ramapo State University. Director for three years of the Young Leadership Academy for United Nation Organization Section Middle East (Istanbul), Team Coordinator in "Libic Brain Role in Marketing" at Palo Alto University, a member of Neuroscience Board in 1998 at Stanford University, he has written 12 books, most of them translated worldwide.

Jesús del Brío has a PhD in Business Administration from the University of Oviedo and has been a Professor in the Department of Business Administration at the University of Oviedo since 2001. He has also taught at the University Carlos III of Madrid (2002–4). His research activity focuses on environmental management, corporate social responsibility and human resources, and more recently on cultural management. He has published 18 papers in journals indexed in Journal Citation Reports, as well as 31 articles in Spanish journals indexed in INRECS or Latindex, and nine other articles in foreign journals with a blind review process. He has also presented papers at 39 national and international conferences.

Alberto Ferraris received his PhD in Business and Management at the Department of Management, University of Turin (Italy) in 2015. He is currently a postdoctoral researcher at the University of Turin (Department of Management). He is also Research Fellow of the Laboratory for International and Regional Economics, Graduate School of Economics and Management, Ural Federal University (Russia). He is an Associate Fellow of the EuroMed Research Business Institute. He is author of several academic and scientific articles published on international journal. He won the Best Student Paper Award at the 7th EuroMed Conference in Kristiansand (Norway) in 2014 and the 2015 Emerald/EMRBI Business Research Award for Emerging Researchers.

Glykeria Karagouni is an Associate Professor at the University of Applied Sciences of Thessaly (Greece). She is a Mechanical Engineer with a PhD in Knowledge-Intensive Entrepreneurship, Innovation and Production Technologies from the National Technical University of Athens. With over 25 years' professional experience in the public and private sector (as a freelancer, consultant and lecturer), her scientific and professional expertise is recognised through peer-reviewed articles, announcements in conferences and book chapters, contributions as an invited speaker and reviewer, and through participation in expert panels, mainly in Europe. Her current research interests are in the fields of entrepreneurship (knowledge-based entrepreneurship, family business,

small and medium-sized enterprises, start-ups and so on), strategic management, technology, innovation and production management. She is a member of a number of scientific groups, a benchmarking consultant and a business plan evaluator.

Thanos Kriemadis is a Professor specialising in Strategic Planning in Sport Organizations, Total Quality Management in Services, Entrepreneurship and Management of Small and Medium-Sized Enterprises, in the Department of Sport Management at the University of the Peloponnese. He is a former Head of Department, Director of Graduate Studies in Sport Management, Director of the Research Laboratory specialising in Services Management and Quality of Life, and former Deputy Rector of Financial Management and Infrastructure. Research interests include Total Quality Management and Strategic Management issues applied to service organisations, including sport organisations. He has written eight management books, 70 papers published in international journals and 200 papers presented at international conferences.

Edmundo R. Lizarzaburu has PhD in Management from University Carlos III of Spain; a Magister in Research ESAN/UC3 (2012); a Program of Negotiation from Harvard University; a Global MBA from Thunderbird and EGADE—TEC de Monterrey (2008); an MA in Financial Management from USMP (2002); and Industrial Engineering (2000), Pontificia Universidad Catolica del Peru. He has published various articles and case studies in indexed and peer-reviewed journals. He is also a Professor on undergraduate and graduate degree courses at ESAN University, a consultant in public and private companies, a Director of GFI of Peru SAC, and Latin American Consultant of GFI Group USA. He is accredited in Risk (CRA), Finance (RFS) and Projects, and an expert in quality (ISO standards) by AENOR. He was also a General Manager (2003–2011) of Datos Técnicos SA—Datatec, a subsidiary company of the Lima Stock Exchange and SIF Icap Intercapital of Mexico, dedicated to delivering solutions for OTC financial transactions.

Petros Lois holds an MSc in Accounting from De Montfort University (UK) and a PhD in Marine Technology from Liverpool John Moores University (UK). He is a Certified Management Accountant, holds the Chair of PwC in Business Research at the University of Nicosia, and is Co-Founder of the Euromed Journal of Business. He is currently an Associate Professor and the Head of the Department of Accounting. He has also served as the Dean of the School of Business, Director of Academic Affairs Department at the University of Nicosia

(Cyprus), and the coordinator of two professional qualifications—CIA (Certified Internal Auditors, USA) and CFA (Chartered Financial Analysts, USA). He is a member of the Institute of Certified Management Accountants of Australia, the Institute of Marine Engineers, Science and Technology (IMarEST, UK), and the National Book-keepers Association. He is a member of the Board of Directors of the Cyprus Ports Authority. His research interests include accounting, working capital management, finance and shipping (maritime). His research work has been published in international conference proceedings, books and journals.

Martti Mäkimattila DSc (Tech.) is a Manager of Green Campus Open Accelerator. His interests are innovation, new business and start-ups. He has published his research in various journals and books, such as *European Journal of Innovation Management*, *International Journal of Business Innovation and Research*, and *Innovation: Management, Policy & Practice*.

Sam El Nemar is an Assistant Professor of Marketing. His main research interests are in the marketing of higher education, student university choices and satisfaction. He holds a PhD in Marketing, an MBA and a BA in Retail Management. He has published over ten refereed articles and has co-written four chapters in different books.

Dimosthenis Orfanos is a Software and Controller Specialist at Vestas Wind Systems. He holds a Master of Business Administration from the University of Nicosia (Cyprus) and an Engineering degree from the Technological Educational Institute of Crete (Greece). He has an extensive background and specialises in the sustainable renewable energy solutions, striving for fossil fuel disengagement from the energy sector. He aims at innovation emerging from multi-cultural team collaboration and has researched the subjects of creativity and management in business.

Hande Özek received her PhD in Human Resource Management at the Faculty of Business, University of Istanbul (Turkey) in 2014. For more than ten years she has worked in the corporate world, particularly in establishing human resource management systems. She is currently a lecturer at the Business Administration Department of İstanbul Yeniyuzyil University; she maintains strong ties with the industry by acting as a consultant for national and international companies.

Ioanna Papasolomou is a Professor of Marketing and the Head of the Marketing Department, School of Business, at the University of Nicosia in Cyprus. She holds a PhD in Marketing (Management), as well as an MPhil and an MBA from the University of Keele (UK), and is also a certified Chartered Marketer of the UK Chartered Institute of Marketing. Professor Papasolomou has extensive academic experience and has undertaken significant research in the area of internal marketing, marketing communications, and corporate social responsibility. She has published over 100 works in numerous internationally esteemed scientific academic journals and international conferences. She has contributed chapters and case studies to several academic books and has also chaired several international conferences in the field of marketing.

Spyridon Repousis received a BA in Economics from Athens University of Economics and Business, an MSc in Banking and Finance from the University of Stirling, Scotland, an MBA from University of Nicosia, Cyprus, and a PhD in Economics from University of the Peloponnese. He has taught at the Technological Educational Institute of Patras and is currently working in a private bank. He has written books about banking and finance in Greek and has contributed to books in English. Many of his scientific articles have been published in journals in English, in areas such as banking, finance, fraud and money laundering.

S. M. Riad Shams is a Senior Research Fellow at the Ural Federal University, Russia. He completed his doctoral research at the Central Queensland University, Australia, in 2011. His MBA and BBA (honours in marketing) were awarded by the University of Dhaka, Bangladesh, in 2004 and 2003, respectively. He is a Research Fellow at the EuroMed Academy of Business. His key research areas are stakeholder relationship management, business sustainability, strategic management, corporate reputation, and image and brand positioning. He has published in and guest-edited for various reputed journals, including the *Journal of Business Research*, *International Marketing Review* and the *Journal of Hospitality & Tourism Research*. He is the lead editor of the *Annals of Business Research* and has served as the track-chair at leading international academic conferences.

Minna Saunila DSc (Tech.) is a Senior Researcher at Lappeenranta University of Technology, School of Business and Management. Her research covers topics related to innovation, service operations and sustainable value creation. She has previously published in the *Journal of Engineering and Technology Management*,

Technology Analysis and Strategic Management and the *Journal of Organizational Effectiveness: People and Performance*, among others.

Francesca Serravalle is a PhD student in Business and Management University of Turin (Italy) and has a PhD co-partnership with the IAE business school of the University of Lyon (France). She graduated with Academic Mention in Business Finance and Financial Markets at the School of Management and Economics in Turin with a thesis on fundraising, where the aim was the creation of an innovative tool, a mobile app, for the cancer organisation LILT Biella.

Giuseppe Tardivo is a Professor of Business Management at the University of Turin (Italy); Honorary Professor at ESCP Europe in London; Director of the Campus of Management and Economics- University of Turin—Cuneo Branch; and President of the MA in Business Management, Marketing and Strategy at the University of Turin. He is the Scientific Coordinator for the international cooperation programme at the University of Turin financed by the European Union with 14 other European universities; a member of the Board of Directors of the Research Center of Entrepreneurship and Management; a member of the scientific committees of academic journals; and a member of the Advisory Board of UniCredit Italy. He is author of several books and papers in national and international journals.

Christos Themistocleous holds a BSc (Hons) in Finance, Accounting and Management from the University of Nottingham (UK), an MSc in Corporate Strategy and Governance from the University of Nottingham and a PhD in Marketing and Consumer Behaviour from the University of Nottingham. He is currently a postdoctoral associate in the Marketing Division of the University of Nottingham; his main research interests revolve around the methods of consumer data collection for the synthesis of big datasets. After being funded by the Leading Credit Score Expert in the UK, Experian Plc for projects around consumer information disclosure and consented use of information, his research has been presented in many international conferences, including AMA, EUROMED, IEEE on ethics in social sciences, the Society for the Advancement of Behavioral Economics and more. He has published in internationally recognised journals and books, and is accredited with a Higher Education Academy Fellowship. His teaching work focuses on marketing research and analytics, consumer behaviour and advanced quantitative research methods.

Alkis Thrassou is a Professor at the School of Business, University of Nicosia (Cyprus). He holds a PhD in Strategic Marketing Management from the University of Leeds, UK and is also a Chartered Marketer and Fellow, a Chartered Construction Manager and Fellow, a Chartered Management Consultancy Surveyor and a Senior Research Fellow of the EuroMed Academy of Business. He has extensive academic and professional/industry experience and has undertaken research in the fields of strategic marketing, management and customer behaviour. He has published well over 100 works in numerous internationally esteemed scientific journals and books, and he retains strong ties with the industry, also acting as a consultant.

Evangelos Tsoukatos teaches Management in the School of Applied Sciences at the Technological Educational Institute of Crete, Greece, and is adjunct faculty at the University of Nicosia, Cyprus and at the Hellenic Open University. He earned a BSc in Mathematics from the Aristotelion University of Thessaloniki, Greece, and a postgraduate diploma and MSc in Operational Research from Lancaster University Management School, UK, where from he also earned his PhD in management science. He has authored and edited books and journal special issues and has published in scholarly journals and presented in academic conferences. He is Associate Editor of the *EuroMed Journal of Business* and an editorial board member in a number of international scholarly journals.

Milena Viassone holds an ESCP Europe PhD, Paris and a PhD in Business Management University of Cassino, and is an Associate Professor of Business Management-University of Turin, Cuneo Branch. She is a member of the Italian Academy of Business Administration Research Group on management for the sustainability of tourist development and the destinations competitiveness, and a member of the International ESCP Europe Group of Research on international development. Dr Viassone is also the Coordinator of the Double Degree between the University of Nice and the University of Turin (Department of Management), and a member of the editorial boards of several international journals and the author of numerous books and papers in national and international journals.

Demetris Vrontis is a Professor and an Executive Dean at the University of Nicosia in Cyprus. Professor Vrontis is the Editor-in-Chief of the *EuroMed Journal of Business*, and the President of the EuroMed Research Business Institute. He has published around 200 refereed articles and 30 books, and given numerous presentations in conferences around the globe. Professor Vrontis

is a Fellow Member and certified Chartered Marketer of the Chartered Institute of Marketing and a Chartered Business and Chartered Marketing Consultant. He also serves as a consultant and member of the board of directors to a number of international companies.

Yaakov Weber is a Professor and Director of the Research Unit, School of Business Administration, College of Management Academic Studies, Israel. His publications have received more than 5000 citations. He was given the Outstanding Author Award and one paper was included in the lists of the most important works published in the *International Bibliography of Sociology*. He has served in various editorial positions in leading journals such as the *California Management Review*, the *Journal of World Business*, *Human Resource Management* and the *British Journal of Management*. He is the founder and president of the EuroMed Research Business Institute and EuroMed Academy of Business. He offers consultancy services to large global companies, start-ups, industrial associations and other organisations.

List of Figures

List of Tables

1

Editorial Introduction

**Alkis Thrassou, Demetris Vrontis, Yaakov Weber,
S. M. Riad Shams, and Evangelos Tsoukatos**

1   About the Book

Contemporary organisations, from across the typological and geographic spectrum, are increasingly pressured to survive and grow in an incessantly changing business context, one characterised by the constant shape-shifting

A. Thrassou (✉) • D. Vrontis
School of Business, University of Nicosia, Nicosia, Cyprus
e-mail: thrassou.a@unic.ac.cy; vrontis.d@unic.ac.cy

Y. Weber
School of Business Administration, College of Management,
Rishon Lezion, Israel
e-mail: yweber@bezeqint.net

S. M. R. Shams
Ural Federal University, Yekaterinburg, Russia

E. Tsoukatos
Department of Accounting and Finance, University of Applied Sciences Crete
(T.E.I. of Crete), Heraklion, Crete, Greece
e-mail: tsoukat@staff.teicrete.gr

of the industry and market forces.[1] At the same time, conventional, time-honoured strategies and tactics are proving less and less efficient in providing the means or the ends to the task at hand. Consequently—and irreversibly—businesses are progressively questioning conventional theories and practices and are seeking to adopt innovative means to innovative ends, with innovation and capacity building being targeted within multiple modes and contexts.

It is the scale of the change that in practice constitutes a revolution for business management as we have come to know it, though it also represents a barrier to overcome for many. This is because it brings new notions, processes, attitudes, concepts and systems that experientially and/or instinctively bring about successful innovation and novelty. Positive results have been marked in varied organisational aspects of management and marketing, but, more importantly, less through focused and specific interventions, and more through comprehensive and holistic organisational redesign. Practitioners naturally initiated the shift towards this new order of things; inescapably, scholars and researchers were quick to notice and pick up on these trends towards innovation and strategic reorientation. Works have begun to be published in this domain and there is a noticeable effort across academia to descriptively comprehend and/or prescriptively adapt organisations to the evolving business context.

This first volume of the series *Palgrave Studies in Cross-Disciplinary Business Research, In Association with EuroMed Academy of Business* has thus been entitled *Innovation and Capacity Building—Cross-Disciplinary Management Theories for Practical Applications.* This was purposefully chosen, in the vein of the above context, aiming to bring together different works of various types and foci; these, in their own individual way, touch upon the subject of innovation and change, and describe or prescribe actions that pave a way ahead for the relevant industries. The book puts forward strategic propositions and paradigms that are innovative and mesh with the trending conditions of business, presenting a good mix of empirical and conceptual works that represent a balanced array of disciplinary, geographic and typological foci. The chapters collectively reflect contemporary business management philosophy, attitude and practice; they provide direction and/or food for thought for international consideration, development and application, both for scholars and practitioners

alike. Neuromarketing, family firm entrepreneurship, emerging market corporate social responsibility, creativity, motivational leadership, development assistance, knowledge streams, customer data ethics, nation branding, career development, science parks, mergers and acquisitions, and control, are all presented in the context of innovation and capacity building in the modern-day business world.

Ultimately, and moving beyond the strict confines of the chapters' foci, this collection of works implicitly defines an organisational philosophy that incorporates functionality but transcends it to embrace business notions pertaining to the wider contextual transformations imposed by the combination of macro-environmental developments. On this note, the following section presents in summary the chapters of the book, along with their purpose and place in the collection.

2   Book Structure and Topics

The book continues with Chap. 2 by Barbasso, Tardivo, Viassone and Serravalle entitled "Neuromarketing in customer behaviour—Customers' diencephalic and midbrain implications in purchase dynamics". The specific topic reflects scientific developments in the field of business and a key innovation with practical implications for marketing and consumer understanding. Specifically, in the light of the limitations that traditional methods of marketing have, particularly related to the degree of subjectivity of consumer responses, which often prevents measurement of the effects of marketing communication on them, this chapter highlights the influence that neuromarketing has on the understanding of consumers' decisions, allowing managers to directly understand the latter's thoughts, emotions and intentions. The chapter describes the concept of neuromarketing and the associated effects of advertising on brain activity, and further investigates the subject to identify and highlight the positive effects of neuromarketing on the measurement of consumer behaviour, and to provide its important theoretical and managerial implications.

In the innovation context of this book, Chap. 3 investigates "The role of dynamic entrepreneurial capabilities and innovation in intergenerational succession of family firms". Authored by Karagouni, this chapter

provides a different perspective on innovation and capacity building; in particular, it presents and discusses the role of dynamic entrepreneurial capabilities in family-business succession and the need to support and enhance innovation and competitiveness across family generations. The chapter further shows that a firm's innovation capabilities' depend closely on knowledge, elevating the latter to a key resource for sustained competitive advantage. Through case studies from Greece and Cyprus, the chapter focuses more specifically on the subjects of succession and innovation, as critical to family business survival (such businesses often fail beyond the second and third generations). Innovation-based dynamic entrepreneurial capabilities are conclusively found to contribute to the widening of successors' knowledge base, to the positive realisation of succession and to family firms' defiance of the ominous mortality rates towards not simply survival but growth.

Chapter 4 moves us to the other end of the typographic and geographic spectrum, and from small family firms in south Europe to banking corporations in rural Peru. Specifically, del Brío and Lizarzaburu present "Corporate social responsibility and corporate reputation in emerging countries: an analysis of the Peruvian banking sector". They evaluate the influence of corporate social responsibility on the reputation of a corporation from a strategic point of view, thus filling a knowledge gap for this topic with respect to the banking sector in emerging countries. Utilising a survey-based statistical analysis, they assessed the perspectives of key executives from Peruvian rural banks towards corporate social responsibility activity, the latter's influence on corporate reputation, and its implications for this rising form of business attitude and process.

Chapter 5 focuses on the innovation component of creativity and its link to motivational leadership and styles. Thrassou, Orfanos and Tsoukatos, in "Linking motivational leadership with creativity", stipulate the principles of motivation and creativity as constituting key parameters of successful management and as contributing significantly to productivity and efficiency. Their work extensively combines primary qualitative with quantitative data to investigate the subjects of motivation and creativity in the workplace, and particularly in the context of leadership styles and hierarchy. Their findings show that once both leadership and employees are motivated to the degree that they achieve job satisfaction,

employees naturally become more creative. The research validates mainstream theoretical arguments documenting the effectiveness of leadership and hierarchy in motivating employee creativity, and also suggests resulting practical implications.

Repousis and Lois in Chap. 6 study "Innovation performance and development assistance and growth in four East European member states". In particular, they examine the impact of international development assistance on economic growth in the European Union member states of Croatia, Estonia, Lithuania and Slovenia; these countries fall into two different innovation performance groups, for a period of 16 years (1995–2010), as can be seen by imposing a behavioural equation of flows (not an accounting identity). The authors' findings show that both international net official development assistance and official aid received, as well as net bilateral aid flows from Development Assistance Committee donors, have no statistically significant effect on gross domestic savings in two different innovation performance groups. In four European Union member states with different innovation performance, only per capita gross domestic product is statistically significant. The results are also consistent with the notion that foreign aid transfers can distort individual incentives.

Chapter 7, by Vrontis, El Nemar, Al Osta and Azizi, focuses on the "Impact of innovation and change management on employees' performance". They term the former "core concepts" in strategic and leadership management, seeing openness in innovation and continuous change in organisational dynamics as important factors in determining organisational effectiveness. Linking innovation with change, they study the impact of these on the performance of employees working in the health sector in northern Lebanon. Through theoretical and primary quantitative research, they connect change communication (representing organisational dynamics), employee satisfaction with change, and employees' perceptions of innovation management to identify a positive impact on employee performance.

Shams, in Chap. 8, follows an inductive constructivist approach to study "The evolution of marketing as an innovative knowledge stream: the evolving role of stakeholder causal scope". He discusses the evolution of marketing as a field of practice and an academic discipline, the differ-

ent eras of its evolution, and relevant market and competitive factors to reinforce our understanding of the advances of marketing dynamics that extend competitive advantage and ensure business sustainability. His findings illustrate six eras in the evolution of marketing, recommending an analysis of the causes and consequences of stakeholder relationships and interactions as a stakeholder causal scope of strategic market/stakeholder orientation, and as an alternative approach to building capacity in dealing with contemporary competitive markets, with an aim to prolong competitive advantage.

Chapter 9, by Themistocleous, presents the topic of "Customer data: contemporary issues of privacy and trust". Starting with the well-established premise that customer information is essential for the survivability of organisations, he notes that past practices revolved around the acquisition and use of customer information without consent, which is a matter currently being tackled by data protection initiatives in the UK, Central Europe and the USA. He thereafter recognises, as imperative to the process of sustainable development and capacity building, the understanding of how customers perceive privacy, as well as the factors that can alleviate disclosure concerns through reciprocal information exchanges and the instilling of trust. These key areas are examined in this chapter consequent to their potential for streamlining sustainably the delicate process of the accumulation, use and sharing of customer information in the new order of things in business.

The following chapter (Chap. 10) touches upon a challenging and intricate subject: "Contemporary nation branding under complex political conditions: the case of Palestine". Focusing on the nation branding of Palestine, Abdalmajid and Papasolomou build on an extensive review of the literature on nation branding, presenting existing nation branding models, identifying the key factors that contribute to the development of a national brand, and uncovering gaps in the existing literature. Their theoretical analysis develops the foundations of a conceptual framework for building the national brand of Palestine, a state characterised by controversy and political instability. Their proposed preliminary conceptual framework combines elements from the models of Anholt (2000), Dinnie (2008) and Hankinson (2004) (see Chap. 10) into a unified and holistic

model that highlights the importance of government in ensuring that the entire branding process is guided by a strategic outlook reflective of the country's vision.

Özek and Ferraris investigate "The role of self-awareness and self-efficacy on career decision-making" through an innovative perspective (Chap. 11). Their chapter contributes to the literature by identifying and underlining the relevance of self-awareness and self-efficacy to career decision-making. Both are found to be important for individual growth and can lead the individual to maximise his/her own potential. The authors place their work in the context of the present fast-changing business context and the need for organisations to discover, develop and utilise their employees' individual potential towards capacity building. Starting from this point, the chapter considers the relevance of these two factors to the individual in order to develop a specifically conscious attitude towards career decision-making. Moreover, the chapter proposes a preliminary empirical analysis based on data from 291 students of a Turkish and an Italian university.

Kriemadis focuses on "Innovation, creativity, new product development processes and the role of science parks". Chapter 12 describes the role of science parks in the encouragement and stimulation of critical business processes, including innovation management, creativity and new product/service development processes. The chapter investigates the cooperation between higher education institutions and companies located in science parks, towards the facilitation of the transfer of knowledge, technology and people (researchers and managerial staff), as well as of the design, testing and launching of new products, the realisation of joint research activities and the commercialisation of university research ideas. The chapter argues that in future science parks should integrate innovations into their management systems, such as the implementation of systems and processes adjoining contemporary versions of total quality management systems, the Deming management method and the Six Sigma, in order to deal with the changing needs of the knowledge economy.

Chapter 13, by Weber, presents "Managerial biases in mergers and acquisitions". He notes that although scholars have advanced the impor-

tance of the learning perspective on cultural integration in mergers and acquisitions, the conflicting results in the relevant research requires a systematic approach to understand the learning mechanisms underlying these. The chapter thus examines managerial bias tendencies in mergers and acquisitions and explores whether perceptions of success increase the tendency to attribute this to management action, and whether experience of failure leads to increasing attributions to cultural differences. Finally, it provides ideas for future research and practical implications for managers.

The final chapter, Chap. 14, is authored by Saunila and Mäkimattila and is entitled "A dynamic learning perspective on innovation control: balancing freedom and constraint". The authors build on recent research which has highlighted innovation as a dynamic, cyclical and continuous process tied to multiple levels within organisations. Their chapter approaches the control of innovation from a dialectic perspective by presenting practical managerial solutions to combine individual, team and organisational elements for the purpose of controlling resources with flexible, self-organising processes. The study reveals that diverse phases of the innovation that proceed as a multilevel process have distinct demands with respect to innovation control. The authors suggest that the early phase should be supported by indirect control mechanisms and idea development guided in a free and supportive manner; the concept phase should be effected by the organisation seeking multiple options and the shared defined goal; and the project development phase should have direct mechanisms for the control of execution and resources.

Notes

1. All references pertaining to the subjects of the changing business environment and the corresponding shifts in business philosophy, theory and practice have been explicitly or implicitly drawn from the works of Chebbi et al. (2013, 2015, 2017), Rossi et al. (2014), Thrassou et al. (2014, 2018) and Vrontis et al. (2017).

References

Anholt, S. (2000). The nation as a brand. *Across the Board, 37*(10), 22–27.

Chebbi, H., Yahiaoui, D., Thrassou, A., and Vrontis, D. (2013). The exploration activity's added value into the innovation process. *Global Business and Economics Review,* 15(2/3), 265–278. https://doi.org/10.1504/GBER.2013.053073.

Chebbi, H., Yahiaoui, D., Vrontis, D., & Thrassou, A. (2015). Building multi-unit ambidextrous organizations: A transformative framework. *Human Resource Management, 54*(S1), s155–s177. https://doi.org/10.1002/hrm.21662.

Chebbi, H., Yahiaoui, D., & Thrassou, A. (2017). Multi-country collaborative innovation in the internationalisation process. *International Marketing Review, 34*(1), 109–137. https://doi.org/10.1108/IMR-12-2015-0286.

Dinnie, K. (2008). *Nation branding: Concepts, Issues, Practice*. Oxford: Butterworth-Heinemann.

Hankinson, G. (2004). Relational network brands: Towards a conceptual model of place bands. *Journal of Vocation Marketing, 10*(2), 109–121.

Rossi, M., Vrontis, D., & Thrassou, A. (2014). Agro business in a changing competitive environment—Campania firms' strategic, marketing and financial choices. *World Review of Entrepreneurship, Management & Sustainable Development, 10*(2/4), 312–333.

Thrassou, A., Vrontis, D., & Bresciani, S. (2014). Strategic reflexivity in the hotel industry—A value based analysis. *World Review of Entrepreneurship, Management and Sustainable Development, 10*(2/3), 352–371.

Thrassou, A., Vrontis, D., and Bresciani, S. (2018). The Agile Innovation Pendulum: A strategic marketing multicultural model for family businesses. *International Studies of Management and Organization, 48*(1), 105–120. http://www.tandfonline.com/doi/full/10.1080/00208825.2018.1407178

Vrontis, D., Thrassou, A., Santoro, G., & Papa, A. (2017). Ambidexterity, external knowledge and performance in knowledge-intensive firms. *Journal of Technology Transfer, 42*(2), 374–388. https://doi.org/10.1007/s10961-016-9502-7.

2

Neuromarketing in Customer Behaviour—Customers' Diencephalic and Mid-Brain Implications in Purchase Dynamics

Lino Barbasso, Giuseppe Tardivo, Milena Viassone, and Francesca Serravalle

1   Introduction

The capacity to evoke an emotional answer through an advertisement or another communication instrument is one of the main aims of marketing. However, it is not easy to measure or quantify emotions. This problem has led marketing scholars to elaborate new models of utility and individual rationality (Tornati 2012).

Normally, the routine of a purchase in a customer's mind starts from a need for a product and arises as *think–perceive–buy/don't buy*. However,

L. Barbasso
Clinton University Iowa, Clinton, IA, USA
e-mail: info@linobarbasso.com

G. Tardivo • M. Viassone (✉) • F. Serravalle
University of Turin, Turin, Italy
e-mail: giuseppe.tardivo@unito.it; milena.viassone@unito.it; francesca.
serravalle@unito.it

this process does not always proceed so simply (Tekin et al. 2017). In fact, often people do not really need a product or service, and the decision is made through other mechanisms, without rational influence.

Managers are always researching factors based on attitude and consumer behaviour that can provide a competitive advantage. Traditionally, marketing and advertising scholars have utilised research based on focus groups to obtain answers about products and brand communication, but market change requires new technologies to understand consumers' minds scientifically. Over the past few years, researchers have developed different neurophysiological methods to analyse consumer behaviour and the effects of advertising, with the aim of clarifying different aspects of marketing (Yadava et al. 2017).

Developments in the neuroscientific field have shown that emotions are the fundamental basis from which the thoughts, behaviours and actions of individuals arise (Tornati 2012). As a result, there is increased interest in an approach based on the brain itself and on the relation between consumers' behaviour and their cerebral activity (Hsu 2016; Poels and Dewitte 2006; Potter and Bolls 2012). This is neuromarketing, an emerging field that completes studies about consumer behaviour with neuroscience; it is changing the way in which brands (such as Campbell's Soup and Pepsi) communicate their products and improve their image (4impring.com), always to gain better credibility.

The main problem for producers of various goods and for managers all over the world is to predict whether their new products will be attractive to consumers, whether the suggested price is acceptable, and whether the marketing communications are effective (Gazdzik 2017). Qualitative research, such as a focus group interview or blind taste test, is always based on self-reports, where the answers given during the interview represent the main way to learn which product, taste or commercial is accepted. This type of methodology makes one important assumption: consumers never lie. In practical life, this hypothesis is wrong, because consumers lie and sometimes respond with expressions of worries and prejudices. It is believed that studies performed in this field are realist, scientific and more reliable (Tekin et al. 2017). Moreover, during focus group interviews people reveal attitudes—influenced by a strong personality, for example—that make the research unreliable. For these reasons,

it is clear that individual responses are not independent of one another (Gazdzik 2017).

Neuromarketing overcomes the limits of conventional methods to test and forecast efficiency in advertising investment (which often fail because they depend on consumer availability and competence to describe how an advertisement feels), offering a cutting-edge methodology to directly probe consumers' minds without requiring demanding cognitive participation (Morin 2011). Neurotechnologies and neuroimaging techniques have the capacity to study the frequency, location and timing of neuronal activity to an unprecedented degree (Bakardjieva and Kimmel 2017; Lee et al. 2007). Neuromarketing uses neuroscience to determine how consumers are affected by variations in product design, packaging and in-store displays; why consumers prefer some products and brands to others; and to what extent advertising content and execution has an impact on them (Bakardjieva and Kimmel 2017; Nobel 2013).

The aim of this chapter is to show, through a deep examination of the literature and results obtained, how the main methodology utilised in neuromarketing can contribute significantly to the efficiency of commercial advertising messages, while also providing managerial and theoretical implications to scholars and managers. The present work adds value to previous studies in the neuromarketing field because it not only sets out the current state of the literature on the research topic but also analyses two practical cases, the first two famous brands in the beverage industry and the second tourist websites, where consumers' decision-making is driven by both positive and negative emotions. In this way, it offers a managerial explanation about the usefulness of neuromarketing techniques in customers' decision-making processes.

2   Review of the Literature

When a firm has a product to promote, one of the issues it must face is to create an advertising campaign. The challenge is to act in a market with more and more different competitors and tackle difficulties concerning reaction time, diversification of the product and the competitor's defences (Nyoni and Bonga 2017b). Ninety-five percent of customers' decision-

making process occurs in the subconscious, and neuroscience could provide good support to better explain this process, showing the reasons for customers' purchase actions (Dooley 2011; Nyoni and Bonga 2017a; Ramsoy 2014; Zaltman 2003). They are not "simple", as Muth's rational-choice model indicates (Muth 1961), but are complex and interconnected (Nyoni and Bonga 2017a). Recent research shows that even if cognitive decisions seem to be rational, they are not. In fact, emotions take over and affect the results (Hazeldine 2014). The brain is a "black box" in which emotions and customers' preferences are hidden, and neuroeconomics is the "window" that links the decision-making process with the real neurological processes of the subject analysed (Fisher et al. 2010; Green and Holbert 2012; Ohme and Matukin 2012).

The importance of neuromarketing is clear: this multidisciplinary science prevents the customer from twisting the message of the advertisement, jeopardising the campaign results (which could be different from the one hoped for). This explains the high failure rate of marketing campaigns (Hilderbrand 2016). From 2005 to 2015, a growing interest within marketing research emerged in the movement away from self-reported consumer research towards the use of direct neuroscientific methods characterised as neuromarketing. Countries where trends of interest are greater are Perú, Colombia and Guatemala. Italy is at the 29th place out of 62 (Google Trends 2018).

Many things still need to be understood about neuromarketing. Some studies have been conducted to gather data about the number of matches and the differences in the number of heat points among the study populations per quadrant of a website (Boz et al. 2017; Štrach and Slivkin 2017). Both Boz et al. (2017) and Štrach and Slivkin (2017) have highlighted the practical applications in the field of cross-cultural web design and business research in two important studies. The first involves mapping cross-cultural differences in the manner of a business-to-business website assessment (Štrach and Slivkin 2017); the other is a tourist website (Boz et al. 2017). Firms use this tool more and more not to influence customers' minds (as many people claim) but to create a better promotional campaign for the customer using the traditional marketing channels (Glaenzer 2016).

Neuromarketing seeks information and insights via traditional techniques such as surveys, focus groups, experiments and ethnography (Cascio et al., 2015; Madan, 2010; Wunderlich et al., 2009). Its goal is to enhance marketing theory and practice (Plassmann et al. 2015; Yoon et al. 2012) or to improve the accuracy of predictions of consumer preferences and behaviour when combined with traditional techniques (Boksem and Smidts 2015; Smidts et al. 2014; Venkatraman et al. 2015; O'Doherty et al., 2008). Researchers use technologies such as functional magnetic resonance imaging (fMRI) and electroencephalography (EEG) to measure specific types of brain activity in response to advertising messages. With this information, companies learn why consumers make the decisions they do and what parts of the brain motivate them to do so (Ghorpade 2017). According to Nick Lee, Honorary Professor of Marketing and Organizational Research, Aston University, "Executives love the idea of using brain scans. As brain imaging and neuroscience develop, Neuromarketing companies will be able to pull out more sophisticated data about what makes people want to buy or avoid certain items. The big question is whether Neuromarketing can push a 'buy-button' in your brain." (Nyoni and Bonga, 2017b).

The major gap we can find here is the scarce application of neuromarketing techniques (Feenstra and Pallarés-Domínguez 2017). While some sceptics and detractors describe neuromarketing as a sort of "brain washing" (Ghorpade 2017), its techniques could allow us to form a reliable view of how companies deal with ethical issues (Feenstra and Pallarés-Domínguez 2017). Threats to consumer autonomy, privacy and control are not meaningful ethical issues given the current capabilities and implementation of neuromarketing research (Stanton et al. 2017). Neuromarketing has clear potential for making a positive impact on society and consumers, a fact rarely considered in the discussion on the ethics of neuromarketing (Stanton et al. 2017) by firms, which prefers to limit or completely avoid this powerful instrument of monitoring. It is easy for businesses to keep track of what we buy, but harder to figure out why (Ghorpade 2017). Neuromarketing will cover this important gap, with effective practical and managerial implications.

Another important limitation for firms is the high costs of using neuromarketing. In fact, an fMRI machine can cost as much as $5 million, while a single advertising sample group of 20 people can cost only around

$10,000. Thus, by necessity, true neuromarketing is used primarily by large companies and organisations such as Google, Microsoft, Frito-Lay and the Weather Channel (Ghorpade 2017).

Having analysed the principle academic sources, we now move on to the methodological heart of this chapter.

3   Methodology

This research emphasises the role of neuromarketing in the study of customers' behaviour, answering two main research questions:

RQ1: What are the principle tools used to analyse brain activity?
RQ2: What are the effects of neuromarketing in the study of customers' behaviour?

These questions are answered through a detailed examination of the literature and empirical results obtained concerning how neuromarketing techniques used in advertisements can influence customers' behaviour. They concern methods for the analysis of brain activity, the areas affected by advertisements and their influence on customers' behaviours. This review emphasises the active role of neuromarketing this and also describes important management applications in the field of marketing.

4   The Main Methods for the Analysis of Brain Activity

We will examine the identification of brain areas in which specific stimuli operate and, in particular, the role of the mid-brain and the diencephalon (especially the amygdala) in specific customers' behaviour trials. The most common methods for the analysis of brain activity subjected to stimuli are electroencephalogram (EEG), positron emission tomography (PET) and fMRI or magnetic resonance imaging. These brain imaging techniques (PET and fMRI) differ in their spatial resolution capacity. Other

techniques sometimes used are eye tracking (used to trace the movement of the eyes, clarifying which points of the image are considered of greatest interest) and biometric measurements used alongside EEG.

Generally, these results are used to understand the level of attention generated by the stimulus and the level of emotional involvement—that is, if customers have positive reactions to the stimuli and how much the stimulus is remembered, as measured by the level of conservation of the memory (Chater and Loewenstein, 2016; Sola, 2013). From these data, it is possible to gather additional information: (1) whether there is an intention to buy a product; (2) how much the proposed product stands out over the competitor's; and (3) the awareness of how much the stimulus is able to communicate efficiently. All these theories are explored through empirical studies.

A study carried out on a sample of 30 university students (15 women and 15 men) relating to the projection of different commercial videos brings to light some important insights. In the first ten seconds, the EEG revealed no electric reactions of the brain, but then the scenes regarding value (specifically, family unity) caused some positive brain effects in the subjects analysed. The scenes directed only at the males generated negative effects in the females, whereas the scenes with supernatural elements or with cloudy colours did not arouse particular interest (Tekin et al. 2017). Here it is possible to see different behaviours from women and men subjected to an EEG test. Women tend to be more influenced by hedonistic scenes than men (Lucia-Palacios et al. 2017). The same behaviour was seen in studies on shopping, revealing that females are more affected by stimuli from the external environment (Borges et al. 2013; Kaltcheva and Weitz 2006; Lucia-Palacios et al. 2017; Wirtz et al. 2000).

Moreover, Suomala et al. (2012) proved how neuromarketing is an important tool to reveal the activation of the brain during customers' engagement, using EEG and fMRI. The study involved virtual travel based on the advisory sale process using a brain scan. Specifically, video clips and photographs taken from a sales process at Nokia flagship stores were presented to 16 subjects, whose brain activity was scanned. The subjects were able to associate themselves with people and video events, and they felt safe during the consultative sales process. This demonstrated that the laboratories are virtual environments similar to the sales environments, where consumers can participate in the buying process and

respond to events represented on the screen. Neuromarketing here is important for gaining consumption information not extrapolated from other sources.

EEG is a more accessible, economical and less invasive test, even if it is able to record only the most superficial signals (Costa Rozan Fortunato and de Moura Engracia Giraldi 2014). In a famous experiment conducted by Daimler Chrysler, Henry Walter scanned the brain activity of 12 young men with fMRI while showing them 66 black-and-white photographs of sports cars, sedans and utility vehicles, highlighting a particular activity of the nucleus accumbens in the brain due to the activation of dopamine at the sight of sports cars. The object of dopamine release has been traced back to the desire for the perceived sports cars. That desire is connected to the perception through advertising that sports cars are highly desirable by men. In his book *Buyology*, Lindstrom (2008) explains a study carried out to demonstrate how labels related to the positive effects of cigarettes are identified as a visual stimulus for smokers and how they encourage them to consume more; instead of stopping their desire to smoke, they function as an advertising message that stimulates desire itself in the nucleus accumbens, the area of the brain that anticipates pleasure.

An interesting study was conducted by Barbasso et al. (2015) to understand which packaging could allow consumers to give an added value to the product, irrespective of its cost. The study involved 24 participants between the ages of 24 and 40 with different levels of schooling using two brain imaging tools, fMRI and magnetoencelography, put into action by magnetic fields determined by the electrical activation of the brain (Zurawicki 2010). These two techniques have made it possible to identify the cortical areas activated in relation to particular behaviour or consumption experiences (Gazzaniga 2004) and to demonstrate how a fundamental component in the perception of the value is the packaging or the appropriateness of the packaging in the environment in which it is intended to function.

The studies performed through the use of eye tracking have shown how it is able to measure the consumer's focus attention, the scheme of visual behaviour of fixation of gaze, pupil dilatation, and the focus and micro-focus, but it does not allow us to understand which emotions are

associated with the areas considered as a focus of attention (Costa Rozan Fortunato and de Moura Engracia Giraldi 2014). Studies conducted on PET lead back, in terms of validity, to fMRI, even though radioactive positrons can pass through the participants to collect the results, making this technique highly invasive and difficult to use in neuromarketing (Lin et al. 2010).

5   Sectors of the Brain on Which the Advertising Message Acts: The Experiments Conducted

Even though our mind greatly influences our actions, many sectors of our brain remain unknown. A study by John O'Doherty of the California Institute of Technology's Psychology and Social Sciences Division determined how advertising acts on the centres of pleasure, gratification and anxiety(O'Doherty and Bossaerts, 2008). The areas involved in the basic operation of advertising were the mid-brain and diencephalon, centres of pleasure/gratification and pain, respectively, the same that are involved in drug addiction and some psychiatric illnesses. The reaction of our brain when we see an advertisement is characterised by the association between stimulus and product. The advertisement works by simply providing a stimulus and associating it with a product.

Thanks to the utilisation of magnetic resonance, it was possible to see the activity of the diencephalon and the mid-brain in a group of volunteers and to evaluate their reactions to being offered juice. After recording the subjects' preferences, neurologists created a visual stimulation related to their flavours. They could see the brain activity due to the control of the open zones, checking the consistency with the initial statements. The neurologists noticed that the mid-brain had more intense activity when stimulated using the subject's favourite flavour. However, the diencephalon reacted with up and down fluctuations when stimulated using their favourite or their hated flavour. Therefore, the neural activity in these areas faithfully reveals subjects' preferences and individual choices. The limbic system is a part of the diencephalon and is composed of a series of

brain structures and a set of neural circuits that are in the deepest and oldest part of the telencephalon linked by the limbic system. This system is involved in the integration of emotions, mood and the sense of self-awareness that determines the individual's behaviour. The limbic lobo, the hippocampus, the previous thalamic nuclei, the limbic bark and the amygdala could garble human behaviours and mood.

The amygdala is well connected to the cerebral cortex, which regulates relations with the outside world. Some senses are directly connected with it, so we sense smells with the amygdala before that information can reach more evolved parts of our mind. In this sense, the ear emotion (an instinctive function of the amygdala) could give us some advantages in the decision-making process to the point that automatic answers caused by the fear could be stronger than our rational ability to voluntarily inhibit them. The amygdala is also the centre of anxiety. Breaking down customers' anxiety (generated by the amygdala) with coherent advertisements and being able to check this through fMRI analysis leads to new horizons in the area of in-depth knowledge of purchasing dynamics, revaluating the role of neurological marketing processes.

6   Amygdala: All Emotions Depend on It

Tears are an emotional signal exclusive to human beings and are stimulated by the amygdala, which conserves emotional memory. Our emotions have a brain that takes care of them, which can be different and independent of the opinions of the rational mind. A study by Drazen Prelec and George Loewenstein (an economics and a psychology professor at the University of Carnegie Mellon) concluded that the worst way to sell a product is to increase the price while increasing the amount consumed (Prelec and Loewenstein, 1998). This process creates mental pain, a pain in the brain areas associated with physical pain. In every context, buying more and more products immediately caused a sense of pain associated with the instant awareness of how much the customer will pay (a potential loss of purchase).

This strange brain conformation also explains other theories such as loss avoidance. Creating a bundle is a strategy that currently enjoys

success, and we know why through the analysis of neuromarketing (Roth, 2013). We know how difficult it is to sell single products, with each one distinguished by pricing. It becomes easier to create a bundle where the price of every product will flow into a discounted one (Plassman, 2008).

Finally, neuromarketing methods can also be applied in the area of the memory. Starting from the awareness that storage is connected with future purchase behaviour, neuroscientific studies (Evers et al., 2014; Sola, 2013, Roth, 2013) have focused on the measurement of both explicit (or declared) memory and implicit memory, which is recorded by neuromarketing indicators and does not reach the subject's consciousness. The implicit memory was also studied in relation to the effects of subliminal messages able to influence customers' preferences (Chartrand et al. 2008).

7 Case Studies

7.1 Coca-Cola or Pepsi in a Consumer's Mind?

Studies show that as much as 95% of all consumer purchases of products and services may be impulse purchases (Koc and Boz 2014a, b). In this chapter, we analyse the reactions of the consumer's mind to both a product (a famous beverage) and a service. We start with one of the most compelling neuromarketing studies about a product, which was conducted by McClure et al. (2004). The researchers monitored neural activity when subjects were drinking either Coca-Cola or Pepsi. McClure et al. (2004) used an fMRI experiment with two conditions: (1) a blind taste test; and (2) brand-cued delivery. With the blind taste test, brain activity between Coca-Cola and Pepsi was nearly identical. However, in the brand-cued condition, dramatic differences were found in neural activity, primarily in the ventromedial prefrontal cortex. The important finding was that no neural activation differences were found when no brand information was available, but when brands were known, brand familiarity and product preference came into play. Coca-Cola was found to be generally preferred by the participants and caused significantly more activity in the ventromedial prefrontal cortex. One key aspect of the

study is that no choices were actually made by the participants; the drink was delivered directly to the participants in the fMRI in small quantities. The manipulation was based on whether the brand was announced first, and the finding is based on the resulting activated regions, as measured by the fMRI.

Koenigs and Tranel (2008) explain that there is a "Pepsi paradox", which essentially explains that in a blind taste test, subjects tend to prefer Pepsi over Coca-Cola, or have no reliable preference, yet Coca-Cola consistently outsells Pepsi. The paradox is that when brand information is available, Coca-Cola is preferred, but when brand information is not provided, no reliable preferences can be made. In McClure et al.'s (2004) study, cola preference was counterbalanced. Koenigs and Tranel (2008) confirm predictions from previous correlative data by using subjects with prefrontal cortex damage, finding that even when these participants are presented with brand information, it makes no difference in their preferences. Thus, this finding mirrors effects found in normal individuals in blind taste tests, as well as under their own blind taste test conditions.

7.2   Tourist Website: How to Choose a Destination?

The second case study involves the tourism sector, which is closely linked with a rise or decrease of prices. Pricing is often used as a competitive advantage tool in tourism in a number of ways to try to influence consumers' purchasing patterns (Swarbrooke and Horner 2007, p. 166). When consumers are looking through a brochure to select a journey, the emotional response is a significant determinant of destination choice (Boz et al. 2017). The study of Bigne and Andreu (2004) showed that tourists experiencing higher pleasure were more likely to be satisfied, loyal and less price-sensitive. Qui and Wu (2005) conducted an experimental study on the influence of cognitive styles and negative emotions on tourism decision-making. While cognitive styles were not influential in decision-making, negative emotions were.

On the other hand, perceived risk motivates intensified information-seeking (Witt and Moutinho 1995) and makes the design of marketing communications messages a significant task in the tourist industry (Boz

et al. 2017). Tourism decisions involve large emotional investments, due to the fact that a great majority of people may have only one opportunity to go on a trip in a year. If a trip goes wrong, there is not another opportunity for another year; therefore, the fear of failure is high and the opportunity cost is irreversible (Koc 2004, p. 88). Although the risk element of services is generally high for consumers, the decisions related to tourism may cause higher risk perception among consumers for than other services.

8   Conclusive Reflections and Implications

From these reflections, it is noted how neuromarketing techniques could be useful to gain a more appropriate valuation of the efficiency of communication. Berns and Moore (2012) showed that the rating of declared preferences and the forecasts of success of a new commercial song list replaced traditional survey techniques that significantly differed from the market data, while analysis carried out with neuromarketing techniques was more predictive and efficient in identifying which techniques would be successful. These results reveal some important theoretical and managerial implications.

From the theoretical point of view, neuromarketing presents the opportunity to overcome the subjectivity characterising more traditional marketing tools used to analyse customers' behaviour (for example, focus groups) by providing objective scientific data. From the managerial point of view, neuromarketing ensures the possibility of measuring objectively the effect of some advertising campaigns, advertisements, brand images and so on. However, it should be noted that, among the neuromarketing techniques, fMRI is preferred by scientists and firms. EEG is also commonly used to determine the effect of all elements of television advertising. The techniques less used are PET, which is highly invasive; magnetoencelography, which is not suitable for measuring the deepest subcortical and cerebral areas and is only possible with very expensive equipment; and eye tracking, which does not allow for an understanding of the emotions associated with the areas that we are focused on.

Neuromarketing and its tools represent a modern and expanding field that generates intense debate concerning ethical principles and the accuracy of its use; these sometimes relates to increasing dangers and possible abuse. This work presents a "state of the art" assessment related to the influence of neuromarketing on customers' behaviour that could be supported in the future with specific empirical analysis carried out on customers from different sectors and geographical areas. Neuromarketing is a new way of studying marketing; if it is correctly used with particular attention to ethical principles, it could help marketing operators understand how to present and sell products more efficiently. In particular, it could become a useful support for marketing applications to find the correct audience for a particular product (Glaenzer 2016). In conclusion, a thorough understanding of brain cognitive mechanisms could find answers to many questions in the field of marketing (Costa Rozan Fortunato and de Moura Engracia Giraldi 2014).

References

Bakardjieva, E., & Kimmel, A. J. (2017). Neuromarketing research practices: Attitudes, ethics, and behavioral intentions. *Ethics & Behavior, 27*(3), 179–200.

Barbasso, L., Cortez, J., and Butter, W. (2015). Studio reazioni corticali e sub-corticali a diverse tipologie di packaging attraverso fMRI. Unpublished study.

Berns, G. S., & Moore, S. E. (2012). A neural predictor of cultural popularity. *Journal of Consumer Psychology, 22*(1), 154–160.

Bigne, J. E., & Andreu, L. (2004). Emotions in segmentation: An empirical study. *Annals of Tourism Research, 31*(3), 682–696.

Boksem, M. A. S., & Smidts, A. (2015). Brain responses to movie trailers predict individual preferences for movies and their population-wide commercial success. *Journal of Marketing Research, 52*, 482.

Borges, A., Babin, B. J., & Spielmann, N. (2013). Gender orientation and retail atmosphere: Effects on value perception. *International Journal of Retail and Distribution Management, 41*, 498–511.

Boz, H., Arslan, A., & Koc, E. (2017). Neuromarketing aspect of tourısm pricing psychology. *Tourism Management Perspectives, 23*, 119–128.

Bryman, A., & Bell, E. (2011). *Business research methods* (3rd ed.). Oxford: Oxford University Press.

Cascio, C. N., O'Donnell, M. B., Bayer, J., Tinney, F. J., Jr., & Falk, E. B. (2015). Neural correlates of susceptibility to group opinions in online word-of-mouth recommendations. *Journal of Marketing Research, 52*(4), 559–575.

Chartrand, T. L., Huber, J., Shiv, B., & Tanner, R. J. (2008). Nonconscious goals and consumer choice. *The Journal of Consumer Research, 35*(2), 189–201.

Chater, N., & Loewenstein, G. (2016). The under-appreciated drive for sense-making. *Journal of Organization Behavior and Organization, 126*(b), 137–154.

Costa Rozan Fortunato, V., & de Moura Engracia Giraldi, J. (2014). A review of studies on neuromarketing: Practical results, techniques, contributions and limitations. *Journal of Management Research, 6*(2), 201–220.

Dooley, R. (2011). *Brainfluence: 100 ways to persuade and convince consumers with neuromarketing*. New York: Wiley.

Evers, E. R. K., Inbar, Y., Loewenstein, G., and Zeelenberg, M. (2014). Order preference (working paper). Department of Social Psychology. http://ssrn.com/abstract=2466991. Accessed 31 July 2016.

Feenstra, R. A., & Pallarés-Domínguez, D. (2017). Ethical debates on political Neuromarketing: The technological advance and its potential impact on the formation of public opinion. *Veritas, 36*, 9–28.

Fisher, C. E., Chin, L., & Klitzman, R. (2010). Defining neuromarketing: Practices and professional challenges. *Harvard Review of Psychiatry, 18*(4), 230–237.

Gazdzik, T. (2017). Neuromarketing: Seller new world order. *Вісник Львівського університету-Серія економічна, 37*, 264–266.

Gazzaniga, M. S. (2004). *The cognitive neurosciences*. Cambridge, MA/London: MIT Press.

Ghorpade, R. (2017). Neuromarketing: New science of consumer behavior. *AADYA-National Journal of Management and Technology (NJMT), 7*, 199–206.

Glaenzer, E. (2016). Are the brain and the mind one?: Neuromarketing and how consumers make decisions. http://digitalcommons.colby.edu/cgi/viewcontent.cgi?article=1831andcontext=honorstheses. Accessed 3 Jan 2018.

Google Trends. (2018). *Google trends*. https://trends.google.it/trends/. Accessed 3 Jan 2018.

Green, S., & Holbert, N. (2012). Gifts of neuroimaging: Science and speculation in the age of neuromarketing. *Marketing Research, 24*(1), 10–14.

Hazeldine, S. (2014). *Neuro-sell: How neuroscience can power your sales success*. Croydon: Kogan Page Limited.

Hilderbrand, M. L. (2016). *Neuromarketing: An essential tool in the future of advertising and brand development*. Master thesis, University of Texas.

Hsu, M. (2016). *Neuromarketing: Inside the mind of the consumer*. http://faculty.haas.berkeley.edu/mhsu/papers/Neuromarketing.pdf. Accessed 27 July 2016.

Kaltcheva, V. D., & Weitz, B. A. (2006). When should a retailer create an exciting store environment? *Journal of Marketing, 70*, 107–118.

Koc, E. (2004). The role of family members in the family holiday purchase decision-making process. *International Journal of Hospitality and Tourism Administration, 5*(2), 85–102.

Koc, E., & Boz, H. (2014a). Triangulation in tourism research: A bibliometric study of top three tourism journals. *Tourism Management Perspectives, 12*, 9–14.

Koc, E., & Boz, H. (2014b). Psychoneurobiochemistry of tourism marketing. *Tourism Management, 44*, 140–148.

Koenigs, M., & Tranel, D. (2008). Prefrontal cortex damage abolishes brand-cued changes in cola preference. *Social Cognitive and Affective Neuroscience, 3*(1), 1–6.

Lee, N., Broderick, A. J., & Chamberlain, L. (2007). What is 'neuromarketing'?: A discussion and agenda for future research. *International Journal of Psychophysiology, 63*(2), 199–204.

Lin, C. H., Tuan, H. P., & Chiu, Y. C. (2010). Medial frontal activity in brand-loyal consumers: A behavior and near-infrared ray study. *Journal of Neuroscience, Psychology, and Economics, 3*(2), 59–73.

Lindstrom, M. (2008). *Buyology: Truth and lies about why we buy and the new science of desire*. Danvers: Crown Publishing Group.

Lucia-Palacios, L., Pérez-Lòpez, R., & Polo-Redondo, Y. (2017). Atmospheric excitement, customers' moods and gender: A study of young shoppers. *Journal of Strategic Marketing, 0*, 1–16.

Madan, C. R. (2010). Neuromarketing: The next step in market research? *Eureka, 1*(1), 34–42.

McClure, S. M., Li, J., Tomlin, D., Cypert, K. S., Montague, L. M., & Montague, P. R. (2004). Neural correlates of behavioral preference for culturally familiar drinks. *Neuron, 44*, 379–387.

Morin, C. (2011). Neuromarketing: The new science of consumer behavior. *Society, 48*(2), 131–135.

Muth, J. F. (1961). Rational expectations and the theory of price movements. *The New Classical Macroeconomics, 1*, 3–23.

Nobel, C. (2013). Neuromarketing: Tapping into the "pleasure center" of consumers. *Forbes Magazine*. https://www.forbes.com/sites/hbsworking-knowledge/2013/02/01/Neuromarketing-tapping-into-the-pleasure-center-of-consumers/. Accessed 26 Feb 2018.

Nyoni, T., & Bonga, W. G. (2017a). Neuromarketing: The journey to better consumer understanding. *Journal of Economics and Finance, 2*, 1–10.

Nyoni, T., & Bonga, W. G. (2017b). "Neuromarketing: No brain, no gain!", *Journal of Economics and Finance, 2*, 17–29.

O'Doherty, J. P., & Bossaerts, P. (2008). Towards a mechanistic understanding of human decision making: Contributions of functional neuroimaging. *Current Directions in Psychological Science, 17*(2), 119–123.

Ohme, R., & Matukin, M. (2012). A small frog that makes a big difference: Brain wave testing of TV advertisement. *IEEE Pulse, 3*(*3*), 28–33.

Plassmann, H., O'Doherty, J., Shiv, B., & Rangel, A. (2008). Marketing actions can modulate neural representations of experienced pleasantness. *PNAS of the USA, 105*(3), 1050–1054.

Plassmann, H., Venkatraman, V., Huettel, S. A., & Yoon, C. (2015). Consumer neuroscience: Applications, challenges, and possible solutions. *Journal of Marketing Research, 52*, 427.

Poels, K., & Dewitte, S. (2006). How to capture the heart?: Reviewing 20 years of emotion measurement in advertising. *Journal of Advertising Research, 46*(1), 18–37.

Potter, R. F., & Bolls, P. D. (2012). *Psychophysiological measurement and meaning: Cognitive and emotional processing of media*. New York: Routledge.

Prelec, D., & Loewenstein, G. (1998). The red and the black: Mental accounting of savings and debt. *Marketing Science, 17*(1), 4–28.

Qui, F., & Wu, M. (2005). An experimental research on the influence of cognitive styles and negative emotions on tourism decision-making. *Psychological Science, 28*(5), 1112–1114.

Ramsoy, T. Z. (2014). *Introduction to Neuromarketing and consumers science*. Holbæk: Kindle Editions, Kindle Locations, Neurons..

Roth, V. A. (2013). *The potential of neuromarketing as a marketing tool*. Dissertation, University of Twente, Enschede, The Netherlands.

Smidts, A., Hsu, M., Sanfey, A. G., Boksem, M. A. S., Ebstein, R. B., Huettel, S. A., et al. (2014). Advancing consumer neuroscience. *Marketing Letters, 25*, 257–267.

Sola, M. H. (2013). Neuromarketing: Science and practice. *Journal of Finance and Law, 1*(1), 25–34.

Stanton, S. J., Sinnott-Armstrong, W., & Huettel, S. A. (2017). Neuromarketing: Ethical implications of its use and potential misuse. *Journal of Business Ethics, 144*(4), 799–811.

Štrach, P., and Slivkin, N. (2017). Adaptation needed: Eye-tracking study of cross-cultural differences in perception of B2B websites. International Business and Economy Conferences, XVI International Business and Economy Conference, Chile 2017. https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2920998

Suomala, J., Palokangas, L., Leminen, S., Westerlund, M., Heinonen, J., & Numminen, J. (2012). Neuromarketing: Understanding customers' subconscious responses to marketing. *Technology Innovation Management Review, 2*(12), 12–21.

Swarbrooke, J., & Horner, S. (2007). *Consumer behavior in tourism*. Stockport/Cheshire: Routledge.

Tekin, M., Köylüoğlu, A. S., & Koyuncuoğlu, L. Ö. (2017). Research on consumers' brain activations by means of electroencephalography method. *European Journal of Multidisciplinary Studies, 5*(1), 313–322.

Tornati, I. (2012). *Il ruolo delle emozioni nei processi decisionali del consumatore: dalle neuroscienze al Neuromarketing*. Master thesis in marketing and communication, University Ca' Foscari of Venice, Venice.

Venkatraman, V., Dimoka, A., Pavlou, P. A., Vo, K., Hampton, W., Bollinger, B., et al. (2015). Predicting advertising success beyond traditional measures: New insights from neurophysiological methods and market response modeling. *Journal of Marketing Research, 52*, 436.

Wirtz, J., Mattila, A. S., & Tan, R. L. P. (2000). The moderating role of target-arousal on the impact of effect on satisfaction: An examination in the context of service experiences. *Journal of Retailing, 76*, 347–365.

Witt, S. T., & Moutinho, L. (1995). *Tourism marketing and management handbook*. Hertfordshire: Prentice Hall Europe.

Wunderlich, K., Rangel, A., & O'Doherty, J. P. (2009). Neural computations underlying action-based decision making in the human brain. *PNAS of USA, 106*(40), 17199–17204.

Yadava, M., Kumar, P., Saini, R., Roy, P. P., & Dogra, D. P. (2017). Analysis of EEG signals and its application to neuromarketing. *Multimedia Tools and Applications, 76*(18), 19087–19111.

Yoon, C., Gonzalez, R., Bechara, A., Berns, G. S., Dagher, A. A., Dube, L., et al. (2012). Decision neuroscience and consumer decision making. *Marketing Letters, 23*, 473–485.

Zaltman, G. (2003). *How customers think: Essential insights into the mind of the market (what consumer can't tell you and competition don't know)*. Boston: Harvard Business Press.

Żurawicki, L. (2010). *Neuromarketing: Exploring the brain of the consumer*. Springer. http://info.4imprint.com/wp-content/uploads/1P-07-0710-July-Blue-Paper-Neuromarketing.pdf. Accessed 27 July 2016.

3

The Role of Dynamic Entrepreneurial Capabilities and Innovation in Intergenerational Succession of Family Firms

Glykeria Karagouni

1 Introduction

Family businesses have captured the interest of scholars from multiple disciplinary backgrounds due to their strong presence on a global level. Succession is among the hottest topics in this literature since the survival rate for these firms is disappointing, especially beyond the second and third generations. Within this context, an emerging stream explores innovation as an important strategic resource which family-run firms can use to achieve a competitive advantage (Bresciani et al. 2013) and which is affected by and affects succession. Therefore, it appears that both succession and innovation are strategically important for the survival and longevity of family businesses.

Despite significant advances in the fields of family firm innovation and family business succession, a conspicuous gap remains in family business research concerning succession as strategic orientation throughout the

G. Karagouni (✉)
University of Applied Sciences of Thessaly, Larissa, Greece
e-mail: karagg@teilar.gr

life cycle of family businesses under a dynamic capabilities (DC) view and within the field of strategic and innovation management.

The chapter contributes to entrepreneurship and family business research by drawing on the succession, innovation and DC literatures and by introducing the novel concept of dynamic entrepreneurial capabilities (DECs), the measurement of this and its role in innovation and succession. While DCs have received significant attention in strategic management, there are no more than a handful of works on the DC approach in family business management. Considering DECs in this study extends the literature by integrating entrepreneurial and purely strategic capabilities in the succession process and thus contributing to the DC-family business succession research field.

The chapter examines and discusses the role of DECs in family business succession, addressing the need to support and enhance innovation and competitiveness across family generations. A firm's innovation capability depends closely on knowledge, thereby making it a key resource for obtaining sustained competitive advantage. Quite recently, family business scholars have started to recognise that innovation can be a dynamic capability (Eisenhardt and Martin 2000). Furthermore, business environments are no longer stable, while succession is by definition a dynamic process which requires a renewal of capabilities. From the DC perspective, DECs have been defined as higher-order DCs that rely mainly on knowledge and are capable of denoting changes in business ecosystems and creating new competitive advantages. DECs contribute to widening the successor(s) knowledge base and enhancing entrepreneurial capacities for a successful realisation of succession building on innovation. They can help family firms defy the threatening mortality rates and not simply survive but thrive, as they build on innovative initiatives. The chapter may orient future research in this intriguing field at the intersection of the DC, innovation and family business succession literature.

The topic is addressed through qualitative research and more precisely using three case studies: two from Greece and one from Cyprus. All three firms are family businesses and belong to different industries: food, furniture, and textiles and clothing. The empirical research shows that successors with advanced DECs exploit knowledge and other resources, creating dynamic environments mainly through innovation and achieving high post-succession performances.

2   Theoretical Background

2.1   Family Business, Succession and Innovation

Family businesses constitute the oldest and predominant forms of economic organisation in society since they constitute around 90% of companies worldwide (Gaitán-Angulo et al. 2016). They are controlled by family members and are sustained and further developed across generations. Unification of ownership and control is typical of family businesses and makes different from other firms in many areas, such as goals and culture.

Family firm research has been of interest to researchers since the 1980s, while succession is perhaps the hottest of the top issues that have received particular scholarly attention. This is because it constitutes one of the primary reasons family businesses fail (Benavides-Velasco et al. 2013). Perhaps the most quoted statistic in the world of family business regards rates of failure: 30% of family businesses make it to the second generation, 10–15% to the third and only 3–5% to the fourth generation.

Succession is defined as a process of actions and events that leads to the transition of leadership from one family member to another (Sharma et al. 2001). It is important to note that succession is a dynamic and iterative process and is described by several models underlining the need for planning on the part of the incumbent and successor (Nordqvist et al. 2013), the influence of values, culture and family dynamics (Distelberg and Blow 2010), individual attributes (e.g., Daspit et al. 2016) and so on. Researchers explore several patterns of succession, factors and barriers affecting effectiveness and success, such as the personality traits of incumbents and successors, successor education and training outside the family business, motivation, the business context, and the culture and environment (Tàpies and Fernández-Moya 2012).

Innovation constitutes an essential source of competitive advantage. It can be "a new idea, method, or device. It is the act of creating a new product or process, which includes invention and the work required to bring an idea or concept to final form" (Kahn et al. 2012, p. 454). It introduces change (radical or not) and constitutes a significant factor for entrepreneurship. The literature underpinning the phenomenon of innovation

purports to explore a great variety of topics of this multidimensional phenomenon, which is both a process and an outcome.

Family business innovation has been defined as an intentional process resulting from the autonomous and interactive efforts of members of a family-run business (Urbinati et al. 2017). According to Benavides-Velasco et al. (2013), it can be a complex process due to the dichotomy of managing the demands of both family and business. According to Urbinati et al. (2017), it appears mainly as outcome in the form of product innovation.

Research on innovation in family firms is in its infancy (Bresciani et al. 2013; Urbinati et al. 2017). Some scholars have pointed to a negative relationship between family involvement, innovativeness and expenditure on research and development, while empirical evidence is somewhat mixed regarding the effect of family influence on innovation output (De Massis et al. 2015). Some researchers state that innovativeness is negatively affected by the succession event, while others conclude that intra-family succession is the catalyst for revolutionary change and innovation (De Massis et al. 2015) or that generational changes can increase the level of internal and external innovativeness (Zellweger and Sieger 2012).

Following the general trend in the innovation literature, family business scholars have also turned to the notions of knowledge, resources and capabilities required by a firm in order to innovate. Bresciani et al. (2013) link innovation to competitive advantage and investigate the innovative capacity of family businesses with reference to the resource perspective. Benavides-Velasco et al. (2013) propose a resource-based view as a way to identify the resources and capabilities that allow family firms to survive and grow. Padilla-Meléndez Dieguez-Soto and Garrido-Moreno (2015) relate the organisation's propensity to innovate to a dynamic capability linking it further to resource allocation, organisational learning and knowledge management. Moreover, "familiness", perhaps the most notable contributions to theories regarding family firms, represents the unique bundle of resources and capabilities generated from the interaction of the family and business systems that contribute to competitive advantage (Daspit et al. 2017).

2.2 The DEC Perspective and "Transgenerational Innovation"

Recently, family business scholars have started to recognise that innovation, as the ability to develop new products and processes or to improve existing ones, can be a dynamic capability (Eisenhardt and Martin 2000) and lead to positive business performance (Chirico and Nordqvist 2010). Furthermore, business environments are no longer stable, no matter the industry (Protogerou and Karagouni 2012), and succession is therefore a dynamic process which requires a renewal of capabilities.

The concept of DCs was introduced by Teece, Pisano and Shuen (1997) and described in Teece (2007). They are defined as a set of specific and identifiable strategic and organisational processes which enable organisations to revise, integrate and reconfigure their internal and external skills and resources to match environmental changes or, according to Helfat et al. (2007), to purposely create, expand and revise their resource base.

DCs have just started to appear in family business literature as a very small but increasing stream, pointing to the importance of adopting a dynamic perspective when studying capabilities which are likely to change over time, especially during distinct dynamic events such as transgenerational succession. Chirico and Nordqvist's (2010) conceptualisation of how DCs are generated by knowledge and create product innovation by family firms was the first effort to relate the DC view to family firms. Urbinati et al.'s (2017) framework adopts a DC perspective while Lin and Hou (2014) related DCs to the performance of family firms.

Within the DC perspective, DECs have been defined as higher-order DCs that influence the location and the modes of selection of resources, skills and knowledge in order to denote changes in business ecosystems and create new competitive advantages. DECs were initially developed to portray the abilities of an entrepreneurial or a managerial team to engage in non-routine activities and as a paradoxical way of combining a variety of knowledge assets in order to create low-tech ventures (Karagouni and Caloghirou 2013). DECs are operationalised across three dimensions: (1) transcendental capability explains how innovative concepts are built,

suggesting that they are the results of knowledge-generation processes—this mainly concerns the process of intangible asset creation, which according to Teece (2011) constitutes the new, hard-to-build "natural resources"; (2) bricolage capability enables agents both to explore and exploit new opportunities that might otherwise be too expensive to investigate; and (3) improvisation capability allows agents to create and execute new plans "on the fly", using resources available when opportunities or unexpected pieces of knowledge and information emerge.

According to their definition, a significant role of DECs is to activate their entrepreneurial and cognitive component and provide for their flexible shaping and use in cases of strategic changes in organisations, such as in the restructuring of the organisation (Sharma and Chrisman 1999). Entrepreneurs and managers are the key agents of DEC development; DECs can be deliberately cultivated, developed and influenced by the core decision-makers. They are simple, idiosyncratic and iterative. They are related to the firm's survival, affecting its growth, innovativeness and competitive advantage.

Succession is "not just changing the people, it's changing the system" (Leach and Bogod 1999, p. 191). This actually means a renewal and development of a new type of business structure, procedure and, often, a new entrepreneurial orientation of the successors. Therefore, we can assume that DECs can indeed play a role in a family business and specifically at transgenerational successions. As successful succession must provoke revolutionary change and innovation (De Massis 2015), bringing constructive organisational change, this becomes a far more dynamic process than is usually believed.

3   Method

3.1   The Empirical Setting

The research is a longitudinal, multiple exploratory case study with the individual family firm as the unit of analysis (Yin 2009). This method permits replication logic since each case is viewed as an independent research study which may confirm, reject or extend the theoretical

Table 3.1 Description of cases

Family business	Year of foundation	Active generation	Industry
Alpha	1961	2nd	Textiles industry
Beta	1932	3rd	Food industry
Gamma	1955	3rd	Furniture industry

background through new insights. The sample was selected from among family firms that were governed by the second or the third generation. It consists of three private family firms: two Greek ones from Oinofyta (Alpha) and Agrinio (Beta), and a Cypriot one from the city of Nicosia (Gamma). All firms belong to different industries (Table 3.1) which occupy a prominent position in the European manufacturing sector. The names given to firms and some other information have been disguised for confidentiality reasons.

3.2 Measures

3.2.1 DECs

Transcendental capability constitutes a purely dynamic entrepreneurial capability of a strategic nature that implies the development of two dimensions:

(a) The capacity to develop panoramic ecosystem awareness in order to sense of spaciousness (Karagouni and Caloghirou 2013) and a constant sensation of where the agents are and where they want to go. Spaciousness allows successors to generate opportunities beyond imposed rules, established path-dependencies and limitations. The capacity is related to the openness of the agents to novelty, and their attitudes, experiences and knowledge but it extends to the areas (sectors, sciences and perspectives) they search, the markets they explore, the mechanisms and channels they use, the networks they build and the visions they develop. This requires further an ability to view global markets in a panoramic way and therefore an ability to view a given phenomenon from various points simultaneously.

(b) Transcendental synthesis concerns the process of data and stimuli reception, a spontaneous reaction, and a repetitive action of judgement. This is an act of intelligent unification which regards bottom-up and up-down information-processing capabilities, openness to ideas and external stimuli, as well as sensitivity to internal signs and stimuli. It is complemented by the capacity or process of judgement, which refers mainly to how actors arrange the firm's assets; it enables the application of specific rules that directly reflect the internal structures of the organisation, thereby generating correspondingly structured outputs.

Bricolage capabilities are strongly shaped by knowledge bases and networks within and outside the bounders of the firm's sectoral value chain. Bricolage is treated as a process of continuous creation and use of knowledge, and as an exploitation of various types of resources. It has two main dimensions:

(a) "Repertoire building" concerns the ability to collect tangible and intangible resources, such as available materials, financial capital, technical assets and knowledge, including different uses of available resources (Ciborra 1996). The ability to build a repertoire includes the ability to create a proper problem-making environment, codify and formulate problems and find solutions by the exploitation of "resources at hand" that are necessary to achieve the particular goals (Chang et al. 2005). These are firm processes, structural mechanisms, forms and routines (Ciborra 1996), knowledge, physical resources, social capital and networks (Baker et al. 2003). The target is to fill in the gap between vision and reality. In order to achieve the desired results, an important part refers to learning through feedback from collaborators, suppliers and other parts of the business ecosystem.

(b) Concentric cycle networking concerns the ability to expand networks starting from the business networks and interpersonal relations; this actually constitutes the initial network pool and can be considered an aspect of the resources at hand. Networking enables the creation of links to potential sources of knowledge, novel

technologies or strategic alliance partners. The dimension concerns the progressive opening up to suppliers, customers and skilled labour, as well as to actors of other industries and other scientific areas.

Improvisation capability allows agents to "read the world in a different way" (Ciborra 2002); instead of the established linear "design-plan-execute" model, they appear to create and execute new plans "on the fly", using resources available at the moment when opportunities or unexpected pieces of knowledge and information emerge. It concerns:

(a) Information flow between the actors and the environment (Chelminski 2007) that enables real-time communication; this the interaction within and between the teams based on timely information. It can be measured by the communication skills of all stakeholders (Vera and Crossan 2005), the degree of knowledge, information-sharing and flexibility, which implies the spontaneous response to circumstances and obstacles arising, allowing exceptions to rules. Flexibility is further related to the capacity for exploring, continuous experimenting, trial-and-error processes with the tolerance of mistakes and failures, and tinkering with possibilities without knowing how the action will unfold (Barrett 1998).

(b) The provocative organisational competencies sub-dimension denotes the absence of adequate routines, low procedural memory and minimal structures (Vera and Crossan 2005). "Provocative competences" are "any deliberate effort to interrupt habit patterns" (Barrett 1998, p. 606) and are based on trust and specific communication codes among stakeholders. Low procedural memory may concern the engagement of completely new staff or the development of new processes and new shifts (Chelminski 2007; Ciborra 1996).

3.2.2   Performance

Financial outcomes (sales and growth), innovation and strategic choices compose the firm's entrepreneurial performance (Barney 1991), while

growth is the most relevant performance indicator in family business succession (Molly et al. 2010), as measured by sales trends after the formal transfer of the firm to the successors.

Innovativeness performance concerns new or diversified products, or product line extensions, new or improved processes, production methods, promotion methods, business models, novel technology and opening up of new markets. Strategic choices concern new markets or niche markets and new technology (De Massis 2015).

3.3   Data Collection

Data were collected through several face-to-face, in-depth interviews using semi-structured questionnaires with two or more family members actively involved in each firm in 2015/2016. Interviews were conducted across several meetings; they were taped and transcribed soon after. The interviewees were also asked to narrate the stories of the succession events, the obstacles and worries they faced and the family firm's evolution over time. Additional sources of information were also used to complement the interview data, such as plant visits, company reports, awards, company websites and press attention.

4   Findings

4.1   Transgenerational Innovation and the Impact of Succession on Performance

Alpha's performance after succession was excellent. Kostas (the father) established a conventional linen company, which soon developed more sophisticated and value-added activities (products for the army and the health sector). Following the innovative father, the two successors took the risk to invest in technical textiles at the time of succession. In almost five years, succession led to a complete change of strategy: Alpha became a pioneering and innovative company, one which is still unique in Greece in the development and manufacture of high-performance

textile products for the defence and safety sector and among industry leaders worldwide. The successors tried (and succeeded in their efforts) to differentiate with innovative, high-tech and, sometimes, patented products, registered trademarks and novel promotion methods. They developed a strong research and development image, focusing on research both in-house and in cooperation with high-tech parties. With significant investments in technology and cutting-edge research findings in biochemistry and nanotechnology, they reformed production technologies to the requirements of the new textiles.

During the years following the succession, Alpha entered new niche markets such as bullet-proof products, invested in verticalisation, engaged in e-commerce and developed its own retail network. The company developed strong design and product development capabilities, becoming a constant innovator for niche markets.

> "We export to more than 16 countries while NATO, [the] RAF [Royal Air Force] and many Defence Ministries are among our best customers" (Demetris, Economist).

Alpha had an 88% sales increase in the difficult crisis years, accompanied by a 130% export increase with exports to count for almost 80% of its turnover. Significant amounts are reinvested in knowledge, technology and R&D. The new (third) generation is en route: "

> My two sons are at University preparing to enter the company" (Michalis, chemist, MSc in Manufacturing System Engineering).

Beta also presented an excellent performance; the third generation consists of five cousins, the children of three brothers. Three cousins were interviewed. According to Kostas, they were educated to take over the company. However, the young successors had to overcome the distrust of the old generation in involving science in rice production. The "bet" was a second plant which would be the basis of innovation for the new generation and the need to preserve leadership for the incumbents:

> "The good thing was that our fathers thought that a plant is a plant and we would not have a lot of margin for error!" (Kostas, Economist).

Beta's successors took over the company in dynamic ways: they invested heavily in innovation and innovation capabilities, patented process methods and cutting-edge technologies, the creation of a strong research and development and quality control department, aggressive new product development and continuous investment in knowledge development. They reoriented its strategy towards differentiation and innovation; they were among the first to delve into circular bio-economy long before the concept became a trend. Indicatively, under the slogan "nothing to be wasted", they commissioned significant research and now they have launched a number of high-value products for the chemical industry: "When you suspect a need you can create a result. Of course you may change the initial idea more than once. All this way comprises knowledge, research as well as imagination" (Tasos, Mechanical Engineer).Soon after the transfer to the new generation, the company started exporting. Beta has won a number of national and international awards since then. It is the leader in the Greek market with a share of more than 30% and has increased its share in the international market. The company almost tripled sales within a decade, with an increase in size from 120 to around 180 employees. Net income increased considerably up to 2012 and reinvestments in the company have been made. The family company did very well through the severe financial crisis in Greece: "In such crises one should think of a superb management and restructuring. This crisis is a crash test for all enterprises which have a considerable time of existence. I don't mean companies of 10 or 15 years, but the ones that count even 100 years!" (Vasiliki, Economist).

In Gamma, performance was negatively affected after the transfer to the third generation. Stelios and Anna inherited a modern furniture manufacturing plant and a loyal clientele of high-end customers in Cyprus and the United Kingdom. However, the successors could not follow the father's pace. The new generation did not invest in any type of technology or in marketing. New products are sometimes launched, which are usually replicas of European design models. The firm has gradually shrunk in size since it lost a significant piece of its market. Stelios says:

> "We took over within the crisis. We had to confront many problems. We worked together with father to survive. We could not think of innovating" (Stelios, graphic designer).

Gamma's size and net income rose substantially after Harris (Stelios' father) took over in 1977. It increased until 2005 and it was quite stable until 2010. However, the entrance of the two successors (2009–2010) had a negative impact on performance and sales. Harris tries to provide excuses for the successors:

> "They were not ready. Maybe, it is not the right job for them! I loved it and I used to search a lot to sense technology, the market, my clients! Stelios is afraid to invest."

The future for Gamma appears uncertain:

> "I just got married. I will not continue to work here. I don't know about Stelios. I think he also wants to escape this mess! We are thinking of ceasing production. It's actually a shame. Father had invested heavily in production" (Anna, economist).

4.2   The Role of DECs

Alpha's successors had developed significant *transcendental capabilities*. They purposefully developed the "bird's view" (before and around the time of succession) of Greek and European markets and sensed the threat of the Asian counterparts against mass production in the textiles and clothing industry, while the majority of the Greek sectoral entrepreneurs did not. According to Demetris, "In the early 90s traditional productive activity started moving to eastern countries with low labour costs". As Michalis said, "Our vision was to advance knowledge and technologies for high-performance products. Our aspiration could be fulfilled through a sustainable technological-oriented and customer-centric path based on continuous innovation."The panoramic ecosystem awareness exceeded the initial market and sub-sector; they invested in collecting knowledge and information on innovative materials, special functions and technologies, such as anti-ballistic technology. Transcendental synthesis yielded to innovations in technology, marketing and business models as the results of the sub-dimension of receptivity concerning: (1) opportunities due to emerging European norms and existing European standards; (2) technology

evolution; (3) the production shift to Asian countries; (4) the advances and innovations of the chemical industry; and (5) the growing interest in high-tech textile products.

The successors grounded the reasons for their idea in: (1) a need to escape conventional mass production; (2) the positive aspects of the emerging trends; and (3) the need to change from a labour-intensive to a knowledge-intensive approach. Their decisions led to: significant knowledge acquisition; the development of a strong research and development department and quality control; a significant investment in the reorganisation of the whole productive process; the creation of an extensive network with global leading chemical industries such as Du Pont; Computer Integrated Manufacturing (CIM) integration; and new customer approaches.

Bricolage capability is strong for Alpha. In order to realise their vision, the two brothers questioned the better fit between protection and the human body and developed networks with firms of high-tech sectors well outside the textiles sector. As Demetris said:

> We owned extended knowledge on clothing and knitting technology. Then, we learnt how to handle with military standards. We wanted to differentiate. I mean when you have some advanced know-how and relevant experience, you seek to develop competitive advantages. Then you have to find how. We tried to find people to cooperate to gain knowledge … material … techniques … Whatever we needed for our new vision.

Concentric cycle networking dimension is evident; the successors developed formal and informal relationships in order to build on knowledge coming from external sources through contracts and joint projects. The most important sources of external knowledge, provided in formal or informal ways, are their high-tech suppliers. As Michalis said:

> Good relations and trust is important. For example, it was the fire-protection material; we had started an official co-operation with a laboratory in England, the leader in its area. We had a really fine relationship and people would provide information and knowledge when just talking—I mean informally.

Transsectoral and transnational knowledge plays a core role in the two successors' culture; they invest money and time in seeking knowledge

in various scientific, industrial and functional areas. With significant experience of the sector, they have proved to be unconventional and personally involved in the efforts to innovate.

Improvisational capabilities are characterised by conscious and stable communication and interaction with the environment in the pursuit of more novelty and differentiation. Changes can be freely made by all team members. Indicatively, improvisational capabilities have enabled the creation of a special customisation line—a need that emerged through a three-piece order at the family firm during the development phase of the new equipment. Alpha's successors improvise by experimenting and through trial-and-error regarding both processes and novel products.

It is interesting to note that successors were not affected by core rigidities of the family firm but had developed flexibility in seizing opportunities. Provocative competencies appear in the form of flexibility in decision-making, and in working out of routines, budgets and estimations which, according to Michalis, were crucial for the realisation of their concept. However, it was a common commitment not to use the family firm's routines in that phase.

Furthermore, it was evident that the actors' enthusiasm for innovation, the attitude towards knowledge and novelty, their extroversion and their creative and provocative dissatisfaction affected the quality of their improvisational capabilities.

Beta's successors drew on the significant business success of the family firm, its strong position in the Greek market, and existing contacts with world leaders across the value chain. They had cultivated high-level panoramic ecosystem awareness, due to academic studies, their involvement in the family firm, and their participation in trade and international events. They were raised in an entrepreneurial milieu, encouraged to travel a lot, gain experience and develop the sense of spaciousness:

> "Our parents were innovators and pioneers in many ways. They were the first in Greece to invest in packaging and sponsor a TV music show!" (Vasiliki).

Science, institutional settings and trends towards a healthy life-style, functional food, demographic data, environmental issues and globalisation

constituted their largest areas of spaciousness. Indicatively, they created new food combinations that suited different customers' needs and products in intra-sectoral areas (pharmaceutical, chemistry, etc.). As Kostas said:

> "Of course all these presuppose knowledge, scientific research and experimentation. Still, nothing exists before you imagine and invent it! All this way comprises knowledge, research as well as imagination!"

It took ten years to engage scientific knowledge, diffuse it throughout the company's functions and establish a new culture. Knowledge of food technology at a scientific level was further nurtured by the approach to universities for formal research collaborations:

> "Our initial aim was to be reinvented in order to suit to the new entrepreneurial international landscape that we felt it would soon come. A sort of knowledge verticalization … Of course, we wanted to keep and enlarge our current market but we bet on innovation too!" (Kostas).

Decisions concerned economic profitability versus the uncertainty of bringing science into rice production. They reflected the internal structures of Beta and referred mainly to productivity, quality, consistency and corporate image. Justification came through a variety of reasons such as the identified gaps in the global market and the emerging environmental challenges. The opportunities exploited were both market driven (covering the existing markets of the family business) and technology driven (innovativeness).

Bricolage capability is very strong. The successors appear keen to use all resources and abilities "at hand" in combinative ways to maximise results: existing codified and tacit knowledge, knowledge sources, strong existing networking cycles, capital resources and even the family firm's reputation among suppliers and customers. The successors invested mainly in technological knowledge to intervene in innovative ways in known processes focusing on ecological aspects, energy saving and recycling. In all cases, learning comes through conscious knowledge-generation, trial-and-error and experimentation. Interactive learning becomes a highly dynamic process:

"Our success depends on the knowledge gathered by our efforts and of course through the generation. There is an easy flow of information within us and to some extent, between generations" (Kostas).

Beta's *improvisational capabilities* are characterised by conscious and stable communication and interaction with the environment. Real-time information excelled the implementation and potential of the new technologies. Contacts are mainly formal but changes were free to be imposed by all team members. The case revealed certain dimensions of improvisational capabilities, such as diversity, a sense of urgency and flexibility, the promotion of experimentation and strong action. As Tasos said:

"I think we managed it well and we really went rather fast! It took us three to four years to formalize the initial idea, experiment, make the plant and improve the product. Initial plans were many times changed; I bet we were flexible. It was quite an adventure!"

Kostas narrates the constant bidirectional knowledge flow of both embodied and disembodied knowledge through skilled personnel, training, plant and equipment design, and description, consulting, experimentation, machinery and equipment.

Gamma can be considered the "weak" case. Insufficient panoramic ecosystem awareness is a result of not getting deeper knowledge of the business ecosystem and of being locked into narrow patterns of expectations. This weakness may have also created a feeling of insecurity and a hesitant prediction of market potential. Weak panoramic ecosystem awareness seems to be further co-responsible for the low post-succession innovation and mediocre business development. As Harris explained:

"Stelios worked with me for many years. However, he did not wish to study and he was reluctant to follow me at trade shows. But it was the same with me when I started. He is a fine carpenter and he likes design; he attended a private school here in Nicosia."

The panoramic ecosystem awareness was too weak to create preconditions for boosting innovation and creativity. Spaciousness was limited to a search for attractive design products and did not even extend to the exploitation of cutting-edge technology for the plant. This weak sense of

spaciousness led to poor bricolage and improvisational capabilities. Gamma's successors preferred to stay in the secure existing family business system and missed the opportunity to build a new vision and their ecosystem with their own rules. Furthermore, judgements concerned mainly problem-solving and led to mediocre and unsatisfactory plans. Data, stimuli and opportunities were tackled hesitantly and on the basis of former routines: "We asked ourselves, 'what would father do?' We actually asked him but e-commerce was all Greek to him!" (Anna).Afraid to expand, the actors became trapped in simply satisfying the current needs of the existing market, which actually offered no new unique advantage to the family firm. On the contrary, many customers turned to other firms since they were loyal mainly to the father. The successors were hesitant to risk an aggressive market entrance at national level, turn to new strategies or invest in building new competitive advantages.

Weak *bricolage capabilities* are evident. The successors rested on existing networks; this was not a choice (as in the case of Beta) but a consequence of their weak strategy. Furthermore, the pieces of information and knowledge collected were limited and insufficient for creative combinations. As Stelios said:

> "We thought of developing our own footprint based on eco-design but it was quite difficult to reach knowledge needed, and materials were too expensive to bring in Cyprus. So, we rejected the idea."

Both successors were too introvert and not particularly unconventional. They seemed to pursue the established procedures of the family business, which, however, could not fully support the business. The existing competitive advantages of the family business became obsolete in a very short time since they were not nurtured and developed in novel ways.

Gamma is a case of weak improvisation capabilities, where facts are not connected to creative actions "on the fly". They are exercised mainly in order to solve problems and overcome obstacles, but the successors appear to *fail to learn* while, in some cases, they could not even recognise failure. They seem unable to engage real-time information (for example, missed opportunities to individualise products in Limassol) or any type of flexibility. This is most evident in the ways they approach experimentation.

5   Discussion and Conclusions

This chapter examines how DECs contribute to widening successor knowledge bases and enhancing their entrepreneurial capacities for a successful succession, building on innovation. Succession is "not just changing the people, it's changing the system" (Leach and Bogod 1999, p. 191); therefore, it is a highly dynamic process which must provoke revolutionary change and innovation in order to be successful.

The chapter contributes to the family business literature mainly by introducing novel DECs, their measurement and their role in cases of succession and vice versa, to the DC literature by explicating the role of DECs in family business management. The findings imply that scholars should attempt to identify the DECs that allow family firms to engage in non-routine activities, improvisation and a flexible way of collecting and establishing knowledge assets and asset combinations in order to revitalise a family firm's operations and reorder its core capabilities to suit the new management system of the successors. In line with Bresciani et al. (2013), the new generation should develop the "necessary competencies to continue the family business". DECs are idiosyncratic and dependent on the particular characteristics of each family business and its culture, encourage innovation as an important strategic resource of successors to sustain existing and achieve new competitive advantages, have a significant impact on post-succession firm performance and shape a firm's DCs.

Another contribution of this study is to provide a clearer perspective of the managerial issues of the succession processes in family-owned firms. This is critical in competitive environments and those facing rapid change. The findings show that innovation and novel strategic orientation are crucial for the longevity of family businesses. They further indicate that a renewal and development of new type of business structures, novel procedures, and often a new entrepreneurial orientation of the successors is necessary and that DECs can support this.

According to the findings, DECs have a positive impact on diverse performance measures, indicating that they can indeed play a significant role in cases of family business succession and are strongly related to innovative performance. Alpha and Beta develop strong DECs, introduce important process and product novelties through time and create an

innovative culture. They take advantage of multifaceted global knowledge and former experience, and innovate by offering patented products and processes, highly differentiated products with unique characteristics, or even novel business models. Their DECs are also related to export orientation and high performances, even during periods of economic crisis. Furthermore, DECs seem to maintain and strengthen these firms' fit with their changing environment during the sensitive phase of succession, not only with regard to their current family business practices but also in terms of their successful operation under the new management and culture.

The Gamma case reveals that weak DECs are partly due to human capital and resources, including specific attitudes towards the family business. In this case, transcendental synthesis was poor, mainly due to very low spontaneity and judgement. Indicatively, knee-jerk reactions and unreasonable grounding led to false decisions, such as the challenge of eco-furniture, which was abandoned; the successors chose to stay in the family business cocoon.

Transcendental capabilities seem to be responsible for the repositioning of the family business within the business ecosystem and its dynamism. Weak transcendental capabilities result in many inconsistencies regarding competitive advantages, instability in strategies and incapability in communicating novelties. Insufficient panoramic ecosystem awareness affects initial core choices regarding area of activation (spaciousness), limiting innovativeness and choices.

Bricolage capability, composed mainly by dynamic "knowledge-repertoire" creation and networking, has a significant role; the two cases with strong bricolage capabilities exploit the existing networks of the family business and stretch these further in new areas and directions which extend sectoral borders.

Innovative attitude and the underpinnings of new product development can be assigned to the significant improvisation capabilities of Alpha's and Beta's successors. A major aspect of the capability is the provision of retrospective interpretation and the creation of new patterns regarding products, processes, targeted markets or models, and the capacity to create information flows between family members, employees, suppliers and other stakeholders. Flexibility within the improvisational

capability allows agents to respond to a variety of both unexpected demands and opportunities within a dynamic and uncertain environment during succession by promptly committing resources to the emerging challenges and by overcoming the liabilities of the established family business culture. It should be noted here that it is not intended that the family business strategy is not a successful one before succession; the focus is on the necessity of strategic reorientation due to the significant internal changes which unavoidably cause instabilities in the firm's business ecosystem. Thus, the successors purposefully cultivate provocative organisational competencies. The persistent tendency for learning and experimenting is also evident.

Finally, an implication for family businesses emerging from this study would be to start early in drawing up a DEC portfolio ready for the time of succession. This concerns a variety of factors such as successors' education and outside work experience, involvement in the family business decision-making, panoramic ecosystem awareness cultivation and openness of mind. Such culture would facilitate the renewal and strategic reorientation as a means of responding effectively to the changing conditions prevailing in family business succession. In addition, DECs facilitate the translation of knowledge into innovation and consequently growth and longevity.

There are certain limitations in this study, such as the method used, the small size of the sample, and the lack of homogeneity of the cases that do not allow for generalisations. Results may also vary in terms of the sector, the market and the national context, among others. These limitations could be also seen as fruitful avenues for further research. Empirical studies could test the DEC framework on large samples in different contexts.

Besides limitations, it appears that successions in family-owned firms are far more volatile and critical than commonly thought. Therefore, DECs can have a significant role to play in such events: they can ensure survival and growth in sales and innovation. The equally strong development of bricolage, improvisational and transcendental capabilities can assist the creation of strong initial competitive advantages for successors to make their formal debut in the family business, innovate and achieve a high level of performance.

References

Baker, T., Miner, A. S., & Eesley, D. T. (2003). Improvising firms: Bricolage, account giving, and improvisational competency in the founding process. *Research Policy, 32*(3), 255–276.

Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management, 17*(1), 99–120.

Barrett, F. (1998). Creativity and improvisation in jazz and organizations: Implications for organizational learning. *Organization Science, 9*(5), 543–555.

Benavides-Velasco, C. A., Quintana-García, C., & Guzmán-Parra, V. F. (2013). Trends in family business research. *Small Business Economics, 40*(1), 41–57.

Bresciani, S., Thrassou, A., & Vrontis, D. (2013). Change through innovation in family businesses: Evidence from an Italian sample. *World Review of Entrepreneurship, Management and Sustainable Development, 9*(2), 195–215.

Chang, S. C., Lin, R. J., Chen, J. H., & Huang, L. H. (2005). Manufacturing flexibility and manufacturing proactiveness: Empirical evidence from the motherboard industry. *Industrial Management and Data Systems, 105*(8), 1115–1132.

Chelminski, P. (2007). A cross-national exploration of the potential cultural antecedents of organisational improvisation. *Journal for Global Business Advancement, 1*(1), 114–126.

Chirico, F., & Nordqvist, M. (2010). Dynamic capabilities and trans-generational value creation in family firms: The role of organizational culture. *International Small Business Journal, 28*(5), 487–504.

Ciborra, C. U. (1996). The platform organization: Recombining strategies, structures, and surprises. *Organization Science, 7*(2), 103–118.

Ciborra, C. U. (2002). *The labyrinths of information*. Oxford: Oxford University Press.

Daspit, J. J., Holt, D. T., Chrisman, J. J., & Long, R. G. (2016). Examining family firms succession from a social exchange perspective: A multiphase, multi-stakeholder review. *Family Business Review, 29*(1), 44–64.

Daspit, J. J., Chrisman, J. J., Sharma, P., Pearson, A. W., & Long, R. G. (2017). A strategic management perspective of the family firm: Past trends, new insights, and future directions. *Journal of Managerial Issues, 29*(1), 6–29.

De Massis, A. (2015). Family business and innovation. In D. B. Audretsch, C. S. Hayter, & A. N. Link (Eds.), *Concise guide to entrepreneurship, technology and innovation* (pp. 89–92). Cheltenham: Edward Elgar Publishing.

De Massis, A., Frattini, F., Pizzurno, E., & Cassia, L. (2015). Product innovation in family versus non- family firms: An exploratory analysis. *Journal of Small Business Management, 53*(1), 1–36.

Distelberg, B., & Blow, A. (2010). The role of values and unity in family businesses. *Journal of Family and Economic Issues, 31*(4), 427–441.

Eisenhardt, K. M.,. a., & Martin, J. A. (2000). Dynamic capabilities: What are they? *Strategic Management Journal, 21*(10–11), 1105–1121.

Gaitán-Angulo, M., Viloria, A., Robayo-Acuňa, P., & Lis-Gutiérrez, J. P. (2016). Bibliometric review on management of innovation and family enterprise. *International Journal of Control Theory and Applications, 9*(44), 247–253.

Helfat, C., Finkelstein, S., Mitchell, W., Peteraf, M., Singh, H., Teece, D., & Winter, S. (2007). *Dynamic capabilities: Understanding strategic change in organizations*. Malden: Blackwell Publishing.

Kahn, K. B., Barczak, G., Nicholas, J., Ledwith, A., & Perks, H. (2012). An examination of new product development best practice. *Journal of Product Innovation Management, 29*(2), 180–192.

Karagouni, G., & Caloghirou, Y. (2013). Unfolding autotelic capabilities in low-tech knowledge-intensive entrepreneurship. *Journal of International Business and Entrepreneurship Development, 7*(1), 21–36.

Leach, P., & Bogod, T. (1999). *Guide to the family business*. London: Kogan Page Publishers.

Lin, H. J. C. S. J., & Hou, J. J. (2014). An investigation of family business from the perspective of dynamic capabilities. *Web Journal of Chinese Management Review, 17*(1), 1.

Molly, V., Laveren, E., & Deloof, M. (2010). Family business succession and its impact on financial structure and performance. *Family Business Review, 23*(2), 131–147.

Nordqvist, M., Wennberg, K., & Hellerstedt, K. (2013). An entrepreneurial process perspective on succession in family firms. *Small Business Economics, 40*(4), 1087–1122.

Padilla-Meléndez, A., Dieguez-Soto, J., & Garrido-Moreno, A. (2015). Empirical research on innovation in family business: Literature review and proposal of an integrative framework. *Revista Brasileira de Gestão de Negócios, 17*(56), 1064.

Protogerou, A., and Karagouni, G. (2012). Identifying dynamic capabilities in knowledge—intensive new entrepreneurial ventures actors sectoral groups and countries, D1.8.2. AEGIS Project. Retrieved from http://www.wfdt.teilar.gr/papers/AEGIS_Deliverable_1.8.2.pdf

Sharma, P., & Chrisman, J. J. (1999). Toward a reconciliation of the definitional issues in the field of corporate entrepreneurship. *Entrepreneurship Theory and Practice, 23*(3), 11–27.

Sharma, P., Chrisman, J. J., Pablo, A. L., & Chua, J. H. (2001). Determinants of initial satisfaction with the succession process in family firms: A conceptual model. *Entrepreneurship Theory and Practice, 25*(3), 17–36.

Tàpies, J., & Fernández- Moya, M. (2012). Values and longevity in family business: Evidence from a cross-cultural analysis. *Journal of Family Business Management, 2*(2), 130–146.

Teece, D. J. (2007). Explicating dynamic capabilities: The nature and micro-foundations of (sustainable) enterprise performance. *Strategic Management Journal, 28*(13), 1319–1350.

Teece, D. J. (2011). Dynamic capabilities: A guide for managers. *Ivey Business Journal, 75*(2), 29–32.

Teece, D. J., Pisano, G., & Shuen, A. (1997). Dynamic capabilities and strategic management. *Strategic Management Journal, 18*(7), 509–533.

Urbinati, A., Franzò, S., De Massis, A., & Frattini, F. (2017). Innovation in family firms: A review of prior studies and a framework for future research. In A. Brem & E. Viardot (Eds.), *Revolution of innovation management* (pp. 213–246). London: Palgrave Macmillan.

Vera, D., & Crossan, M. (2005). Improvisation and innovation performance in teams. *Organization Science, 16*(3), 203–224.

Yin, R. K. (2009). *Case study research: Design and methods* (4th ed.). Thousand Oaks: Sage.

Zellweger, T., & Sieger, P. (2012). Entrepreneurial orientation in long-lived firms. *Small Business Economics, 38*(1), 67–84.

4

Corporate Social Responsibility and Corporate Reputation in Emerging Countries: An Analysis of the Peruvian Banking Sector

Edmundo R. Lizarzaburu and Jesús del Brío

1   Introduction

The present research examines the relationship between three factors: corporate social responsibility (CSR), corporate reputation (CR) and investor confidence, appraised in the context of emerging (developing) countries and circumscribed to the banking sector. For the general model of research, see Fig. 4.1. (del Brio J. and Lizarzaburu E. 2018)

The research model here presented is based on two theories: CSR and CR. In regard to the first, the hypothesis that provides the best theoretical support to this research conceives social responsibility from an instrumental approach (De Matos and Rossi 2006; Narwal and Sharma 2008; De Pelsmacker et al. 2006; Obermiller et al. 2009; Roman and Cuestas

E. R. Lizarzaburu (✉)
Universidad ESAN, Santiago de Surco, Peru

J. del Brío
Universidad de Oviedo, Oviedo, Spain
e-mail: delbrio@uniovi.es
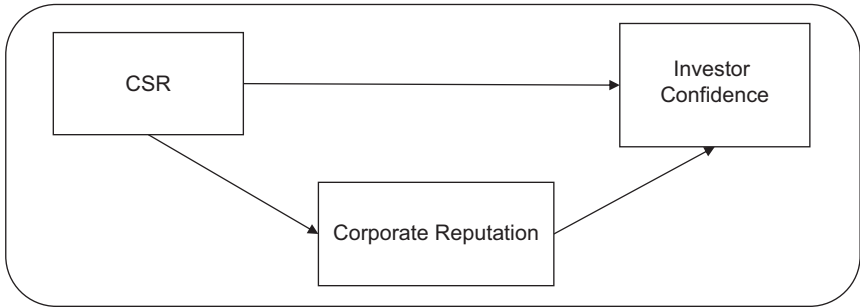
Fig. 4.1 General research model

2008; Sen & Bhattacharya 2001).[1] The authors of the instrumental school consider companies as instruments for wealth generation and their social activities as a means to achieve economic gain. Nowadays, organisations are settling for ethical and responsible performance to the extent to which it offers a competitive advantage. For CR, the relational school is the most appropriate to use to support this research. For CR, the relational school applies.[2] This approach argues that CR incorporates the perspectives of both the internal and external stakeholders of a company, as related to identity and image respectively (Davies and Miles 1998; Hatch and Schultz 2001).

A first approach to the study of the general model, or, in other words, to the assessment of the relationship between CSR and its effects on CR, was to conduct a case study applied to the Peruvian banking system. The analysis suggests the following seven propositions:

Proposition 1:
CSR could have a positive influence on investor confidence. (CSR and investor confidence are the variables related.)
Proposition 2:
If CSR involves the employees of the company, it could have a positive impact on investor confidence. (CSR and investor confidence are the variables related.)
Proposition 3:
CSR could have a positive influence on CR. (CSR and CR are the variables related.)

Proposition 4:

CSR aimed at rural areas outside the capital city could have a positive influence on CR. (CSR and CR are the variables related.)

Proposition 5:

CSR oriented towards strengthening the community's academic quality could have a positive influence on CR. (CSR and CR are the variables related.)

Proposition 6:

CR could have a positive impact on investor confidence. (CR and investor confidence are the variables related.)

Proposition 7:

CR could have a positive influence on investor confidence when the company demonstrates that environmental protection is part of their strategic plan. (CR and investor confidence are the variables related.)

These propositions are considered as hypotheses in this chapter and allow for the operationalising of the general model (see Fig. 4.1). Figure 4.2 exhibits the relationship between the variables described within the propositions.

This general model, with seven defined hypotheses, considers two effects. The first, called the direct effect of the CSR, studies the relationship between the CSR and investor confidence. The second, called the indirect effect of the CSR, examines how the CR variable moderates the impact of CSR on investor confidence. It has two stages: the first is to study the effect of CSR on CR; the second is to examine the impact of the latter variable on investor confidence.

This chapter incorporates the study of the first stage of the indirect effect of CSR (the relationship between CSR and CR). Future research will address other levels of CSR.

Figure 4.3 outlines the central variables of the study and the possible relationships between them. In the first place, CSR plans and actions undertaken by companies are expected to increase their reputation. On top of that, if those efforts focus on improving the rural area or education, CR would be positively influenced.
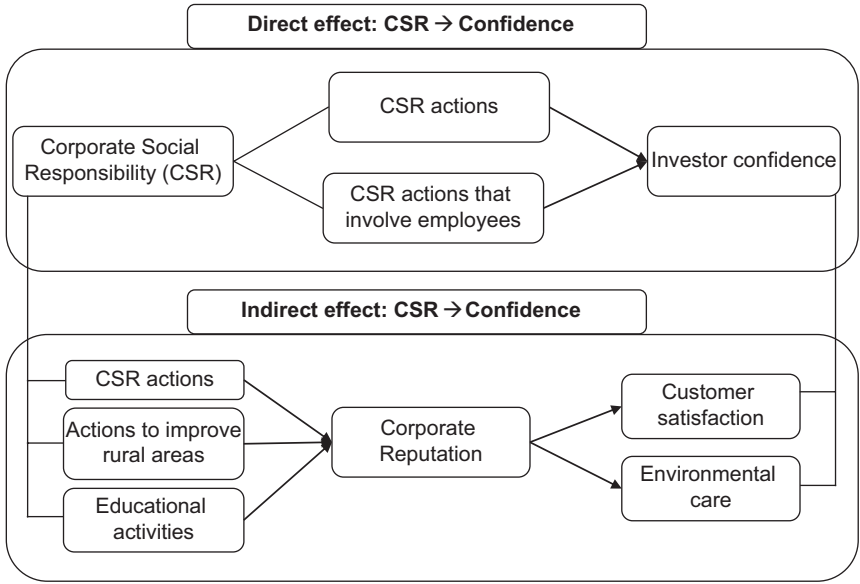
Fig. 4.2   General model of research with the propositions of the case study
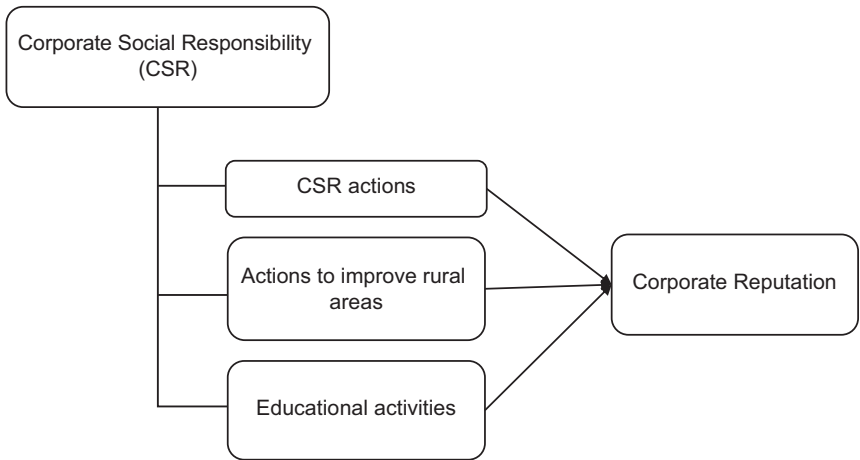
Fig. 4.3   Research model

The investigation model is in line with the literature. Throughout the review, the authors encountered multiple research studies on the relationship of CSR and CR (Knox and Maklan 2004; Parastoo et al. 2015). However, most of those findings focus on developed countries and productive sectors. Thus, they ignore the knowledge attainable from analysing emerging countries or the banking sector (Ruiz et al. 2014; Fombrun 2012), even though some of the available material on CSR and its effect on the CR that addresses the service industry confirm the positive relationship between them (Komodromos and Melanthiou 2014). Additionally, several economic theories prove the noteworthiness of CR in the strategic business process (Barney 1991). They concern the ability of this intangible resource to prompt both higher incomes and a sustainable competitive advantage, which may consequently lead to business success. According to these theories, CR is a valuable resource that is also difficult to imitate. It serves as an indicator of the quality of the managerial performance. It also plays a crucial role in times of crisis (Coombs 2007). Good CR provides a backup that diminishes the repercussions of market decline in times of uncertainty and economic turmoil (Jones et al. 2000). In general, studies of CSR and its effects on CR in emerging economies confirm that apart from the economic benefit it generates, it strategically places the company with their stakeholders, giving the organisation continuity and growth in the market (Valenzuela Fernandez et al. 2014).

In this context, this research studies the relationship between CSR and CR from a theoretical and empirical point of view, one different from those of previous studies. In the first place, not only the direct effect of CSR on CR is evaluated, but also the indirect effects of two moderating variables: customer confidence and satisfaction (Thorsten et al. 2003; Walsh et al. 2009a; Yoon et al. 2006; Ruiz et al. 2014; Roth et al. 2015; Helm et al. 2009; Walsh et al. 2009b; Levesque and McDougall 1996). Secondly, the study considers the context of developing countries, such as Peru, as well as the banking sector. The rural areas of different countries present essential challenges in their development due to globalisation, demographic change and rural migration. Policies focused on these zones should strengthen their competitive activities and create opportunities for growth. In reviewing the literature, the authors found that companies from various economic sectors have directed CSR efforts at initiating

programmes classified into three types: health and subsistence; infrastructure and environment; and education (Matten and Moon 2008; Schuler and Jackson 2006).

In fact, at the beginning of the new millennium, world leaders met at the United Nations to shape a broad vision for combating poverty in its many dimensions. This vision translated into eight Millennium Development Goals. These emphasised three areas: human capital, including nutrition, healthcare and education; infrastructure; and human rights (social, economic and political). Health is the most valued factor for people in rural areas, where there are significant deficiencies in development. Companies that act in favour of health can achieve an enhanced CR (Hambric 2007; Ouazi 2003). A second action involving rural areas is the construction of infrastructure primarily related to the environment (water supply and drainage, spill control, afforestation and reforestation). Thanks to the infrastructure actions, it is possible to develop further the areas where these actions are implemented, allowing part of the population to become future clients of the company, valuing their products more highly and also improving their judgement of the organisation's management quality and business leadership (Matten and Moon 2008; Schuler and Jackson 2006).

2   CR Theory

The literature suggests that stakeholders have multiple interests and expectations that need to be satisfied. Therefore, CR depends on whether the actual experiences, which arise from the degree of compliance of the commitments assumed by the company, exceed these expectations.

In this regard, the company must consider within its strategic planning the principles that will lead the relationship with its stakeholders. After identifying the interests of the stakeholders, the company management must internalise them into the CSR plans. These actions will improve the perception of the stakeholders of the company, which will lead to a better CR. In line with the above, the CR will be the result of the company's performance against its commitments and, additionally, the opinion of the stakeholders on the matter. On that account, the business must align CSR with its objectives, declared values, behaviour and the expectations of the stakeholders.

According to Chun (2005), it is possible to identify three types of schools of thought about CR: evaluative; impressive; and relational. The main difference between these schools lies in the stakeholders that are taken as a focal point when assessing the reputation of the organisation.

The evaluative and impressive schools are concerned mainly with the interests of a single stakeholder (Barney 1991; Hall 1992; Grant 1995; Sabate and Puente 2003; Lucey and Dowling 2005; Balmer 1997; Brown et al. 2005; Dowling 2006; Yoon et al. 2006; Weiss et al. 1999; Dutton et al. 1994). In contrast, the relational school is founded on the theory of stakeholders, which recognises multiple stakeholders and their different perceptions of the company (Clarkson 1995; Freeman 1984; Davies and Miles 1998; Hatch and Schultz 2001).

3 Types of Actions of CSR

3.1 CSR Actions Related to the Environment

The concern for environmental care has grown over the past three decades at an accelerated pace. This concern has not only spread in the academic community but has also influenced political and business circles.

In this context, the companies, in their quest for the maximisation of benefits, have considered CSR as a competitive advantage to differentiate themselves from their peers in the market on the environmental issue. For this purpose, environmental management systems are tools for competitive advantage that respond to the burgeoning pressure of either the public, employees or any other individual or entity affected by the activity of a company. To date, most of the companies report voluntarily on their environmental performance to meet the demand of their stakeholders: investors, community, consumers, clients and employees.

Stakeholders interested in the environmental activities of CSR include the following:

- Investors: Banks, stock markets or insurance companies need to know of the additional capital expenditure that are necessary to comply with upcoming regulations, as well as of the potential environmental liabilities and their effect on financial operations.

- Local communities: The communities want to understand the environmental impact of the operations of the companies in their territory. They also have the power to support or reject their activities.
- Consumers: Consumers want information on the impact and effects of the products they buy. Sometimes, the consumer may choose a more expensive product just because it is considered more environmentally friendly.
- Clients: Companies want to gain the trust of their customers by showing they have an environmental policy and an adequate structure for information disclosure.
- Employees: Employees like to know that the company they work for is clean and transparent.

The preceding analysis suggests that the actions of CSR aimed at strengthening the environment will impact on the perceptions of various stakeholders, which may result in an improved CR.

4   CSR and Related Variables

4.1   CSR and CR

CSR is part of a value-generation cycle in which companies generate reputation capital, manage reputational risk and also improve their performance. Organisations invest in CSR because of the reputational wealth it creates. Later on, it is used for a dual purpose: as a launchpad for future and opportunities; and for keeping current assets safe by acting as a buffer against losses. Additionally, CSR programmes provide consistency for value-generating cycles while mitigating reputational risk. The effects of the relationship between CSR and CR, following Knox and Maklan (2004), Parastoo et al. (2015), are:

- Increase in profits: client affinity, innovation and customer retention.
- Reduction in profits risk: volatility of profits, growth strategies.
- Reduction in cost-related risk: ecological, social and employment.
- Reduction of cost: employee retention, and waste and energy.

Multiple authors propose a conceptual model that allows researchers to anticipate the image formation process of CSR. The model considers three direct antecedents of CSR image: company–CSR coherence; motivational attribution; and corporate credibility.

The authors base their theory on the seminal work of Rifon, Choi, Trimble and Li (2004), who propose a causal model that explains the effect of company–CSR coherence, the attribution of business motivations to participate in CSR and corporate credibility. These are based on the customer attitude towards the CSR activities carried out by the company. Additional research from Yoon, Gürhan-Canli and Schwarz (2006) highlight the role of suspicion and the perceived sincerity of the company's motives for the success of CSR campaigns.

The results of the study confirm the value of the participation of a company in the sponsorship of CSR initiatives. Customers must perceive those as: (1) consistent with the activities and the products of its core business (company–CSR coherence); (2) altruistic (attributed to their motives); and (3) credible (corporate credibility). All of these can influence CR.

However, the authors found three limitations in this study. First, the review was based on a laboratory experiment, so customer perceptions of the actual market are not evaluated. Second, it considers only the reliability of the model regarding the marketing of tangible products, not services. Third, possible moderating effects on the formation of the CSR image are ignored. That is to say, it ignores demographic characteristics such as gender, age or educational level in determining knowledge of CSR, attitudes and behaviour. On the other hand, Lorenz (2012) suggests that CSR contributes to reputation, but not always in a positive way. That is to say, some believe CSR has an immediate effect, but instead often fails when this is the only purpose of applying it. According to this author, CR is one of the most valuable intangible assets which also is directly related to financial performance.

In addition, reputation is the main reason for performing CSR activities (Eisenegger and Schranz 2011). There are four aspects that ought to be considered for CSR to have an impact on reputation. Lorenz (2012) mentions them as follows. First, stakeholders must be aware of the efforts of CSR. This variable depends on the company's communication strategy

(Bortree 2009). Second, the company should have either a positive or neutral reputation by the time CSR is applied. If such is not the case, CSR actions will not seem legitimate (Pfau et al. 2008). Third, the CSR programme has to be believable—this variable also depends on communication. Fourth, the plan must offer a situation where everybody wins and should also be perceived clearly (Suchanek 2008).

Along the same lines, Mattera and Baena claim that CSR indeed has an impact on CR. They also consider CSR one of the most significant factors in business management because it strengthens company legitimacy and reputation, builds a competitive advantage and reduces both operational costs and the risks inherent to the company. On top of that, CSR achieves a substantial profit when the stakeholders' needs are carefully managed. Stanaland (2011) reinforces the arguments of Mattera and Baena (2012), arguing that commitment to CSR delivers higher levels of loyalty and trust among the company's customers, which helps build a competitive advantage. Wei, Wang and Zhu (2014) comment that CSR events significantly affect social reputation in the short period subsequent to the first CSR event and that thereafter social reputation grows slowly.

4.2   CSR and Client Satisfaction

The literature suggests that there is a relationship between CSR and client satisfaction (Bigne et al. 2011; He and Li 2011; Luo and Bhattacharya 2006). Furthermore, Luo and Bhattacharya (2006) mention three points that reinforce the basis of such a relationship. The first affirms that customers, who may be potential stakeholders, are not only interested in a company's financial strength. They also expect the products and services delivered to the society to convey the message that the company is socially responsible (Maignan et al. 2005; He and Li 2011).

The second point indicates that a significant presence of CSR in shaping a favourable corporate image for the company. It also strengthens the consumers' assessment of the behaviour of the company (Sen and Bhattacharya 2001; Bhattacharya and Sen 2003).

Finally, the third finding is a consensus on the idea that the perception of a company being socially responsible is one of the key agents influencing customer satisfaction (Luo and Bhattacharya 2006; Mithas et al. 2005).

4.3   CSR and Confidence

The literature on the subject reveals that trust is positively affected by CSR (Ball 2004; Kennedy et al. 2001; Swaen and Chumpitaz 2008). This statement correlates with any client impressions that ethical and socially responsible businesses stimulate and strengthen their bonds with customers based on confidence. These are in turn founded on the belief that all the commitment actions among participants (stakeholders) will be credible beyond any legal or contractual restriction (Swaen and Chumpitaz 2008; Morgan and Hunt 1994; Brown and Dacin 1997). Furthermore, Pivato et al. (2008, p. 5) claim that the building of confidence is one of the most valuable outcomes of the planning and execution of CSR. Additionally, the repercussions on financial strength are perceived more immediately.

5   Research Gap

The literature review leads to three significant conclusions. The first implies that CSR could have a positive impact on a company's reputation (Ingram 1978; Klassen and McLaughlin 1996; Newgren et al. 1985; Brown and Perry 1994; Graves and Waddock 1997; Hill and Hansen 1991; Wright and Ferris 1997; Bromiley and Marcus 1989; Moore 2001). The second conclusion indicates that CSR not only has a direct impact on CR (Walsh and Beatty 2007; Boshoff 2009; Bravo et al. 2009; Chen and Chen 2009; García de los Salmones et al. 2009; Walsh et al. 2009a, b; Bravo et al. 2010, Hung 2002; Walsh and Wiedmann 2004; Schwaiger 2004; Helm 2005; Fombrun et al. 2000; Sen and Bhattacharya 2001; Martin et al. 2006; De Quevedo et al. 2007; Highhouse et al. 2009), but also influences customer confidence and satisfaction, thus creating two indirect effects (Thorsten et al. 2003; Walsh et al. 2009a; Yoon et al. 2006; Ruiz et al. 2014; Roth et al. 2015; Helm et al. 2009, Walsh et al. 2009b; Levesque and McDougall 1996). These two variables (customer confidence and satisfaction) could be further analysed to complement the current studies and can be regarded as moderating variables of the CSR–CR relation. The third conclusion exposes the main rationale

following a company's motivation to plan and execute CSR and improve its level of CR. This is because these factors will yield a higher economic benefit (Ingram 1978; Klassen and McLaughlin 1996; Newgren et al. 1985; Brown and Perry 1994; Graves and Waddock 1997). Despite this, there are no studies that quantify the impact of either CSR or CR on an organisation's benefits, nor any assessing the relationship between the two on business gains. This finding also represents a line for future investigation.

6   Methodology and Results

6.1   Methodology

In Peru, according to the monetary authority (Banco Central de Reserva del Peru), financial intermediaries are sub-divided into two groups: deposit societies and other financial firms. The deposit companies and the other financial firms altogether make up the Peruvian financial system. In this investigation, all the financial intermediaries that belong to other deposit companies and the Entidad de Desarrollo para la Pequeña y Micro Empresa or Development Entity for Small and Micro Enterprise (EDPYMES) are considered as the study sample. For the examination, we will use the correlations (a bivariate analysis that measures the strength of association between two variables and the direction of the relationship) between the Spain company, Monitor Empresarial de Reputación Corporativa (MERCO) reputation variable and the financial variables for the companies in the financial system. A quantitative methodology was used to contrast the hypotheses previously presented. The most relevant characteristics of the quantitative methods are the following (McCutcheon and Meredith 1993; Meredith et al. 1989):

(a) It seeks systematic, verifiable and comparable, measurable and replicable knowledge.
(b) Its fundamental concern is the search for efficiency and an increase in the body of knowledge.
(c) It follows a hypothetical-deductive methodology.
(d) Reality is observable, measurable and quantifiable.

(e) It is part of a significant sample to generalise the results.
(f) The objective of the research is the prediction, control, description, confirmation and verification of hypotheses.

This quantitative methodology involved empirical research established with the directors of the Association of Banks of Peru. The directors provided us with the data of the banks that were operating in January 2016 in Peru (a total of 17) as well as the contact data for the 1745 people occupying managerial positions in the branches of these banks. These 1745 are the target population of the study to whom we sent the questionnaire. The field work finished with 112 valid responses (6.41%). The expression $n = \dfrac{Z^2 \times N \times p \times (1-p)}{(N-1) \times e^2 + e^2 \times p \times (1-p)}$ was used to calculate the sampling error. N stands for the population size (1745), n is the sample size (112), Z at a confidence level of 95% takes the value of 1.96, and P is the population that holds the characteristic. As it is unknown, the authors bet on the worst case, where $p = q = 0.5$, and e is the sampling error, the variable to calculate. After applying the formula, the resulting error rate was 0.0896. The error rate is high because the response rate was low, though errors below 0.1 are still statistically acceptable.

6.2   Analysis and Results

To measure the actions of health and subsistence in the rural area, we have taken as a reference studies (Droppert and Bennett 2015; Dutta and Durgamohan 2008) where it is clear that the determinants of the actions developed in the rural area focused on health are the quantity of such activities, their importance, their impact (mainly a positive increase in the actions carried out) and the amount invested in these programmes. Based on this work, we have asked about four items rated on the Likert scale (1–5): (1) importance of CSR actions in health in rural areas, where 1 is not important and 5 is very important (IMPORTANCIASALUD); (2) number of CSR actions in rural health, where 1 is few actions and 5 is many actions (CANTIDADSALUD); (3) level of social impact in CSR actions on health in rural areas, where 1 indicates low impact and 5 indicates great impact (IMPACTOSALUD);

(4) investment in CSR actions that improve the rural environment in the health sector, valued at 1 for little investment and 5 for significant investment (INVERSIONSALUD).

The following group of questions refers to actions in the rural sphere dedicated to infrastructure and the environment. To measure these actions, we have taken as a reference an empirical study [22] which has analysed the importance of activities related to this subject. From this work, we have asked about four items rated on the Likert scale (1–5): (1) importance of CSR actions in environmental infrastructure in rural areas, where 1 is not important and 5 is very important (IMPORTANCIAMA); (2) number of CSR actions in environmental infrastructure in rural areas, where 1 is few actions and 5 is many actions (CANTIDADMA); (3) social impact level of CSR actions on the environment in rural areas, where 1 indicates low impact and 5 indicates high impact (IMPACTOMA); (4) investment in CSR actions that improve the rural environment, valued at 1 for little investment and 5 for significant investment (INVERSIONMA).

The third group of questions refers to CR actions. The literature on corporate reputation research suggests that there are several factors and determinants (dimensions) that explain a company's reputation: a) the quality of management / managerial ability and business leadership; b) the outward image; c) customer satisfaction; d) stakeholder confidence (Brammer, Brooks and Pavelin, 2006; Lee, 2017). Following the CR dimensions described, we have asked for the importance of perceived quality of management and corporate leadership (RCGESTIÓN); the outward image (RCIMAGEN); customer satisfaction (RCSATISFACCIÓN); stakeholder confidence (RCCONFIANZA). These variables were appraised on the Likert scale (1-5).

In the analysis of the banking system we obtained the following propositions:

• There is a positive correlation between the global capital ratio[3] and the reputation; this indicates that when banks have a higher capital cushion that will enable them to face potential contingencies, the economic agents perceive that the bank is solvent, thereby strengthening its CR.

- There is a negative correlation between indicators of deteriorating loan portfolio quality and CR. In particular, if a bank presents defaults on their credits in foreign currency, then their reputation will be negatively affected. This fact indicates that economic agents value a bank whose placements (credits) aim at sectors with low credit delinquencies, which will strengthen CR.
- There is a strong correlation between profitability and CR. It is sustained by an average of 55% of the coefficient for three years (2012–2014), which represents the Annualised Net Income ratio/ Average Equity with the reputation measured by MERCO. The previous suggests that stakeholders value banks that yield profit, which consequently enhances their CR.

7   Conclusions

The research helps us to understand that the financial entities should identify their most valuable stakeholders to mitigate potential risks. The community, customers and the government are, at the beginning, the most critical stakeholders in emerging economies. In emerging countries, CSR actions focus on rural areas and, in these areas, the community needs education, health and infrastructure. Throughout the research, the authors showed the positive influence of a manager's perception of CSR actions directed to health and subsistence in rural zones over the perception of the Peruvian banking sector's CR, supported by other theoretical contributions and empirical studies. It has not been possible to validate the effect of CSR actions oriented towards infrastructure and environment over the Peruvian baking sector's CR. This is, perhaps, because environmental care is relevant to a lesser degree in emerging economies. Besides, this research could establish a model for relations between CSR and CR, so that it can be applied in other countries and in other economic sectors, such as mining, or other industries that consider both the CR and the stakeholder impact important.

Notes

1. In literature, the theories of corporate social responsibility show four common dimensions (Garriga and Melé 2004): benefits, political action, social demands and ethical values. The theory can therefore be classified in four blocks according to the emphasis that each theory puts on any of the four dimensions: instrumental theories, political theories, integrative theories and ethical theories.
2. Besides the relational school, there are two schools that study corporate reputation: the evaluative and the impressive.
3. Measured as the effective equity between risk-weighted credit assets and contingencies, operational and market. document: had the assistant Celeste Gaspar and Miguel Alegre from Esan University and InveXtiga.

References

Ball, A. (2004). A sustainability accounting project for the UK local government sector? testing the social theory mapping process and locating a frame of reference. *Critical Perspectives on Accounting, 15*(8), 1009–1035.

Balmer, M. T., & Van Riel, C. B. M. (1997). Corporate identity: The concept, its measurement and management. *European Journal of Marketing, 31*(5), 340–355. https://doi.org/10.1108/eb060635.

Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management, 17*(1), 99–120.

Bhattacharya, C. B., & Sen, S. (2003). Consumer-company identification: A framework for understanding consumers' relationships with companies. *Journal of Marketing, 67*(2), 76–88.

Bigne, R., Rivera, J. J., & Curras-Perez, R. (2011). Effects of corporate social responsibility perception on consumer satisfaction with the brand. *Spanish Journal of Marketing – ESIC., 20*(2), 104–114.

Bortree, D. S. (2009). The impact of green initiatives on environmental legitimacy and admiration of the organization. *Public Relations Review, 35*(2), 133–135.

Boshoff, C. (2009). A psychometric assessment of an instrument to measure a service firm's customer-based corporate reputation. *South Africa Journal of Business Management, 40*(2), 35–44.

Boulouta, I., & Pitelis, C. N. (2014). Who needs CSR? The impact of corporate social responsibility on national competitiveness. *Journal of Business Ethics, 119*(3), 349–364.

Brammer, S., Brooks, C., & Pavelin, S. (2006). Corporate social performance and stock returns: UK evidence from disaggregate measures. *Financial Management, 35*(3), 97–116.

Bravo, R., Montaner, T. & Pina, J. (2009). *La imagen corporativa de la banca comercial. Dife- rencias entre segmentos de consumidores*. Universia Business Review, Primer Trimestre, 66–83.

Bravo, R., Montaner, T., & Pina, J. M. (2010). Corporate brand image in retail banking development and validation of a scale. *The Service Industries Journal, 30*(8), 1199–1218.

Bromiley, P., & Marcus, A. (1989). The deterrent to dubious corporate behavior: Profitability, probability and safety recalls. *Strategic Management Journal, 10*(3), 233–250.

Brown, B., & Perry, S. (1994). Removing the financial performance halo from fortune's "Most Admired" companies. *The Academy of Management Journal, 37*(5), 1347–1359.

Brown, T. J., & Dacin, P. A. (1997). The company and the product: Corporate associations and consumer product responses. *Journal of Marketing, 61*(1), 68–84.

Brown, W. O., Hellanda, E., & Smith, J. K. (2005). Corporate philanthropic practices. *Journal of Corporate Finance, 12*(5), 855–877.

Chen, J. K., & Chen, I. S. (2009). Corporate reputation measurement for the privately run banking industry in Taiwan. *Global Journal of Business Research, 3*(2), 65–75.

Chun, R. (2005). Corporate reputation: Meaning and measurement. *International Journal of Management Reviews, 7*(2), 91–109.

Clarkson, M. B. (1995). A stakeholder framework for analyzing and evaluating corporate social performance. *The Academy of Management Review, 20*(1), 92–117.

Coombs, W. T. (2007). Protecting organization reputations during a crisis: The development and application of situational crisis communication theory. *Corporate Reputation Review, 10*(3), 163–176.

Davies, G., & Miles, L. (1998). Reputation management: Theory versus practice. *Corporate Reputation Review, 2*(1), 16–27.

De Matos, C. A., & Rossi, C. A. (2006). Consumer reaction to product recalls: Factors influencing product judgment and behavioral intentions. *International Journal of Consumer Studies, 31*(1), 109–116.

De Pelsmacker, P., Driesen, L., & Rayp, G. (2006). Do consumers care about ethics? Willingness to pay for fair-trade coffee. *Journal of Consumer Affairs, 39*(2), 363–385.

De Quevedo Puente, E., De la Fuente Sabaté, J. M., & Fombrun, C. (2007). Corporate social performance and corporate reputation: Two interwoven perspectives. *Corporate Reputation Review, 10*(1), 60–72.

del Brío, J., & Lizarzaburu Bolaños, E. (2018). CSR Actions in companies and perception of their reputation by managers: Analysis in the rural area of an emerging country in the banking sector. *Sustainability, 10*(4), 920.

Dowling, M. (2006). Communicating corporate reputation through stories. *California Management Review, 49*(1), 82–100.

Droppert, H., & Bennett, S. (2015). Corporate social responsibility in global health: An exploratory study of multinational pharmaceutical firms. *Globalization and Health, 11*(1), 1. https://doi.org/10.1186/s12992-015-0100-5.

Dutta, K., & Durgamohan, M. (2008). Corporate social strategy: Relevance and pertinence in the Indian context. Working paper, Available online: www.iitk.ac.in/infocell/announce/conversion/papers

Dutton, J. E., Dukerich, J. M., & Harquail, C. V. (1994). Organizational images and member identification. *Administrative Science Quarterly, 39*, 239–263.

Eisenegger, M., & Schranz, M. (2011). Reputation management and corporate social responsibility. In O. Ihlen, J. L. Bartlett, & S. May (Eds.), *The handbook of communication and corporate social responsibility*. Chichester: Wiley.

Fombrun, C. (2012). *Corporate reputation: The main driver of business*. Reputation Institute UK.

Fombrun, C., Gardberg, N., & Sever, J. M. (2000). A multi-stakeholder measure of corporate reputation. *The Journal of Brand Management, 7*(4), 241–255.

Freeman, E. (1984). *Strategic management: A stakeholder approach*. Boston: Pitman.

García de los Salmones, M. M., Pérez, A., & Rodríguez del Bosque, I. (2009). The social role of financial companies as a determinant of consumer behavior. *International Journal of Bank Marketing, 27*(6), 467–485.

Garriga, E., & Melé, D. (2004). Corporate social responsibility theories: Mapping the territory. *Journal of Business Ethics, 53*(1), 51–71.

Grant, R. M. (1995). *Contemporary strategy analysis: Concepts, techniques, applications* (6th ed.). Oxford: Wiley-Blackwell.

Graves, S., & Waddock, S. (1997). The corporate social performance–financial performance link. *Strategic Management Journal, 18*(4), 303–319.

Hall, R. (1992). The strategic analysis of intangible resources. *Strategic Management Journal, 13*, 135–144. https://doi.org/10.1002/smj.4250130205.

Hambric, D. C. (2007). Upper echelons theory: An update. *The Academy of Management Review, 32*(2), 334–343.

Hatch, M. J., & Schultz, M. (2001). Are the strategic stars aligned for your corporate brand? *Harvard Business Review., 79*(2), 129–134.

He, H., & Li, Y. (2011). CSR and service brand: The mediating effect of brand identification and moderating effect of service quality. *Journal of Business Ethics, 100*(4), 673–688.

Helm, S. (2005). Designing a formative measure for corporate reputation. *Corporate Reputation Review, 8*(2), 95–109.

Helm, S., Garnefeld, I., & Tolsdorf, J. (2009). Perceived corporate reputation and consumer satisfaction: An experimental exploration of causal relationships. *Australasian Marketing Journal, 17*, 69–74.

Highhouse, S., Brooks, M., & Gregarus, G. (2009). An organizational impression: Management perspective on the formation of corporate reputations. *Journal of Management, 35*(6), 1481–1493.

Hill, C. W. L., & Hansen, G. S. (1991). Are institutional investors mypic? A time series study of four technology driven industries. *Strategic Management Journal, 12*, 1–16.

Hung, C. J. F. (2002). *The interplays of relationship types, relationship cultivation and relationship outcomes: How multinational and Taiwanese companies practice public relations and organization-public relationship management in China.* Unpublished doctoral dissertation, University of Maryland, College Park.

Ingram, R. W. (1978). An investigation of the information content of social responsibility disclosures. *Journal of Accounting Research, 16*, 270–285.

Jones, G., Jones, B., & Little, P. (2000). Reputation as reservoir: Buffering against loss in times of economic crisis. *Corporate Reputation Review, 3*(1), 21–29.

Kennedy, M. S., Ferrell, L., & Thorne LeClair, D. (2001). Consumers' trust of salesperson and manufacturer: An empirical study. *Journal of Business Research, 51*(1), 73–86.

Klassen, R., & McLaughlin, C. (1996). The impact of environmental management on firm performance. *Management Science, 42*(8), 1199–1214.

Knox, S., & Maklan, S. (2004). Corporate social responsibility: Moving beyond investments towards measuring outcomes. *European Management Journal, 22*(5), 508–516.

Komodromos, M., & Melanthiou, Y. (2014). Corporate reputation through strategic corporate social responsibility: Insights from service industry companies. *Journal of Promotion Management, 20*(4), 470–480. https://doi.org/10.1080/10496491.2014.930284.

Lee, Y. K. (2017). A comparative study of green purchase intention between Korean and Chinese consumers: The moderating role of collectivism. *Sustainability, 9*(11), 1930.

Levesque, T., & McDougall, G. (1996). Determinants of customer satisfaction in retail banking. *International Journal of Bank Marketing, 14*(7), 12–20. https://doi.org/10.1108/02652329610151340.

Lorenz, B. W. (2012, October). *Does corporate social responsibility really contribute to reputation?* Speech presented at International Reputation Management Conference of Kadir Has University, Turkey.

Lucey, B. M., & Dowling, M. (2005). The role of feelings in investor decision-making. *Journal of Economic Surveys, 19*, 211–237. https://doi.org/10.1111/j.0950-0804.2005.00245.x.

Luo, X., & Bhattacharya, C. (2006). Corporate social responsibility, customer satisfaction, and market value. *Journal of Marketing, 70*(4), 1–18.

Maignan, I., Ferrell, O. C., & Ferrell, L. (2005). A stakeholder model for implementing social responsibility in marketing. *European Journal of Marketing., 39*(9/10), 956–977.

Martin De Castro, G., Navas López, J. E., & López Sáez, P. (2006). Business and social reputation: Exploring the concept and main dimensions of corporate reputation. *Journal of Business Ethics, 63*(4), 361–370.

Matten, D., & Moon, J. (2008). "Implicit" and "Explicit" CSR: A conceptual framework for a comparative understanding of corporate social responsibility. *Academy of Management Review, 33*(2), 404–424.

Mattera, M., & Baena, V. (2012). Corporate reputation and its social responsibility: A comprehensive vision. *Cuadernos de Estudios Empresariales, 22*(2012), 129–149.

McCutcheon, D. M., & Meredith, J. R. (1993). Conducting case study research in operations management. *Journal of Operations Management, 11*, 239–256.

Meredith, J. R., Raturi, A., Amoako-Gyampah, K., & Kaplan, B. (1989). Alternative research paradigms in operations. *Journal of Operations Management, 8*(4), 297–326.

Mithas, S., Krishnan, M. S., & Fornell, C. (2005). Why do customer relationship management applications affect customer satisfaction? *Journal of Marketing, 69*(4), 201–209.

Moore, G. (2001). Corporate social and financial performance: An investigation in the UK supermarket industry. *Journal of Business Ethics, 34*(3/4), 299–315.

Morgan, R., & Hunt, S. (1994). The commitment-trust theory of relationship marketing. *Journal of Marketing, 58*(3), 20–38.

Narwal, M., & Sharma, T. (2008). Perceptions of corporate social responsibility in India: An empirical study. *Journal of Knowledge Globalization, 1*(1), 61–79.

Newgren, K. E., Rasher, A. A., LaRoe, M. E., & Szabo, M. R. (1985). Environmental assessment and corporate performance: A longitudinal analysis using a market– determined performance measure. In L. E. Preston (Ed.), *Research in corporate social performance and policy.* (7 ed. (pp. 153–164). Greenwich: JAI Press.

Obermiller, C., Burke, C., Talbott, E., & Green, G. (2009). 'Taste great or more fulfilling': The effect of brand reputation on consumer social responsibility advertising for fair trade coffee. *Corporate Reputation Review, 12*(2), 159–176.

Ouazi, A. M. (2003). Identifying the determinants of corporate managers' perceived social obligations. *Management Decision, 41*(9), 822–831.

Pfau, M., Haigh, M., Sims, J., & Wigley, S. (2008). The influence of corporate social responsibility campaigns on public opinion. *Corporate Reputation Review: Special Issue: Globalization and Corporate Reputation, 11*(2), 145–154.

Pivato, S., Misani, N., & Tencati, A. (2008). The impact of corporate social responsibility on consumer trust: The case of organic food. *Business Ethics: A European Review, 17*(1), 3–12.

Parastoo, S., Sofian, S., Parvaneh, S., Sayyedeh, P. S., & Seyyed, A. S. (2015). How does corporate social responsibility contribute to firm financial performance? The mediating role of competitive advantage, reputation, and customer satisfaction. *Journal of Business Research, 68*(2), 341–350.

Rifon, N. J., Choi, S. M., Trimble, C. S., & Li, H. (2004). Congruence effects in sponsorship: The mediating role of sponsor credibility and consumer attributions of sponsor motive. *Journal of Advertising, 33*(1), 30–42. https://doi.org/10.1080/00913367.2004.10639151.

Roman, S., & Cuestas, P. (2008). The perceptions of consumers regarding online retailers' ethics and their relationship with consumers' general internet expertise and word of mouth: A preliminary analysis. *Journal of Business Ethics, 83*(4), 641–656.

Roth, L., Dyck, A., Lins, K., & Wagner, H. F. (2015). Do institutional investors drive corporate social responsibility? Internation evidence. *Journal of Financial Economics*. Paper presented to the 2nd Annual Financial Institutions, Regulation and Corporate Governance Conference, Rotman School of Management.

Rowley, T. (1998). A normative justification for stakeholder theory. *Business and Society, 37*(1), 105.

Ruiz, B., Esteban, A., & Gutiérrez, S. (2014). Reputación bancaria durante la crisis económica. Comparación entre las principales entidades financieras desde la perspectiva del cliente. *Universia Business Review, 43*, 16–34.

Sabate, J., & Puente, E. (2003). Empirical analysis of the relationship between corporate reputation and financial performance: A survey of the literature. *Corporate Reputation Review, 6*(2), 161–177. https://doi.org/10.1057/palgrave.crr.1540197.

Schuler, R., & Jackson, S. (2006). *Strategic human resource management* (2nd ed.). New York: Wiley-Blackwell.

Schwaiger, M. (2004). Components and parameters of corporate reputation – An empirical study. *Schmalenbach Business Review, 56*(1), 46–71.

Sen, S., & Bhattacharya, C. B. (2001). Does doing good always lead to doing better? Consumer reactions to corporate social responsibility. *American Marketing Association, 38*(2), 225–243.

Stanaland, A. (2011). Consumer perceptions of the antecedents and consequences of corporate social. *Journal of Business Ethics, 102*(1), 47–55.

Suchanek, A. (2008). Business ethics and the golden rule. Diskussionspapier-Nr. 2008-3, Wittenberg-Zentrum für Globale Ethik, Lutherstadt-Wittenberg.

Swaen, V., & Chumpitaz, R. (2008). Impact of corporate social responsibility on consumer trust. *Recherche et Applications en Marketing, 23*(4), 7–34.

Thorsten, B., Demirgüç-Kunt, A., & Levine, R. (2003). Law, endowments, and finance. *Journal of Financial Economics, 70*(2), 137–181.

Walsh, G., & Beatty, S. (2007). Customer-based corporate reputation of a service firm: Scale development and validation. *Journal of the Academy of Marketing Science, 35*(1), 127–143.

Walsh, G., Mitchell, V. W., Jackson, P. R., & Beatty, S. E. (2009a). Examining the antecedents and consequences of corporate reputation: A customer perspective. *British Journal of Management, 20*(2), 187–203.

Walsh, G., Mitchell, V. W., Jackson, P. R., & Beatty, S. E. (2009b). Examining the antecedents and consequences of corporate reputation: A customer perspective. *British Journal of Management, 20*(2), 187–203. https://doi.org/10.1111/j.1467-8551.2007.00557.x.

Walsh, G., & Wiedmann, K.-P. (2004). A conceptualization of corporate reputation in Germany: An evaluation and extension of the RQ. *Corporate Reputation Review, 6*(4), 304–312.

Wei, J., Wang, Y., & Zhu, W. (2014). Strategically manipulating social reputation by scheduling corporate social responsibility events. *Journal of Public Affairs, 14*(2), 116–129. https://doi.org/10.1002/pa.1516.

Weiss, C., Anderson, E., & Macinnis, D. (1999). Reputation management as a motivation for sales structure decisions. *Journal of Marketing, 63*(4), 74–89.

Wright, P., & Ferris, S. P. (1997). Agency conflict and corporate strategy: The effect of divestment on corporate value. *Strategic Management Journal, 18*(1), 77–83.

Yoon, Y., Gürhan-Canli, Z., & Schwarz, N. (2006). The effect of corporate social responsibility (CSR) activities on companies with bad reputations. *Journal of Consumer Psychology, 16*(4), 377–390.

5

Linking Motivational Leadership with Creativity

Alkis Thrassou, Dimosthenis Orfanos, and Evangelos Tsoukatos

1 Research Background and Aim

Leaders have long sought ways to enhance creativity in the workplace. A key element that could prepare the workplace to accommodate creativity that potentially leads to innovation is employee motivation (Amabile 1988). In this study, we investigate the effectiveness of hierarchy and leadership in motivating employees, and thus in enhancing and maintaining

A. Thrassou (✉)
School of Business, University of Nicosia, Nicosia, Cyprus
e-mail: thrassou.a@unic.ac.cy

D. Orfanos
WTG Engineering – EMEA Southern Hub, Global Service, Athens, Greece
e-mail: dior@vestas.com

E. Tsoukatos
Department of Accounting and Finance, University of Applied Sciences Crete (T.E.I. of Crete), Heraklion, Crete, Greece
e-mail: tsoukat@staff.teicrete.gr

creativity, which could pave the way for innovation in the workplace (Gilley et al. 2009). In this context, we review the various styles of leadership managers could adopt in order to motivate employees and foster creativity, as well as the ability of the hierarchy to keep employees motivated for creativity at a level that could yield innovation with the minimum efforts required (Obiwuru et al. 2011).

Provisionally defining the key terms, "leadership" is the ability of a person to stimulate people to want to share aspirations and strive to achieve common goals (Kouzes and Posner 1995). Whereas hierarchy applies mainly to large, complex tasks, these are split into a series of sub-tasks in which employees, superiors from various departments within an organisation and other stakeholders need to be involved (Jaques 1990). "Motivation" is the driver energising people, stimulating them to move in a certain direction and causing them to act in a specific and sustainable manner (Gilley et al. 2009). "Creativity" is the generation of novel and useful ideas concerning products, services or processes (Amabile 1983).

The motivation for creativity is important for employees so that they willingly carry out their jobs and feel creative and productive (Baek-Kyoo et al. 2013). Employee creativity is directly linked to productivity and thus it can be considered an economic source which can potentially raise living standards (Florida 2002). Businesses and organisations on the other hand, subjected daily to challenges emerging from the dynamic and challenging environment and fierce competition, need to maintain employee productivity (Baek-Kyoo et al. 2013). There are several creative solutions and strategies which prove to be effective for business problems, strategies and job processes (Ford and Gioia 2000; Taggar 2002). Creative outgrowth can vary from minor modifications to processes or product improvements to substantial improvements or breakthroughs and innovative products or processes (Mumford and Gustafson 1988; Bresciani et al. 2012, 2013a, b). Summing up, both employees and organisations directly benefit when motivation for creativity is achieved in the workplace.

With regards to the impact of leadership styles and hierarchy on employee motivation towards generating novel and creative ideas, Rosing et al. (2011) argue that a single leadership style is not sufficient to yield

creativity; instead, leaders should focus more on comprehensive leadership behaviour in order to help employees become creative. Herrmann and Felfe (2014) analyse a set of behaviours that reflect on a specific leadership style, such as transformational or transactional leadership. They argue that leaders' behaviour emerges from a solid sequence of steps the leader takes, and promotes targeted creativity in specific circumstances, which they term a "creativity technique".

The aim of this research is to assess the effectiveness of hierarchy and leadership styles in motivating employees in Greece to become more creative, and to assess the degree to which creative ideas generated actually materialise and lead to innovation (Zhou and Hoever 2014). In this context, the research establishes the theoretical foundations of the subject to generate and quantitatively and qualitatively test hypotheses, draw explicit conclusions that expand theoretical knowledge of the subject and identify managerial implications for practical implementation.

2   Theoretical Foundations of Motivational Leadership

Leadership has been given many definitions: "Leadership is the art of mobilizing others to want to struggle for the shared aspirations" (Kouzes and Posner 1995: 30); "Leadership may be considered as the process (act) of influencing the activities of an organized group in its efforts toward goal setting and goal achievement" (Stogdill 1950: 3); "Leadership is the art of influencing others to their maximum performance to accomplish any task, objective or project" (Cohen 1990: 9). The following sub-sections present the four styles of leadership identified most frequently in the literature—transactional, transformational, lateral and authentic—and their relationships with motivation and creativity.

2.1   Transformational Leadership

This style relates to merits such as self-completion, competence, esteem, integrity and being good at leading ethical turnarounds in organisations;

it thus tends to develop positive and ethical environments. Further, it fosters corporate social responsibility and treats its followers with respect (Toor and Orfi 2009). These merits are used to improve employee motivation so they perform above expectations and transform a typical workplace into an exciting one. This is achieved by creating an inspirational vision through which committed members in the hierarchical layers execute the transformation leadership plan in tandem and at all levels (Chebbi et al. 2013, 2017a). Gumusluoglu and Ilsev (2009) noticed the positive impacts which transformational leadership can yield on both the individual creativity of employees and on the organisational level.

Transformational leadership aims at self-efficacy and high employee performance (Walumbwa and Hartnell 2011). It has frequently been characterised as one of the most influential factors in deliberately motivating employees. Gong et al. (2009) further found a positive relation between transformational leadership and employee learning orientation, which led to employee creativity and self-efficacy.

Transformational leadership emerges when one or more employees engage with others (subordinates and superiors) in a way where they act as a team and strengthen each other's motivation, taking this to a higher level (Kuhnert and Lewis 1987). The relationship between superiors and subordinates has some mediating effects as regards personal safety, feelings and employee engagement on the job (Kahn 1990; May et al. 2004), and it affects employee energy and creativity (Kark and Carmeli 2009). Amabile (1998) and Gumusluoglu and Ilsev (2009) discuss the significance of the leadership effect as well as its influence on employee contribution and creativity, and the impact on innovation at the organisational level when combining collaboration, creative results and achievements. More recently, Vrontis et al. (2012) have investigated innovation in its contemporary strategic context, while Thrassou et al. (2018a, b) have taken it a step further to incorporate key strategic, marketing and management elements into a unified model on innovation; underlying this is the pivotal role of innovation across the organisational functions and processes. Overall, nonetheless, the effects specifically of transformational leadership on employee creativity which leads to innovation in the organisational development processes have received little attention (Birasnav et al. 2011; Gumusluoglu and Ilsev 2009).

Transformational leadership also shares common ground with authentic leadership, as both motivate intrinsically the employees towards creativity (Walumbwa et al. 2008); the element that transformational leadership needs if it is to approach authentic leadership is morality (Bass and Steidlmeier 1999).

2.2   Transactional Leadership

Transactional leaders provide extrinsic incentives, monetary and non-monetary benefits and recognition to their employees or followers (Bass et al. 2003). Hence, transactional leaders make sure the basic needs of the employees are fulfilled adequately. Thus, one could argue that the combination of transformational and transactional leaders can cover both the intrinsic and extrinsic needs of the employees respectively, and their combination to be the most suitable for the workplace. Furthermore, the indications are that this combination can easily yield employee motivation, which in turn can lead to creativity (Kaur 2012). According to Sosik et al. (1998), there is a positive relationship between transformational leadership and creativity, and several other studies from Wilson-Evered et al. (2001, 2004) have linked it with innovation in the workplace. Both creativity and innovation processes require management responsibilities and leadership (Hyypiä and Parjanen 2013). Hence it emerges that good and—equally importantly—appropriate leadership, in conjunction with effective management, is key to motivating employees for creativity and fostering innovation. In such a case, it is highly probable that the potential of the employees will be unlocked and will ensure that an organisation is empowered with the right strategy to head towards productivity and growth, with creative innovation at its epicentre, both in the strict organisational context and a wider, collaborative, "open" context (Rossi et al. 2013; Santoro et al. 2017).

2.3   Authentic Leadership

Unlike transformational and transactional types of leadership, authentic and lateral leadership styles are not so widespread, neither in practice nor in the literature. Authentic leaders are equipped with the elements of

rational transparency, self-awareness, internalised moral perspective and balanced processing (Walumbwa et al. 2008). Authentic leaders are aware of their strengths, weaknesses and personal traits, and use their knowledge and their personal traits to interact well with others. Rational transparency makes them reveal their true feelings and thoughts, and this makes their authenticity sustainable. Their intention is not to rule or command and show a direction to their subordinates; instead, they would rather build confidence in the people they lead to an extent which leads to the self-efficacy of both the leader and the follower. They radiate the positivism they possess, and enhance their subordinates with hope, resilience and optimism, hence helping them to overcome their weaknesses and focus on their strengths (Luthans and Avolio 2003). Via their inherent moral/ethical and positive elements, they stimulate their subordinates to operate in the same manner, and thus they build healthy relationships of trust with their followers.

Research has shown that leaders with these characteristics cultivate intrinsic motivation (Deci and Ryan 2000) and this often leads to higher job satisfaction and performance of the followers. Intrinsic motivation acts as an internal sustaining force which pushes the employee to face the challenges that lead to creative work (Gilson and Shalley 2004). On a similar note, Amabile et al. (2004) found that research and development professionals believe that intrinsic motivation is essential to their creativity. Followers often acknowledge the authenticity of their authentic leader and become authentic followers, identifying their own strengths and independently developing themselves (Avolio and Gardner 2005; Ilies et al. 2005; Gardner et al. 2005), and ultimately improving their performance and accomplishing more (George et al. 2007). During this process, the leader and the follower come closer and thus reinforce their relationship, focusing on merits and sharing ideas, information and feelings which help them achieve their goal (Kernis 2003). Via this solid and transparent relationship, the authentic leader stimulates the follower to become more creative and perhaps achieve innovation (Černe et al. 2013). Though leadership that motivates employees for creativity and innovation has intrigued researchers, the connection of these three principles, which include creativity and the implementation of creative ideas (Amabile 1988), has not been ascertained in adequate detail (Crossan and Apaydin 2010).

In a sense, authentic leaders tend to create a moral workplace that is characterised by transparency and in which conflicts are mitigated or resolved before they arise (Gagne and Deci 2005; Griffin et al. 2007). In this way, they add significant value to the workplace and absorb the negativism which might arise during conflicts. Further, they make sure this happens in a sustainable way, as via their skills they convert their followers from ordinary into authentic followers. As soon as the conversion of the followers to authentic ones is accomplished, authentic leaders focus on fostering autonomous and sustainable motivation (Deci and Ryan 2000). Autonomous motivation, however, is not the only element that can foster creativity and innovation, as there are more variables such as job anatomy and complexity (Amabile 1983; Shalley et al. 2000). Creativity inherently also involves some risks as well (Tesluk et al. 1997), which could be unforeseen, but this is part of a process that—by nature— necessitates trial-and-error solutions (Gilson and Shalley 2004).

2.4   Lateral Leadership

Lateral leaders have some similarities with the authentic leaders in the way they interact and motivate peers and subordinates for creativity. A characteristic of lateral leaders is that they utilise the skills of each member in a team so as to get things done in a successful and efficient way. They do not just rule or show the direction to their subordinate or followers; instead, they focus on teamwork that yields results. They first identify the skills they need to develop in order to get things done effectively, and then identify the way the group of people interacts and how they cooperate when they use their skills effectively and efficiently (Fisher and Sharp 2009). In modern organisations and workplaces, most of the conflicts that arise amongst employees are resolved amicably and do not require the involvement of superiors. In matrix organisations especially, the subordinate might have two superiors: a functional and (perhaps) a regional. Furthermore, the functional superior might be physically located in different geographic places (Sy and Côté 2004). In such cases in particular, lateral leadership facilitates the communication of each party so that there is a clear and shared understanding of each employee's position. Furthermore, it grants the employees the authority to operate

and interact effectively on the task to be carried out. It gives the employees the ability to share their knowledge, communicate and cooperate mutually with their peers, and engage in knowledge-sharing activities (Reinhardt et al. 2011; Vrontis et al. 2010).

According to Fisher and Sharp (2009), the incentives that motivate employees lie in the field of intrinsic motives. The employees acknowledge the true value of formulating a purpose for their tasks, and then start thinking systematically and learning from each other's experience and skills. They are self-engaged in the task and they tend to convert it from an ordinary to a challenging one. Intrinsic motivation becomes sustainable when each member in the team begins to give and receive feedback (Fisher and Sharp 2009), and in this way creative ideas may emerge. There are several studies that have revealed that creativity can be derived from teamwork and self-engagement. Gilson and Shalley (2004) found that teams who cooperate and strive to achieve the desired results are actively involved in the decision-making process; they socialise better with each other and support each other. In other words, they are able to build a sustainable environment where creativity can emerge. Furthermore, Gilson and Shalley (2004) found that team members' engagement level was higher in the creative process when they realised the significance of creativity and task interdependence for the jobs they had to carry out. Additionally, motivation must take place at all levels, while the CEO should focus on motivation of the top management team; building confidence, setting goals and developing empowerment and recognition should cascade through the organisation (Pearce et al. 2007).

Bligh et al. (2006) argued that creativity and innovation is highly likely to emerge when members of a team are self-encouraged to lead themselves in the first place and then mutually with their peers the team they are part of, to influence each other to define the problems, to agree on decisions for moving forward, and finally to solve problems and identify the potential for current or future opportunities and challenges. Nonetheless, this self-sustained form of leadership, which can be characterised as shared leadership, may have some flaws as well. There is an inherent lack of control in the team and a lack of a leader as a focal point (Herrmann and Felfe 2014). Furthermore, Treffinger et al. (1994) argue that employees might lack a sense of ownership of the task

they are involved in and instead consider it a task of the team. This could act as a counter-incentive for the employees and hinder creativity and innovation. There are, however, several advocates of lateral leadership, with some arguing that lateral leadership would be preferable over hierarchical leadership (Kozlowski and Bell 2003; Park and Kwon 2013).

3   Theoretical Conclusions and Research Hypotheses

The literature review indicates a positive relation of leadership and hierarchy with employee motivation for creativity in the workplace. Particular styles of leaders can stimulate employee perception of the relation between leader support with motivation and creativity. These leaders emphasise emotional as well as coordination support behaviours (Amabile et al. 2004). Coordination support equips the employee with the proper expertise in order to perform well, while at the same time the leader prompts employees' intrinsic motivation for creative work. With this instrument, the leader facilitates the employees with the tasks he/she has to carry out in a creative way (Amabile et al. 1996). With interpersonal support, the leader reveals his/her interest, empathy and consideration for the employee for the tasks he/she has to perform, which has been found to enhance employee creativity (Oldham and Cummings 1996; Amabile et al. 2004). Innovation support perception defines the degree to which, and the manner in which the employee understands and interprets his/her leaders' engagement to support him/her in coming up with novel ideas; the latter, in turn, leading to innovative solutions. This is directly linked with the leadership style. For instance, the rational transparency element that authentic leaders possess, as part of the self-regulation characteristic, evidently reveals to the employee the leader's true self (Gardner et al. 2005).

Hypothesis 1 *Superiors and leadership styles can create a positive environment in the workplace which can stimulate employee motivation for generating creative ideas that might lead to innovation.*

According to Fletcher and Käufer (2003), shared leadership stimulates team members to focus more on collaboration and act mutually with their peers, replacing a classic hierarchical format such as leader–follower cooperation. Furthermore, Pearce and Manz (2005) state that shared leadership is substantial for organisations which foster constant innovation so as to offer innovative products and services to their customers and thus remain competitive in a very dynamic environment. On the other hand, flexible organisations have the infrastructure to support creative ideas and innovation (Chebbi et al. 2017b). Based on Hyypiä and Parjanen (2013), the generation of ideas and innovation are quite likely to emerge from flexible and flat organisations, as they are more open to communication throughout the entire organisation. Hence, in this way, they cultivate an organisational culture which focuses on communication throughout the organisation, which fosters employee commitment to creativity and innovation across all organisational layers. Several research studies have also shown that transformational leadership has been categorised as a positive style, one which can increase employee motivation and innovation (Gumusluoglu and Ilsev 2009). Further, leadership can substantially influence the employees to collaborate better and become more creative, allowing the organisation to foster innovation (Amabile 1998; Gumusluoglu and Ilsev 2009).

Hypothesis 2 *Healthy cooperation amongst peers, superiors and subordinates, or in other words shared leadership, can yield sustainable creativity, which can lead to innovation.*

Effective cooperation amongst peers, superiors and subordinates can bring astonishing outcomes to the organisation. According to Bligh et al. (2006), the development of shared leadership can be effective when dealing with complex problems. Shared or lateral leadership has the ability to engage multiple employees with knowledge and skills on different sectors in order to solve a complex problem. In other words, teams with various skills, advanced knowledge and experience can replace the hierarchical superior with one of the members of the team, an individual mutually agreed on. Hence, they are not supervised by a hierarchical

superior, but by one member of the team. This set-up may lead to a powerful and successful type of leadership, which might yield motivation for creativity (Cox et al. 2003).

Transformational leaders critically affect employee creativity for two main reasons. First, leadership is important to fostering the individual traits that are critical for creativity, as well as the skills that are relevant to creativity and task motivation; in turn, these factors influence the level and frequency of employee creative behaviour (Amabile et al. 1996). Second, since leaders are empowered to manage rewards and sanctions, they ought to have the leadership behaviour to identify whether the creative ideas that employees come up with could potentially be beneficial, or instead could be costly and jeopardise the company (Detert and Burris 2007; George 2007). Leadership styles which motivate employees to act creatively by exploring new ideas support them during uncertain times, cultivate creative work and demonstrate to them that acting creatively is not so risky. Transformational leaders assess the individuality context and the unique perspectives (Bass 1985) and subsequently build an environment which encourages the employees not to fear and to feel comfortable with creative activities.

Hypothesis 3 *Healthy cooperation amongst peers, superiors and subordinates, or shared and transformational leadership can yield sustainable employee motivation for creativity.*

The development of employee problem-solving skills is an important element for contemporary organisations. It is often mentioned that organisations are not that effective in innovating independently and are often accused of having insufficient internal capabilities to face the challenges of the external dynamic environment, which is constantly changing (Hyypiä and Parjanen 2013). The nominated leader is usually an individual who promotes agility, rationality, systematic thinking and approaching problems cautiously. The leader approaches problems holistically before proposing potential solutions or guiding subordinates, and considers all perspectives. S/he then proposes new approaches for examining how to complete the tasks and encourages the re-evaluation of ideas

which had not been argued for properly in the past (Bass and Avolio 1994). In this way, the leader stimulates his/her subordinates to come up with creative ideas by questioning assumptions, re-evaluating problems and approaching old issues in new and perhaps innovative ways. Rank et al. (2009) found that transformational leadership has meditating effects on employees with low self-esteem, increasing their motivation and making them more innovative.

Hypothesis 4 *Superiors can guide subordinates to come up with creative ideas for solving problems they come across in their daily working life effectively and to overcome barriers that hinder innovation.*

Jaques (1990) argues that a managerial hierarchy is the most difficult, albeit efficient, structure that large organisations ever invented; in factual terms, it is the most common. Properly structured organisations in terms of hierarchy can motivate employees to come up with creative ideas, normalise productivity and improve morale. Furthermore, Jaques (1990) stresses that the mould in which organisations are cast in utilises people to work, and in order to utilise them effectively it employs a managerial hierarchy system. In this sense, organisations keep employees accountable to get the job done. Quite a few other mechanisms are presented in the literature, which charismatic CEOs could use so as to influence an organisation's performance. For instance, an inspirational and tangible vision could engage employees and various other stakeholders to increase their motivation level, as well as their commitment to serve the organisation even better (Shamir et al. 1993). Furthermore, when they demonstrate confidence in their employees' efforts and capabilities, CEOs could maximise motivation (House 1977). A solid identity—in other words, a strong brand—is a key element for organisational identification (Ashforth et al. 2008; Kreiner and Ashforth 2004) and is very likely to positively affect employee motivation for creativity (Shamir et al. 1993).

Hypothesis 5 *Properly structured organisations support employee motivation and facilitate the generation and consequently the implementation of creative ideas.*

4   Methodology, Analyses and Measurement Model

4.1   Methodology

Both qualitative and quantitative data have been employed for this research, with their combination providing more comprehensive analyses on the subject. Through the applied triangulation method, quantitative and qualitative data have been mixed so as to enrich the research analyses and the discussion of the research subject (Robson 2002; Tashakkori and Teddlie 2003).

Two types of questionnaire have been employed for the collection of the desired data. Both questionnaires have some demographic questions at the beginning for both the employee and the organisation. As regards the employee, gender, age, education level and job title, and years of employment, were the desired information; whereas for the organisation, the data collected concerned the number of employees, the nature and the sector of the business.

The closed type questionnaire featured the Likert scale (1–5) and it is intended to collect information on the correlation of leadership and hierarchy with the employee motivation for the generation of creative ideas, and whether these ideas might lead to innovative solutions. The open type questionnaire was unstructured and focused on in-depth analysis of the impact that hierarchy and leadership can have on employee motivation for creativity. The open type questionnaire employed open-ended questions; hence the respondents were given the opportunity to express their opinion and unfold their perceptions in a more detailed manner, giving the researchers the ability to obtain unique and more authentic answers (Tashakkori and Teddlie 2003).

The sample is purposive and is composed of 114 responses for both closed type and in-depth interview questionnaires. The sample consists of employees who are currently employed in multinational and large-scale companies, which operate in the sectors of construction, manufacturing and services. For practicality purposes, a convenient representative sample was chosen.

For the completion of this research we distributed the closed type questionnaires via the web so as to collect the quantitative data. In the meantime, several interviews were carried out for the collection of the qualitative data. The next stage, after the collection of the primary data, was to run statistical analyses on the responses of the closed type questionnaires via SPSS and align them with the measurement model. The demographics data analyses were carried out via Excel, and the results were stipulated in percentage format. Subsequently, the interrelation of the qualitative and quantitative data contributed significantly to the identification of common ground or divergent points between the two different types of data. In the discussion section, the analyses and comments reveal the relation of the findings and the results with the research hypothesis.

4.2   Analyses

The type of research analysis employed is convergent methodology, multi-trait (Campbell and Fiske 1959) or, according to Webb et al. (1966), triangulation. The quantitative data analyses have been carried out via SPSS statistical and Excel software. First, we measured the respondents and carried out a frequency analysis of the demographics data, so as to obtain the majority of the respondents' characteristics. We then carried out a factor and reliability analysis through SPSS so as to confirm the coherence and the quality of the quantitative data collected. The factor and reliability analysis helped create a research model for the analyses of the results; we employed a retrogression measurement model to test the research hypothesis. The main advantage of the retrogression technique is that it can reduce huge amounts of raw data into more actionable information, and with the aid of SPSS we also made sure that that quantitative data perfectly matched the model, and that the model was seamless.

Following the analysis of the quantitative data, we deployed and injected the qualitative data in order to reinforce the results from the quantitative data and the research hypotheses. Throughout this process,

it was quite likely that some divergent opinions might emerge as well. In both cases, the qualitative data are supported by the perception and the experience of people who are currently employed in businesses, and who understand how their leaders and organisations support motivation and creativity. For the collection of the qualitative data, we used ten questions which aimed to derive the perception and the views of the respondents on the research subject. The ten questions purposefully had common ground with some of the questions of the closed type questionnaire in order to achieve coherence between the qualitative and quantitative data, alignment of the qualitative data with the research model and alignment of results.

4.3   Demographics

One hundred and fourteen people who are currently employed in private businesses and the public sector participated in the study. The majority of the population has a high level of education (49%, 37% and 4% have had tertiary, postgraduate and PhD education, respectively), with the remaining 10% having had secondary education. Seventy-three percent are 'normal' employees, whereas 17%, 7% and 2% belong to higher levels (supervisors, managers and top management, respectively). The higher percentage of the respondents are male (68.5%). Fifty-two percent of the employees have been employed for more than 10 years in the current business, whereas the remaining percentage is equally shared (24%) by two groups: 1–5 and 6–10 years. Hence, they hold a good level of work experience and thus a good understanding of the distinct characteristics pertaining to motivation, creativity and leadership in their respective organisations. The majority of the respondents are employed in the private sector (84%), with the rest in the public sector. Most of the respondents are employed in the industrial sector (28.7%), while approximately 18% is evenly shared between construction and services. The remaining 27% is employed at other types of sectors. The majority of the respondents are employed in relatively large organisations (200+). Finally, the majority of the respondents, 77%, belong to departments which are

composed of 10–49 employees; 16% belong to bigger departments composed of 50–90 employees; the last 7% belong to large departments, which have 100–200 employees.

4.4   Descriptive Statistics

Factor and reliability analysis allowed the categorisation of the quantitative data, which in turn allowed the linkage of the dependent with the independent variables and led to more solid conclusions. Subsequently, retrogression analysis carried out via SPSS included the final group of the quantitative data, which is composed by the following elements: (1) creativity; (2) lateral-shared leadership; (3) hierarchy incentives; (4) hierarchy support; (5) hierarchy motivation; (6) leadership bridging gaps; and (7) leadership inspiration. These elements contain both dependent and independent variables examined in this research, with the SPSS analysis identifying the interrelation between these. The final step of data analysis was to enrich it with the qualitative data, so as to either reinforce the results from the quantitative analysis and the hypothesis or identify divergence.

4.5   Measurement Model

The model below (Fig. 5.1) emerged naturally from the research hypotheses as well as from both the quantitative and quantitative data. Initially, we checked the correlation between the dependent and un-dependent variables, based on the significance column in the coefficient matrix. In the first selection, "creativity" is the dependent variable and the predictors are "self-motivation", "hierarchy-motivation", "lateral leadership", "hierarchy supporting", "hierarchy incentives", "job satisfaction", "leadership bridging gaps" and "leadership inspiration" (see Table 5.1). In the second selection, the dependent variable is "job satisfaction", and the predictors are "hierarchy-motivation", "hierarchy supporting", "hierarchy incentives", "leadership bridging gaps", "lateral leadership" and "leadership inspiration" (see Table 5.2).
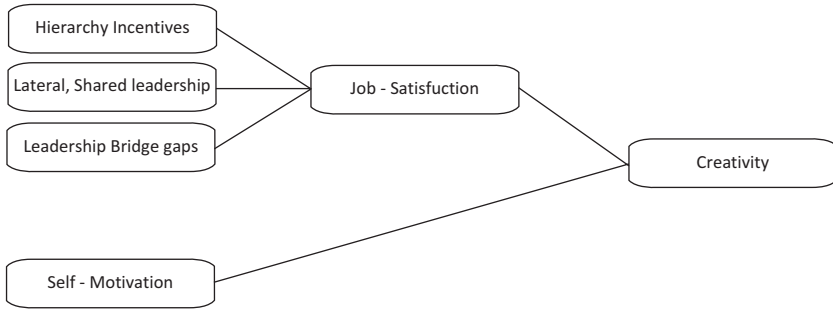
Fig. 5.1 The measurement model

Table 5.1 Creativity predictors and coefficients

Coefficients[a]		
Model[b]		Sig.
1	(Constant)	0.000
	Hierarchy motivation	0.223
	Hierarchy supporting	0.545
	Hierarchy incentives	0.791
	Leadership inspiration	0.621
	Leadership bridging gaps	0.225
	Teamwork	0.654
	Job satisfaction	0.019
	Self motivation	0.018

[a]Dependent variable: creativity
[b]Predictors: (Constant), self motivation, hierarchy motivation, teamwork, hierarchy supporting, hierarchy incentives, job satisfaction, leadership bridging gaps, leadership inspiration

5   Results, Discussion and Findings

5.1   Quantitative Research Findings

The quantitative results revealed that the dependent variable "creativity" is driven by two predictors. The first is self-motivation and the second is job satisfaction. Based on the SPSS results, self-motivation is driven by the inherent will of the employee to be motivated, or perhaps he/she is inspired by the intrinsic incentives or rewards obtained from

Table 5.2 Job satisfaction predictors and coefficients

Coefficients[a]		
Model[b]		Sig.
1	(Constant)	0.015
	Hierarchy motivation	0.929
	Hierarchy supporting	0.467
	Hierarchy incentives	0.004
	Leadership inspiration	0.224
	Leadership bridging gaps	0.067
	Lateral, shared leadership	0.001

[a]Dependent variable: Job satisfaction
[b]Predictors: (Constant), teamwork, hierarchy incentives, hierarchy supporting, hierarchy motivation, leadership bridging gaps, leadership inspiration

the work and thus her/his motivation level grows more and more. Self-motivation is the process where the employee evaluates her/his performance based on the targets to be achieved, the timeline, the budget and other critical evaluation elements. This form of motivation mainly operates via internal comparison processes and requires setting personal standards which are able to evaluate the employee performance (Bandura and Dale 1981). The dependent variable job satisfaction is driven by three predictors: hierarchy incentives, lateral shared leadership and leadership bridge gaps. The significance value of all the above-mentioned predictors lies below the 0.05, which is the threshold that discloses the relation of the dependent variable from its predictors. More specifically, the significance level of the job satisfaction and self-motivation predictors is 0.019 and 0.018, respectively, when creativity is the dependent variable.

Based on the results depicted above (Table 5.1), there is a positive relation between the dependent variable "creativity" and the job satisfaction and self-motivation predictors. The employees perceive the two predictors (job satisfaction and self-motivation) as key drivers leading them to creativity. This outcome is similar to research by Deci and Ryan (2000), which found that authentic leaders can make employees feel satisfied with their job when they provide adequate intrinsic incentives. Consequently, job satisfaction makes the employees creative at a level that can lead to innovation (Stogdill 1950).

Toor and Orfi (2009) have also found that transformational leaders can, among other merits, stimulate employee self-motivation. Following this, the employees explore and utilise their individual traits and skills further and this makes them become more creative (Amabile et al. 1996). In addition, the significance level of predictors hierarchy incentives, lateral shared leadership and leadership bridging gaps is 0.004–0.001 and 0.067, when job satisfaction is the dependent variable.

Based on the above outcome, the drivers that make employees feel satisfied with their jobs are both leadership and hierarchy. The employees feel satisfied with their job when hierarchy provides them with adequate incentives to carry it out well. Furthermore, they praise the leadership styles that bring them closer with their leaders and make them cooperate even better with their colleagues. According to Morana (1987), leadership behaviours stimulate employees to feel more satisfied with their jobs. Fisher and Sharp (2009) found that lateral or shared leadership affects positively the employees, increases their motivation level and makes them feel satisfied with their jobs. Furthermore, Jaques (1990) supports the idea that properly hierarchically structured organisations can motivate their employees.

Hence, based on the above-mentioned results, the predictors can drive the dependent variables towards the desired results.

5.2   Injecting the Qualitative Research Results: Discussion and Findings

Based on our model and research findings, it appears that creativity is highly dependent on self-motivation and job satisfaction. Self-motivation can be considered an inherent merit of employees which drives them towards creativity. In contrast, job satisfaction is driven by leadership and hierarchy. Deci and Ryan (2000) have also found that authentic leaders cultivate employees' intrinsic motivation, and this often leads to increased job satisfaction and performance by employees. Furthermore, from the qualitative data it emerges that employees consider both motivation and creativity to be important factors in their effectiveness and efficiency.

Hypothesis 1 and 4 appear aligned with the research findings. Based on the results, leadership can bridge gaps between the regular employees and superiors, at a level where the employees are satisfied with their jobs. Job satisfaction leads to creativity, which can lead both to innovative solutions or efficient problem-solving methods. Hence, leadership appears to positively influence both the employees and the superiors in their efforts towards setting goals and working hard to achieve these (Stogdill 1950). Based on Dikshit and Dikshit (2014) and Sternberg (2008), leadership development in the workplace can intensify employee motivation to a level where it can lead to creativity. Furthermore, one of the leader's tasks is to demonstrate creative problem-solving methods and tactics. Leaders ought to act like role models so as to motivate the employees and either help them or work as a team in order to solve complex problems arising at work (Mumford et al. 2000a, b). Based on the qualitative data, the majority of employees believe that their leaders are indeed role models who support creativity, and that they can consult them in order to become more creative.

Employee enthusiasm does not appear to be taken greatly into account: the majority of the respondents do not come across enthusiasm in their daily working life for the goals to be achieved. However, it turns out that all of them understand the value of being inspired and of demonstrating enthusiasm for the company's goals. Unenthusiastic employees are less willing to engage in tasks, and are dissatisfied and perhaps de-motivated. In this case, an authentic leader can meditate these effects (Harter et al. 2003). The voice of the employees can reach out to their leaders; hence, the leaders appear to be close to the employees and they are willing to hear their subordinates. However, the communication seems to be indirect, as most of the respondents mentioned that they normally have to speak to their immediate superiors in order for them to access the top management team.

Hypothesis 2 and 3 seems to be aligned with the research findings as well. Based on the data analysis, there is relation between lateral, shared leadership and job satisfaction, which in turn leads to creativity. There are quite many studies linking effective leadership with better and ethical performance (Kreitner 1995).

Based on the qualitative data the employees communicate often with their peers, subordinates and their managers. They either communicate

via well-established processes which support effective employee communication, or by building both professional and personal relations. The close and constant communication motivates the employees and supports the adoption and perhaps materialisation of creative ideas. Hyypiä and Parjanen (2013) found that individual employees adopted a more creative and collaborative atmosphere when shared leadership roles were used. The leaders have actively contributed to the cases where they could share knowledge, experience and in general where they could contribute. The leaders have acted like role models and this action has stimulated the employees to act likewise. Furthermore, the leaders have encouraged the employees to develop creativity and communication in the organisation.

Problems that arise at work potentially disorganise employees and require more resources to resolve them. Based on the qualitative data below, the problems arising at work are dealt with at the team level; depending on the complexity of the problem they are then elevated to higher levels within the organisation. The employees share their experience, knowledge and skills in order to come up with a creative solution to the problems and adopt a more proactive approach to avoid repetition of the problems. Further, they use the tools, procedures and all organisational means available to solve a problem efficiently and before it escalates. Subsequently, they try to adopt proactive/preventive methods.

Bligh et al. (2006), advocates of shared and lateral leadership, claim that employees with shared leadership skills act efficiently and yield effective solutions when dealing with complex problems. Employees with different specialties, areas of knowledge, cultures and professions work as a team and they all share a common goal. The need to have such a team supervised by a superior is minor, and it is quite likely that creative ideas will emerge from it (Cox et al. 2003).

Based on the quantitative results, the incentives that a properly hierarchically structured organisation provides leads to job satisfaction, an outcome aligned with the fifth hypothesis. The employees, therefore, are satisfied with their job when they receive either intrinsic or extrinsic rewards. Jaques (1990) argues that properly hierarchical structured organisations motivate employees to come up with creative ideas. This outcome is in line also with transactional and transformational leadership

styles, as both of these styles focus on providing intrinsic and extrinsic incentives. Bass et al. (2003) stress that transactional leaders provide extrinsic incentives, in the form of both monetary and non-monetary benefits, thus, practically and effectively communicating their recognition of their employees' efforts and results. In contrast, according to Walumbwa et al. (2008), transformational leaders focus more on providing intrinsic incentives, thus improving employee self-efficacy.

Based on the qualitative data, employees appear engaged in their organisation, and committed to generating new ideas, which could lead to innovative solutions. They are close to their customers, they understand the significance of their needs and they strive to fulfil them. Furthermore, their organisation provides them the tools they need to carry out their job and to become creative.

Communication between employees and their superiors also appears good. Superiors are close to employees, guiding them by sharing the organisation's goal and trying to help them overcome the barriers they come across in their daily working lives. Superiors provide adequate incentives to the employees, both intrinsic and extrinsic. The former are: challenging tasks; close communication; support; good relationships backed up by trust; smart and tangible goals; and constant review of their performance. The latter are: annual bonuses; and non-monetary incentives, such as days off.

Hence, the organisation and thus the hierarchy across the various layers of the organisation provide adequate incentives, thereby boosting their performance and motivation level. Furthermore, employees feel free to express business-related ideas they might have, and this approach seems to be encouraged by their entire organisation as well. Furthermore, creative ideas are taken seriously into account and creative employees are rewarded.

6   Conclusions, Implications, Limitations and Further Research

6.1   Conclusions

There are several contributing factors which make the employees feel motivated so as to yield creative solutions. This research concludes that employ-

ees in Greece have a positive perception of the notions of motivation and creativity, and believe they are essential to the workplace. Moreover, the incentives provided make employees feel satisfied with their job and in turn they become creative. This is something we have seen in the quantitative data analyses and in the qualitative data as well. Further, employees utilise the processes and procedures of their organisation towards the above ends. Employees have a good relation with and feel close to their leaders and enjoy cooperating with their colleagues in order to achieve a common goal. However, they miss the element of enthusiasm, or perhaps they prefer to utilise their powers otherwise to "survive" in a competitive environment. It is evident that employees have developed self-motivation skills, which often lead them to creativity. The first and fourth hypotheses turn out to be correct, as the employees feel they are close to their superiors, they are satisfied with their jobs and they work in a creative way which leads them to innovation. Furthermore, the workplace is overwhelmed by positivism as the gaps between the lower and higher levels are bridged.

Employees appear to be excited when it comes to cooperating with peers, subordinates and superiors. They acknowledge the value of lateral and shared leadership where employees with various skills, different expertise, education and seniority levels join forces, and they work as a team to achieve a common goal. They prefer to leave aside personal issues and any other kind of barriers which hinder goal achievement, and instead they prefer to work as a team, acting creatively towards reaching an innovative solution. As a result, the second and third hypotheses are correct as well.

Properly structured organisations support motivation for creativity. Based on both the quantitative and qualitative data, the hierarchy provides adequate incentives to employees to become creative; hence, the fifth hypotheses is proven correct as well. This outcome shares also some common ground with some of the abilities of the transformational and transactional leaders to motivate the employees for creativity.

Finally, the objective of this study and the research hypotheses are aligned with the research findings. Employees perceive authentic, transformational and transactional leaders as well as the lateral shared leadership as positive styles of leadership, ones which strengthen their motivation for creativity. Furthermore, the employees are satisfied with well-structured organisations which provide them the desired incentives they

need in order to become creative. Self-motivation has not been considered by this research; however, from the primary data it emerged that employees are empowered with the inherent merit of self-motivation towards creativity and innovation.

6.2 Managerial Implications

From the research results it emerges that employees are satisfied with their jobs when they feel the gaps between them and their superiors are bridged, and this leads to them working more creatively. The authentic and transformational leaders are the ones who have the ability to get close to the employees, and make them feel a sense of trust, optimism, admiration and respect (Avolio and Gardner 2005). Furthermore, lateral, shared leadership is another style of leadership the employees acknowledge as beneficial. They enjoy working as a team serving a common goal (Fisher and Sharp 2009) and when this is achieved they are overwhelmed with motivation, feel satisfied with their jobs and work creatively.

The incentives and the tools that hierarchy provides make the employees feel satisfied with their jobs, to a level which leads to creativity. One more important element that has emerged from this research is that self-motivated employees reach creativity sooner. It is further indicated that a high level of self-esteem could potentially lead to self-motivation.

Hierarchy, leadership and self-motivation can stimulate employees to become creative. It appears that if the leaders serve as role models, rather than just instructing the employees on how to carry out their jobs, then creativity is very likely to result. If the leaders join more actively in the problem-solving process and they engage in tasks that might require employees to have different skills, expertise and background, then the employees become more creative.

The incentives provided to the employees are another element the employees identify as significant. Proper and fair incentives make employees feel satisfied with their jobs and ultimately become creative. Leaders thus ought to identify the type of incentives (intrinsic or extrinsic), as well the specific incentives that satisfy individual employees, and distribute them wisely.

6.3   Research Limitations and Future Research

The research has some limitations, which also partly constitute further research directions. Further to the obvious limitation of the rather restricted sample, the first limitation stems from the disproportionate focus on larger and multinational organisations, calling for further research with a more distinct small and medium-size enterprise focus. The second limitation relates to the model's self-motivation element, which remains unexplored with regards to its drivers and its relationship with creativity and innovation. The third limitation stems from the research's combination of leadership styles and hierarchy. Further research may focus on a specific leadership style, allowing more explicit conclusions to be drawn. Finally, the qualitative data have given rise to "enthusiasm" as a critical factor of creativity, which is insufficiently explored here though, and could constitute an enticing area for research.

References

Amabile, T. M. (1983). The social-psychology of creativity – A componential conceptualization. *Journal of Personality and Social Psychology, 45*, 357–376.

Amabile, T. M. (1988). A model of creativity and innovation in organizations. *Research in Organizational Behavior, 10*, 123–167.

Amabile, T. M. (1998). How to kill creativity. *Harvard Business Review, 76*(5), 76–87.

Amabile, T. M., Conti, R., Coon, H., Lazenby, J., & Herron, M. (1996). Assessing the work environment for creativity. *Academy of Management Journal, 39*(5), 1154–1184.

Amabile, T. M., Schatzel, E. A., Moneta, G. B., & Kramer, S. J. (2004). Leader behaviors and the work environment for creativity: Perceived leader support. *The Leadership Quarterly, 15*(1), 5–32.

Ashforth, B. E., Harrison, S. H., & Corley, K. G. (2008). Identification in organizations: An examination of four fundamental questions. *Journal of Management, 34*(3), 325–374.

Avolio, B. J., & Gardner, W. L. (2005). Authentic leadership development: Getting to the root of positive forms of leadership. *The Leadership Quarterly, 16*, 315–338.

Baek-Kyoo, B. J., Gary, N. M., & Baiyin, Y. (2013). Creativity and human resource development: An integrative literature review and a conceptual framework for future research. *Human Resource Development Review, 12*(4), 390–421.

Bandura, A., & Dale, H. S. (1981). Cultivating competence, self-efficacy, and intrinsic interest through proximal self-motivation. *American Psychological Association Inc, 41*(3), 586–598.

Bass, B. M. (1985). *Leadership and performance beyond expectations*. New York: Free Press.

Bass, B. M., & Avolio, B. J. (1994). *Improving organizational effectiveness through transformational leadership*. Thousand Oaks: Sage.

Bass, B., & Steidlmeier, P. (1999). Ethics, character and the authentic transformational leadership behavior. *Leadership Quarterly, 10*, 181–217.

Bass, M. B., Jung, D. I., Avolio, B. J., & Berson, Y. (2003). Predicting unit performance by assessing transformational and transactional leadership. *Journal of Applied Psychology, 88*(2), 207–218.

Birasnav, M., Rangnekar, S., & Dalpati, A. (2011). Transformational leadership and human capital bene-fits: The role of knowledge management. *Leadership & Organization Development Journal, 32*(2), 106–126.

Bligh, M. C., Pearce, C. L., & Kohles, J. C. (2006). The importance of self- and shared leadership in team based knowledge. *Journal of Managerial Psychology, 21*(4), 296–231.

Bresciani, S., Thrassou, A., and Vrontis, D. (2012). Human resource management—Practices, performance and strategy in the Italian hotel industry. *World Review of Entrepreneurship*, *Management and Sustainable Development*, 8(4), 405–423.

Bresciani, S., Thrassou, A., & Vrontis, D. (2013a). Change through innovation in family businesses: Evidence from an Italian sample. *World Review of Entrepreneurship, Management and Sustainable Development, 9*(2), 195–215.

Bresciani, S., Thrassou, A., & Vrontis, D. (2013b). Mindset and behaviour effect on firm performance. In D. Vrontis & A. Thrassou (Eds.), *Innovative business practices: Prevailing a turbulent era*. Newcastle upon Tyne: Cambridge Scholars Publishing.

Campbell, D. T., & Fiske, D. W. (1959). Convergent and discriminant validation by the multi-trait multi-method matrix. *Psychological Bulletin, 56*, 81–105.

Černe, M., Jaklič, M., & Škerlavaj, M. (2013). Authentic leadership, creativity, and innovation: A multilevel perspective. *Leadership, 9*(1), 63–85.

Chebbi, H., Yahiaoui, D., Thrassou, A., & Vrontis, D. (2013). The exploration activity's added value into the innovation process. *Global Business and Economics Review, 15*(2/3), 265–278.

Chebbi, H., Yahiaoui, D., & Thrassou, A. (2017a). Multi-country collaborative innovation in the internationalisation process. *International Marketing Review, 34*(1), 109.

Chebbi, H., Yahiaoui, D., Vrontis, D., & Thrassou, A. (2017b). The impact of ambidextrous transformational leadership on the internationalization of emerging market firms (EMF). *Thunderbird International Business Review, 59*(3), 421–436.

Cohen, W. A. (1990). *The art of a leader*. Englewood Cliffs: Jossey-Bass. Library Journal Publishing.

Cox, J. F., Pearce, C. L., and Perry, M. L. (2003). Toward a model of shared leadership and distributed influence in the innovation process: How shared leadership can enhance new product development, team dynamics and effectiveness. In Pearce, C. L. and Conger, J. A. (eds.) Meso-level model of leadership 313, *Shared leadership: Reframing the how's and whys of leadership*, Sage, Thousand Oaks, pp. 48–76.

Crossan, M. M., & Apaydin, M. (2010). A multi-dimensional framework of organizational innovation: A systematic review of the literature. *Journal of Management Studies, 47*(6), 1154–1191.

Deci, E. L., & Ryan, R. M. (2000). The "what" and "why" of goal pursuits: Human needs and the self-determination of behavior. *Psychological Inquiry, 11*, 227–268.

Detert, J. R., & Burris, E. R. (2007). Leadership behavior and employee voice: Is the door really open? *Academy of Management Journal, 50*, 869–884.

Dikshit, A. Y., & Dikshit, P. A. (2014). A theoretical study of leadership development at workplace. *International Journal of Advanced Research in Management and Social Sciences, 3*, 39–52.

Fisher, R., & Sharp, A. (2009). *Lateral leadership: Getting it done when you are not the boss*. London: Profile books LTD..

Fletcher, J. K., & Käufer, K. (2003). Shared leadership: Paradox and possibility. In C. L. Pearce & J. A. Conger (Eds.), *Shared leadership: Reframing the hows and whys of leadership* (pp. 21–47). Thousand Oaks: Sage.

Florida, R. (2002). *The rise of the creative class and how it's transforming work, leisure, community, and everyday life*. New York: Basic Books.

Ford, C. M., & Gioia, D. A. (2000). Factors influencing creativity in the domain of managerial decision making. *Journal of Management, 26*, 705–732.

Gagne, M., & Deci, E. L. (2005). Self-determination theory and work motivation. *Journal of Organizational Behavior, 26*, 331–362.

Gardner, W., Avolio, B., Luthans, F., May, D., & Walumbwa, F. (2005). Can you see the real me? A self-based model of authentic leader and follower development. *The Leadership Quarterly, 16*(3), 343–372.

George, J. M. (2007). Creativity in organizations. *The Academy of Management Annals, 1*, 439–477.

George, B., Sims, P., McLean, A., & Mayer, D. (2007). Discovering your authentic leadership. *Harvard Business Review, 85*(2), 129–138.

Gilley, A., Gilley, W. J., & McMillan, S. H. (2009). Organizational change: Motivation, communication, and leadership effectiveness. *Performance Improvement Quarterly, 21*(4), 75–94.

Gilson, L. L., & Shalley, C. E. (2004). A little creativity goes a long way: An examination of teams engagement in creative processes. *Journal of Management August, 30*, 453–470.

Gong, Y., Huang, J. C., & Farh, J. L. (2009). Employee learning orientation, transformational leadership, and employee creativity: The mediating role of employee creative self-efficacy. *Academy of Management Journal, 52*(4), 765–778.

Griffin, M., Neal, A., & Parker, S. (2007). A new model of work role performance: Positive behaviors in uncertain and interdependent contexts. *Academy of Management Journal, 50*, 327–347.

Gumusluoglu, L., & Ilsev, A. (2009). Transformational leadership, creativity, and organizational innovation. *Journal of Business Research, 62*(4), 461–473.

Harter, J. K., Schmidt, F. L., & Keyes, C. L. M. (2003). Well-being in the workplace and its relationship to business outcomes: A review of the Gallup studies. In C. L. M. Keyes & J. Haidt (Eds.), *Flourishing: Positive psychology and the life well-lived* (pp. 205–224). Washington, DC: American Psychological Association.

Herrmann, D., & Felfe, J. (2014). Effects of leadership style, creativity technique and personal initiative on employee creativity. *British Journal of Management, 25*, 209–227.

House, R. J. (1977). A 1976 theory of charismatic leadership. In J. G. Hunt & L. Larson (Eds.), *Leadership: The cutting edge* (pp. 189–207). Carbondale: Southern Illinois University Press.

Hyypiä, M., & Parjanen, S. (2013). Boosting creativity with transformational leadership in fuzzy front-end innovation processes. *Interdisciplinary Journal of Information, Knowledge, and Management, 8*, 21–41.

Ilies, R., Morgeson, F. P., & Nahrgang, J. D. (2005). Authentic leadership and eudaemonic well-being: Understanding leader-follower outcomes. *The Leadership Quarterly, 16*(3), 373–394.

Jaques, E. (1990). In praise of hierarchy. *Harvard Business Review, 68, pp.*, 127–133.

Kahn, W. A. (1990). Psychological conditions of personal engagement and disengagement at work. *Academy of Management Journal, 33*, 692–724.

Kark, R., & Carmeli, A. (2009). Alive and creating: The mediating role of vitality and aliveness in the relationship between psychological safety and creative work involvement. *Journal of Organizational Behavior, 30*, 785–804.

Kaur, R. (2012). Transformational and transactional leadership behaviour in selected public and private sector banks in Chandigarh. *International Journal of Engineering and Management Sciences, 3*(2), 126–133.

Kernis, M. (2003). Toward a conceptualization of optimal self-esteem. *Psychological Inquiry, 14*(1), 1–26.

Kouzes, J. M., & Posner, B. Z. (1995). *The leadership challenge: How to keep getting extraordinary things done in organizations*. San Francisco: Jossey Bass.

Kozlowski, S. W. J., & Bell, B. S. (2003). Work groups and teams in organizations. In W. C. Borman & D. R. Ilgan (Eds.), *Comprehensive handbook of psychology: Industrial and organizational psychology* (pp. 333–375). New York: Wiley.

Kreiner, G. E., & Ashforth, B. E. (2004). Evidence toward an expanded model of organizational identification. *Journal of Organizational Behavior, 25*(1), 1–27.

Kreitner, R. (1995). *Management* (6th ed.). Boston: Houghton Mifin.

Kuhnert, K. W., & Lewis, P. (1987). Transactional and transformational leadership: A constructive/developmental analysis. *Academy of Management Review, 12*, 648–657.

Luthans, F., & Avolio, B. J. (2003). Authentic leadership: A positive developmental approach. In K. S. Cameron, J. E. Dutton, & R. E. Quinn (Eds.), *Positive organizational scholarship* (pp. 241–261). San Francisco: Barrett-Koehler.

May, D., Gilson, R., & Harter, L. (2004). The psychological conditions of meaningfulness, safety and availability and the engagement of the human spirit at work. *Journal of Occupational and Organizational Psychology, 77*, 11–37.

Morana, C. (1987). Employee satisfaction: A key to patient satisfaction. *Perioperative Nursing Quarterly, 3*(1), 33–37.

Mumford, M., & Gustafson, S. (1988). Creativity syndrome: Integration, application, and innovation. *Psychological Bulletin, 103*, 27–43.

Mumford, M. D., Zaccaro, S. J., Connelly, M. S., & Marks, M. A. (2000a). Leadership skills: Conclusions and future directions. *Leadership Quarterly, 11*(1), 155–170.

Mumford, M. D., Zaccaro, S. J., Harding, F. D., Jacobs, T. O., & Fleishman, E. A. (2000b). Leadership skills for a changing world: Solving complex social problems. *Leadership Quarterly, 11*(1), 11–35.

Obiwuru, T. C., Okwu, A. T., Akpa, V. O., & Nwankwere, I. A. (2011). Effects of leadership style on organizational performance: A survey of selected small scale enterprises in Ikosi-Ketu council development area of Lagos state, Nigeria. *Australian Journal of Business and Management Research, 1*(7), 100–111.

Oldham, G., & Cummings, A. (1996). Employee creativity: Personal and contextual factors at work. *Academy of Management Journal, 39*(3), 607–634.

Park, J. G., & Kwon, B. (2013). Literature review on shared leadership in teams. *Journal of Leadership, Accountability and Ethics, 10*(3), 28–36.

Pearce, C. L., & Manz, C. C. (2005). The new silver bullets of leadership: The importance of self and shared leadership in knowledge work. *Organizational Dynamics, 34*(2), 130–140.

Pearce, C. L., Conger, J. A., & Locke, E. A. (2007). Shared leadership theory. *Leadership Quarterly, 18*(3), 281–288.

Rank, J., Nelson, N. E., Allen, T. D., & Xu, X. (2009). Leadership predictors of innovation and task performance: Subordinates' self-esteem and self-presentation as moderators. *Journal of Occupational & Organizational Psychology, 82*, 465–489.

Reinhardt, W., Schmidt, B., Sloep, P., & Drachsler, H. (2011). Knowledge worker roles and actions—Results of two empirical studies. *Knowledge and Process Management, 18*(3), 150–174.

Robson, C. (2002). The analysis of qualitative data. In *Real world research: A resource for social scientists and practitioner-researchers*. Oxford: Wiley-Blackwell.

Rosing, K., Frese, M., & Bausch, A. (2011). Explaining the heterogeneity of the leadership–innovation relationship: Ambidextrous leadership. *Leadership Quarterly, 22*, 956–974.

Rossi, M., Thrassou, A., and Vrontis, D. (2013). Open innovation system and new form of investment: Venture capital's role in innovation. In D. Vrontis, and A. Thrassou (eds.), *Innovative business practices: Prevailing a turbulent era*. Newcastle upon Tyne: Cambridge Scholars Publishing.

Santoro, G., Vrontis, D., Thrassou, A., & Dezi, L. (2017). The internet of things: Building knowledge management systems for open innovation and knowledge management capacity. *Technological Forecasting and Social Change*. https://doi.org/10.1016/j.techfore.2017.02.034.

Shalley, C. E., Gilson, L. L., & Blum, T. C. (2000). Matching creativity requirements and the work environment: Effects on satisfaction and intentions to leave. *The Academy of Management Journal, 43*(2), 215–223.

Shamir, B., House, R. J., & Arthur, M. B. (1993). The motivational effects of charismatic leaders: A self-concept based theory. *Organization Science, 4*(4), 577–594.

Sosik, J. J., Kahai, S. S., & Avolio, B. J. (1998). Transformational leadership and dimensions of creativity: Motivating idea generation in computer-mediated groups. *Creativity Research Journal, 11*(2), 11–121.

Sternberg, R. J. (2008). The WICS approach to leadership: Stories of leadership and the structures and processes that support them. *The Leadership Quarterly, 19*(3), 360–371.

Stogdill, R. M. (1950). Leadership, membership and organization. *Psychological Bulletin, 47*, 1–14.

Sy, T., & Côte, S. (2004). Emotional intelligence a key ability to succeed in the matrix organization. *Journal of Management Development, 23*(5), 437–455.

Taggar, S. (2002). Individual creativity and group ability to utilize individual creative resources: A multilevel model. *Academy of Management Journal, 45*, 315–330.

Tashakkori, A., & Teddlie, C. (2003). *Handbook of mixed methods in social & behavioral research*. Thousand Oaks: Sage.

Tesluk, P. E., Farr, J. L., & Klein, S. R. (1997). Influences of organizational culture and climate on individual creativity. *Journal of Creative Behaviour, 31*, 27–41.

Thrassou, A., Vrontis, D., & Bresciani, S. (2018a). The agile innovation pendulum: A strategic marketing multicultural model for family businesses. *International Studies of Management and Organization, 48*(1), 105–120.

Thrassou, A., Vrontis, D., and Bresciani, S. (2018b). The agile innovation pendulum: Family business innovation and the human, social and marketing capitals, International Studies of Management and Organization, Vol. 48, No.1, pp 88–104.

Toor, S. R., & Orfi, G. (2009). Ethical leadership: Examining the relationship with full range leadership model, employee outcomes, and organizational culture. *Journal of Business Ethics, 90*, 533–547.

Treffinger, D., Tallmann, M., and Isaksen S. C. (1994). Creative problem solving: An overview. In M. A. Runco (ed.), *Problem finding*, *problem solving*, *and creativity*, pp. 223–236. Norwood: Ablex.

Vrontis, D., Thrassou, A., and Razali, M. Z. (2010). Internal marketing as an agent of change—Implementing a new human resource information system for Malaysian airlines. *Journal of General Management*, 6(1), 21–41.

Vrontis, D., Thrassou, A., Chebbi, H., & Yahiaoui, D. (2012). Transcending innovativeness towards strategic reflexivity. *Qualitative Market Research: An International Journal, 15*(4), 420–437.

Walumbwa, F. O., & Hartnell, C. A. (2011). Understanding transformational leadership–employee performance links: The role of relational identification and self-efficacy. *Journal of Occupational and Organizational Psychology, 84*(1), 153–172.

Walumbwa, F. O., Avolio, B. J., Gardner, W. L., Wernsing, T. S., & Peterson, S. J. (2008). Authentic leadership: Development and validation of a theory-based measure. *Journal of Management, 34*(1), 89–126.

Webb, E. J., Campbell, D. T., Schwartz, R. D., and Lee, S. (1966). Unobtrusive measures: Nonreactive research in the social sciences. Chicago: Rand McNally.

Wilson-Evered, E., Hartel, C. E. J., & Neale, M. (2001). A longitudinal study of workgroup innovation: The importance of transformational leadership. In M. D. Fottler, G. T. Savage, & J. D. Blair (Eds.), *Advances in health care management* (Vol. 2, pp. 315–340). Amsterdam: Elsevier Science.

Wilson-Evered, E., Härtel, C. E. H., & Neale, M. (2004). Leadership and innovation surfacing synergies among theories and constructs. In A. B. Ghobadian, N. O. Regan, D. Gallear, & H. Viney (Eds.), *Strategy and performance: Achieving competitive advantage in the global market place* (pp. 268–285). Basingstoke: Palgrave Macmillan.

Zhou, J., & Hoever, I. J. (2014). Research on workplace creativity: A review and redirection. *Annual Reviw of Organizational Psychology and Organizational Behavior, 1*, 333–359.

6

Innovation Performance and Development Assistance and Growth in Four East European Member States

Spyridon Repousis and Petros Lois

1   Introduction and Research Background

In this chapter, foreign aid as additive to domestic savings is examined and is expected to cause an increase in economic growth and domestic savings. The case of four east European member states—Croatia, Estonia, Lithuania and Slovenia—that fall into two different innovation performance groups, during a maximum period of 16 years (1995–2010), is examined by following a behavioural equation of flows, not an accounting identity.

The European Innovation Scoreboard (2017) provides a comparative analysis of innovation performance in European Union (EU) countries, other European countries, and regional neighbours. It assesses the relative strengths and weaknesses of national innovation systems and helps countries identify areas they need to address.

S. Repousis • P. Lois (✉)
School of Business, University of Nicosia, Nicosia, Cyprus
e-mail: spyrep@otenet.gr; lois.p@unic.ac.cy

The new 2017 edition of the Scoreboard reveals that EU innovation performance continues to increase, especially due to improvements in human resources, the innovation-friendly environment, own-resource investments and attractive research systems. Sweden remains the EU innovation leader, followed by Denmark, Finland, the Netherlands, the UK and Germany. Lithuania, Malta, the UK, the Netherlands and Austria are the fastest growing innovators. In a global comparison, the EU is catching up with Canada and the USA, but South Korea and Japan are pulling ahead. China shows the fastest progress among international competitors.

Based on their average performance scores as calculated by a composite indicator, the Summary Innovation Index, EU member states fall into four different performance groups. Denmark, Finland, Germany, the Netherlands, Sweden and the United Kingdom are *Innovation Leaders* with innovation performance well above that of the EU average. Austria, Belgium, France, Ireland, Luxembourg and Slovenia are *Strong Innovators* with performance above or close to that of the EU average. The performance of Croatia, Cyprus, the Czech Republic, Estonia, Greece, Hungary, Italy, Latvia, Lithuania, Malta, Poland, Portugal, Slovakia and Spain is below that of the EU average. These countries are *Moderate Innovators*. Bulgaria and Romania are *Modest Innovators* with performance well below that of the EU average.

Innovation is important for the growth process of developing countries and it is important to look back at past European member state performance and examine the effect of foreign aid on the growth process of developing countries. Foreign aid is an important topic given its implications for poverty reduction in developing countries. Previous empirical studies on foreign aid and economic growth have generated mixed results. The main areas of focus of all previous research is Africa, Asia, Latin America and the Caribbean. This is due to the fact that foreign assistance or aid is a significant source of income to developing countries, especially to countries in Africa, where on average it provides 12.5% of gross domestic product (GDP) and is by far the most important source of foreign capital (Pallage and Robe 2001).

East Europe (including Albania, Bosnia and Herzegovina, Bulgaria, Croatia, the Former Yugoslav Republic of Macedonia, Moldova,

Montenegro, Kosovo, Romania and Serbia) is home to 55 million citizens. Since 1989, however, many former communist countries in east Europe have faced the collapse of their production system along with socio-economic problems such as poverty, hunger and even war. The past decade of transition and conflict has left the region with a legacy of inadequate growth and declining living standards. Since the end of the Kosovo conflict in 1999, however, there has been considerable improvement. Civil unrest has been overcome and a political balance has been found that has allowed a return to economic growth and closer regional cooperation.

In order to alleviate the region's problems, the international community has released a significant amount of foreign aid. In addition, it attempted to help the reconstruction of east Europe and to bring political stability and economic prosperity. Foreign aid has been provided by different donors, including all EU member states, as well as other countries, such as Canada, Japan, Russia, Switzerland and the USA. Much of this bilateral assistance has been provided in the form of grants. The EU is by far the single largest grant assistance donor to the countries of the western Balkans. Depending on what concept of aid is used, assistance to the Balkan countries in 1990–1998 ranged from $17 billion to $25 billion, or 2.2 to 3% of recipients' GDP (Kekic 2008). Since 1991, the EU has provided more than €6 billion to the region through its various aid programmes. In addition, high levels of assistance have also been provided by multilateral donors and international financial institutions (for example, the European Bank for Reconstruction and Development, the European Investment Bank and the World Bank), mainly in the form of preferential loans.

As important as the provision of financing to the region is the need to coordinate this assistance. Donor coordination also helps to avoid misconceptions, unrealistic expectations, and poor information or data, all of which can lead to the undermining and damaging of reconstruction efforts. For this reason, the European Commission and the World Bank play a key role as coordinators of international assistance for the reconstruction and development of east Europe. The EU Commissioner for Economic and Monetary Affairs and the President of the World Bank co-chair a High Level Steering Group (HLSG), which comprises G8

finance ministers and heads of major international financial institutions. The HLSG aims to ensure the strategic direction of the process of economic reconstruction, stabilisation, reform and development in the region, including social and institutional dimensions, both at country and regional level. Moreover, the HLSG oversees resource implications for the international community and the donor mobilisation process, assists in coordination, oversees the appropriate conditions of support and ensures consistency of the criteria by which donor funding is committed.

The countries of the region are expected to develop and implement their reform programmes based on national strategies that also foster regional cooperation. The objective here is not to recreate, for example, the former Yugoslavia, but to develop regional perspectives on, inter alia, trade, energy, the environment and water resource management, which can offer political benefits and large welfare increases for all countries of the region. Moreover, a regional approach allows for adequate prioritisation of regional infrastructure investments in east Europe. The regional approach and the need to enhance regional cooperation is also a cornerstone of the Stabilization and Association Process, the process by which the western Balkan countries are being integrated into EU structures.

The Development Assistance Committee (DAC) is the principal body through which the Organization for Economic Cooperation and Development (OECD) deals with issues related to cooperation with developing countries. Donors have been highly responsive to the needs of the region, and their support is tailored to the requirements of each recipient country. For example, donor support for reconstruction and reform in Bosnia and Herzegovina peaked in the years immediately following the signing of the Dayton Agreement in 1995. In Albania and the Former Yugoslav Republic of Macedonia, on the other hand, the Kosovo crisis caused immediate and dramatic budget support and humanitarian needs, which the donors were generally able to satisfy. Kosovo, to give another example, had substantial needs in 1999 and 2000 but as budget systems have been put in place and reconstruction needs been filled, demand and supply have since been on a downward trend.

Also, the World Bank, as a development institution, supports two broad goals in east Europe: (1) poverty reduction and (2) economic and social development, the latter in support of the efforts of the western Balkan countries to join the EU. The central vehicle for supporting the national reform programme of each country is the so-called Country Assistance Strategy. Based on an assessment of the country's priorities, past portfolio performance and creditworthiness, the Country Assistance Strategy sets strategic priorities and determines the level and composition of financial and technical assistance that the World Bank seeks to provide to the country. The framework for poverty reduction and economic growth is supplied by the countries' own Poverty Reduction Strategy Papers, developed by their governments through a participatory consultation procedure.

In general, donors recognise that economic development, social inclusion and regional stability in east Europe hinge on the strengthening of institutions, governance and a lowering in the level of corruption. International assistance was largely successful in promoting peace, strengthening state institutions and preventing a return to the violent conflict of the past (Huliaras 2011). The purpose of this chapter is to examine the impact of international development assistance on economic growth in the case of four east European member states—Croatia, Estonia, Lithuania and Slovenia—that fall into two different innovation performance groups, during a maximum period of 16 years (1995–2010).

Croatia is a Moderate Innovator. Its 2017 performance represents a decline of 1.4 per cent relative to that of the EU in 2010. The relative strengths of the innovation system are in firm investments, human resources and employment impacts. Its relative weaknesses are in intellectual assets, attractive research systems and innovators.

Estonia is a Moderate Innovator. Its 2017 performance represents a decline of 3.6% relative to that of the EU in 2010. The relative strengths of the innovation system are in finance and support, human resources and innovation-friendly environment. Its relative weaknesses are in innovators, linkages and sales impact.

Lithuania is a Moderate Innovator. Its 2017 performance represents an increase of 21% relative to that of the EU in 2010. The relative strengths of the innovation system are in innovation-friendly environment, human

resources and linkages. Its relative weaknesses are in sales impacts, attractive research systems and intellectual assets.

Slovenia is a Strong Innovator. Over time, performance has declined by 0.2% relative to that of the EU in 2010. The relative strengths of the innovation system are in human resources, firm investments and an innovation-friendly environment. Its relative weaknesses are in finance and support, sales impacts and innovators.

Foreign aid as additive to domestic savings is expected to cause an increase in economic growth and domestic savings. The next section of the chapter provides a theoretical and empirical discussion, while Sect. 3 describes the data and the methodology. Section 4 presents the results; Sect. 5 provides some concluding remarks.

2   Theoretical Foundation

The relationship between foreign aid and economic growth has been a favourite topic of economists and policy makers for many decades. The standard model for justifying the aid-growth relationship was the "two gap" model developed by Chenery and Strout (1966), who built on earlier work of other development economists, such as Lewis (1954) and Rostow (1960). In the model, the first gap is between the amount of investment necessary to attain a certain rate of growth and the available domestic savings, while the second gap is between the import requirements for a given level of production and foreign exchange earnings. According to Chenery and Strout (1966), a positive effect of foreign aid on domestic savings exists even if some of the inflows are used for consumption. The equation $S = I - F$, where S, I and F are domestic savings, gross investment and net total foreign inflows, respectively, is a behavioural equation of flows, not an accounting identity, as presented by Nushiwat (2007).

Departing from the above view, Bauer regards foreign aid as a failure for recipient countries, defining foreign aid as "a transfer of resources from the taxpayer of a donor country to the government of a recipient country" (Bauer 1972: 396). Thus, foreign aid destroys economic incentives, leads to a misallocation of scarce resources and rent-seeking, and

finally reduces recipient countries' economic growth (see also Berrittella and Zhang 2012).

On empirical grounds, foreign aid donors and recipient governments have recognised the need to establish a link between foreign aid and economic growth and development. But the empirical literature is controversial. Thus, one strand of the literature recognises the positive effects of aid on growth, while another supports the view that aid is effective in some countries with certain characteristics; a third does not find any causal relationship and a fourth finds a negative relationship.

Supporters of foreign aid espouse the view that on average or in most cases, aid has been an effective developmental tool (a positive aid-growth correlation). The main contribution here was developed by Chenery and Strout (1966), who argued that if investment in a country is below the desired level, foreign aid inflows and foreign capital inflows are needed so that the country can grow more rapidly than its internal resources would otherwise allow. Foreign aid therefore moves a country's economy upwards.

Mubarak (2008) evaluated the effectiveness of the external development assistance provided to Pakistan. The main effect of aid was to eradicate extreme poverty and promote gender equality, investing in health and education and achieving environmental sustainability. Hatemi and Irandoust (2005) investigated the long-run relationship between foreign aid and real economic growth for a panel of developing countries (Botswana, Ethiopia, India, Kenya, Sri Lanka and Tanzania) over the period 1974–1996. The donor country was Sweden. The estimated long-run elasticities indicated that the Swedish foreign aid had a positive and significant impact on economic activity for all countries in the sample, and a policy implication was that foreign capital flows can have a favourable effect on real income by supplementing domestic savings. Murty, Ukpolo and Mbaku (1994) found that per capita real GDP, the saving rate and aid are co-integrated, and that aid had positive long-run effects in Cameroon during the period 1970–1990. Levy (1988) found aid to be positively and significantly correlated with investment and economic growth in Africa. Using an Autoregressive Distributed Lag model, Gounder (2001) found that aid had a positive and significant effect on growth in Fiji. Papanek (1972), Dowling and Hiemenz (1982), Gupta

and Islam (1983), Hansen and Tarp (2000), Gomanee et al. (2005), Dalgaard et al. (2004) and Karras (2006) also find evidence for the positive impact of foreign aid on growth. There are also several countries in which successful programmes of economic development have originated from post-war recovery programmes for humanitarian needs—notably Greece, Taiwan, Israel and the Philippines (Adelman and Chenery 1966).

A new popular study providing evidence that aid has a positive effect on growth was developed by Burnside and Dollar (1997). This new evidence influenced many other studies. Burnside and Dollar (1997) found a positive influence of aid on economic development, but only in developing countries with good fiscal, monetary and trade policies. A country has a good policy environment if there is low inflation, a low budget deficit and no protectionism, meaning trade is relatively open. This study gained favour from aid regime supporters because it explains why aid has supported growth in several countries while at the same time not influencing growth in others. Subsequently, Burnside and Dollar (1997, 2000, 2004), the World Bank (1998), Collier and Dollar (2001, 2002), Svensson (1999), Collier and Dehn (2001) and Collier and Hoeffler (2002) found similar results.

The robustness of Burnside and Dollar's (1997) results was questioned by Easterly (2003) and Easterly et al. (2003). They use the same methods and data definitions as Burnside and Dollar (1997) but they employed additional data or a different sample period, thereby showing that nearly all the results of Burnside and Dollar (1997) depended on the "right" choice of data included in the sample. According to Easterly (2003), the widely publicised finding that "aid promotes growth in a good policy environment" is not robust to the inclusion of new data or alternative definitions of "aid," "policy" or "growth". He argues that the idea that "aid buys growth" is shaky theoretically and empirically. Mosley (1980), Mosley et al. (1987), Boone (1996) and Jensen and Paldam (2003) found evidence to suggest that aid has no impact on growth. A recent study by Doucouliagos and Paldam (2009), using meta-analysis covering 68 papers containing a total of 543 direct estimates, found that the effect of aid on growth estimates scattered considerably and added up to a small positive, but insignificant, effect on growth.

Roodman (2003) showed that the results obtained by some studies can be fragile, and for this reason he qualified the results he reported. Ouattara and Strobl (2004) concluded that project aid worked but programme aid did not, and Ram (2004) concluded that, while the overall impact of aid was positive, multilateral, unlike bilateral, aid did not work. Inanga and Mandah (2008) examined the role of the two foreign aid financing agencies in promoting Zambia's economic growth and concluded that although it may be difficult to separate the effects of foreign aid finance from those of other growth-inducing factors, the efficient and effective utilisation of foreign aid finance can contribute to growth in a stable macro-economic environment.

Dalgaard et al. (2004) found that the size and direction of the impact of foreign aid may depend on policies, "deep" structural characteristics and the size of the inflow. Holder (2004) argued that the relationship between foreign aid and growth turns out to be an inverted-U shape under reasonable policy assumption, which is an Aid Laffer Curve. The positive relationship between foreign aid and growth is located in the upward slope of the curve, while the negative relationship is located in the downward slope.

Ekanayake and Chatrna (2010) analysed the effects of foreign aid on the economic growth of a group of 85 developing countries, spanning Asia, Africa, Latin America and the Caribbean, for the period 1980–2007. The findings indicated that foreign aid has mixed effects on economic growth in developing countries. Similarly, Ang (2010) found that while foreign aid exerts a direct negative influence on output expansion, its indirect effect via financial liberalisation is positive. Bivariate Granger causality tests by Dhakal et al. (1996) involving four Asian countries (India, Nepal, Pakistan and Thailand) and four African countries (Botswana, Kenya, Malawi and Tanzania), using data from 1960 to 1990, failed to find any causal relationship between foreign aid and economic growth in any of these countries. All the studies cited above were concerned specifically with the impact of aid on per capita national income growth, the exception being Lloyd et al. (2001), who looked at private consumption growth.

There are also other studies examining various issues concerning foreign aid. Djankov et al. (2006) showed an unexpected outcome of foreign

aid: it reduces the level of democracy in the recipient countries. Making aid effective is difficult, and loans may help to induce some discipline and a more effective use of funds, since the money has to be returned. In addition, other sources of foreign funds, such as remittances and private assistance, have proved to be quite effective in fostering growth and investment. For example, in Albania, remittances are estimated to be about 9–10% of GDP, representing an important inflow to both households and the entire economy (Liargovas and Repousis 2011). Increasing the responsibility of recipient countries, reducing the cost of remittances to developing countries and improving the coordination of donors seem to be reasonable goals for improving the effectiveness of foreign aid.

Critics of foreign aid take as their starting point the fact that after more than 40 years of development assistance, people in the poorest African countries are still living in poverty. Their real per capita income since 1965 has either declined or remained stagnant. Rajan and Subramanian (2005) found no robust positive relationship between aid and growth by using cross-country panel data. Werker et al. (2009) argued that foreign aid affected most components of GDP, but had no statistically identifiable impact on prices or economic growth. Mallik (2008) examined the effectiveness of foreign aid for economic growth in the six poorest and most highly aid-dependent African countries (Central African Republic, Malawi, Mali, Niger, Sierra Leone and Togo), using co-integration analysis, and found that a long-run relationship exists between per capita real GDP, aid as a percentage of GDP, investment as a percentage of GDP and openness. However, the long-run effect of aid on growth was found to be negative for most of these countries.

Brautigam and Knack (2004) found evidence that higher aid levels were associated with larger declines in the quality of governance and a lower tax effort in Africa. Other studies, such as Friedman (1958) and Bauer (1972), called for an end to aid, arguing that it is not a necessary requirement for the economic growth of a country. Furthermore, Economides et al. (2008), based on Drazen (2000), showed that foreign aid transfers could distort individual incentives, and hence hurt growth, by encouraging rent-seeking and corruption in recipient countries, as opposed to productive activities. They used a model of a growing small open economy for a cross-section of 75 aid-recipient countries. In their model, they refer to rent-seeking as "the socially costly pursuit of winning

a contestable prize",[1] where foreign aid transfers increase the size of the prize that interest groups fight over (see Svensson 2000). In their view, increases in aid are associated with worse institutions (see, for example, Alesina and Weder 2002), although this view has not escaped criticism (see, for example, Tavares 2003). The interest in the association between institutions and aid is not surprising given the robust evidence that institutions and economic performance (like growth) are positively associated (see, for example, Mauro 2002; Knack and Keefer 1995, 1997).

According to Burhop (2005), all these contributions neglect the question of causality: is foreign assistance really a causal force in economic development, or is there only a correlation between foreign assistance and economic development? Foreign assistance could be a causal force if it eliminates barriers for economic growth. Burhop (2005) investigated the causal relationship between foreign aid, income per capita and investment for 45 developing countries. Wald tests on vector autoregression coefficients cannot reject the hypothesis of there being no causal relationship between aid and economic performance.

Finally, a common characteristic of all of the above studies is that the country coverage is either Africa, Asia or the Caribbean.

3   Data and Methodology

According to Chenery and Strout (1966), foreign aid as additive to domestic savings would cause an increase in economic growth and domestic savings. Examining whether causality runs from foreign aid to the domestic savings of the recipient counties, Griffin and Enos (1970), Griffin (1970) and Weisskopf (1972) concluded that the effect of aid on savings is negative, because only a part of foreign aid is used for investment and the rest is used for consumption. Foreign aid generally does not cause an outflow of funds from the recipient country.

Based on Chenery and Strout (1966), we test the following equation for each one of the four countries in our sample:

$$S = a_0 + b_0 f + c_0 y \qquad (1)$$

where

S = Gross domestic savings divided by GDP

f = total international net official development assistance (ODA) and official aid received (current US\$) or total net bilateral aid flows from DAC donors (current US\$)

y = per capita GDP.

By using F-distribution, our hypothesis is:

H_o: $b_o = c_0 = 0$ which means that neither of the two explanatory variables is significant for gross domestic savings, R^2 insignificant; and

H_1: b_o, $c_0 \neq 0$ which means that at least one of the two explanatory variables is different from zero, R^2 significant.

We are examining four countries in east Europe: Croatia, Estonia, Lithuania and Slovenia. Data are collected from World Bank national accounts data and OECD National Accounts data files.

GDP per capita is GDP divided by mid-year population. GDP is the sum of gross value added by all resident producers in the economy plus any product taxes and minus any subsidies not included in the value of the products. It is calculated without making deductions for the depreciation of fabricated assets or for the depletion and degradation of natural resources. Data are in current US dollars.

Gross domestic savings are calculated as GDP less final consumption expenditure (total consumption).

Net ODA consists of disbursements of loans made on concessional terms (net of repayments of principal) and grants by official agencies of the members of the DAC, by multilateral institutions and by non-DAC countries to promote economic development and welfare in countries and territories in the DAC list of ODA recipients. It includes loans with a grant element of at least 25% (calculated at a rate of discount of 10%). Net official aid refers to aid flows (net of repayments) from official donors to countries and territories in Part II of the DAC list of recipients: the more advanced countries of Central and Eastern Europe, the countries of the former Soviet Union and certain advanced developing countries and territories. Official aid is provided under terms and conditions similar to those for ODA. Part II of the DAC List was abolished in 2005. The

collection of data on official aid and other resource flows to Part II countries ended with 2004 data. Data are in current US dollars.

Net bilateral aid flows from DAC donors are the net disbursements of ODA or official aid from the members of the DAC. Net disbursements are gross disbursements of grants and loans minus the repayments of the principal on earlier loans. ODA consists of loans made on concessional terms (with a grant element of at least 25%, calculated at a rate of discount of 10%) and grants made to promote economic development and welfare in countries and territories in the DAC list of ODA recipients. Official aid refers to aid flows from official donors to countries and territories in Part II of the DAC list of recipients. Official aid is provided under terms and conditions similar to those for ODA. DAC members are Australia, Austria, Belgium, Canada, the Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Japan, the Republic of Korea, Luxembourg, Netherlands, New Zealand, Norway, Poland, Portugal, the Slovak Republic, Slovenia, Spain, Sweden, Switzerland, the United Kingdom, the United States and EU institutions. Regional aggregates include data for economies not specified elsewhere. World and income group totals include aid not allocated by country or region. Data are in current US dollars.

4   Empirical Results

We tested Eq. (6.1) for Croatia, Estonia, Lithuania and Slovenia. Our results appear in Table 6.1.

4.1   Croatia

Our regression equation estimates S_C (gross domestic savings divided by GDP in Croatia), f_C (total international net ODA and official aid received in Croatia) and y_C (per capita GDP in Croatia) for a 16-year period, 1995–2010 (values in parenthesis are the coefficients t statistics). The results show that total international net ODA and official aid received has a positive correlation with gross domestic savings and it is not statistically

Table 6.1 Regression equations for four east European member states

	NODA	Bilateral
Croatia	$S_c = 7.8804 + 855.5441fc + 0.0009y_c$	$Sc = 8.4729 + 777.2528fc + 0.0009yc$
	(3.09) (1.48) (5.26)[a]	(3.34) (1.21) (5.03)[a]
Estonia	$S_E = 22.5807 - 199.6714f_E + 0.0008y_E$	$S_B = 22.5355 - 211.7047f_E + 0.0008y_E$
	(4.36) (−0.64) (1.86)	(4.33) (−0.63) (1.95)
Lithuania	$S_L = 9.8734 + 16.0419f_L + 0.0009y_L$	$S_L = 9.9237 + 13.0877f_L + 0.0009y_L$
	(6.90) (0.21) (3.66)[a]	(7.22) (0.17) (3.65)[a]
Slovenia	$S_S = 19.3248 + 146.0429f_S + 0.0004y_S$	$S_S = 19.2780 + 159.8428f_S + 0.0004y_S$
	(7.91) (0.57) (2.69)[a]	(8.08) (0.62) (2.74)[a]

[a]Denotes statistical significance at the 5% level

significant at the 5% confidence level. Per capita GDP has a positive correlation with gross domestic savings and is statistically significant at the 5% confidence level. As a whole, using the F-distribution, the results show that one explanatory variable (total international net ODA and official aid received) is significant in its effect on gross domestic savings divided by GDP (the H_1 hypothesis is accepted). Moreover, our equation explains 82.85% of the variation in gross domestic savings in statistical terms.

In addition, we tested the effect of total net bilateral aid flows from DAC donors using data for the same (16-year) period. Major net bilateral flows from DAC donors were from the USA and France. Our derived statistical results are exactly the same as those we obtained by using Net Official Development Assistance (NODA).

4.2   Estonia

Our regression equation estimates S_E (gross domestic savings divided by GDP in Estonia), f_E (total international net ODA and official aid received in Estonia) and y_E (per capita GDP in Estonia) for a 10-year period, 1995–2004 (values in parenthesis are the coefficients t statistics). The results show that total international net ODA and official aid received has a negative correlation with gross domestic savings, but this is not statistically significant at the 5% confidence level. Per capita GDP has a positive correlation on gross domestic savings but is not statistically significant at the 5% confidence level. As a whole, using the F-distribution, the results

show that neither explanatory variable is significant on gross domestic savings divided by GDP (the H_0 hypothesis is accepted). Furthermore, our equation explains 70.08% of the variation in gross domestic savings in statistical terms.

In addition, we tested the effect of total net bilateral aid flows from DAC donors (variable f_E) using data for the same (10-year) period. Major net bilateral flows from DAC donors were from the USA and Sweden. Our derived results show again that neither explanatory variable is statistically significant. Moreover, our equation explains 69.99% of the variation in gross domestic savings in statistical terms.

4.3   Lithuania

Our regression equation estimates S_L (gross domestic savings divided by GDP in Lithuania), f_L (total international net ODA and official aid received in Lithuania) and y_L (per capita GDP in Lithuania) for a 10-year period, 1995–2004 (values in parenthesis are the coefficients t statistics). The results show that both explanatory variables are positively correlated with gross domestic savings, but only per capita GDP in Lithuania is statistically significant at the 5% confidence level.

As a whole, using the F-distribution, our equation explains 81.01% of the variation in gross domestic savings in statistical terms.

In addition, we tested the effect of total net bilateral aid flows from DAC donors (variable f_L) using data for a 10-year period, 1995–2004. Major net bilateral flows from DAC donors were from Sweden, Japan, France and Finland. Our derived results for total net bilateral aid flows from DAC donors show that per capita GDP has a significantly positive effect on gross domestic savings divided by GDP. It explains 80.97% of the variation in gross domestic savings in statistical terms.

4.4   Slovenia

Our regression equation estimates S_S (gross domestic savings divided by GDP in Slovenia), fs (total international net ODA and official aid received in Slovenia) and y_S (per capita GDP in Slovenia) for a 10-year

period, 1995–2004 (values in parenthesis are the coefficients t statistics). The results show that total international net ODA and official aid received are positively correlated with gross domestic savings and are not statistically significant at the 5% confidence level. Per capita GDP has also a positive effect on gross domestic savings but is statistically significant at the 5% confidence level. As a whole, using the F-distribution, our results show that no explanatory variable is significant (the H_1 hypothesis is accepted) and our equation explains 72.85% of the variation in gross domestic savings in statistical terms.

In addition, we test the effect of total net bilateral aid flows from DAC donors (variable fs) using data for the same 14-year period. Major net bilateral flows from DAC donors were from the USA and Sweden. Our derived results for total net bilateral aid flows from DAC donors are exactly the same as those we obtained by using NODA. It explains 73.13% of the variation in gross domestic savings in statistical terms.

5   Conclusions and Implications

The purpose of this chapter is to examine the impact of international development assistance on economic growth in the case of four east European member states—Croatia, Estonia, Lithuania and Slovenia—that fall into two different innovation performance groups, during a maximum period of 16 years (1995–2010), by following a behavioural equation of flows, not an accounting identity.

According to the gap model developed by Chenery and Strout (1966), foreign aid positively affects domestic savings. Foreign aid as additive to domestic savings is expected to cause an increase in economic growth and domestic savings.

Our empirical results do not support this hypothesis. We have shown that both international net ODA and official aid received, as well as net bilateral aid flows from DAC donors, have no statistically significant effect on gross domestic savings into two different innovation performance groups. In all four European member states only per capita GDP is statistically significant at the 5% confidence level.

For Slovenia, a Strong Innovator, net ODA and official aid received and total net bilateral aid flows from DAC donors are positively correlated with gross domestic savings and are not statistically significant at the 5% confidence level. Only per capita GDP is statistically significant at the 5% confidence level and has also a positive effect on gross domestic savings. But as a whole, using the F-distribution, no explanatory variable is significant.

For Croatia and Lithuania, two Moderate Innovators, only per capita GDP has a positive correlation with gross domestic savings and is statistically significant at the 5% confidence level.

Our results are not surprising. They are in line with similar results found by Rajan and Subramanian (2005), Werker et al. (2009) and Mallik (2008) with different data sets and variable specifications. Our results are also consistent with Bauer (1972), who regards foreign aid as a failure for recipient countries because it destroys economic incentives and leads to misallocation of scarce resources and rent-seeking, and finally reduces recipient countries' economic growth (see also Berrittella and Zhang 2012). Brautigam and Knack (2004) also found evidence that higher aid levels are associated with larger declines in the quality of governance and a lower tax effort in the case of Africa. Finally, Economides et al. (2008), based on Drazen (2000), showed that foreign aid transfers can distort individual incentives, and hence hurt growth, by encouraging rent-seeking and corruption in recipient countries, as opposed to productive activities.

Since 1990, the international community has released a significant amount of foreign aid to east Europe, totalling 2.2–3% of recipients' GDP. The aim is to help the reconstruction of the region and bring political stability and economic prosperity.

Our results suggest that if aid is to be effective (in the future), both the international community and the recipient countries should reconsider the appropriate conditions of support, placing more emphasis on the consistency of criteria under which donor funding is committed and on institutional and social development in recipient countries, so as to discourage rent-seeking behaviour and improve the quality of governance.

Notes

1. The main theoretical explanations as regards rent-seeking behaviour are found in Tullock (1980), Krueger (1974), Baumol (1990) and Murphy et al. (1991). Bhagwati (1982) provides a synthesis of the welfare analysis of rent-seeking activities. More recently, Conlon and Pecorino (2004) study policy reforms in a model with rent-seeking.

References

Adelman, I., & Chenery, H. (1966). Foreign aid and economic development: The case of Greece. *The Review of Economics and Statistics, 48*(1), 1–19.

Alesina, A., & Weder, B. (2002). Do corrupt governments receive less foreign aid? *American Economic Review, 92*(4), 1126–1137.

Ang, J. B. (2010). Does foreign aid promote growth? Exploring the role of financial liberalization. *Review of Development Economics, 14*(2), 197–212.

Bauer, P. (1972). *Dissent on development*. Cambridge, MA: Harvard University Press.

Baumol, W. (1990). Entrepreneurship: Productive, unproductive, and destructive. *Journal of Political Economy, 98*(5), 893–921.

Berrittella, M., and Zhang, J. (2012). *A global perspective on effectiveness of aid for trade* (Policy research working paper 6126). Washington, DC: World Bank.

Bhagwati, N. J. (1982). Directly unproductive, profit-seeking (DUP) activities. *Journal of Political Economy, 90*, 988–1002.

Boone, P. (1996). Politics and the effectiveness of foreign aid. *European Economic Review, 40*(2), 289–329.

Brautigam, D. A., & Knack, S. (2004). Foreign aid, institutions, and governance in sub-Saharan Africa. *Economic Development and Cultural Change, 52*(2), 255–285.

Burhop, C. (2005). Foreign assistance and economic development: A re-evaluation. *Economics Letters, 86*(1), 57–61.

Burnside, C., and Dollar, D. (1997). *Aid, policies, and growth* (Policy research working paper no. 1777). Washington, DC: World Bank.

Burnside, C., & Dollar, D. (2000). Aid, policies and growth. *The American Economic Review, 90*(4), 847–868.

Burnside, C., and Dollar, D. (2004). *Aid, policies and growth: Revisiting the evidence* (Policy research working paper no. O-2834). Washington, DC: World Bank.

Chenery, H., & Strout, A. (1966). Foreign assistance and economic development. *American Economic Review, 56*(4), 679–733.

Collier, P., and Deh, J. (2001). *Aid, shocks, and growth* (Policy research working paper no. 2688). Washington, DC: World Bank.

Collier, P., & Dollar, D. (2001). Can the world cut poverty in half? How policy reform and effective aid can meet the international development goals. *World Development, 29*(11), 1787–1802.

Collier, P., & Dollar, D. (2002). Aid allocation and poverty reduction. *European Economic Review, 46*(8), 1475–1500.

Collier, P., and Hoeffler, A. (2002). *Aid, policy, and growth in post-conflict societies* (Policy research working paper no. 2902). Washington, DC: World Bank.

Conlon, R. J., & Pecorino, P. (2004). Policy reform and the free-rider problem. *Public Choice, 120*, 123–142.

Dalgaard, C., Hansen, H., & Tarp, F. (2004). On the empirics of foreign aid and growth. *The Economic Journal, 114*(496), 191–216.

Dhakal, D., Upadhyaya, K., & Upadyay, M. (1996). Foreign aid, economic growth and causality. *Rivista Internazionale di Scienze Economiche e Commerciali, 43*(3), 597–606.

Djankov, S., Montalvo, J., & Reynal-Querd, M. (2006). Does foreign aid help? *Cato Journal, 26*(1), 1–28.

Doucouliagos, H., & Paldam, M. (2009). Conditional aid effectiveness: A meta-analysis. *Journal of International Development, 21*(7), 1582–1601.

Dowling, M., & Hiemenz, U. (1982). *Aid, savings and growth in the Asian region, Economic office report series 3*. Manila: Asian Development Bank.

Drazen, A. (2000). *Political economy in macroeconomics*. Princeton: Princeton University Press.

Easterly, W. (2003). Can foreign aid buy growth? *The Journal of Economic Perspectives, 17*(3), 23–48.

Easterly, W., Levine, R., & Roodman, D. (2003). *New data, new doubts: Revisiting aid, policies and growth*. Washington, DC: Center for Global Development mimeo.

Economides, G., Kalyvitis, S., & Philippopoulos, A. (2008). Does foreign aid distort incentives and hurt growth? Theory and evidence from 75 aid-recipient countries. *Public Choice, 134*(3), 463–488.

Ekanayake, E., & Chatrna, D. (2010). The effect of foreign aid on economic growth in developing countries. *Journal of International Business and Cultural Studies, 3*(2), 1–13.

European Innovation Scoreboard. (2017). European Commission.

Friedman, M. (1958). Foreign economic aid. *Yale Review, 47*(4), 501–516.

Gomanee, K., Girma, S., & Morrisey, O. (2005). Aid and growth in sub-Saharan Africa: Accounting for transmission mechanisms. *Journal of International Development, 17*(8), 1055–1075.

Gounder, R. (2001). Aid-growth nexus: Empirical evidence from Fiji. *Applied Economics, 33*(8), 1009–1019.

Griffin, K. (1970). Foreign capital, domestic savings and economic development. *Oxford Bulletin of Economics and Statistics, 32*(2), 99–112.

Griffin, K., & Enos, J. (1970). Foreign assistance: Objectives and consequences. *Economic Development and Cultural Change, 18*(3), 313–327.

Gupta, K. L., & Islam, M. A. (1983). *Foreign capital, savings and growth—An international cross-section study.* Dordrecht: Reidel Publishing Company.

Hansen, H., & Tarp, F. (2000). Aid effectiveness disputed. *Journal of International Development, 12*(3), 375–398.

Hatemi, J., & Irandoust, M. (2005). Foreign aid and economic growth: New evidence from panel co-integration. *Journal of Economic Development, 30*(1), 71–80.

Holder, R. (2004). Redistribution to rent seekers. In *Foreign aid and economic growth*. Bern: Universität Bern Volkswirtschaftliches Institut.

Huliaras, A. (2011). Foreign aid to the Balkans (1990–2010): The dynamics of the 'silent' human security agenda. *Southeast European and Black Sea Studies, 11*(4), 421–434.

Inanga, E., & Mandah, E. (2008). Foreign aid finance and economic development: The case of two foreign aid financing agencies in Zambia. *International Research Journal of Finance and Economics, 14*, 322–358.

Jensen, P. S., and Paldam, M. (2003). *Can the new aid-growth models be replicated?* (Working paper no. 17) Aarhus: Institute for Economics.

Karras, G. (2006). Foreign aid and long-run economic growth: Empirical evidence for a panel of developing countries. *Journal of International Development, 18*(7), 15–28.

Kekic, L. (2008). Aid to the Balkans: Addicts and pushers. *Southeast European and Black Sea Studies, 1*(1), 20–40.

Knack, S., & Keefer, P. (1995). Institutions and economic performance: Cross-country tests using alternative institutional measures. *Economics and Politics, 7*(3), 207–227.

Knack, S., & Keefer, P. (1997). Does social capital have an economic payoff? A cross-country investigation. *Quarterly Journal of Economics, 112*(4), 1251–1287.

Krueger, A. (1974). The political economy of the rent-seeking society. *American Economic Review, 64*(3), 291–303.

Levy, V. (1988). Aid and growth in sub-Saharan Africa: The recent experience. *European Economic Review, 32*(9), 1777–1795.

Lewis, W. A. (1954). Economic development with unlimited supplies of labor. *Manchester School, 22*, 139–192.

Liargovas, P., & Repousis, S. (2011). Underground banking or hawala and Greece-Albania remittance corridor. *Journal of Money Laundering Control, 14*(4), 313–323.

Lloyd, T., Morrissey, O., and Osei, R. (2001). *Aid, exports and growth in Ghana* (CREDIT research paper no.01/01). Nottingham: University of Nottingham. Centre for Research in Economic Development and International Trade.

Mallik, G. (2008). Foreign aid and economic growth: A co-integration analysis of the six poorest African countries. *Economic Analysis and Policy, 38*(2), 251–260.

Mauro, P. (2002). *The persistence of corruption and slow economic growth* (IMF working paper 02/213). Washington, DC: International Monetary Fund.

Mosley, P. (1980). Aid, savings and growth revisited. *Oxford Bulletin of Economics and Statistics, 42*(2), 79–95.

Mosley, P., Hudson, J., & Horrell, S. (1987). Aid, the public sector and the market in less developed countries. *Economic Journal, 97*(387), 616–641.

Mubarak, A. (2008). Role of foreign assistance in economic development of Pakistan. *International conference on applied economics*, Kastoria, Greece, 15–17 May.

Murphy, K., Shleifer, A., & Vishn, R. (1991). The allocation of talent: Implications for growth. *Quarterly Journal of Economics, 106*(2), 503–530.

Murty, V. N. R., Ukpolo, V., & Mbaku, J. M. (1994). Foreign aid and economic growth in Cameroon: Evidence from cointegration tests. *Applied Economics Letters, 1*(10), 161–163.

Nushiwat, M. (2007). Foreign aid to developing countries: Does it crowd-out the recipient countries' domestic savings? *International Research Journal of Finance and Economics, 11*, 94–102.

Ouattara, B., and Strobl, E. (2004). *Disaggregating the aid and growth relationship* (School of Economic Studies discussion paper 0414). Manchester: University of Manchester.

Pallage, S., & Robe, M. (2001). Foreign aid and the business cycles. *Review of International Economics, 9*(4), 641–672.

Papanek, G. F. (1972). The effect of aid and other resource transfers on savings and growth in less developed countries. *Economic Journal, 82*(327), 934–950.

Rajan, R. G., and Subramanian, A. (2005). *Aid and growth: What does the cross-country evidence really show?* (IMF working paper no. 05/127). Washington, DC: International Monetary Fund.

Ram, R. (2004). Recipient country's policies' and the effect of foreign aid on economic growth in developing countries: Additional evidence. *Journal of International Development, 16*(2), 201–211.

Roodman, D. (2003). *The anarchy of numbers: Aid, development and cross-country empirics* (CGD working paper 32). Washington, DC: Centre for Global Development.

Rostow, W. W. (1960). *The stages of economic growth: A non-communist manifesto*. Cambridge: Cambridge University Press.

Svensson, J. (1999). Aid, growth and democracy. *Economics and Politics, 11*(3), 275–297.

Svensson, J. (2000). Foreign aid and rent-seeking. *Journal of International Economics, 51*(2), 437–461.

Tavares, J. (2003). Does foreign aid corrupt? *Economics Letters, 79*(1), 99–106.

Tullock, G. (1980). Efficient rent-seeking. In J. Buchanan, R. Tollison, & G. Tullock (Eds.), *Towards a theory of the rent-seeking society* (pp. 97–112). College Station: Texas A&M University Press.

Weisskopf, T. (1972). The impact of foreign capital inflows on domestic savings in underdeveloped countries. *Journal of International Economics, 2*(1), 25–38.

Werker, E., Faisal, A. Z., & Cohen, C. (2009). How is foreign aid spent? Evidence from a natural experiment. *American Economic Journal: Macroeconomics, 1*(2), 225–244.

World Bank. (1998). *Assessing aid: What works, what doesn't, and why*. New York: Oxford University Press.

7

Impact of Innovation and Change Management on Employees' Performance

Demetris Vrontis, Sam El Nemar, Bernard Al Osta, and Joseph Raymond Azizi

1   Introduction

1.1   Background of the Study

One of the most challenging aspects of leadership is to understand how to lead and manage organisational dynamics and innovation inside an organisation. Thus, recognising the need for this change and innovation is essential. Since the turn of the century and after technological innovations and huge economic and political changes, the need for assessing

D. Vrontis
School of Business, University of Nicosia, Nicosia, Cyprus
e-mail: vrontis.d@unic.ac.cy

S. El Nemar (✉)
School of Business, AZM, Tripoli, Lebanon

B. Al Osta • J. R. Azizi
School of Business, LIU, Beirut, Lebanon

employee performance has become necessary. Recently, many theorists have argued that "change and innovation are dramatically increasing in firms and mostly all firms face many types of innovation and change during their lifecycle" (Burnes 2011, p. 24).

Innovation and change management are considered core concepts in strategic management and leadership management. Technological innovation and continuous change in the organisational environment are important factors determining organisational effectiveness. Innovation is crucial for organisational success, as is coping with organisational changes (Christensen and Laegreid 2010).

Organisational change and innovation aims to help employees and understand their concerns about current changes and new techniques for innovation. The change and innovation literature has always been related to the huge impact these factors have on different organisational aspects. Studies are very limited when it comes to the impact of change and innovation management on employee performance. This chapter aims to redress this (Campbell 2001).

1.2   Aims and Hypothesis

Innovation and change, if well applied, are a determinant for success for organisations and represent factors that can greatly affect organisational performance. Nowadays, organisational change and innovation management are essential in a rapidly changing economic world, imposing dramatic change and fast-paced innovation. All these factors affect organisations in different ways.

The main research problem for this chapter is to study the relation between change and innovation management in organisations and their impact on employee performance. Thus, the main problem of this research chapter can be summed up in the following research question:

RQ – Does change and innovation management impact employee performance?

Managing change as well as applying innovation in a structural way in an organisation is crucial for its success. The main objectives of this chapter are:

RO1 – To measure the influence of change and innovation managerial strategies on employee performance.

RO2 – To identify the nature of the relation between change and innovation management and employee performance.

The research hypotheses to be studied in this chapter are:

H1: Communication of upcoming change influences employee performance.

H2: Satisfaction with change influences employee performance.

H3: Employee perception of change influences employee performance.

H4: Employee perception of innovation influences employee performance.

The hypotheses are designed to investigate the influence of change and innovation management on employee performance. These hypotheses, if correct, would prove that both variables affect employee performance.

2 Literature Review

2.1 Phenomenon of Change

A company's welfare is largely based on four vital factors: quality, act of its teaching, administration and industry division. Research has revealed that the majority of companies function to protect themselves against uncertainty. Therefore, most companies, whether public or personal, show no need to aim at change for the sake of change (Amit and Schomaker 2010).

In contrast, many researchers have seen that nationwide or international community divisions are ineffectual and unproductive. To alter this unconstructive evaluation, organisations must improve their performance by preserving a concrete base of values, appropriate strategies, work cultures and ethics in order to be successful. Both employers and employees have to adapt their view of change (Goodman and Truss

2011). In consequence, organisations are likely to outperform their competitors if they consider efficiency and effectiveness and embrace change. A study on public and private institutions showed that public division organisations can function and perform better than non-public ones as they are essentially familiar with terms of quality (Freeman 2013).

2.2   Definition of Organisational Change

Sorensen (2014), believes it is challenging to define "change" accurately without submitting to the general notion of change, which is "a new state of things, diverse from the old state of things". Organisational change is not easy. As its name suggests, "organisational change" refers to changes happening in organisational behaviour. However, this alone does not help us understand the concept; it does not mention the types of change involved.

Second-degree change, characterised by radical and definitive change, is another essential factor, one which consists of determining the appearance of change. Adding to the previous ideas, we can easily identify organisational change as innovation. Innovation may refer to a technology, product or practice used by an organisation for the first time. It does not matter if this was previously used by other corporations or not (Lewin 2004).

2.3   Change and its Effects

The interdependence between the substance and the course of change might have a harmful effect if the results are unsuitable for the situation. Walker (2014) defined the criteria for success in accordance with goals, deadline and budget. He later stated that inappropriately defined goals and budget would lead to problems, even if the organisation attained its initial goals. That is, the implementation of change alone will not enhance an organisation's performance (Walker 2014).

To validate this study, Kotter (2006) set out eight errors that lead to disadvantages in change supervision: providing too much satisfaction in the organisation; an inability to generate apparent and influential strategies; a limited vision in conditions of potential preparation; a shortness of communication in the organisation; a failure to handle issues straight away; attention to long-term growth at the expense of short-term benefits; and the belief that change has been accomplished before this is in fact the case.

2.4   Types of Change

As organisational change encompasses many aspects, two main dimensions help express change better (Korn 2011): defining intentional change; and comparing radical change to gradual and tectonic changes. Intentional change can be affected by an occurrences exterior to the organisation. Organisations can relay that change to external main proceedings as part of changes originated as responses to an event or a sequence of events (reactive changes). As the name indicates, changes based on predictable events are known as anticipatory changes. The best known way to categorise organisational change depends on how essential a change appears (Christensen and Laegreid 2010).

Every researcher has his or her own method of grasping the chief dissimilarity between kinds of change. Many authors make a distinction between radical change and gradual change; they consider the former a type of development. Other researchers suggest a third type of change—tectonic change—because they believe the initial two types of change, the radical and the gradual, cannot mesh with a genuine framework of change (Reger and Welsh 2004). Reger and Welsh (2004) simplified tectonic change by reference to a distinction between the existing organisations and ideal organizations. This type of change shows the need for change with a lower level of stress. The practical classification, as seen from a managerial perspective, connects to the level of change and the degree to which the organisation is affected by it (Bresciani et al. 2013). For example, a low-level change is based on the reorganisation of job structures while a change at the level of the whole organisation affects all processes in operation (Aosa 1992).

2.5   The Process of Change

The most familiar and realistic categorisation of organisational change is based on two different types: planned change, and random or emerging change. While planned change is formal and obligatory, random change is informal and has its origins outside the organisation (Bain 2010).

Planned change originates from within an organisation and appears to be a response to needs in the environment. It is characterised as a practical change which individuals in the organisation implement by anticipating environmental change or by following their own original ideas. The fundamental element of this type of change derives from "planning"—it involves planning the change. According to Mintzberg (1996), part of the procedure for the implementation occurs after the strategy has been established. From his outlook and point of view, planned change must first be formulated in organised practices of well-led events and monitored by regular observation. As a result, the state which an organisation must reach and the means by which it will do this are declared openly (Mintzberg 1990).

The opposite type of change—emerging or random change—is not widely used. This change occurs from the constant actions of the organisation's associates, as they regularly deal with conflicts and opportunities (Baraboux 2011). As explained above, this change has its origins outside the organisation; the leaders produce the vision of change and the employees implement this vision gradually. This implementation will start from the lower level, leading to foremost organisational change (Bain 2010).

To date, there has been no research that clearly states or proves the superiority of either type. As shown, planned change is at the foundation of the main theory of organisational change; it highlights the significance of calculating and planning the course of change until it is accomplished.

2.6   Theories of Organisational Change

Managers have introduced different reasons varying from a reaction to inner or environmental pressure, leading to tactical changes, in order to enlarge the association. Such reasons, along with most organisational

changes, are planned, intentional changes. They develop in a short period because they take place at an organisation level, unlike those taking place at a macro level. The operator of change is another dimension that can be easily identified. In the case of organisational change, the following theories of organizational change have a primary function that can help us identify another significant difference. For instance, by measuring a set of reasons specific to the system, both previous to and following the change, we will be able to measure the effects of a change. This variation represents the effect of the intervention. As for the system, its very core principles are based on estimating the difference between two different phases at different moments (Bain 2010).

There are two ways of classifying organisational change. The first refers to the description of the process which analyses the change instead of providing standard ways for applying it. The second refers to providing a clarification for the methods of implementing a planned change. Leavitt (1972) provided one of the most well-known analytic models of the two presented in each approach. He considered that organisations are multivariate systems with at least four vital variables: objective, formation, players and technology. Below are the main theories relating to change management:

Leavitt's Diamond According to Leavitt, "structure" means the structure of influence, accountability, statement and work associations. These variables are symbolised in various ways. For example, players are represented by the workers of the organisation and technology—the totality of instruments and techniques—is a way to achieve goals. Goals are considered the raison d'être, the basis for the existence and functioning of an organisation. Based on these variables, we now have the ground for change represented by four essential kinds. There is a strong relationship between these variables, showing the level of interdependence between them; if one is modified, the others would also be altered (Leavitt 1965).

Lewin's Theory on Change In Lewin's view, the process of change involves three stages (Lewin 2004). The first is *Unfreezing*: this can be applied as a prologue in the system of information to demonstrate the occurrence of a discrepancy between the authentic behaviour and the

preferred behaviour of recruits in order to diminish the forces that preserve the system's behaviour. The second stage is *Change proper*: this step consists of developing new values, attitudes and behaviours across the organisational structures and procedures in order to adjust the organisation's behaviour, achieving an additional level of preparation. The third and final stage is *Refreezing*: in order to strengthen the recently introduced fundamentals, research tends to rely on this step to smooth the new phase of the organisation via organisational culture, standards, guidelines and structures. The three stages of the change process that Lewin (2014) recommended focus on introducing an organisational change rather than developing an organisational change.

Edgar Schein Enhancement of Lewin's Model The current model, just like the previous one, aims at formulating methods of interference based on examining change theoretically. For this reason, Edgar Schein (2014) enhanced Lewin's model by attaching consistent psychological mechanisms to every stage. The lack of confirmation in Stage 1 produces uneasiness, generating a need for change in that person based on blame and concern. Nevertheless, to "attain" a new behaviour, an individual must not feel uncomfortable leaving his/her old behaviour because this will lead to failure (Schein 2014; Singh 2014). Stage 2 involves change through a procedure of cognitive restoration by acquiring information and confirmation for change to appear positive and pleasing. Moreover, by becoming conscious of the expenses and risks of his/her old state, the subject will experience this proof with an inspiring quality attained by his/her recognition of other people that have gone through a similar process. The stage of refreezing consists of finding out whether, through testing, the new state is apt or not for this individual and for his/her social framework. Therefore, having a core aim in acquiring a new behaviour outline in that person's system of principles and manners is not the only characteristic of this procedure.

Watson and Westley's Seven-Stage Model The preliminary three-stage model suggested by Lewin's model was then improved to a seven-stage

model (Bruke 2012), taking account of the occurrence of and increasing the need for change. This stage corresponds to the unfreezing stage in Lewin's model. The first step begins by setting up a background of relations connected to change. In this phase, the relation between the client-system and a proxy of change from outside the organisation is established. The second aims to improve the examination of the client-system. The third step inspects the additional goals and objectives, setting out the objectives and purposes for the action plan. The fourth step rotates objectives into real determinations to change. The fifth simplifies the change. This segment resembles the period of refreezing in Lewin's model. The final stage determines a final connection, closing the client professional relationship. As may be observed, this points to a model that illustrates the structure of organizational dynamics and consultancy activity.

In any OD interference, we must take into consideration the fact that the outer agent or advisor might be overwhelmed with difficulties and has not yet learned to solve these matters. Therefore, another concept of organisational change has been developed. Bruke's (2012) initial argument is the modification between evolutionary concept and revolutionary speculation. The former considers directorial change as a slow procedure involving slight alterations of the system, which are then enlarged over time by environmental forces. There is slight interference by management. As for revolutionary change, it might place the organisation under many burdens due to the rapidity of the change. Leaders take a dynamic part in the process because they are highly noteworthy and possibly hasty; therefore, amplified stress is placed on expectation, participation and creativity (Bruke 2012).

2.7   Innovation Management

Since creativity, innovativeness and innovation are all connected ideas that are often used interchangeably, we do not have a commonly acknowledged description of innovation. According to Schumpeter (1984), scientific problems prompt new ideas, which then nourish the search for further innovation. In his view, innovation is the introduction of a new

invention, procedure, technique or structure. Increasing numbers of researchers and academics have fixated on factors of individual innovation because creativity is seen as a valuable means to improve creative or innovative behaviour that involves constructing obligatory jobs and processing responsibilities in a unique way in order to understand what drives employees to be creative (Schumpeter 1984).

Based on Bond and Flaxman's (2006) studies, to assist employees' learning and innovation skills, surveys have suggested that learning strategies in the organisation promote new ideas. This theory was supported by Holman et al. (2012), who demonstrated that the factor of work based on learning strategies reinforces the relationship between job characteristics and innovation. According to Fernandez and Moldogaziev (2013), numerous aspects such as the nature of individual innovations empower practices so as to produce innovative applications such as authority, assets, data and recompense (Flaxman 2006; Christensen and Laegreid 2010; Holman et al. 2012; Christofi et al. 2015).

In Estonian enterprises, studies proved that leadership factors such as devotion, affect and specialised admiration are essential to forecasting an innovative environment. On the other hand, other studies proposed by Cingöz, A. and Akdoğan (2013) showed that anticipated results and expected performance improvements are directly associated with innovative behaviour. In order to support the creative performance of individuals, we must rely on two major aspects: climate and leadership (Cingoz and Akdogan 2010). Furthermore, the climate for innovation symbolises the desires of the employees, which include the proper organisation, an effective working atmosphere, organisational communication and pattern communication. Executives can express their deliberations by discussing constructive results and celebrate small wins. Instead of dwelling on employees' mistakes, managers must tell stories of achievement, motivate employees and point out their strengths and weaknesses in order to improve their skills (Gibbert 2010; Awitta 2014). Other studies have suggested that, through the mediating factor of fundamental motivation at the individual level, ethical and moral leadership is a forecaster of individual innovation. Previous studies have proposed that showing the impact of the working climate on the inno-

vation strategy remains restricted and incomplete. Additionally, the climate for innovation is also an outstanding aspect for academics and research establishments. The increasingly divergent role among work and family demands practised by most functioning individuals in workplaces had led to the increased regularity of stress and burnout. Moreover, role stress consists of role vagueness and role conflict. Inter-role conflict has two significant types. Work–family conflict refers to the concept of work demands interfering with family life, while family–work conflict refers to the notion that involvement in the family obstructs the development of the work of the organisation (Awitta 2014).

According to Awitta's (2014) research, inter-role conflict connects with the three dimensions of burnout: elevated exhaustion, increased depersonalisation with others, and a lowered feeling of achievement. This statement was based on the U-shaped affiliation between pressure and innovative presentation. Another research focused on the notion that the innovative performance of employees is affected by the aspects of role stress, mediated with the low apparent support for innovation. Furthermore, the study examined the role of conflict as an intermediary in the leader–association exchange and the stress relationship. While work role flexibility increases the work satisfaction, work–family and family–work conflicts decrease it (Lewin and Patterson 2012).

3   Methodology

3.1   Research Philosophy and Approach

Logical problem solving uses two different types of reasoning: inductive and deductive. Using the inductive technique, a researcher observes a certain phenomenon, transforms it into a certain pattern, and tests the hypotheses to come up with a theory. As for the deductive reasoning technique, it works from "top to bottom". First, a researcher comes up with a theory of a certain topic, then narrows it down to more specific "hypotheses" to be tested later on. Therefore, the hypothesis should be tested with a confirmatory data technique. The theoretical approach of

this chapter is a "deductive" one. It starts with a theory on the impact of challenge and innovation management on employee performance. Then a hypothesis on this topic is formed, data is collected and analysed, the research hypothesis is tested and the outcome is observed. It is important to mention that a case study is used to conduct the research over a sample of candidates.

Data collection method is an important part of scientific research. Two main methods, qualitative and quantitative, are used (solely or together) in order to conduct research and obtain the necessary information. This is in addition to a research philosophy being adopted throughout the research process.

The qualitative data technique is used to measure information that cannot be measured by numbers. It uses in-depth interviews, observations, focus groups and other methods to study a certain situation. Data collected through qualitative methods is mainly analysed through human interpretations.

In this chapter, a quantitative data collection approach will be used; numerical data is collected in order to generate accurate information representing the studied hypotheses. Such an approach is important for the collection of fundamental statistical data, helping in undertaking an objective analysis of collected data with a broader survey of participants, as well as generating accurate findings and results.

3.2   Research Design and Tools

Based on the methodological choice of this chapter, questionnaires are distributed to a specific sample of respondents, mainly employees working at organisations facing continuous change. Why use questionnaires? Mostly because of their time and cost efficiency for the researcher, in addition to the fact that many studies agreed on the increased honesty of responses collected using questionnaires.

As a sample size, this study collects data from approximately 100 employees working in the health sector. The sampling technique is a "random sampling technique", where all population members are given equal

selection. This sample presents a good reflection of the desired population in northern Lebanon.

The sampling technique is convenient as it:

- ensures an equal chance of representation among all members of the selected population;
- helps in giving a good representation of the population;
- is time efficient;
- is easy to carry out sample comparison to probability sampling.

The questionnaire is divided into four main parts. The first part is designated for demographic variables: age, gender, financial status and marital status. The second part covers different variables analysed through SPSS, using the Chi-square test. The variables are selected according to the literature review and the designed research model. The main set of variables is divided into: satisfaction with change; change communication; perception of change; and perception of innovation.

The questionnaire is scaled using the "Likert scale" method using a five-point measurement scale where all employees can express their opinion subjectively. The Likert scale coding is as follows: "1" = Highly Disagree; "2" = Disagree; "3" = Neutral; "4" = Agree; and "5" = Highly Disagree.

The validity of the data provided in this chapter is guaranteed by making sure that all of the main variables in the topic are covered. To ensure the reliability and validity of the study, the questionnaire is designed in a way that all ethical norms are taken into consideration. An ethical questionnaire guarantees that all collected data is valid and reliable, avoiding any kind of bias. Here, all questions are investigated without any influence on the respondents' choices. They are directly related to the topic, ensuring face validity. As for content validity, this is ensured when all behaviours presented by the theoretical concept are sampled and tested.

A pilot testing is conducted in order to establish the subjectivity of the respondents, the clarity and ease of the questions given, the need to include more elements in certain areas and variables, as well as determining the workability of the proposed data analysis method. A pilot testing

is to be conducted over 10% of the total population (n = 10) outside the targeted population in order to assess the reliability and validity of the study.

4   Data Analysis

4.1   Chi-square and Pearson R Correlation

Table 7.1 demonstrates a relationship between employee change management satisfaction and employee performance (Chi-square = 70.492; p = 0.000 < 0.05). The satisfaction with change is a contributing factor in employee performance. The higher the satisfaction with change management undertaken by the organisation, the higher the employee performance. The Pearson correlation indicates the strength of correlation between two variables. Table 7.1 indicates that a strong significant correlation (P = 0.000; Pearson correlation = 0.771) exists between employee performance and satisfaction with change management undertaken by the organisation. This means that satisfaction with change strongly affects employee satisfaction.

Table 7.2 shows a relation between the communication of change and employee performance (Chi-square = 81.987; p = 0.000). The communication of change is a contributing factor in employee performance. The higher the change communicated, the higher the employee performance.

Table 7.1 Chi-square and Pearson R of satisfaction with change management

	Value	df	Asymp. sig. (2-sided)
Pearson Chi-square	70.492	4	0.000
Likelihood ratio	83.392	4	0.000
Linear-by-linear association	58.808	1	0.000
N of valid cases	100		

	Value	Asymp. std. error	Approx. T
Pearson's R	0.771	0.046	11.975
Spearman correlation	0.752	0.042	11.302
N of valid cases	100		

Table 7.2 indicates that a strong significant correlation ($p = 0.000$; Correlation = 0.828) exists between the communication of change and employee performance. This means that change communication strongly affects employee performance.

Table 7.3 reveals an association between the perception of innovation and employee performance (Chi-square = 69.291; $p = 0.000 < 0.05$). Employee perception of innovation is a contributing factor in employee performance. The higher the employee perception of innovation, the higher the employee performance. Table 7.3 indicates that a strong significant correlation ($p = 0.000$; Correlation = 0.778) exists between the perception of innovation and employee performance. This implies that how an employee perceives innovation management in his/her firm strongly affects his/her performance.

Table 7.2 Chi-square test and Pearson R correlation for change communication with employee

	Value	df	Asymp. sig. (2-sided)
Pearson Chi-square	81.987	4	0.000
Likelihood ratio	90.028	4	0.000
Linear-by-linear association	67.854	1	0.000
N of valid cases	100		

	Value	Asymp. std. error	Approx. T
Pearson's R	0.828	0.049	14.612
Spearman correlation	0.781	0.046	12.369
N of valid cases	100		

Table 7.3 Chi-square test and Pearson R correlation for perception of innovation

	Value	df	Asymp. sig. (2-sided)
Pearson Chi-square	69.291	4	0.000
Likelihood ratio	74.369	4	0.000
Linear-by-linear association	59.951	1	0.000
N of valid cases	100		

	Value	Asymp. std. error	Approx. T
Pearson's R	0.778	0.053	12.266
Spearman correlation	0.727	0.048	10.467
N of valid cases	100		

5   Discussion and Conclusions

The authors conducted a quantitative study of 100 employees working in health organisations where innovation and change management is taken into consideration. The targeted employees were asked questions to evaluate the impact of innovation and change management on their performance. Using Chi-square test and Pearson R's correlation, the research hypothesis and objectives were tested.

The first tested element of the research model was "communication of upcoming changes" and its impact on employee performance. This was hypothesised as "H1: Communication of upcoming change influences employee performance". All of the tested statements classified under "change communication with employees" in relation to employee performance turned out to be significant according to Chi-square test, thus H1 is accepted (sig = 0.000). Furthermore, to indicate the relation between the communication of upcoming change and employee performance, the Pearson R correlation test was undertaken for all of the statements emphasised in the section of the questionnaire, showing a strong positive and significant relationship between the tested variables. Therefore, change communication is crucial for employee performance.

The second tested element of the research model was "satisfaction with changes" and its impact on employee performance. This was hypothesised as "H2: Satisfaction with change influences employee performance". All of the tested statements classified under "satisfaction with change" in relation to employee performance were found to be significant (sig = 0.000) according to the Chi-square test, and thus H2 is accepted. Furthermore, to indicate the relation between the satisfaction with change and employee performance, a Pearson R correlation test was undertaken for all of the statements emphasised in the section of the questionnaire, showing a strong positive and significant relationship between the tested variables. Therefore, employee satisfaction with change has a high impact on employees' performance.

The third tested element of the research model was "employee perception of innovation" and its impact on employee performance. This was hypothesised as "H3: Employee perception of innovation influences employee performance". All of the tested statements classified under "employee perception of innovation" in relation to employee performance

turned out to be significant (sig = 0.000) according to the Chi-square test, and thus H3 is accepted. Furthermore, to indicate the relation between employee perception of change and employee performance, a Pearson R correlation test was undertaken for all of the statements emphasised in the section of the questionnaire, showing a strong positive and significant relationship between the tested variables. Therefore, employee perception of innovation has a high impact on employee performance.

Furthermore, we can conclude that to improve employee performance in the event of change, it is highly recommended for the managerial level of the organisation to effectively communicate change with employees, give them a clear view of this change and prepare them for it through good training. As for innovation, it is highly recommended for employers to respect innovative talents and encourage them, as they impact performance.

The main limitations of this study were: first, the limitation of studied sample to employees working in the health sector; second, the limited access to employees working in the health sector; and third, the difficulties in collecting questionnaires due to the limitations imposed by the Lebanese health sector (mainly related to the rules and regulations of information communication in this type of sectors).

For future research, the authors recommend enlarging the studied population in order to reach at least 200 respondents. Future researchers should not limit themselves to one sector only. They should expand the geographic location of the study. It is highly recommended for future researchers to study the diamond of change theory, which encompasses three stages: freezing, unfreezing and refreezing.

6   Implications for Theory and Practice

According to the outcome of this chapter, the authors can address the following recommendations for organisations in order to improve employee performance in the event of change and innovation management:

- Employees should be well satisfied with change, and thus the organisations must ensure that:
    - employees must understand the upcoming changes well;

- employees must feel comfortable with changes, enabled through the effective assistance of the management;
- organisational systems must be compatible with the changes undertaken.

- Organisations must communicate any change they want to impose by adopting the following steps:

  - effectively communicate change with employees;
  - have employees participate in the implementation stage;
  - provide employees with necessary information related to the upcoming changes;
  - provide employees with proper training for any expected change.

- To improve employees' performance using innovation management, organisations must ensure that:

  - employee innovation is well appreciated and encouraged;
  - an innovation strategy linked to the core values of the company is in place;
  - Internal policies and rules encourage innovative participation.

As for the theoretical practice, this project has opened a new window in the literature of innovation and change management, discussing the importance of adopting innovative ideas in a dynamic workplace. Furthermore, the study valued the importance of the communication of upcoming change and its positive influence on employee performance. Another factor that is valued and can help researchers expand their ideas is the positive influence of satisfaction with a dynamic environment in a firm: adopting innovative approaches by managers and letting employees expand their innovative thinking positively influence employee performance.

References

Amit, R., & Schomaker, P. (2010). Strategic assets and organizational rent. *Strategic Management Journal, 14*(2), 33–46.

Aosa, E. (1992). An empirical investigation of aspects of strategy formulation and implementation within large, private manufacturing companies in Kenya.

Bain, J. (2010). Industrial innovation. *Journal of Management., 50*(2), 448.

Baraboux, P. (2011). A design-oriented approach to organizational change. *Journal of Organizational Change Management, 24*(5), 626–639.

Bresciani, S., Thrassou, A., & Vrontis, D. (2013). Change through innovation in family businesses: Evidence from an Italian sample. *World Review of Entrepreneurship, Management and Sustainable Development, 9*(2), 195–215.

Bruke, W. (2012). *Organization change: Theory and practice*. Thousand Oaks: Sage Publications, Inc..

Burnes, B. (2011). Managing change: A strategic approach to organisational dynamics. *Pearson Education, 15*(2), 124–132.

Campbell, J. P. (2001). Modeling the performance prediction problem in industrial and organizational psychology. In M. D. Dunnette & L. M. Hough (Eds.), *Handbook of industrial and organizational psychology* (pp. 687–732). Palo Alto: Consulting Psychologists Press.

Christensen, T., & Laegreid, P. (2010). *Autonomy and regulation: Coping with agencies in the modern state*. Cheltenham: Edward Elgar.

Christofi, M., Leonidou, E., Vrontis, D., Kitchen, P., and Papasolomou, I. (2015). Innovation and cause-related marketing success: A conceptual framework and propositions. *Journal of Services Marketing*, 29(5), 354–366.

Cingoz, A., & Akdogan, A. A. (2010). Strategic flexibility, environmental dynamism, and innovation performance: An empirical study. *Procedia—Social and Behavioral Sciences, 37*(3), 123.

Cingöz, A., & Akdoğan, A. A. (2013). Strategic flexibility, environmental dynamism, and innovation performance: An empirical study. *Procedia-Social and Behavioral Sciences, 99*, 582–589.

Fernandez, S., & Moldogaziev, T. (2013). Employee empowerment, employee attitudes, and performance: Testing a causal model. *Public Administration Review, 73*(3), 490–506.

Flaxman, A. (2006). Sybilguard: Defending against sybil attacks via social networks. *Computer Communication Review, 36*, 113–130.

Freeman, R. (2013). Strategic management: A stakeholder approach. *Pitman publishings, 15*, 120–141.

Gibbert, M. (2010). Generalizing about uniqueness: An essay on an apparent paradox in the resource-based view. *Journal of Management Inquiry, 49*(1), 287.

Goodman, J., & Truss, C. (2011). The medium and the message: Communicating effectively during change. *Journal of Change Management, 4*(3), 217.

Holman, D., Batt, R., & Holtqrewe, U. (2012). *The global call center report: International perspectives on management and employment.* Ithaka: Cornell University Publication.

Korn, A. B. (2011). Dominant designs and population dynamics. *Social Science Research, 24*(3), 97–135.

Kotter, J. (2006). Leading change: Why transformation efforts fail. *Harvard Business Review, 86*, 97–103.

Leavitt, H. J. (1965). Applied Organizational Change in Industry, Structural, Technological and Humanistic Approaches. *Handbook of organizations, 264.* Rand McNally & Company.

Leavitt, H. J. (1972). An integrated approach to change. *Managerial Psychology, 12*(2), 356.

Lewin, K. (2004). Complexity theories: Back to the future. *Journal of Change Management, 12*(4), 309–325.

Lewin, D. (2014). Behold: Silence and attention in education. *Journal of Philosophy of Education, 48*(3), 355–369.

Lewin, T., & Patterson, Z. (2012). Approaches to development research communication. *IDS Bulletin, 43*(5), 38–44.

Mintzberg, H. (1990). The design school: Reconsidering the basic premises of strategic management. *Strategic management journal, 11*(3), 171–195.

Mintzberg, H. (1996). Managing government, governing management. *Harvard business review, 74*(3), 75.

Reger, M., & Welsh, R. K. (2004). Cognitive abilities related to driving performance. *Journal of Psychology, 15*(4), *258.*

Schein, E. (2014). Enhancements on change theory. *Journal of Human Resource Management in International Business, 18*, 183.

Schumpeter, J. A. (1984). The meaning of rationality in the social sciences. *Journal of Management, 140*(4), 137.

Singh, D. (2014). Organizational change and organizational mortality. *Administrative Science Quarterly, 60*(4), 587.

Sorensen, J. (2014). Introduction: Collaborative innovation in the public sector. *The Innovation Journal: The Public Sector Innovation Journal, 12*(2), 15.

Walker, M. (2014). Innovation and organizational performance: Evidence and a research agenda. *Advanced Institute for Management Research, 115*(3), 124.

8

The Evolution of Marketing as an Innovative Knowledge Stream: The Evolving Role of Stakeholder Causal Scope

S. M. Riad Shams

1   Introduction

Marketing management and the allied dynamics—as is acknowledged today—have been evolving persistently, based on the mutual endeavours of academics and reflective industry-based practitioners. Marketing academics and practitioners proactively deal with various market issues, competitive forces and challenges, as well as exploit opportunities and create value to nurture contemporary and latent market needs. In this game of market intelligence, successful marketing initiatives are substantiated by market competitiveness, cost effectiveness and social acceptability (including as this relates to the key stakeholders). Different market issues and competitive forces have influenced the market dynamics at times. These issues and forces expose the various limitations of existing marketing strategies to deal with market competitions. Therefore, managerial efforts coupled with academic research have been contributing to

S. M. R. Shams (✉)
Ural Federal University, Yekaterinburg, Russia
e-mail: Riad.Shams@urfu.ru

the development of marketing thinking and practice, in order to cope with varying contemporary market needs since the early 1900s.

From this perspective, the aim of this article is to concisely review the evolution of marketing management, as a field of managerial practice and as an academic discipline, the different eras of this evolution, and relevant market drivers and competitive forces, in order to reinforce our perceptions of the advances of marketing dynamics that protract competitive advantage and ensure business sustainability. The findings illustrate six eras in this evolution of marketing management, and their respective competitive forces, alongside the progress of marketing thinking and practice to deal with those competitive forces. Together with other issues, value- and service-driven stakeholder relationship management is generally acknowledged as the key challenge in contemporary competitive markets. In response to this challenge, an analysis of the causes and consequences of stakeholder relationships and interactions as a stakeholder causal scope (SCS) of strategic market/stakeholder orientation is proposed as an alternative approach of relationship marketing (RM) to deal with contemporary competitive markets, with an aim to prolong competitive advantage. This article follows an inductive constructivist view to support findings to evolve rationally from the reviewed data (Eisenhardt 1989; Yin 1994; Shams and Kaufmann 2016). Therefore, it presents the relevant literature through the progress of discussions, as an inductive analysis, to rationalise the findings in relation to the aim of the chapter (Hallier and Forbes 2004; Glaser and Strauss 1967; Shams and Belyaeva 2017). The remainder of this article discusses: changes in the markets and the evolution of marketing management; the role of marketing in the contemporary competitive market; and implications and future research.

2   Methodology

In general, an inductive constructive approach as a research methodology offers wide scope to review historical perspectives and/or previous studies, in order to justify the arguments of the study (Larchey-Wendling n.d.). Inductive discovery […] from […] observed data […] to derive a law (a procedure) and an explanation via the model (a concept) about

how the law is generated from the fundamental axiomatic mechanisms of the model.

> "An inductive approach starts with observations and experiential data, from which students analyze and generalize and then find ways to apply the conclusions in solving real-world problems (Prince and Felder 2006). An inductive approach does not mean that teachers never lecture; rather, teachers assess what students know and believe, help question and clarify those beliefs, and then work to facilitate the construction of new knowledge." (Bransford et al. 1999 as cited in Smart et al. 2012, p. 393)

From this context, the inductive method appears "as a fundamentally constructive premise for theorizing and research" (Ketokivi and Mahoney 2016, p. 124). In terms of inductive constructivist method, "the underlying logic can be classical logic, or, in cases where the computational (reasoning) power of a theory should be enhanced, intuitionistic (constructive) logic" (Cohen 2016, p. 3). Cohen (2016) discussed the implications of inductive constructive approach; the reasoning pattern in knowledge development predominantly relies on cross-checking with existing knowledge for further justification of the newly created knowledge. As a result, this chapter follows the traditional inductive constructive method to develop new insights by analysing the literature and relevant information in order to enable the findings to evolve through the discussion, and to justify it and the underlying findings, based on the scholarly arguments, so that new insights can be generated inductively, while moving forward with the supporting factors, variables, ideas and concepts.

3   The Changes in Markets and the Evolution of Marketing Management

In the early 1900s, marketing as a field of practice and academic discipline was established in the USA (Firat et al. 1995) to bridge gaps in the understanding of the market in modern society. Berner and Tonder (2003) discussed modernism as associated with the transition experienced

in social and economic institutions, which was characterised as a progressive and innovative movement begun in the preceding century (Burke 2012) and shaped during the industrialisation of the 1920s (Hassard 1993). In modern society, success was perceived as the outcome of industrialisation and mass production (Thomas 1997); the role of marketing was merely to meet the basic market needs. During this modernist era, customers were satisfied as soon as they recognised their needs were met—that is, as soon as they could find the desired products on the shelves of the nearby shops. Therefore, the role of marketing was centred on the production and sales concept simply to bridge the market gaps by ensuring the availability of standardised mass-produced products to satisfy the basic needs of the modern market.

In the modernist market, once mass production reached to its peak and products were remaining unsold, producers were started to think about bridging market gaps more philosophically, alongside the basic utility of a product against a basic need, in order to compete and survive. As a result, the gurus of marketing philosophy helped to introduce the traditional 4Ps (product, price, place and promotion) marketing mix during the late 1950s in the mass consumer markets of the USA (Little and Marandi 2003), as a replacement for the production and sales concepts. The 4Ps emphasis that marketing success depends on recognising market gaps not only from the angle of the basic utility of a product, but also from the angles of its competitive pricing and location, backed by concentrated advertising and a wider promotional mix. Therefore, for marketing, the modernist market can be divided into two parts: early modernist and late modernist. The early modernist market centred on the mass production and sales concepts, where marketing was centred on bridging the market gaps through standardised, mass-produced products to offer the basic utility of a product to satisfy a basic need. In the late modernist market, the market encountered intense competition to sell a high volume of mass-produced standardised products in the mass consumer market. Here, marketing success was understood based on the 4Ps philosophy, emphasising bridging market gaps not only through the basic utility of a product, but also through competition centred on the customers' needs in relation to the product's pricing, distribution channels and promotion. As a result, underlying the 4Ps marketing mix, the added

value in addition to the basic utility had started to form the basis of competitive advantage.

The technological developments of the 1970s brought an unprecedented change in marketing management. Here, the postmodern concept was introduced, which coincides with the era of the information revolution. Many young professionals started using the term "postmodernism" during this time instead of "modernism" (Featherstone 1991). This postmodern society relies on global knowledge democracy, emergence management, trans-disciplinarity, value optimisation and knowledge creativity, instead of the modernist concepts of knowledge control, control management, single-disciplinarity, value-maximisation and so forth (Graham 2003). Instead of the individual scientific findings of modern society, the postmodern society focuses on meaning beyond scientific fact and truth; this is embedded in a broader context—a profound focus on the entirety of a situation.

Absolute truth is rejected in the postmodern society, as meaning is repeatedly changing and social meaning is significantly influenced by form and style (Berner and Tonder 2003). Therefore, the postmodern market realigns the 4Ps marketing mix; the "added value" concept was introduced to niche and customised production from the modern market's standardised mass production, as postmodern consumers have a profound knowledge of immediacy and expect services/tasks to be done straight away (Berner and Tonder 2003; Chebbi et al. 2015; Shuv-ami et al. 2018), in relation to their expectations (Graham 2003). Since the postmodern consumer lives in an era filled with "doubt, ambiguity and uncertainty" (Thomas 1997, p. 58), postmodern marketers offer additional value by utilising information intelligence rather than simply the industrialised power of the modernist concept. In order to keep postmodern customers loyal, the concept of service was introduced through repair and maintenance options for the product-driven marketing in the 1970s; however, the service logic was completely elusive in the marketing management, especially for the service industries—hospitality, airlines, travel and tourism and so forth (Gummesson 2014).

In the 1990s, RM was introduced in marketing management, which aligns well with the service logic (Gummesson 2008, 2014), where customers are active co-creators of service value and contribute to the product/service development processes. In RM, to contribute to the target

markets, marketers work together to design and realign processes to support each other. Fundamentally, there is a continuous and collaborative effort between the key stakeholders to the relationship and an understanding of long-term commitment (Tomer 1998). RM is recognised as

> administering marketing activities with a long-term outlook, focusing on the mutually beneficial relationship values and multifarious goals of associated stakeholders, while the stakeholders working interdependently in order to establish, maintain and enhance value for customers by meeting and exceeding customers' anticipation in a way that customers expect and accept, and share that value with the involved stakeholders towards a win-win outcome. (Shams 2013, p. 244)

In the post-2000 postmodern market, "service-dominant" (S-D) logic was coined by Vargo and Lusch (2008), which perceives goods as the distribution devices for services (Gummesson 2014). For example, the information technology companies offer their goods (for example, computer hardware) as the devices to distribute their service (for example, the World Wide Web and related software). The S-D logic is centred on the "co-creation of value and resource integration between suppliers, customers and other stakeholders" (Gummesson 2014, p. 659), which is a fundamental logic of RM as well, if we take the co-creation and integration of resources between the key stakeholders based on the joint power and share of dependency risk and uncertainty among the associated stakeholders (Gummesson 2002; Kurtz 2009; Agariya and Singh 2011; Shams 2011; Rowland et al. 2017). As a result, the postmodern market can be divided into three eras: early postmodern (early 1970s to late 1980s); mid-postmodern (early 1990s to pre-2000s); and contemporary postmodern (post-2000s).

4   The Role of Marketing in Contemporary Competitive Markets

The value-driven postmodern market adapts the traditional 4Ps marketing mix with stakeholder (including customers) relationship management and marketing, based on the S-D logic, where the target markets

contribute to the service co-creation processes. In this ever-competitive postmodern market, brand loyalty frequently loses its sustainability as consumers are overwhelmed by information and have available alternative brands with competitive value propositions. As a result, postmodern customers avoid brand commitment and exercise the right to move to an alternative competitive value propositions (Gould and Lerman 1998; Little and Marandi 2003).

Kotler (2003) described how postmodern customers assess which brand offers the most value. As value-optimisers, postmodern customers form an expectation of value within their search costs and the availability of information and act on it (Kotler 2003). Following the service encounters, the customers convey their service expectations and accordingly take part in the service co-creation process, which in general leads to a firm's competitive advantage. But, because of the ease of obtaining information in the postmodern market economy, the sustainability of a competitive advantage relies on the integrated resources and the subsequent co-created value proposition capabilities to survive through the "valuable, rare, inimitable and non-substitutable" (VRIN) test of the resources (Barney 1991) and the co-created value of those integrated resources.

If a competitive advantage cannot be sustained because of its lack of VRIN competency, in order to at least prolong that competitive advantage, the resource integration among the key stakeholders and the subsequent co-creation of the S-D and relationship management logics can rely on the analysis of the causes and consequence of stakeholder relationships and interactions. Various stakeholder relational perspectives of RM—such as trust, satisfaction, commitment, communication, reciprocity and co-creation, reliability, responsiveness and so forth (Agariya and Singh 2011)—are generally originated and enhanced through the causes and consequences of stakeholders' relationships and interactions, as a SCS of strategic market/stakeholder orientation. These SCSs have the ability to recognise unique condition(s) from the relational experience of the stakeholders, which can further enrich the relational perspectives to underpin the co-creation processes among the key stakeholders, and to prolong that relationship:

RM service providers gain a better knowledge of the client's requirements and needs. This knowledge (a possible specific exceptional condition, in

relation to the needs, wants and expectations of the target markets) can then be combined with social rapport built over a number of service encounters to tailor and customise the service to client's specifications. (Little and Marandi 2003, p. 31)

RM focuses on long-term stakeholder relationships (Little and Marandi 2003) to recognise stakeholders' needs, wants and expectations, in order to design and offer customised service (Stavros 2005; Acar and Ozkan 2017), based on that specific knowledge of stakeholders' anticipations and stipulations. Another RM advantage is to retain a concentrated orientation on the evolution of opportunity (possible exceptional conditions) from stakeholder relationships (Kurtz 2009; Santoro et al. 2017; Vrontis et al. 2017), to impact on innovative product/service development and delivery (Donaldson and O'Toole 2007; Thrassou et al. 2016), centred on the relevant considerations and specific knowledge gained from those stakeholder relationships.

Such SCS-driven exceptional unique conditions can outplay the VRIN features, as that unique condition can be learnt from a firm's market relationships and overall learning experience of its internal and external stakeholders (Peteraf et al. 2013). For example, the resource integration among the key stakeholders and the successive co-creation-driven competitive advantage that is originated through such exceptional SCS-centred condition(s) would be valuable until the promised value meets the goals of the stakeholders involved. These relationships and interactions among the key stakeholders would also be rare in the market in favour of the competitive advantage, until a specific stakeholder withdraws their commitment and/or concurrently relates with the competitors. Again, the part of the causes and consequences of stakeholder relationships and interactions perceived by the competitors could be imitable.

However, if the success of such relationships is based on any unique and/or secret understanding of share of dependency, risk and uncertainty and an anticipated win-win value, which is exclusively learnt from the relational experience of specific stakeholders, it could outplay the imitable capacity of the competitors to some extent. In particular, the unique reason that is evolved based only on the joint power of those specific stakeholders would not be imitable by their competitors. Furthermore,

based on the preceding relationship experience, if a firm is able to prove the supremacy of their competitive advantage, with relevant exceptional conditions to customise the stakeholders' needs, centred on those exceptional conditions, the stakeholders will not look for a substitution relationship. Therefore, the role of marketing in the contemporary competitive markets is to identify, establish, maintain and enhance value for the target markets, based on a unique and customised condition recognised from the causes and consequences of a firm's relationships and interactions with their target markets/stakeholders, so that the reinforced value would be mutually valuable for them, but would be rare, inimitable and non-substitutable for the competitors, in order to authentically differentiate the relevance of that value to prolonging the competitive advantage.

Similarly, the contemporary marketing management should be centred on understanding the causes and consequences of stakeholder relationships and interactions (the SCS) and differentiating a value proposition based on that understanding to promote why stakeholders should be associated with that value proposition, instead of the alternative competitive propositions. In such a co-created value proposition, "share of dependency, risk and uncertainty" among the key stakeholders (Kurtz 2009; Gummesson 2002; Giacosa et al. 2017; Bresciani et al. 2017) and their "joint power" (Gummesson 2002) as RM features play a central role in reinforcing the value proposition's competitive advantage.

5   Implications and Future Research

However, the marketing research and practice have been evolving since their beginnings to cope with the changing market needs; the traditional production and sales-focused transaction marketing and the 4Ps marketing mix have not been rejected since they are the core of marketing management. Following this traditional 4Ps marketing mix, various concepts have been added in marketing management to deal with the market competitions. These concepts are: added value; niche and customised value proposition; value optimisation; value co-creation; stakeholder relationship management; S-D logic; and the SCS concept.

Underlying the marketing mix and these concepts, the SCS analysis has evolved as an alternative approach to deal with the contemporary market issues and competitive forces, in order to prolong competitive advantages. Table 8.1 briefly describes these changes in marketing and their associated dynamics. From this angle, this chapter contributes to

Table 8.1 The evolution of marketing management in response to the market competition

Timeline/era	The market	Market drivers/ competitive forces	The role of marketing in response to the market competitions
Early 1900s to late 1940s	Early modernist market	Industrialisation and mass production (Hassard 1993; Thomas 1997)	Transactional sales concept
Early 1950s to late 1960s	Late modernist market	Unsold mass-produced goods	Introduction of added value based on the 4Ps marketing mix
Early 1970s to late 1980s	Early postmodernist market	Knowledge democracy (Graham 2003)	Niche and customised value proposition (Stavros 2005)
Early 1990s to pre-2000	Mid-postmodernist market	Ease of information Value optimisation (Graham 2003) Symbolic (form and style)	Stakeholder relationship management for value optimisation within a value network (Gummesson 2008)
Post 2000	The millennial postmodernist market	representation of value Service dominance (Gummesson 2008) Corporate social responsibilities, environmental issues and social wellbeing (Gummesson 2014)	S-D logic: integration of resources among the key stakeholders and value co-creation (Gummesson 2008); SCS analysis to recognise exceptional unique conditions from the experience of the associated stakeholders to possibly outplay the VRIN features, in order to prolong competitive advantages (Shams 2016a, p. 676)

Table 8.1 (continued)

Timeline/era	The market	Market drivers/ competitive forces	The role of marketing in response to the market competitions
Post 2010	The millennial stakeholder-dominant market	Phenomena in stakeholder casual scope (Shams 2017a)	Analysing the "the cause and consequence of stakeholder relationships and interactions in a network, as a SCS […] to collaborate with the stakeholders, with an on-going understanding on the contemporary and latent needs, and subsequent value-anticipation of the associated stakeholders" (Shams 2016a, p. 676), in order to design and deliver value in a way that would be expected and accepted by the key stakeholders (Shams 2016b, 2017b)

our understanding of the role of marketing management, in response to the contemporary market competition, where the SCS analysis is proposed as a preliminary conceptual viewpoint which needs to be reinforced by empirical results. Additionally, this chapter provides a concise review of existing literature on the different eras of marketing management as a field of practice and academic discipline, relevant competitive forces and the role of marketing management, in response to these competitive forces. As a result, it provides a quick snapshot for researchers of the historical and contemporary issues of marketing management.

Following the introduction of the chapter, an overview of the methodology is provided. Then the chapter discusses changes in markets and the

evolution of marketing management as a practice and as a discipline of knowledge. Following this discussion on the evolution of marketing and the relevant changes in market dynamics, the chapter then discusses the role of marketing in contemporary competitive markets. Following this discussion, the SCS analysis concepts evolves in a new direction in the role of marketing management to influence the traditional marketplaces, as well as to influence contemporary market-spaces, in order to co-create value in a way that would be expected and accepted by the stakeholders involved, including the target customers. In such SCS dynamics, the ultimate goal is sustaining the competitive advantage of a business firm and/or its products or services, in comparison to the competitive products or services.

Future research and practice could be centred on typifying the nature of SCS: why, when and how the SCS arises; recognising the early growth and declining stages of SCSs and its building-blocks to intensify co-creation; and recognising the role of relational perspectives to identify, establish, maintain and enhance SCSs, in order to understand the underlying variables, so that the SCS could evolve and be outlined based on a logical sequence of relationships and interactions. Another avenue for future research would be correlating these interconnected concepts of transactional marketing (sales and production concepts of marketing), marketing mix, added value, value optimisation, value co-creation, stakeholder relationship management, S-D logic, SCS and other emerging concepts, in relation to the market dynamics, in order to enrich the strategic direction through this evolving strategic marketing management philosophy. Beside the academic interest, further research will also satisfy the need for explicit guidance for practice.

References

Acar, E., & Ozkan, S. (2017). Corporate governance and provisions under IAS 37. *EuroMed Journal of Business, 12*(1), 52–72.

Agariya, A. K., & Singh, D. (2011). What really defines relationship marketing? A review of definitions and general and sector-specific defining constructs. *Journal of Relationship Marketing, 10*(4), 203–237.

Barney, J. (1991). Firm resources and sustained competitive advantage. *Journal of Management, 17*(1), 99–120.

Berner, A., & Tonder, C. L. V. (2003). The postmodern consumer: Implications of changing customer expectations for organisational development in service organisation. *The Journal of Individual Psychology, 29*(3), 1–10.

Bresciani, S., Ferraris, A., and Giudice, M. D. (2017). The management of organizational ambidexterity through alliances in a new context of analysis: Internet of Things (IoT) smart city projects. *Technological Forecasting and Social Change.* Published ahead of print, doi:https://doi.org/10.1016/j.techfore.2017.03.002.

Burke, B. (2012). *Post-modernism and post-modernity*. Available at: http://www.infed.org/biblio/b-postmd.htm. Accessed 29 November 2012.

Chebbi, H., Yahiaoui, D., Vrontis, D., & Thrassou, A. (2015). Building multi-unit ambidextrous organizations—A transformative framework. *Human Resource Management, 54*(1), 155–177.

Cohen, L. (2016). *Formalizing mathematics via predicative and constructive approaches*. Doctoral thesis, University of Tel-Aviv, Tel-Aviv, Israel.

Donaldson, B., & O'Toole, T. (2007). *Strategic market relationships: From strategy to implementation* (2nd ed.). Brisbane: Wiley..

Eisenhardt, K. (1989). Building theories from case study research. *Academy of Management Review, 14*(4), 532–550.

Featherstone, M. (1991). *Consumer culture and postmodernism*. London: Sage.

Firat, F. A., Dholakia, N., & Venkatesh, A. (1995). Marketing in a postmodern world. *European Journal of Marketing, 29*(1), 40–57.

Giacosa, E., Ferraris, A. Mazzoleni, A., and Vrontis, D. (2017). A model for testing the relationship between company size and performance: A cross country analysis. *Global Business and Economics Review.* Available at: http://www.inderscience.com/info/ingeneral/forthcoming.php?jcode=GBER. Accessed 4 January 2018.

Glaser, B., & Strauss, A. (1967). *The discovery of grounded theory: Strategies in qualitative research*. London: Wiedenfeld and Nicholson.

Gould, S. J., & Lerman, D. B. (1998). Postmodern versus long-standing cultural narratives in consumer behaviour: An empirical study of NetGirl online. *European Journal of Marketing, 32*(7/8), 644–654.

Graham, C. (2003). *The transition from mode-1 to mode-2 society: The implications for education*. Available at: http://www.futures1.net/docs/Mode-2%20Paper.doc.pdf. Accessed 11 August 2009.

Gummesson, E. (2002). *Total relationship marketing* (1st ed.). Oxford: Elsevier/ Butterworth-Heinemann.

Gummesson, E. (2008). *Total relationship marketing* (3rd ed.). Oxford: Elsevier/ Butterworth-Heinemann.

Gummesson, E. (2014). Productivity, quality and relationship marketing in service operations: A revisit in a new service paradigm. *International Journal of Contemporary Hospitality Management, 26*(5), 656–662.

Hallier, J., & Forbes, T. (2004). In search of theory development in grounded investigations: Doctor's experiences of managing as an example of fitted and prospective theorizing. *Journal of Management Studies, 41*(8), 1379–1410.

Hassard, J. (1993). *Sociology and organizational theory: Positivism, paradigms, and postmodernity.* Cambridge: Cambridge University Press.

Ketokivi, M., & Mahoney, J. T. (2016). Transanction cost economics as a constructive stakeholder theory. *Academy of Management Learning and Education, 15*(1), 123–138.

Kotler, P. (2003). *Marketing management* (International ed.). Sydney: Prentice Hall.

Kurtz, D. L. (2009). *Contemporary marketing.* Singapore: South-Western Cengage Learning.

Larchey-Wendling, D. (n.d.). *Proof pearl: Constructive extraction of cycle finding algorithms.* Available at: https://members.loria.fr/DLarchey/files/papers/ITP_2018_paper_16.pdf. Accessed 1 February 2018.

Little, E., & Marandi, E. (2003). *Relationship marketing management.* Singapore: Thomson Learning.

Peteraf, M., Stefano, G. D., & Verona, G. (2013). The elephant in the room of dynamic capabilities: Bringing two diverging conversations together. *Strategic Management Journal, 34,* 1389–1410.

Prince, M. J., & Felder, R. M. (2006). Inductive teaching and learning methods: Definitions, comparisons, and research bases. *The Research Journal for Engineering Education, 95*(2), 123–138.

Rowland, C. A., Hall, R. D., & Altarawneh, I. (2017). Training and development: Challenges of strategy and managing performance in Jordanian banking. *EuroMed Journal of Business, 12*(1), 36–51.

Santoro, G., Vrontis, D., Thrassou, A., and Dezi, L. (2017). The internet of things: Building a knowledge management system for open innovation and knowledge management capacity. *Technological Forecasting and Social Change.* Published online ahead of print, doi:https://doi.org/10.1016/j.techfore.2017.02.034.

Shams, S. M. R. (2011). *A relationship marketing model to enable sustainable growth of the Bangladesh Cricket Board: A stakeholder causal scope analysis.* Doctoral dissertation. Rockhampton: Central Queensland University.

Shams, S. M. R. (2013). Implications of relationship marketing indicators to enable organisational growth: A stakeholder causal scope analysis. In H. Kaufmann & M. F. A. K. Panni (Eds.), *Customer centric marketing strategies: Tools for building organizational performance* (pp. 214–244). Hershey: Business Science Reference.

Shams, S. M. R. (2016a). Capacity building for sustained competitive advantage: A conceptual framework. *Marketing Intelligence and Planning, 34*(5), 671–691.

Shams, S. M. R. (2016b). Branding destination image: A stakeholder causal scope analysis for internationalisation of destinations. *Tourism Planning and Development, 13*(2), 140–153.

Shams, S. M. R. (2017a). Transnational education and total quality management: A stakeholder-centred model. *Journal of Management Development, 36*(3), 376–389.

Shams, S. M. R. (2017b). International education management: Implications of relational perspectives and ethnographic insights to nurture international students' academic experience. *Journal for Multicultural Education, 11*(3), 206–223.

Shams, S. M. R., and Belyaeva, Z. (2017). Quality assurance driving factors as antecedents of knowledge management: A stakeholder-focussed perspective in higher education. *Journal of Knowledge Economy.* Published online ahead of print, https://doi.org/10.1007/s13132-017-0472-2.

Shams, S. M. R., & Kaufmann, H. R. (2016). Entrepreneurial co-creation: A research vision to be materialised. *Management Decision, 54*(6), 1250–1268.

Shuv-Ami, A., Vrontis, D., & Thrassou, A. (2018). Brand lovemarks scale of sport fans. *Journal of Promotion Management, 24*(2), 215–232.

Smart, K. L., Witt, C., & Scott, J. P. (2012). Toward learner-centred teaching: An inductive approach. *Business Communication Quarterly, 75*(4), 392–403.

Stavros, C. (2005). *Relationship marketing in Australian professional sport: An organizational perspective.* Doctoral dissertation. Brisbane: Griffith University.

Thomas, M. (1997). Consumer market research: Does it have validity? Some postmodern thoughts. *Marketing Intelligence and Planning, 15*(2), 54–59.

Thrassou, A., Vrontis, D., Tsakiris, T., & Hadjistassou, C. (2016). The Cyprus oil and gas industry's indirect business effects—A predictive real-time analysis. *Journal of Transnational Management, 21*(3), 115–141.

Tomer, J. F. (1998). Beyond transaction markets toward relationship marketing in the human firm: A socio-economic model. *The Journal of Socio-Economics, 27*(2), 207–208.

Vargo, S. L., & Lusch, R. F. (2008). Service-dominant logic: Continuing the evolution. *Journal of the Academy of Marketing Science, 36*(1), 1–10.

Vrontis, D., Thrassou, A., Santoro, G., & Papa, A. (2017). Ambidexterity, external knowledge and performance in knowledge-intensive firms. *The Journal of Technology Transfer, 42*(2), 374–388.

Yin, R. K. (1994). *Case study research: Design and methods* (2nd ed.). Thousand Oaks: Sage.

9

Customer Data: Contemporary Issues of Privacy and Trust

Christos Themistocleous

1   Research Background and Aims

The evolution of marketing in recent decades has shown that consumer information is vital for the survivability and profitability of modern organisations. Through correct use of consumer information and the synthesis of large datasets, organisations are enabled to build customer loyalty while expanding their customer base through customised advertising, personalised products and individualised attention to customers (Bello-Orgaz et al. 2016; Dubey et al. 2016). This generates what is known as the "personalisation/privacy trade-off", which occurs when consumers sacrifice certain amounts of private information in order to allow organisations to offer them more personalised products. In doing so, organisations use feedback from current users of their products and services to identify new needs and points of improvement for future products, which by extension fuels innovative approaches for organisations in meeting these demands.

C. Themistocleous (✉)
The University of Nottingham, Business School, Nottingham, UK
e-mail: christos.themistocleous@nottingham.ac.uk

A very important stream of information also comes via customer data accumulated through transactions with the organisation. When it comes to the ways consumer data can be collected, organisations can easily obtain data through transactions (transactional data) or through indirect means (non-transactional data). Even though non-transactional data is more difficult to obtain, its use provides insightful information into the lifestyle and psychological characteristics of consumers. This is believed to be extremely valuable as it can reveal the shopping patterns or even the credibility levels of customers in regard to their purchases, indicating to organisations which customers are either high or low risk, allowing them to be targeted accordingly. At the same time, appropriate uses of customer information also enable new product development and product refinement processes.

Even though customer information provides valuable benefits to organisations through their various uses, it does come at a cost. One of the main drawbacks for organisations that seek to acquire non-transactional data is the fact that this type of data relies (or should rely) on voluntary disclosure by individuals. As non-transactional data is not directly related to the original transaction but can still be acquired by organisations and used without the consent of the individual, this raises several sustainability-related and ethical issues regarding the protection of consumer privacy. This can threaten the individual's autonomy, not only as a consumer but also as a citizen as it can detract from the right to choose when to disclose (or not) private personal information to organisations. Therefore, organisations are faced with what was initially described by Linden (2002) as the explicit versus implicit data collection dilemma. The explicit data collection method is made by explicitly asking consumers to disclose private data, while the implicit data collection is characterised as more of a "behind the scenes" approach where information is gathered without the involvement of the individual whose information is being acquired and processed. This is normally done through information purchased from third parties.

As a strong understanding of current practices for customer information management is essential for both the enhancement of organisational efficiency and sustainable capacity building for organisations, this chapter seeks to provide an in-depth analysis of theories, followed by a

reflection on the consumer psychology literature in order to understand how consumers perceive information disclosure processes. It then disseminates managerial implications regarding data accumulation and further practices.

More precisely, this chapter's objectives include the dissemination of the Social Exchange Theory (SET)—which serves as the foundation for examining why information is being exchanged by different parties within a society—and the identification of parameters that facilitate this exchange of information within an organisational context. Then particular focus is put on the process of accumulation of customer data through loyalty schemes; finally, ethical implications are identified, followed by an examination of the current attempts at sustainable capacity building solutions.

2   Theoretical Foundation: SET

SET, as the name suggests, is based on the exchange of tangible or intangible sources that have value between two or more parties. Through social exchange, the entities that participate in it are better off with it than they would have been without it. With its origins traced back to the 1920s, the theory is fuelled by one main idea that serves as the main convergence point for most academic views in the field: social exchange involves a series of interactions between different parties that generate obligation. Even though its definition may seem straightforward, the aspects and concepts that define SET have been heavily analysed. Some of the earliest papers, including Thibault and Kelley's (1959) and Blau's (1963), embrace the fact that there is a need for a relationship between parties in order for a social exchange to take place. For the development of relationships to the point where commitments become mutual, parties need to follow certain rules of exchange that are characterised by reciprocal interdependence. Furthermore, exchange plays a crucial role as certain types of resources, such as money, status, information, love, services and other goods, might have different value when offered by different individuals. From this it can be argued that information (as a type of exchange resource) has a value for both the party who holds it as well as the party who seeks it.

Knowledge regarding the party (or parties) with which there is an exchange is also vital. Knowledge regarding the party's (or parties') previous and potential actions, as well as reputation, may allow for the better establishment of reciprocal interdependence. Moving from the broad to the specific, SET's aspect of knowledge is linked to the crucial point of the knowledge possessed by consumers regarding the use of their personal information by organisations. This was found to have an influence on consumers' propensity to disclose certain information. In particular, a study by Nowak and Phelps (1995) identified three categories pertaining to the consumer's knowledge of data collection. These were: (1) full knowledge of collection and use; (2) knowledge of collection but not use; and (3) no knowledge of either collection or use.

Based on the concept of knowledge, consumers tend to disclose information more willingly when they are informed by the organisation on how it intends to use it. This allows for a more reciprocal interaction between individuals and organisations, which alleviates information disclosure concerns. Interestingly, an experimental study by Zimmer et al. (2010) employed dyadic relationships in order to synthesise reciprocal information exchanges examining whether this increases information disclosures or not. This was done by explaining to individuals in a questionnaire how the acquired information would be used by the organisation prior to asking for it in order to facilitate knowledge regarding information use, with the results being found significant.

Chadwick-Jones (1976), who sought to explain SET through social psychology, mentions that behaviour can be linked to either a reward or punishment—using the term "reinforcement exchange theory" to describe this link. He bases this notion on the fact that "if the occurrence of a given behaviour is followed by reinforcement, then its strength increases" (p. 647). Furthermore, he specified that the projection and utilisation of a reward can strengthen an existing beneficial behaviour or enable the inducement of another. However (as predicted), rewards can take different forms, from monetary to non-monetary. For the latter, information can be provided in return for more tailored products or services based on the needs of the individual; private medical information may be used to determine the symptoms of an illness and so on.

Another vital point regarding SET is the fact that an exchange can be either voluntary or coerced. Even though the distinction between the two is a hard one, with Blau (1963, p. 91) mentioning that "someone may give money to another person just because the second holds a gun on the head of the first" (who arguably exchanges his life for money), the majority of social exchange theorists focus on voluntary exchanges. These are the exchanges which make all involved parties better off with them than without them. Interestingly, it can be argued that an involuntary acquisition of information does not qualify as an exchange. This is due to the fact that, as Heath (1976) mentions, "exchange can take place if both sides find it preferable to the alternatives actually open to them at the time of the exchange" (p. 20).

Also important to SET is the power and the dependency that one party has over the other, which determines the relationship based on which a social exchange takes place. Dependency increases when alternatives are less satisfactory, ultimately limiting the bargaining power of the party. When applying this to the two social actors that are the main focus of this research—the consumer holding personal information and the organisation seeking it—it can be argued that one of the consumer's alternatives could be the potential disclosure of information to another organisation that provides more benefits in return for disclosure. What this implies is the avoidance of disclosure until a better deal transpires for the individual. From the organisational side, the main alternative could be the acquisition of much-needed consumer information in an implicit fashion, which would imply the acquisition and use of information without prior consent. The main problem with this action is that by following an implicit instead of explicit approach, data acquisition processes would enter the domain of unethical and arguably illegal conduct as they do not qualify as exchanges based on Heath's definition of the term. This leaves organisations with very few options and a growing need to maximise the accumulation of consumer information by improving their approach to the data collection process. In order to acquire information in an explicit fashion, organisations can utilise certain means in order to increase the effectiveness of this method by offering compensation in return for disclosure and/or by highlighting potential uses of acquired information and more.

Following the review of literature regarding SET and its link to information disclosure, it is important to identify how SET is reflected in practice in the decision-making of individuals. The following section reflects on current academic insights that stem from consumer psychology in an attempt to understand how consumers they perceive privacy while identifying important factors that can influence this understanding.

3   Consumer Behaviour: Privacy, Trust and Relevant Matters

Within the process of organisational capacity building, it is important to understand the procedure of information disclosure by consumers. This section focuses on understanding how customers interact with other entities in regard to information disclosure, with particular attention being paid to five key areas that serve as the main convergence points for most academic views when examining the behaviour of consumers towards this. These are: (1) the categorisation of consumers based on perceptions about privacy; (2) the understanding of when individuals lie when divulging information; (3) what the preferred methods used by individuals when disclosing information are; (4) how important organisational trust is for the facilitation of information accumulation; and (5) how compensation can influence perceptions about privacy and motivate consumers to divulge information. Each of these areas is analysed below.

3.1   Consumer Categorisation Based on Perceptions About Privacy

This section reflects on survey research conducted to identify different categories of individual in regard to privacy perception, while also acknowledging that the underlying economic notion of the rationality of individuals is applicable in this context. At the same time, it acknowledges that individuals have different ways of perceiving private information and different ways of weighing the benefits and losses from a potential disclosure; their levels of susceptibility in regard to the offering

of compensation also vary. A practical example of the rationality and differing nature of individuals is found in the study of Alan Westin, who categorises consumers into three groups based on their overall perception of privacy and the disclosure of information. The study included six surveys carried out between 1990 and 2003. The findings from all six surveys were summarised by Kumaraguru and Cranor (2005). Westin's categorisation of consumers based on how individuals perceive privacy is as follows:

Privacy unconcerned: Individuals who are unconcerned about their personal information and easily provide information for low or even no benefits in return.

Privacy pragmatists: Individuals who balance the pros and cons from disclosing information and choose carefully whether to disclose or not certain information. They usually engage in disclosures when the potential benefits exceed potential losses.

Privacy fundamentalists: Individuals that completely avoid the disclosure of information to organisations and are not induced by any benefits being offered with disclosure.

Westin's work sets the foundation for understanding the key clusters of consumers in regard to their attitudes towards information disclosure, enabling marketers to employ different strategies and techniques to target individuals from the three different groups. This gives rise to the understanding of individuals as falling into different groups—those who share truthfully private information without necessarily receiving direct benefits, those who completely avoid information disclosure and those who may lie in order to avoid the divulgence of private information. In understanding the customer, the following section focuses on this latter group.

3.2   Lying by Individuals in the Information Disclosure Process

When examining the circumstances under which consumers tend to lie when disclosing information, research indicates that individuals take advantage of their position and tend to misrepresent some personal data.

More precisely, when there is a larger gap between the "perceived cost of providing personal information and the benefit perceived to be received in return" (Horne et al. 2007, p. 92) there is a greater likelihood that the individual will lie. Their research identified three clusters linked to lying by individuals:

(a) individuals who in general tend to lie often when disclosing information;
(b) individuals who tend to leave out data instead of falsifying it;
(c) individuals who tend to provide truthful data.

Robertshaw and Marr (2005), when examining the behaviour of consumers regarding the disclosure of truthful information, conclude that individuals tend to either omit or falsify personal information when the required information is perceived by the individual as sensitive. According to their study, the main reason for omissions was the fact that most individuals were worried that their information would be passed on to third parties and could become subject to misuse. Interestingly, the study indicates that the general tendencies of individuals when disclosing head towards omission instead of falsification. Important to the minimisation of lying behaviours by customers is the identification of data accumulation methods with which they feel comfortable to disclose information.

3.3   Preferred Consumer Methods of Divulging Information

Apart from lying, part of the marketing literature specialises in the examination of the effectiveness of different methods of data capture, such as self-completed questionnaires, questionnaires completed by another person, and so on. Even though organisations can acquire customer information through interviews, questionnaires or even focus groups, online data-capturing surveys are considered to be one of the most efficient and effective data accumulation techniques, as reflected in a study by Long et al. (1999). This method was also found to be more effective in terms of information disclosure by individuals compared to

any other offline method. Because of this, more recent papers have focused on factors that enhance the efficiency and effectiveness of online data-capturing surveys. In particular, they experiment with question sequence effects, capitalisation on the comparative nature of individuals, and examinations regarding reciprocal information exchanges and their effects on voluntary disclosure (more information on these can be found in Moon 2000; Acquisti et al. 2012; Zimmer et al. 2010, respectively).

Related research focusing on the examination of the factors that influence voluntary disclosure, within organisational settings, has grown significantly since the mid-90s, with several papers emerging from different disciplines such as consumer psychology, consumer behaviour and marketing. In regard to the disciplines of consumer psychology and behaviour, an important amount of research focuses on the conceptualisation of frameworks that explain the cognitive processes that individuals go through when disclosing certain information fuelled by the relational factors that certain entities may have. Relational concepts such as trust, relationships and intimacy in organisational settings are heavily involved with the positive influence of these on voluntary disclosure, being the main convergence points for most academic views. The following section is therefore devoted to explaining how relational depth, and in particular the element of organisational trust, influences the willingness of consumers to provide private information to organisations while touching upon relevant academic studies.

3.4   The Impact of Trust on the Disclosure of Information

Beyond the identification of preferable methods of information disclosure, trust is considered to act as additional fuel for the information acquisition process. Nevertheless, in order to examine trust and its influence on voluntary disclosure, it is essential to define the concept in relation to the context in which it is studied, while reflecting on literature from consumer psychology and studies devoted to explaining the impact of trust on information disclosure.

Within different settings, trust takes many forms as it can be interpersonal, impersonal, relational, calculative, rational, affective and so on. Interestingly, Shapiro (1987) acknowledges that trust is an extremely wide and broad concept which in most cases "result(s) in a confusing potpourri of definitions applied to a host of units and levels of analysis" (p. 625). She provides a definition of trust identifying it as the "social relationship in which principals invest resources, authority, or responsibility in another to act on their behalf for some uncertain future return" (p. 626). On an interpersonal level, Culnan and Armstrong (1999, p. 6) define trust as "having clear, mutually agreed upon expectations". It was also noted that impersonal relations are also important in enabling the development of trust. Culnan and Armstrong (1999) argue that in most cases consumers are dependent and rely on strangers to act on their behalf, as in the case of information disclosure by consumers to commercial organisations. Furthermore, trust within an organisational setting allows for the reduction of complexity between relations while maximising the effectiveness of relationships and reducing transaction costs.

Several frameworks focus on the utilisation of trust as a dominant parameter when it comes to the behavioural intentions of individuals in disclosing sensitive information (Mital et al. 2010), with risks from a potential disclosure being the other main parameter. Trust and risk are treated as positive and negative stimuli respectively with regard to the intention of the individual to disclose sensitive information. When examining the impact of trust on consumers' perception of privacy, the instilment of trust is considered to be a superior method when managing consumer data, as compared to trying to reduce privacy concerns. Trust, as a mediating factor for the disclosure of information, is a widely explored concept in the literature, with the majority of academic opinions identifying a positive relation between trust and voluntary information disclosures.

As with social relations, the instilment of trust in organisational settings is based on the mutual and reciprocal disclosure of information. Organisations have the option to disclose a set of information to consumers, with the main objective being to facilitate impersonal trust; this, by extension, makes the divulgence of information easier from the point of the consumer. The organisational information that can be disclosed

includes the potential uses of the customer information acquired as well as practices of storing and sharing (or not) with other parties. For the development of impersonal trust, transparency by organisations is essential to both acquiring truthful information and obtaining the consent to use existing customer information.

From this section, it is imperative to understand that relational depth between customers and organisation facilitates information disclosure and, by extension, information accumulation. Nevertheless, in certain cases when strong relational bonds are not in place due to the nature of the industry that certain organisations might be involved in, an alternative option is provided to them of offering compensation in return for information divulgence.

3.5 The Influence of Compensation

Apart from the importance of relational depth, in cases where trust between organisations and consumers is not in place, the element of compensation in return for information divulgence can be used in order to influence consumers. This is linked to Andrade et al.'s (2002) statement that "(compensation) reduces the subjective costs of self-disclosure" (p. 350), and thus influences the consumer's propensity to disclose. This in return makes the disclosure of information a more logical and a wiser decision as potential positives from a potential disclosure exceed potential losses, such as embarrassment and loss of privacy.

The offering of compensation that leads to disclosure of information is a widely explored concept. Even though several studies have utilised experiments for recording the effects of compensation on information disclosure, no measurements have been identified for measuring specific monetary amounts of compensation required for the revelation of truthful information. For example, previous experimental studies by Premazzi et al. (2010) and Deutskens et al. (2004) focused on the examination of the effects of different kinds of compensation provided, such as lottery, monetary, charity and voucher, with both studies mentioning that individuals showed a stronger preference towards monetary-oriented types of compensation.

Compensation is an important factor that influences information disclosure by consumers as well as the provision of consent for information usage by the organisation. Apart from the consumer behaviour-oriented theoretical background, the objective of which was the understanding of how consumers perceive privacy and the factors that influence it, it is now important to complement the consumer psychology and behaviour spectrum with more practical examples. To this end, the following section concentrates on how transactional information is now being accumulated, with particular attention being paid to the loyalty schemes employed by organisations.

4   Customer Information Accumulation: Loyalty Schemes

Loyalty schemes are considered to be integral to the development of customer loyalty for companies within different sectors. Even though the names might differ from case to case (from loyalty to rewards or membership cards), all are examples of loyalty schemes that seek to maximise the buy-rebuy behaviour of individuals and by extension instil customer loyalty.

Nevertheless, from the time of their introduction, loyalty schemes had a secondary objective, which is currently becoming more prominent than loyalty-development. This is the gathering of customer information. With the introduction of loyalty schemes revolving around electronic cards in the 1980s and 1990s, organisations were provided with the capability to record the consumption volumes of specific products by customers as a whole. This enhanced the inventory management of organisations and improved efficiency by providing them with the ability to more effectively identify when to order new volumes of products. Additionally, this improved the efficiency of organisations by allowing them to identify which products performed well in terms of sales and which ones did not, which would lead to increases or decreases in the volumes being ordered, or even possible termination of requests for additional volumes of unpopular products.

As technology progressed, new analyses of patterns could be calculated from the data acquired through the loyalty cards. From seeing customers as a whole, larger organisations with the appropriate resources and devoted departments can now identify patterns to the singular level, meaning for each customer individually. By accumulating data of the shopping patterns of the individual over a period, say for example one month, organisations can now identify products to which a particular individual is loyal to and accordingly provide him/her with offers for specific brands to reinforce their loyalty to the company. See for example Table 9.1.

From Table 9.1 above, Customer A has a clear tendency to like the Coca Cola soft drink, meaning that he/she strongly prefers this brand over competitive ones. Large organisations with the capabilities to identify patterns like these on an individual level can target Customer A with tailored discounting schemes that involve his/her brand of choice. This ensures that buy-rebuy behaviour is in place, which by extension leads to customer loyalty with the organisation that provides that product and other popular products on offer.

The newest generation of customer analysis techniques now seeks to explain customer behaviour through shopping patterns. Smith and Sparks (2004) in their paper "All about Eve?" (now more than ten years old) demonstrate how customer information can shed light on demographic, lifestyle and (to some extent) psychographic characteristics of individuals by simply analysing their shopping pattern and without any prior knowledge of that individual. Table 9.2 demonstrates this.

Table 9.2 summarises the purchasing pattern, by product type, of Customer A, whose pattern was analysed above to see his/her strongest preference for soft drinks. Through the table above specialists in data

Table 9.1 Shopping pattern of soft drinks by Customer A

Customer A		
Product type	Brand	Quantity (over a one-month period)
Soft drinks	Coca Cola	19
	Sprite	6
	Pepsi	3

Table 9.2 Shopping pattern of multiple product types by Customer A

Customer A	
Product type	Quantity (over a one-month period)
Soft drinks	28
High-calorie snacks	18
Chocolate	19
Condoms (pack of six)	2
Nappies for babies (pack of 12)	3

analytics can make inferences about what characterises this individual. For example, by identifying the high number of unhealthy products being purchased, namely high-calorie snacks, soft drinks and chocolate, arguably and up to a reasonable degree it can be inferred that this individual must be following a relatively unhealthy lifestyle with a good chance that he/she will have some excess weight. Furthermore, the purchase of condoms can lead to the inference that this individual is sexually active with a high probability of being a male, while the packs of nappies hint that he must be the father of a young baby. Therefore, the previously unknown Customer A now is translated to a relatively young father with a baby who has some excess weight and is sexually active. Arguably, the above description can also be relevant to a young mother who happens to buy condoms for her partner but the precision of the description increases when examining the shopping pattern over a longer period (two years, for example) and by including other types of products to confirm gender (for example, tampons). Through these, one can achieve statistical significance when describing Customer A.

Now the uses of the information demonstrated above can arguably follow two paths. First, organisations through analyses such as this have the ability to characterise and understand their customers and accordingly provide them with more related offers. For example, for Customer A, offers on healthier foods, cheaper products for babies (through offers and so on) can be found relevant and useful to improve lifestyle and alleviate some of the economic burdens that are linked to parenthood.

However, ethical implications can also be present in the above example, leading to a second and arguably less ethical path for information usage. The above characteristics of Customer A could lead to the organisation selling this information to third parties, say for example to a local

gym, who would target this young father with offers to lose weight or to an email advertising campaign for a new baby carriage. The possibilities are limitless and organisations in the past have demonstrated this and shared information without the knowledge and consent of the individuals, an issue that has recently been identified by data protection initiatives. To the local gym, this information is an example of non-transactional data, as Customer A had no previous encounters (nor transactions) with the gym. This last point provides leverage for a closer examination of the ethical implications of customer non-transactional data accumulation.

5   Conclusions and Implications: Sustainability and Capacity Building from Customer Information Accumulation Practices

5.1   Implications

As specified in the introduction, information is key in allowing organisations to examine customer preferences in order to gain a competitive edge. More precisely, a distinction was made in regard to the way in which information is acquired. The first included data obtained directly through a transaction with the customer—transactional data—while the second linked to data that has no relation to the transaction and acquired through indirect means.

Ethical issues and implications arise when non-transactional data is used, stored or shared with other parties without the consent of the individual. This is considered to affect both the customer's right to privacy and his/her choice to disclose (or not) private personal information to organisations. Because of this, in recent years several data protection initiatives, such as Midata in the UK (for Central Europe, see *EU Data Protection Directive* and for the USA, see *Cyber-Security Initiatives*) are slowly becoming more dominant in the data protection arena. For example, Midata is poised to provide consumers with access to their personal data held by marketers; this, according to Reed (2014), will help shift the

balance of information asymmetry between consumers and organisations. An asymmetric exchange occurs when consumers receive limited value for providing information to both firms and public-sector services.

Attention should be drawn to the fact that data protection initiatives, such as Midata, aim to empower consumers while assuring them that their personal data is well protected and not shared with any third parties unless consent is provided. To this end, it can be argued that these initiatives seek to substantially reduce the flow of consumer information to organisations that profit from selling them to third parties or fail to get consent for the acquisition and use of that information by the respective individuals in the first place. This arguably limits the usage of implicit data collection methods, mentioned above, and at the same time embraces the importance of more explicit methods of data capture to achieve a more sustainable equilibrium. As explicit data collection processes are based on voluntary disclosure by individuals, it is essential for organisations to identify key factors that make these processes more reliable, effective and efficient.

It can therefore be argued that the evolution of consumer data management that embraces sustainable development and capacity building should be based on voluntary disclosure as well as the acquisition of the consent of consumers to use their data; more rigorous data protection mechanisms should be employed within data warehousing processes to prevent leakage of information or potential misconduct. Within this spectrum, organisations need to employ a set of methods that maximise the propensity of individuals to both disclose information and provide consent of usage for their information. In doing so, research indicates a clear explanation to individuals on how their information is to be used as well as the mechanisms in place for the storage of their information increases disclosure propensity. This can be done through the simplification of the terms and conditions and privacy section while in certain cases simplified statements about potential use related to the question being asked (dyadic relationships) can arguably alleviate concerns.

To this end, contradicting views are also present and worth acknowledging. A study by Acquisti, Brandimarte and Lowenstein (2015) specified that logical assurances about information uses can sometimes elevate respondents' privacy concerns due to the fact that they become aware of potential risks from information disclosure that would have otherwise

remained dormant. A practical example of this is found in Mathios' (2000) work; this mentions that in the USA, salad sellers were previously not legally obligated to summarise the nutritional value of their salad dressings. Nevertheless, after certain legislation (Nutritional Labeling and Education Act), organisations were forced to clearly specify dressings with a higher fat content, which ultimately resulted in the decline in their sales. This provides evidence that extensive disclosure by organisations regarding products and services can have adverse effects on information disclosure by individuals.

5.2   Contributions and Future Research Avenues

The answering of questions concerning how much an organisation should disclose regarding potential uses of acquired information in order to facilitate information disclosure, and not force individuals to "clam up", is of particular managerial and also academic use and importance. This represents an interesting avenue for future research where qualitative means can be employed to empirically investigate the optimal way(s) reciprocal information disclosure can be synthesised and facilitated. Certain legislation by default requires organisation to disclose to consumers how their information is being used, albeit sometimes in an over-complicated terms and conditions documents. Streamlining and making this process more minimal and transparent can help to instil genuine organisational trust, with consequent benefits for relations with consumer organisations. Through this the visions of data protection initiatives are fulfilled while sustainability is established, setting the foundation of capacity building in the consumer information management arena.

Although privacy is a civil right applying to every consumer, great value can be found in its "loss" through the revealing of information; it is therefore important for organisations to pay the necessary attention to the delicate process of information disclosure in order develop sustainable solutions for customer data management while also enhancing capacity building processes. Apart from the legal obligations that are slowly requiring commercial organisation to engage in explicit instead of implicit modes of data collection, information revelation should be based on voluntarism by individuals.

As with all psychological behaviours by individuals, specific elements are found to influence the process of the voluntary disclosure of information. By taking into consideration certain ethical implications and key factors that influence the process of voluntary information disclosure, organisations are better equipped to extract both information and consent for usage by simply understanding how their customers perceive privacy at first and accordingly establishing sustainable practices around it.

References

Acquisti, A., John, L. K., & Loewestein, G. (2012). The impact of relative standards on the propensity of disclosure. *Journal of Marketing Research, 48*, 160–174.

Acquisti, A., Brandimarte, L., & Loewenstein, G. (2015). Privacy and human behavior in the age of information. *Science, 347*(6221), 509–514.

Andrade, E. B., Kaltcheva, V., & Weitz, B. (2002). Self-disclosure on the web: The impact of privacy policy, reward and company reputation. *Advances in Consumer Research, 29*(1), 350–353.

Bello-Orgaz, G., Jung, J. J., & Camachoa, D. (2016). Social big data: Recent achievements and new challenges. *Information Fusion, 28*, 45–59.

Blau, P. M. (1963). *The dynamics of bureaucracy: A study of interpersonal relations in two government agencies*. Chicago: University of Chicago Press.

Chadwick-Jones, J. K. (1976). *Social exchange theory: Its structure and influence in social psychology*. London: Academic.

Culnan, M. J., & Armstrong, P. K. (1999). Information privacy concerns, procedural fairness, and impersonal trust: An empirical investigation. *Organisation Science, 10*(1), 104–114.

Deutskens, E., De Ruyter, K., Wetzels, M., & Oosterveld, P. (2004). Response rate and response quality of internet-based surveys: An experimental study. *Marketing Letters, 15*(1), 21–36.

Dubey, R., Gunasekaran, A., Ghilde, S. J., Wamba, S. F., & Papadopoulos, T. (2016). The impact of big data on world-class sustainable manufacturing. *International Journal of Advanced Manufacturing Technology, 84*, 631–645.

Heath, A. (1976). *Rational choice and social exchange: A critique of exchange theory*. London: Cambridge University Press.

Horne, D. R., Norberg, P. A., & Ekin, A. C. (2007). Exploring consumer lying in information-based exchanges. *Journal of Consumer Marketing, 24*(2), 90–99.

Kumaraguru, P., & Cranor, L. F. (2005). *Privacy indexes: A survey of Westin's studies* (pp. 1–21). Pittsburgh: Institute for Software Research International, Carnegie Mellon University.

Linden, A. (2002). *Where should web-usage mining and personalization stop?* (1st ed.). Stamford: Gartner Publications.

Long, G., Hogg, M. K., Hartley, M., & Angold, S. J. (1999). Relationship marketing and privacy: Exploring the thresholds. *Journal of Marketing Practice: Applied Marketing Science, 5*(1), 4–20.

Mathios, A. D. (2000). The impact of mandatory disclosure laws on product choices: An analysis of the salad dressing market. *Journal of Law and Economics, 43*, 651–678.

Mital, M., Israel, D., & Agarwal, S. (2010). Information exchange and information disclosure in social networking web sites: Mediating role of trust. *The Learning Organization, 17*(6), 479–490.

Moon, Y. (2000). Intimate exchanges: Using computers to elicit self-disclosure from consumers. *Journal of Consumer Research, 26*(4), 323–339.

Nowak, G. J., & Phelps, J. (1995). Direct marketing and the use of individual-level consumer information: Determining how and when privacy matters. *Journal of Direct Marketing, 9*, 46–60.

Premazzi, K., Castaldo, S., Grosso, M., Raman, P., Brudvig, S., & Hofacker, C. F. (2010). Customer information sharing with E-vendors: The roles of incentives and trust. *International Journal of Electronic Commerce, 14*(3), 63–91.

Reed, D. (2014). *Empowering consumers through data.* Retrieved from The Data Governance Forum, website: http://www.datagovernor.co.uk/styled-4/

Robertshaw, G. S., & Marr, N. E. (2005). The implications of incomplete and spurious personal information disclosure for direct marketing practice. *Database Marketing & Customer Strategy Management, 13*(3), 186–197.

Shapiro, S. P. (1987). The social control of impersonal trust. *American Journal of Sociology, 93*(3), 623–658.

Smith, A., & Sparks, L. (2004). All about eve? *Journal of Marketing Management, 20*(4), 363–385.

Thibaut, J., & Kelley, H. H. (1959). *The social psychology of groups* (1st ed.). New York: Wiley.

Zimmer, J. C., Arsal, R., Al-Marzouq, M., Moore, D., & Grover, V. (2010). Knowing your customer: Using a reciprocal relationship to enhance voluntary information disclosure. *Decision Support Systems, 48*, 395–406.

10

Contemporary Nation Branding Under Complex Political Conditions: The Case of Palestine

Jilan Abdalmajid and Ioanna Papasolomou

1   Introduction

In light of global development, and since the beginning of the twenty-first century, almost all existing ideas regarding nation branding and brand building have been challenged (Aronczyk 2013; Browning 2016; Kaneva 2011). Nations around the world have faced unprecedented challenges, such as recession, political instability, internal conflict, corruption, war, refugee crises and religious war. Dinnie (2008) and Aldersey-Williams (1998) stipulate that nation branding is an exciting but complicated and controversial phenomenon as it is a highly politicised activity that often generates conflicting views. O'Shaughnessy and

J. Abdalmajid
School of Business, University of Nicosia, Nicosia, Cyprus

I. Papasolomou (✉)
Head of Marketing Department, School of Business, University of Nicosia, Nicosia, Cyprus
e-mail: Papasolomou.i@unic.ac.cy

Jackson (2000) argue that the image of a nation is so complex and abstract that it contradicts the clarity that is implicit in a term such as "brand image".

A "national brand" is defined as "a brand available nationally as distinct from [a] regional or test-market brand" (Bureau 1998). On the other hand, "a nation-brand, where the brand is the country, state or nation, is defined as the unique, multi-dimensional blend of elements that provide the nation with culturally grounded differentiation and relevance for all its target audiences" (Dinnie 2008, p. 15). This definition highlights the idea that brands exist in consumers' minds and do not constitute a completely controllable element in terms of marketing function. The definition, therefore, incorporates perceptual attributes and target markets.

Countries seem to adopt different strategies when dealing with challenges, but there is a growing trend for countries to adopt nation branding strategies in order to highlight their individuality and enhance their economic performance, especially in terms of tourism, inward investment and exports. Dinnie (2008) suggests that the branding process can help to eliminate misconceptions about a country and allow it to position or reposition itself favourably in the eyes of its target audience. Some countries have successfully created a strong nation reputation and have launched strong nation branding strategies; for example, Australia transformed itself from a penal colony into one of the most popular property markets and developed economies in the world, and South Korea, a poor, rural society following the Second World War, emerged as a rich economy and became synonymous with efficiency and quality (*Branding is key for countries*, 2010). One should not ignore the short-term consequences of nation branding in favour of a long-term strategy. Denmark's policymakers, for example, put their efforts into restoring the country's image following the crisis in 2005–2006, but they failed to adequately deal with the short-term consequences in the areas of national security and exports (Insch and Avraham 2014). Song (2017) highlights the fact that countries which were once leaders in global country-brand rankings have seen their nation brands damaged by increased political instability and social division.

Several academics agree that branding is vital for developing and managing coherent and comprehensive nation brands and, hence, for contributing to the success of a country (Szondi 2007; Dinnie 2015; Martin 2017). The Anholt-GfK Nation Brands Index[SM], which is conducted by GfK, is the world's most comprehensive global nation branding survey. It is conducted in cooperation with Simon Anholt, an independent policy advisor, who initially developed the Nation Brand Hexagon model (2000), which is one of the three models used in the preliminary framework for developing a nation brand for Palestine. The Anholt-GfK Nation Brands Index[SM] helps governments, organisations and businesses to understand, measure and ultimately build a strong national image and reputation. It measures the power and quality of each country's "brand image" by combining the six dimensions which were initially identified and highlighted in Anholt's Nation Brand Hexagon model (2000): governance; people; exports; tourism; investment and immigration; and culture and heritage.

The latest Anholt-GfK Nation Brands Index[SM] ranks the following market economies from best to worst: Germany, France, the UK, Canada, Japan, the USA, Italy, Switzerland, Australia and Sweden (Martin 2017).

Imran (2017) argues that nation branding is no longer a process that is used only by the strongest economies in the world; rather, less economically developed countries are engaging in nation branding activities to enhance their reputation. The existing literature discusses several examples, including Singapore (Song 2017), Azerbaijan (Imran 2017), the UAE (Zeineddine 2017) and South Africa during the World Cup in 2010 (Knott et al. 2015) and Oman (Alzadjali 2010).

Although Palestine, along with Bethlehem and Jerusalem, has been an important pilgrimage destination for centuries and possesses probably one of the oldest brands in the world, it suffers from having an unknown state brand (Hall et al. 2016). Hall et al. (2016) argue that the process of branding the State of Palestine is no longer a choice but a necessity, and that the branding strategy itself should be based on an integrated effort by all key stakeholder groups. The unique nature of Palestine is summed up by Cakmak and Isaac (2012), who state that it is "The newest country probably with the oldest nation brand in the world" (Cakmak and Isaac 2012, p. 228).

2   Literature Review

Nation branding is a relatively new phenomenon (Varga 2013), one that emerged shortly after the Second World War (Aronczyk 2013). The past few decades have witnessed exponential growth in the use of branding techniques by nations envisaging "the synthesis of brand management with public diplomacy, trade and investment, tourism and export promotion" (Varga 2013). As an emerging area of interest, nation branding is driven largely by practitioners, but, paradoxically, not only is there a lack of progress in conceptual development but also there is only a relatively small amount of adequate research on this topic (Fan 2010). As a result, there is an urgent need for the conceptual development of the subject (Fan 2010).

Nation branding involves creating a nation's values and benefits for its people and sustaining its competitiveness in the era of globalisation (Lee 2009). Countries are embracing nation branding in order to differentiate themselves on the world stage, to strengthen their economic performance (Dinnie 2008) and to attract investors, tourists, entrepreneurs, and cultural and international sporting events (Anholt 2007). Anholt (2007, p. 3) defines nation branding as

> the systematic process of aligning the actions, behaviours, investments, innovations and communications of a country around a clear strategy for achieving a strengthened competitive identity. It can be as modest as linking the promotions […] or it can be a decades-long policy of coordinating all internal and external national strategies […] into a coherent, planned process.

Branding is not just a marketing activity. It is a long-term strategy for a country and its position in the world (Qobo 2017). It can be perceived as a holistic development which influences the entire nation (Moilanen and Rainisto 2009). It encompasses activities ranging from country naming to managing the nation brand (Lee 2009). A critical step in the design of a nation brand is to identify the underlying principles and critical factors, while also acknowledging that certain basic principles and factors may be perceived as more important than others in different countries (Dinnie 2016).

One can perhaps argue that, in a nation's branding efforts, stakeholders play a critical role in developing the brand, in terms not only of its conception but also of communication (Dinnie 2008). The existing literature on the relationship between branding and stakeholder theory has not adequately focused on their role and importance in the nation branding process (Dinnie 2016). This gap in the literature has motivated the researchers to explore and critically evaluate the role of stakeholders in developing a nation brand for Palestine. The current literature also lacks empirical evidence for the influential role stakeholders play in developing and managing brands (Pike 2004; Florek 2005). Dinnie and Fola (2009) agree and claim that, in the majority of cases, the existing literature merely identifies these stakeholder groups in various organisational contexts and settings.

Gregory (2007) argues that stakeholders are usually regarded as targets rather than partners in the development of brands and that the literature seldom provides guidance on how their involvement and role can be either identified or facilitated. According to Merrilees et al. (2012), the scant literature available provides scope for investigating the relationship between branding and the multiple stakeholders involved in the process. Dinnie and Fola (2009) argue that stakeholder identification may be context-specific; in other words, there may not be a universally applicable concept. Further research is needed to investigate the nature of stakeholder identification across different international settings. As a response to this need, this chapter discusses the conceptual part of an exploratory research study that aims to develop a framework for developing a nation brand for Palestine. The study explores the perceptions and opinions of several stakeholder groups in relation to the key factors that contribute to developing a strong nation brand; it therefore aims to help fill this gap in the existing literature and shed light on the influential role of stakeholders in Palestine and their respective views and attitudes towards developing the nation brand.

3   The Case of Palestine

Palestine was chosen for this research study owing to its unique geopolitical, economic and cultural identity. The Palestinian Liberation Organization (PLO) has worked towards the international recognition of the State of

Palestine since the Palestinian Declaration of Independence, which proclaimed the establishment of the State of Palestine on 15 November 1988 in Algiers. The declaration was initially acknowledged by approximately 80 countries (aljazeera.net 2016); however, by the end of the 1988, the state had been recognised by over 80 countries (United Nations Educational, Scientific 1989). In February 1989, at its 43rd session, the General Assembly acknowledged the proclamation of the State of Palestine by the Palestine National Council on 15 November 1988, and decided that the designation "Palestine" should be used in place of the designation "Palestine Liberation Organization" in the United Nations system (General Assembly resolution 43/177, para. 3). As an attempt to resolve the ongoing Israeli–Palestinian conflict, the Oslo Accords signed between Israel and PLO in September 1993 established the Palestinian Authority as a self-governing interim administration in the Palestinian Territories. To this day, Israel does not recognise Palestine as a state and maintains de facto military control over all the territories.

As of 29 November 2012, 138 of the 193 member states of the United Nations and two non-member states have recognised the State of Palestine as a non-member state (Palestinian Declaration of Independence; Palestinian National Authority; Gaza-Jericho (Oslo I) Agreement; Palestinian Academic Society for the Study of International Affairs; all accessed 22 January 2018). In the case of Palestine, developing a nation brand has not really been a priority since the establishment of the Palestinian Authority in 1993 and the recognition of the State of Palestine as a non-member state. One of the few initiatives in this respect is the National Export Strategy, which was launched in 2017, but this aimed merely to develop a strategy for branding Palestinian exports (Mustapha 2017). Additionally, the Palestinian government has announced its 2017–2022 sectorial strategy for the development of the national economy and the 2014–2018 national export branding strategy. These strategies resulted from acknowledging the global development of nation brands and the importance of developing a nation brand for Palestine (Pal Trade 2014).

4   The Importance of Stakeholders

Hankinson (2007) suggests that corporate brands are multi-dimensional and multi-disciplinary. On the one hand, stakeholder audiences interface with the organisation in a variety of ways; on the other, the interface

incorporates social responsibility, compliance and corporate governance (Ind 1997). Along these lines, one can claim that nation brands are also multi-dimensional in nature as a variety of stakeholder groups interface with the organisation in a variety of ways; for example, tourists visit a country's attractions and trade with local businesses. The business sector invests in the country's economy and its success relies heavily on the country's infrastructure. The public-sector organisations address the needs of the citizens, and very often the needs of the country's visitors. Not-for-profit organisations rely heavily on government subsidies and donations to help the people in their care, and the country's citizens invest a significant amount of mental and physical effort in daily interactions with organisations and individuals.

Hankinson (2007) further suggests that corporate brands share similarities with destination brands, and that the literature on corporate branding can make an important contribution to our understanding of the potential problems of destination brand management and how these can be solved. Ashworth and Voogt (1994) stipulate that tourism destinations are multi-service products and are therefore often of interest to a wide range of consumer segments. Hence, they are similar in nature to corporate brands, and, to be successful, both tourism destinations and corporate brands must communicate with a wide audience. In the case of destinations, these audiences can be grouped into three broad categories: tourist segments, corporate segments and organic influencers (Gunn 1997). Tourist segments may also encompass leisure and business tourists. Corporate segments may encompass tourism-related organisations and non-tourism-related organisations, while the organic influences segment consists of organisations and groups of people that can strongly influence the destination's brand image through their communication role, for example in the media, education and the arts.

Based on this perspective, it can be suggested that the creation and success of a nation brand—as is the case with a destination or a corporate brand—depends heavily on the relationships that it forms with key segments; that is, key stakeholders. It is important to establish relationships with these distinct stakeholders since their impact can be profound and permanent in shaping the reputation of the nation brand. Therefore, in building a nation brand, care needs to be taken when identifying key stakeholders, their perceptions and expectations, and the nature of their relationships with the nation brand.

5   Methodological Research Design

The overarching aim of the research study on which this chapter builds is to propose an integrated framework for designing a nation brand for Palestine based on an extensive review of the relevant literature, followed by empirical data. In the first part of the chapter, the in-depth literature review (above) discussed previous conceptual models for developing a nation brand. It identified: (1) the key factors/variables that contribute to the creation of a nation brand; and (2) any existing gaps. The second part of the chapter aims to synthesise a "new" framework for developing a nation brand for Palestine by considering the role and complexity of various stakeholders from the political, economic, academic, governmental, diplomatic and social sectors of Palestine.

The following broad research questions guide the discussion in this chapter:

1. What are the key critical factors (based on the existing literature) for developing a nation brand?
2. What role do various stakeholders play in the nation brand-building process?
3. What are the key factors and the key stakeholder groups that help to build a contemporary nation brand for Palestine?

These research questions resulted in the following research objectives:

1. to carry out an extensive literature review in the field of nation branding and nation brands in order to identify the key factors that are essential for developing a nation brand;
2. to explore the importance of the stakeholder theory and its relevance in the branding process; and
3. To propose a "new" framework for developing a nation brand for Palestine.

The discussion is guided by the authors' philosophical perspective and positioning. Developing this philosophical perspective requires making several core assumptions concerning the ways in which we view the world

(Burrell and Morgan 1970). There are two broad perspectives regarding research philosophy: ontology (the way we perceive reality); and epistemology (the way we study this reality) (Saunders et al. 2009). The authors have adopted an ontological position—subjectivism—that supports the interpretation of people's perceptions (Johnson and Christensen 2010). Research paradigms guide the way research is conducted and implemented and the way the results of the research are analysed and presented (Babbie 2012; Blaikie 2000; Bryman and Bell 2015). A review of the various research paradigms resulted in the adoption of the interpretivism/ constructivism paradigm as the researchers' personal standpoint is one allows for the formation of an understanding of the world based on human experience, implying that reality is socially constructed (Mertens 2005; McMillan and Schumacher 2006). The discussion in this chapter is the first part of a two-stage empirical study on constructing, testing and verifying a conceptual model for the nation brand of Palestine. The empirical stage of the study was guided by the interpretivist/constructivist paradigm, which is qualitative in nature (Qu and Dumay 2011; Harris and Daunt 2013) and utilises both inductive and deductive approaches (Wallace 1971).

6   Preliminary Conceptual Framework

The literature review process revealed that there is no single nation brand model which can be adopted by all nations since, according to Hankinson (2007), there are significant differences between nations, for example in terms of their institutional infrastructure and their potential for developing strong nation brands. Therefore, there seems to be a gap in the existing literature in terms of a suitable nation brand model for Palestine. The literature reviewed also revealed a second gap, whereby there is a discrepancy in identifying the key factors that contribute to the development of a nation brand. It seems that different authors and, hence, different models propose different factors as contributing to the development of a nation brand. Finally, a third gap exists in terms of the types and roles of stakeholders in the branding process (Gregory 2007).

There are several research studies on nation branding, for example: EndziĦa and LuĦeva (2004), Gilmore (2002), Morgan, Pritchard and Piggott (2002), Zerrillo and Thomas (2007), Gudjonsson (2005), and Florek and Conejo (2007). However, several researchers and scholars (Hankinson 2004; Fan 2010; Dinnie 2016) have argued that the understanding of the nation branding process is still in its infancy and there is lack of empirical research studies and integrated models. In the current study, the authors chose to draw on different aspects of the nation branding process taken from specific models and to use factors from the existing models, but in an integrated manner. In particular, the authors chose to focus on three models in order to develop the preliminary conceptual framework to be tested in the empirical phase of the research study. These models are those developed by Anholt (2000), Hankinson (2007) and Dinnie (2008).

Dinnie (2008) proposes a model that can be used to identify key stakeholders in the nation branding process. In the context of nation branding, the argument is that the stakeholder identification becomes a complicated task given the multiplicity and almost infinite range of potential stakeholders. The FIST (Fully Inclusive Stakeholders) model encompasses the diverse range of potential stakeholders that may play a critical role in the nation branding process. At the heart of the model is the idea that all relevant stakeholders must be involved in the branding process. According to Dinnie's (2008) model, the government has the legitimacy to establish the parameters of the country's nation branding strategy. One of the few studies carried out on nation branding from a stakeholders' perspective is that by Dinnie and Fola (2009), which focused on branding Cyprus.

Anholt's (2000) model suggests that most countries create their nation brands by using six components: tourism, export, people, governance, culture and heritage, and people. These components are critical factors in attracting tourism, stimulating inward investment and boosting exports. However, one should acknowledge that these factors may have different roles and degrees of importance in different countries. Anholt (2007) emphasises the government's role in identifying the perceived reputation of a country, developing a strategy for managing it and building a reputation that is fair, true, powerful, attractive and useful for the country's

economic, political and social aims. Anholt (2007) stipulates that there is no standard formula for building a nation brand; however, the process must be collaborative as each country has its own unique circumstances, resources and competences.

Hankinson (2004) stipulates that there is no single universal approach to destination branding and that the literature on place marketing in general, and destination branding in particular, incorporates several academic domains, such as geography, urban planning, tourism and retail marketing. He develops a holistic model for managing the destination branding process, one which integrates the repertory grid technique originally developed by Kelly (1955). Hankinson's assesses the relative saliency of image attributes associated with history, heritage and culture in shaping the perceptions of places as tourism destinations. These images tend to form over a long period of time and result from an exposure to communication processes largely outside the domain of marketing, such as education, literature and the arts. The study identified 11 categories of image attributes associated with a destination's history, heritage and culture being the second most salient.

The models developed separately by Hankinson (2007), Anholt (2000) and Dinnie (2008) can be integrated into one single model for building a nation brand for Palestine. This chapter presents one single, comprehensive and all-encompassing model incorporating all previously suggested stakeholders as well as other critical parameters, such as the leadership's vision, and internal and external brand identity, which may be critical in the branding process. The model includes all key stakeholder groups identified by Dinnie (2008) and Anholt (2000) and highlights the fact that the government needs to assume responsibility for ensuring that the leadership vison guides the entire nation branding process (Hankinson 2004).

The proposed integrated framework for building a nation brand for Palestine (see Fig. 10.1) highlights how the three models previously developed have been blended into one single model. Dinnie (2016) claims that there are several similarities between corporate branding and nation branding. One such similarity is that the branding process should be guided by the corporate vision, which is usually the responsibility of a firm's CEO. In the case of a country, the vision regarding the nation brand
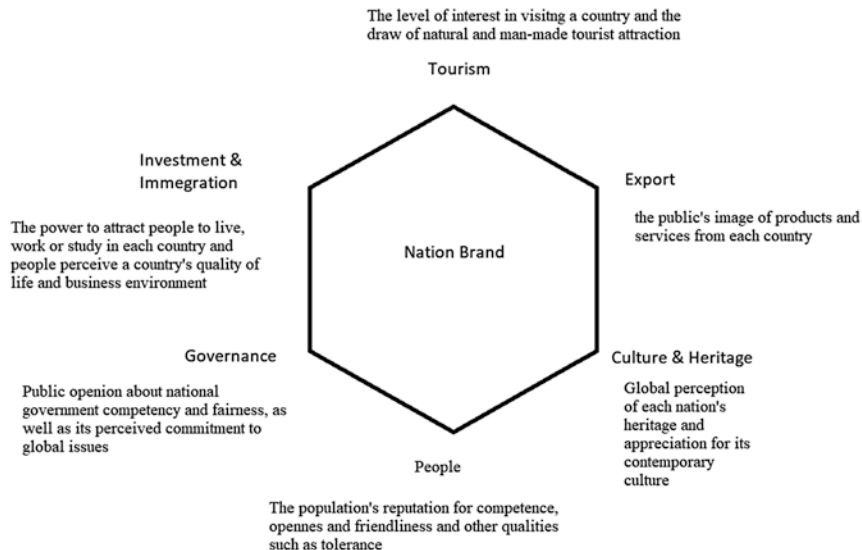
The level of interest in visitng a country and the
draw of natural and man-made tourist attraction

Tourism

Investment &
Immigration

Export

The power to attract people to live,
work or study in each country and
people perceive a country's quality of
life and business environment

the public's image of products and
services from each country

Nation Brand

Governance

Culture & Heritage

Public opienion about national
government competency and fairness, as
well as its perceived commitment to
global issues

Global perception
of each nation's
heritage and
appreciation for its
contemporary
culture

People

The population's reputation for competence,
openess and friendliness and other qualities
such as tolerance

Fig. 10.1 The proposed integrated conceptual framework for developing a nation brand for Palestine

could be the responsibility of higher-level officials, such as the country's president and ministers. Hankinson (2007) argues that the company's strategic vision should guide the organisational culture and brand image, which should be developed and communicated by senior-level management throughout the organisation. Urde (2003) stipulates that building the brand must begin with top management, while Anholt (2007) indicates that, in the case of building a nation brand, an integral part of the government's job is to build a reputation that is fair, true, powerful, attractive and genuinely useful to the country's economic, political and social aims. To be able to do this, the government should develop a clear strategy that is founded on cooperation with different stakeholders (Anholt 2007). Dinnie's (2008) FIST model demonstrates that, in creating a nation brand, all stakeholders should be included in the branding process and an effort should be made to identify their perceived "ideal" state. Ideally, the nation brand should reflect the stakeholders' views.

According to Anholt (2000), the "natural channels" of the nation brand are tourism, export, people, governance, culture and heritage, and inward investment. Hankinson (2007) argues that communication with

these target audiences is particularly important not only during the early stages of creating the brand but also during the developmental stage. Stakeholders are an integral part of the nation branding process (Urde 2003). Hankinson (2007) also posits that the core brand values which reflect a brand's identity are essentially a subset of the corporate values which reflect a corporation's identity. The framework suggests that the nation brand values are reflected through the vision of senior-level governmental officials of what the nation brand represents and reflects, and this vison is subsequently refined through a process of interaction with key stakeholders (Hankinson 2004).

Hankinson (2007) also states that the communication of the nation brand through various channels entails a wider audience. Anholt (2007), on the other hand, suggests that the nation's reputation powerfully affects the way people both inside and outside the country think about the country and respond to events occurring within it. It is possible to measure the nation's reputation by collecting and analysing a continuous flow of feedback shared among all the stakeholders and the government of a nation. Therefore, coordination of and communication between all key stakeholders is paramount to the branding process.

7   Theoretical and Practical Implications

The literature review reveals a gap owing to the lack of sufficient empirical evidence regarding a universal framework for governments to create nation brands. According to Kaufmann and Durst (2008), the development of "nation brands" across nations and cultures currently lacks an empirical and systematic research approach.

The literature review revealed that nation branding is an exciting but complex and controversial phenomenon (Dinnie 2008). The controversy that surrounds it is largely because it is a highly publicised activity that generates conflicting views and opinions. O'Shaughnessy and Jackson (2000) theorise that the image of a nation is not only complex but also abstract, and this contradicts the meaning and central idea of the term "nation image", which refers to the stakeholders' "picture" (or image) of a nation. Furthermore, it is also an area with little existing theory but heightened real-life international activity. Therefore, the present study

proposes an integrated and extended conceptual framework for building a nation brand for Palestine (a state surrounded by controversy) by merging three models that were developed separately by Hankinson (2007), Anholt (2000) and Dinnie (2008). These three models independently promote critical components of the branding process, but the conceptual framework proposed in this chapter combines them into one holistic model.

The model suggests that several key stakeholders may play an influential role in enhancing the nation brand for Palestine, and their views need to be identified and integrated into the branding process; these stakeholders are the private and public sectors, political partners, non-governmental organisations, tourism associations, and trade associations and unions (Dinnie 2008). Similarly, the branding process proposed in the framework encompasses several critical factors, such as exports, tourism, culture and heritage, people, investment and public diplomacy (Anholt 2000); finally, the branding process needs to reflect the leadership's (government's) vision about the nation brand and internal and external brand identity (Hankinson 2007).

The components of the proposed conceptual model will be verified through the collection and analysis of empirical evidence provided by key stakeholders/segments in Palestine. Specifically, the researchers will carry out in-depth personal interviews with the following stakeholders: tourism boards (private and public sectors), chambers of commerce, trade associations, non-governmental organisations and the diaspora, intellectual citizens and investment and economic agencies (the private and public sectors). The in-depth personal interviews will reveal the views, perceptions, attitudes and beliefs of these stakeholder groups in relation to those factors that contribute towards creating a strong and distinct nation brand for Palestine. Subsequently, it is quite likely that some of the elements revealed will be different from those proposed through the conceptual framework; if this is so, the framework will be redefined to reflect this.

8   Conclusion

The literature review revealed a number of conceptualisations of nation branding. These, which are stipulated by several authors, bring to light the dynamism inherent in the nation branding process. The models

highlight the critical factors contributing to the formation of a nation brand. This chapter suggests that a stakeholder approach to nation branding has clear merit.

Nation branding can be analysed more effectively by using a framework based on the management of a nation's relationship with its stakeholders. A nation is the nexus of a complex web of stakeholder relationships. Three models were specifically selected since they emphasised the relationship between a nation brand and various stakeholders. Anholt (2000), Dinnie (2008) and Hankinson (2007) suggest that nation branding as a process is affected by multiple stakeholders who interact with the nation brand and, subsequently, define it. Although the three models favour specific stakeholders and their impact on shaping the nation brand, they can be integrated into one holistic model for defining the nation brand of Palestine. Their integration into the proposed model ensures that all the critical building factors are identified and managed. The proposed conceptual model also suggests that the entire process should be strategically managed by the nation's government, and that the government's vision regarding the nation brand should guide the nation branding developmental and implementation processes in a strategic way. This study contributes to existing theory by proposing an integrated conceptual model, one which will be validated at a later stage and, hence, can potentially be implemented by any interested party.

References

Aldersey-Williams, H. (1998, April 10). Cool Britannia's big chill. *New Statesman*, pp. 12–13.

Alzadjali, B. D. (2010). *Nation brand in Oman. Studing stakeholders views on 'Branding Oman'*. Master thesis in Marketing managament, Faculty of Business and Law, De Montfort Umiversity, Leicester. Munich and Santa Cruz: GRIN.

Anholt, S. (2000). The nation as a brand. *Across the Board, 37*(10), 22–27.

Anholt, S. (2007). Competitive identity: The new brand management for nations, cities and regions. *Journal of Brand Management, 14*(6), 474–475.

Aronczyk, M. (2013). *Branding the nation: The global business of national identity*. New York: Oxford University Press.

Ashworth, G., & Voogt, H. (1994). Marketing and place promotion. In J. Gold & S. Ward (Eds.), *Place promotion, the use of publicity and marketing to sell towns and regions*. Chichester: Wiley.

Babbie, E. (2012). *The practice of social research* (11th ed.). Belmont: Wadsworth Publishing.

Blaikie, N. (2000). *Designing social research: The logic of anticipation*. Malden: Polity Press.

Browning, C. S. (2016). Nation branding and development: Poverty panacea or business as usual? *Journal of International Relations and Development, 19*(1), 50–75.

Bryman, A., & Bell, E. (2015). *Business research methods* (4th ed.). Oxford: Oxford University Press.

Bureau, J. R. (1998). In M. J. Baker (ed.), *The Westburn Dictionary of Marketing*. Westburn Publishers Ltd. 2002.

Burrell, G., & Morgan, B. (1970). *Sociological paradigms and organisational analysis: Elements of the sociology of corporate life* (Vol. 14). London: Heinemann.

Cakmak, E., & Isaac, R. K. (2012). What destination marketers can learn from their visitors' blogs: An image analysis of Bethlehem, Palestine. *Journal of Destination Marketing and Management, 1*(1/2), 124–133.

Dinnie, K. (2008). *Nation branding: Concepts, issues, practice*. Oxford: Butterworth-Heinemann, 15.

Dinnie, K. (2015). *Nation branding: Concepts, issues, practice*. New York: Routledge.

Dinnie, K. (2016). *Nation branding: Concepts, issues, practice*. New York: Routledge.

Dinnie, K., and Fola, M. (2009, July). *Branding Cyprus—A stakeholder identification perspective*. Paper presented at the seventh international conference on marketing, Athens Institute for Education and Research, Athens.

Endziħa, I., & Luħeva, L. (2004). Development of a national branding strategy: The case of Latvia. *Place Branding, 1*(1), 94–105.

Fan, Y. (2010). Branding the nation: Towards a better understanding. *Place Branding and Public Diplomacy, 6*(2), 97–103.

Florek, M. (2005). The country brand as a new challenge for Poland. *Place Branding, 1*(2), 205–214.

Florek, M., & Conejo, F. (2007). Export flagships in branding small developing countries: The cases of Costa Rica and Moldova. *Place Branding and Public Diplomacy, 3*, 53–72.

Gilmore, F. (2002). A country—Can it be repositioned? Spain—The success story of country branding. *The Journal of Brand Management, 9*(4), 281–293.

Gregory, A. (2007). Involving stakeholders in developing corporate brands: The communication dimension. *Journal of Marketing Management, 23*(1–2), 59–73.

Gudjonsson, H. (2005). Nation branding. *Place Branding, 1*(3), 283–298.

Gunn, C. (1997). *Vacationscape: Developing tourist areas* (2nd ed.). Washington, DC: Taylor and Francis.

Hall, C., Isaac, R., & Higgins-Desbiolles, F. (Eds.). (2016). *The politics and power of tourism in Palestine*. London: Routledge.

Hankinson, G. (2004). Relational network brands: Towards a conceptual model of place bands. *Journal of Vocation Marketing, 10*(2), 109–121.

Hankinson, G. (2007). The management of destination brands: Five guiding principles based on recent developments in corporate branding theory. *Brand Management, 14*, 240–254.

Harris, L., & Daunt, K. (2013). Managing customer misbehaviour: Challenges and strategies. *Journal of Services Marketing, 27*(4), 281–293.

Imran, S. (2017). Effects of nation branding on national identity of Azerbaijan. *Journal of Economic Sciences: Theory & Practice, 74*(1), 34–47.

Ind, N. (1997). *The corporate brand*. London: Macmillan.

Insch, A., & Avraham, E. (2014). Managing the reputation of places in crisis. *Place Branding and Public Diplomacy, 10*(3), 171–173.

Isaac, R. K., Michael Hall, C., & Higgins-Desbiolles, F. R. E. Y. A. (2015). Introduction. In *The politics and power of tourism in Palestine* (pp. 17–28). London: Routledge.

Johnson, R. B., & Christensen, L. B. (2010). *Educational research: Quantitative, qualitative, and mixed approaches* (4th ed.). Thousand Oaks: Sage.

Kaneva, N. (2011). Nation branding: Toward an agenda for critical research. *International Journal of Communication, 5*, 117–141.

Kaufmann, H. R., & Durst, S. (2008). Developing inter-regional brands. *EuroMed Journal of Business, 3*(1), 38–62.

Kelly, G. A. (1955). *The psychology of personal constructs*. New York: Norton.

Knott, B., Fyall, A., & Jones, I. (2015). The nation branding opportunities provided by a sport mega-event: South Africa and the 2010 FIFA World Cup. *Journal of Destination Marketing & Management, 4*(1), 46–56.

Lee, K. M. (2009). *Nation branding and sustainable competitiveness of nations dissertation*. Unpublished doctoral dissertation. University of Twente.

Martin. (2017). *How nations and brands overcome country of origin challenges*. Retrieved from https://martinroll.com/resources/articles/marketing/how-

nations-and-brands-overcome-country-of-origin-challenges/. Accessed 10 January 2018.

McMillan, J. H., & Schumacher, S. (2006). *Research in education: Evidence-based inquiry*. New York: Pearson Education, Inc.

Merrilees, B., Miller, D., & Herington, C. (2012). Multiple stakeholders and multiple city brand meanings. *European Journal of Marketing, 46*(7/8), 1032–1047.

Mertens, D. M. (2005). *Research methods in education and psychology: Integrating diversity with quantitative and qualitative approach* (2nd ed.). Thousand Oaks: Sage.

Moilanen, T., & Rainisto, S. K. (2009). *How to brand nations, cities, and destinations: A planning book for place branding*. Helsinki: Palgrave Macmillan.

Morgan, N., Pritchard, A., & Piggott, R. (2002). New Zealand, 100% pure. The creation of a powerful niche destination brand. *The Journal of Brand Management, 9*(4), 335–354.

Mustapha, M. (2017). Retrieved from https://www.paltrade.org/upload/multi-media/admin/2014/10/5448e728e1bd3.pdf. Accessed 14 December 2017.

O'Shaughnessy, J., & Jackson, N. (2000). Treating the nation as a brand: Some neglected issues. *Journal of Macromarketing, 20*(1), 56–64.

Pal Trade. (2014). Retrieved from https://www.paltrade.org/upload/multime-dia/admin/2014/10/5448e728e1bd3.pdf. Accessed 14 December 2017.

Pike, S. (2004). *Destination marketing organisations*. Oxford: Elsevier.

Qobo, M. (2017). Africa's foreign policy and nation branding: Regional leadership and its discontents. *Strategic Review for Southern Africa, 39*(1), 9.

Qu, S., & Dumay, J. (2011). The qualitative research interview. *Qualitative Research in Accounting & Management, 8*(3), 238–264.

Saunders, M., Lewis, P., and Thornhill, A. (2009). *Research methods for business students* (6th ed). UK: Pearson Education Limited.

Song, K. B. (2017). *Brand Singapore: Nation branding after Lee Kuan Yew, in a divisive world*. UK: Marshall Cavendish International Asia Pte Ltd.

Szondi, G. (2007). The role and challenges of country branding in transition countries: The Central and Eastern European experience. *Place Branding and Public Diplomacy, 3*(1), 8–20.

Tessler, M. (1994). *A history of the Israeli–Palestinian conflict* (2nd illustrated ed). UK: Indiana University Press.

United Nations Educational, Scientific; Cultural Organization, Executive Board. (1989, May 12). *Hundred and thirty-first session: Item 9.4 of the provisional agenda, Request for the Admission of the State of Palestine to UNESCO as*

a Member State. Presented at the United Nations. Retrieved from http:// nation-brands.gfk.com. Accessed 18 January 2018.

Urde, M. (2003). Core value-based corporate brand building. *European Journal of Marketing, 37*(7/8), 1017–1040.

Varga, S. (2013). The politics of nation branding: Collective identity and public sphere in the neoliberal state. *Philosophy & Social Criticism, 39*(8), 825–845.

Wallace, J. (1971). *Psychology: A social science*. Philadelphia: Saunders.

Zeineddine, C. (2017). Employing nation branding in the Middle East – United Arab Emirates (UAE) and Qatar. *Management & Marketing, 12*(2), 208–221.

Zerrillo, P. C., & Thomas, G. M. (2007). Developing brands and emerging markets: An empirical application. *Place Branding and Public Diplomacy, 3*(1), 86–99.

11

The Role of Self-Awareness and Self-Efficacy on Career Decision-Making: An Innovative Perspective

Hande Özek and Alberto Ferraris

1 Introduction

Careers play a central role in people's lives and significantly impact their economic and social status as well as emotional wellbeing (Blustein 2008). Choosing one's future career is one of the most important decisions that individuals face during their development. Making career decisions is not an easy task; indeed, career decision-making difficulties are among the most prevalent vocational problems encountered by individuals (Amir and Gati 2006; Campbell et al. 2017). Such difficulties may result in avoiding the career decision-making process, halting it or pursuing sub-optimal

H. Özek
Department of Business Administration, Yeniyuzyıl University,
Istanbul, Turkey
e-mail: hande.ozek@yeniyuzyil.edu.tr

A. Ferraris (✉)
Department of Management, University of Turin, Turin, Italy
e-mail: alberto.ferraris@unito.it

outcomes (Gati et al. 2010). This fact also has implications for organisations that aim at increasing the effectiveness and quality of their workforce with a positive impact on their capacity building.

There are many individual features that influence the way we make our decisions, including our personal interests, cognitive abilities, emotions, personality traits and identity (Gati et al. 2010; Germeijs et al. 2012). Therefore, to make wise career decisions, an individual must take into account his or her own personal characteristics while examining the available information about the vocational world.

In fact, not only personal traits but also demographical and social factors can affect career decisions. Family influence has been found to be one of the major factors influencing Asian adolescents' career decisions (Kim 1993; Leong and Chou 1994). Asian parents implicitly or explicitly convey their expectations to their children, and familial pressure on career choices has been mentioned by various researchers (Kim 1993; Leong and Serafica 2001). Cultural values may also contribute to particular career decisions (Jiang 2014) because there are occupations that are culturally more desired or respected (Tang et al. 1999). Moreover, the individual has to control for various internal and external factors that can interfere with the decision-making process. Altogether, these activities could be interpreted as self-regulation, which comprises self-monitoring and self-control (Barber et al. 2009).

While examining the literature, we noted that there are two internal factors, self-efficacy and self-awareness, which can be decisive and influential in the decision-making process; we encountered little research examining these two factors together. Self-awareness incorporates the capacity for self-reflection and thoughtfulness that Covey (2004) declared necessary to discover one's voice and, at the same time, incorporates the ability to understand one's true nature and the freedom to choose how one consciously wishes to respond to life (Goleman et al. 2002). Self-efficacy, in contrast, refers to a person's belief in his/her ability to successfully complete a behaviour or set of behaviours (Chung 2002). We hypothesized that people with higher self-efficacy and self-awareness would make more consistent career decisions. This result can also provide benefits to organisations in the long term regarding their capacity building.

Human resources (HR) that assess the potential of the employees using HR systems are crucial for organisations that use performance management and HR systems to select, train and reward their employees (Ferraris et al. 2017a; Vrontis et al. 2017). This may be even more important with regard to new innovation approaches (such as open innovation), where the behaviour and attitudes of people are a key factor in the implementation of open innovation culture within organisations (Bresciani et al. 2016; Ferraris et al. 2017b).

Overall, we aim to add value to the literature by pointing out the relevance of self-awareness and self-efficacy, which may lead to a more conscious attitude towards decision-making. Moreover, in this chapter we reveal the differences between two cultures and among several demographical features in career decision-making. The research aims to give more explanatory information about the factor that has an effect upon career decision-making by university students.

The chapter is organised as follows. First, we propose a deep literature review on self-awareness and self-efficacy on career decision-making. We then offer a preliminary empirical analysis on university students coming from two large Italian and Turkish universities. Finally, we discuss the results in the light of the existing literature on the topic, deriving some interesting implications as well as considerations on the factors that influence the career decision-making of the students.

2   Theoretical Background

2.1   Self-Efficacy in Career Decision-Making

Career decision-making self-efficacy identifies the extent to which students have confidence (self-efficacy) in their ability to engage in educational and occupational planning and decision-making. Bandura (1980) originally hypothesised that efficacy expectancies were independent of outcome expectancies, yet he also noted that both these expectancies can shape behaviour. For example, individuals may cease their attempts to attain goals either because they believe themselves incapable of adequately

performing the necessary behaviours (low efficacy expectancy) or because they believe that their efforts will go unrewarded (low outcome expectancy). Bandura (1979) suggested that behaviour is predicted by considering both types of expectancies, although he proposed that efficacy expectancies exert a stronger influence on behaviour change and that expected outcomes depend in part on perceptions of personal capabilities (Manning and Wright 1983).

Individual attributes, such as low self-esteem, limited self-efficacy and a lack of self-advocacy skills, can restrict the ability of individuals to fully explore a wide range of career options (Lindstrom et al. 2012). There is evidence, for example, showing that how a person feels about himself can affect how the person believes others will feel about him (e.g., Kenny and De Paulo 1993). Low self-esteem and self-efficacy can cloud the ability to grasp what others see about a person, as well as lower the motivation to influence or change the impressions of others. This can lead a person to assume that others' perceptions tally with their own: "People tend to hold certain views of themselves and these views can bias their perceptions of how others view them" (Tice and Wallace 2003, p. 98).

Bandura points out that self-percepts of efficacy are domain-specific. An individual may have a strong sense of self-efficacy in one domain, but a much weaker one in another. An individual's evaluation of a certain situation or event may vary according to his or her perceived capacity to deal adequately with it (Folkman 1984). It follows, therefore, that individuals with high self-percepts of self-efficacy perceive a difficult assignment as a challenge, while those with low self-percepts of efficacy regard the same assignment in an entirely different light. Individuals with low self-percepts of efficacy tend on the whole to focus on their own limitations (Tuckman and Sexton 1992). They prefer unchallenging goals demanding little involvement, ones that are not conducive to good task performance.

On the basis of this, we expected that the perceived self-efficacy of students would have an impact on their future career choices, either directly or via the goals that are pursued. Based on Bandura's hypothesis, we thought that when students have low self-efficacy they would not believe that they would be able to success the task or occupation given. In contrast, a higher level of self-efficacy would mean higher confidence of a

student about his or her abilities in educational or occupational life, which could lead the student to make better choices about his/her career. According to our point of view, for a student to be able to have more confidence about his/her capabilities, first he/she has to be self-aware. This is why as a second factor we examined self-awareness and its effects on the decisions of the students.

2.2   Self-Awareness in Career Decision-Making

Self-awareness is another fundamental element in shaping behaviours and implies a deep understanding of one's emotions, strengths and limitations, and values and motives (Goleman et al. 2002). Self-awareness has also been defined as one's ability to self-observe (Wicklund 1979) and to precisely evaluate one's behaviour with respect to set norms (Atwater and Yammarino 1992). Self-awareness is the practice of reflecting on and accurately assessing one's own behaviour and skills as they are manifested in workplace interactions (Church 1997). Higgs (2000) has described self-awareness as the awareness of our own feelings and the ability to recognise and manage them.

Classical theories of self-awareness (Buss 1980, 2001; Carver and Scheier 1998; Duval and Wicklund 1972; Gangestad and Snyder 2000) define self-awareness as a process in which a person makes assessments about him/herself and how he/she is perceived by others. These early theories suggest that self-awareness consists of two components: an understanding of one's self-resources and an understanding of how one is seen by others. More recent discussions of self-awareness have affirmed that self-awareness consists of two components. In his comprehensive review of studies by hundreds of psychology researchers, Baumeister (2005) concludes that self-awareness involves anticipating others' perceptions, evaluating oneself and own actions according to collective beliefs and values, and caring about others' evaluations. Likewise, from the management literature, Hall (2004) emphasises both components, stating that self-awareness consists of the internal (recognising one's own inner state) and the external (recognising one's impact on others).

Self-awareness rests at the core of a person's sense of self; thus, the human capacity to direct attention towards the self has fundamental personal, social and cultural consequences (May 1967). According to the original self-awareness theory (Duval and Wicklund 1972), self-focused attention makes people more conscious of their attitudes and beliefs (Gibbons 1990). Original self-awareness theory (Duval and Wicklund 1972) begins with the assumption that at any given time, people's attention may be focused on themselves or the environment, but not both (Xu et al. 2014). People are typically not self-focused, but certain situations can cause them to focus their attention inward, such as gazing into a mirror, standing in front of an audience, or seeing themselves in a photograph or videotape. When their attention is directed to the self, people reside in a state of objective self-awareness.

Self-awareness is a motivational state that occurs when one's attention is focused exclusively on the self as an object to be evaluated. Duval and Wicklund (1972) outlined two forms of self-awareness: (1) objective self-awareness (when attention is focused on the self); and (2) subjective self-awareness (when attention is directed away from the self and towards external objects).

Objective self-awareness theory (Duval and Wicklund 1972; Duval and Silvia 2001) suggests that humans can achieve self-awareness when they direct their attention inwards and focus on themselves. This self-focused attention automatically results in self-evaluation against self-defined, subjective standards of correctness. According to objective self-awareness theory, if people find themselves lacking in comparison with their standards, they can change the standards, change themselves or work to avoid their self-aware state.

Further developments in self-awareness theory (for example, Buss 1980; Froming et al. 1982) distinguish between public and private self-awareness. Public self-awareness involves the awareness of oneself from the imagined perspective of others (for example, standing in front of an audience), whereas private self-awareness refers to an awareness of oneself from a personal perspective (for example, gazing into a mirror) (Fejfar and Hoyle 2000). Private self-awareness results in behaviour that reflects personal attitudes, whereas public self-awareness tends to cause behaviour to become more consistent with societal expectations (Froming et al. 1982).

3   A Comparative Empirical Analysis

3.1   Sample and Data Collection

After the literature review, we developed, based on the mainstream literature, a questionnaire about the demographical factors that could affect the career decision-making of the students. Career decision self-efficacy was measured by 25 items taken from the Career Decision Self-Efficacy Scale-Short Form (Betz et al. 1996). To measure self-awareness, we used the Self-Consciousness Scale (Scheier and Carver 1985). We collected data from 291 undergraduate students of Yeni Yüzyıl University in Istanbul and the University of Turin. Thus, respondents were recruited from a single university in Turkey and a single university in Italy. Our objective was to reveal the significance of self-awareness and self-efficacy scales in the career decision-making of students in different cultural contexts. The presented analysis gives preliminary results of a wider analysis aimed at finding out the factors which are similar or different in the students' career decision-making in two different cultures (Italian and Turkish) and the relevance of self-awareness and self-efficacy on student choices.

The survey questionnaires were collected during from April to November in 2017. As a result, our sample is composed of a total of 291 complete answers from students in Turkey (200) and Italy (91), excluding ten incomplete responses for Turkish respondents and 22 incomplete responses for Italian respondents, respectively. Regarding gender, about 58% of Turkish respondents were male; the same figure applies for the Italians. In terms of studies, all the students were enrolled in an Economics and Management programme but around 63% of them belonged to an Economic Department while 37% belonged to International Trade and Logistics Department. In order to better evaluate their knowledge about work, we also asked if they had ever had a job in and if they had ever attended a job fair to acquaint themselves with careers. Around 65% of all the respondents had at least one experience of work (part time jobs and trainees included), while only 46% of them had attended a job fair. The average marks of our sample of students is 2.31 (max. 4) for Turkish

Table 11.1 The distribution of the students according to their grade level

Grade	Absolute	%
1	71	24.40
2	74	25.43
3	60	20.62
4	62	21.31
5	24	8.25
Total	291	100

Note: Turkish students study for four years, Italians for five

students and 26 (max. 30) for Italian students. In terms of grade level of the students responding to the questions, they were widely distributed across all the grades (see Table 11.1).

3.2   Measures and Descriptive Analysis

The questionnaire was developed through the adaptation of items from previous literature related to career decision-making self-efficacy and self-awareness. First of all, career decision self-efficacy was measured by 25 items taken from the Career Decision Self-Efficacy Scale-Short Form (Betz et al. 1996; Chiesa et al. 2016; Choi and Kim 2013; Chung 2002) pertaining to the five sub-dimensions of self-appraisal, occupational information, goal selection, planning and problem solving. To be able to measure self-awareness, in our literature review we used the Situational Self-Awareness Scale developed by John Govern and Lisa Marsch which includes nine items (Govern and Marsch 2001). Some of the statements were modified versions of items found in the public and private sub-scales of the Self-Consciousness Scale. Following this, we borrowed from the Scheier and Carver (1985) Self-Consciousness Scale, which includes 22 items, in order to measure self-awareness.

Finally, six questions were developed regarding demographics, based on the literature review. Essentially, the first thing that we wanted to reveal with our demographical questions is whether the career choices of the students were freely made or not. In the light of other studies (Guan et al. 2016; Lee and Kim 2015; Nawaz and Gilani 2011), which underlines the relationships with family and the expectations of the family

regarding career choice, we created this statement: "I chose my department freely (without any coercion from a family member/teacher/friend)." Moreover, in our demographics we also wanted to find out if the students had enough information about how their department would benefit them in occupational life and if they were really conscious about what they wanted to do in at least their near future. Even though occupational information is a sub-dimension of the Career Decision Self-Efficacy Scale-Short Form and self-consciousness is one of our main scales, we wanted to add these statements in order to attain more detailed results. For all the items have been used, answers were taken through a five-point Likert-type scale, ranging from "strongly disagree" (1) to "strongly agree" (5).

Table 11.2 shows the findings of the descriptive analysis about the dimensions used in this study. The primary finding showed that there were significant mean differences between Italian and Turkish respondents in all the dimensions used in this study. More specifically, Turkish students reported higher mean values, meaning that the perception of these dimensions in an educational setting varies depending on the ethnic group.

The form contains 25 items measuring the following sub-dimensions: self-appraisal; gathering occupational information; goal selection; planning; and problem solving (Betz et al. 1996; Chiesa et al. 2016; Choi and Kim 2013; Chung 2002). A total score is computed by summing scores for the 25 items; higher scores indicate greater levels of career decision-making self-efficacy (Paulsen and Betz 2004).

Table 11.2 Descriptive statistics of the constructs between Italy and Turkey

	Italy			Turkey		
Dimensions	Mean	Std. Dev.	Std. Err.	Mean	Std. Dev.	Std. Err.
Demographic	3.58242	1.09956	0.11526	3.84917	1.00753	0.07124
Occupational	3.45055	1.07857	0.11307	3.60800	0.96690	0.06837
Planning	3.37582	1.20263	0.12607	3.69300	0.92195	0.06519
Problem solving	3.29011	1.08625	0.11387	3.50900	1.02109	0.07220
Goal selection	3.46154	1.10679	0.11602	3.55417	1.00251	0.07089
Self-appraisal	3.43077	1.20751	0.12658	3.99100	0.90138	0.06374
Self-awareness	3.38012	1.15474	0.12105	3.51568	1.04283	0.07374

Note: All coefficients are significant at least at $p < 0.05$

3.3   Reliability and Validity

In order to analyse our data, an Exploratory Factor Analysis was carried out following the methodology widely used when dealing with these kinds of dimension. The main difference between an Exploratory Factor Analysis and a Principal Component Analysis is that the former assumes the existence of a few common factors driving the variance of the data, while the latter does not (Williams et al. 2010). This assumption makes the Exploratory Factor Analysis method particularly suitable for this study because of the division of the data into five different sub-dimensions.

Table 11.3 shows the reliability and validity of the underlying dimensions used in this study. As a result, three items (for example, "Q8. I can find out the employment trends for my potential occupation over the next 10 years") should be deleted based on the cut-off of 0.40 (Kline 1994). Below, the results of the assessed reliability and validity of underlying dimensions are reported.

As suggested by previous studies on similar topic (for example, Choi and Kim 2013), Cronbach's alpha was employed to identify the internal consistency of items within each dimension and assess the quality of the instruments. The result showed that some dimensions used in this study were reliable in the light of Cronbach's alpha values ranging from 0.71 to 0.81 (>0.70), but Occupational Information, Planning, Goal Selection and Problem Solving scored lower values (<0.65) (Nunnally 1978). However, some studies (for example, Williams et al. 2010) suggest using dimensions that show Eigenvalues higher than 1 in order to explain a higher portion of variance. Thus, in our analysis we can take into account Occupational Information, Planning and Goal Selection.

Despite this, our results highlighted that the Eigenvalue for Problem Solving does not allow us to consider this dimension in our analysis. This is due to the problem of correlation which leads this dimension to explain less variance than a single item would do. As can be seen here, this dimension is problematic because two out of five items (Q16 and Q21) are not sufficiently correlated with the others so they should be deleted in further analysis

Table 11.3 Reliability of measures from Exploratory Factor Analysis

Measures	Factor loading 1	Factor loading 2	Uniqueness	Communalities	Alfa if item deleted
Demographical (Eigenvalue = 1.88243; Alpha= 0.7249)					
Q1. I chose my department freely (without any coercion from a family member/teacher/friend)	0.5139	0.7359	0.2641	0.7051	
Q2. I like what I study	0.6563	0.5693	0.4307	0.6564	
Q3. I can imagine myself five years later as an employee and the kind of job I am working in and at which level	0.5963	0.6444	0.3556	0.6762	
Q4. I know what opportunities graduating from my department will provide me with	0.5856	0.6571	0.3429	0.6814	
Q5. I know which of my skills will help me in my career development	0.4604	0.7881	0.2119	0.71	
Q6. I try to find out information from other sources (such as the internet, brochures, career centres) about my potential/possible job and career	0.5265	0.7228	0.2772	0.6902	
Occupational Information (Eigenvalue = 1.04325; Alpha= 0.5562)					
Q7. I can find out about the average yearly earnings of people in my potential occupation	0.4121	0.8301	0.1699	0.4906	

(*continued*)

Table 11.3 (continued)

Measures	Factor loading 1	Factor loading 2	Uniqueness	Communalities	Alfa if item deleted
Q8. I can find out the employment trends for my potential occupation over the next 10 years	0.1551		0.9759	0.0241	0.6048
Q9. I can find information about graduate or professional schools	0.5277		0.7215	0.2785	0.4511
Q10. I can talk with people already employed in the field I am interested in	0.6011		0.6387	0.3613	0.4082
Q11. I can find out information in the library about occupations I am interested in	0.4578		0.7904	0.2096	0.5137
Planning (Eigenvalues = 1.23904; Alpha= 0.6301)					
Q12. I can prepare a good CV for myself	0.5611		0.6851	0.3149	0.5507
Q13. I can identify employers, firms and institutions relevant to my career possibilities	0.5182		0.7315	0.2685	0.5661
Q14. I can successfully manage a job interview process	0.5147		0.735	0.2650	0.5676
Q15. I can determine the steps I need to take to successfully attain my chosen career	0.5255		0.7239	0.2761	0.5583
Q30. I can make a plan of my goals for the next five years	0.3385		0.8854	0.1146	0.6368

Table 11.3 (continued)

Measures	Factor loading 1	Factor loading 2	Uniqueness	Communalities	Alfa if item deleted
Problem solving (Eigenvalue = 0.92025; Alpha= 0.5312)					
Q16. I can determine the steps to take if I am having academic trouble with an aspect of my chosen subject	0.2818		0.9206	0.0794	0.5181
Q17. I can change careers if I do not like my first choice	0.5504		0.6971	0.3029	0.4072
Q29. I can change occupations if I am not satisfied with the one I have entered	0.4457		0.8013	0.1987	0.4695
Q31. I can identify some reasonable career alternatives if I am unable to get my first choice	0.5047		0.7453	0.2547	0.446
Q. 21. I can persistently work at my subject or career goal even when I get frustrated	0.2907		0.9155	0.0845	0.5262
Goal selection (Eigenvalue = 1.16065; Alpha=0.5774)					
Q18. I can select one career from a list of potential careers I am considering	0.5941		0.6471	0.3529	0.4552
Q19. I can select one occupation from a list of potential occupations I am considering	0.6014		0.6383	0.3617	0.4556
Q20. I can choose a career that will fit my preferred lifestyle	0.4366		0.8093	0.1907	0.5529

Table 11.3 (continued)

Measures	Factor loading 1	Factor loading 2	Uniqueness	Communalities	Alfa if item deleted
Q22. I can choose a career that will fit my interests	0.4539		0.794	0.2060	0.5
Q23. I can make a career decision and then not worry about whether it was right or wrong	0.2221		0.9507	0.0493	0.6281
Self-appraisal (Eigenvalue = 1.94580; Alpha= 0.7698)					
Q24. I can define the type of lifestyle I would like to live	0.6955		0.5163	0.4837	0.7016
Q25. I can work out what I am and I am not ready to sacrifice to achieve my career goals	0.6302		0.6029	0.3971	0.7259
Q26. I can decide what I value most in an occupation	0.6255		0.6088	0.3912	0.7288
Q27. I can determine what my ideal job would be	0.595		0.6459	0.3541	0.7356
Q28. I can accurately assess my abilities	0.5654		0.6803	0.3197	0.7452
Self-awareness (Eigenvalues: Factor1 = 3.80515; Factor2= 2.18160; Alpha1= 0.8164; Alpha2= 0.7045)					
Q32. I am always trying to work myself out	0.4167		0.8263	0.1737	0.8147
Q33. I am concerned about my style of doing things		0.4569	0.8615	0.1385	0.6995
Q34. It takes me time to get over my shyness in new situations		0.6232	0.6077	0.3923	0.6435
Q35. I think about myself a lot	0.4507		0.7967	0.2033	0.8136

(*continued*)

Table 11.3 (continued)

Measures	Factor loading 1	Factor loading 2	Uniqueness	Communalities	Alfa if item deleted
Q36. I care a lot about how I present myself to others	0.6089		0.6293	0.3707	0.8018
Q37. I often daydream about myself	0.4527		0.7936	0.2064	0.8137
Q38. It is hard for me to work when someone is watching me		0.427	0.7984	0.2016	0.6848
Q39. I never take a hard look at myself	−0.432		0.7633	0.2367	0.8157
Q40. I get embarrassed very easily		0.6967	0.4966	0.5034	0.6351
Q41. I am self-conscious about the way I look	0.5555		0.6844	0.3156	0.807
Q42. It is easy for me to talk to strangers	–	–	0.9229	0.0771	0.8508
Q43. I generally pay attention to my inner feelings	0.4608		0.7752	0.2248	0.8134
Q44. I usually worry about making a good impression		0.4453	0.8186	0.1814	0.6952
Q45. I am constantly thinking about my reasons for doing things	0.4907		0.7477	0.2523	0.8092
Q46. I feel nervous when I speak in front of a group		0.5903	0.6393	0.3607	0.6507
Q47. Before I leave my house, I check how I look	0.6846		0.5271	0.4729	0.7965
Q48. I sometimes step back (in my mind) in order to examine myself from a distance	0.4604		0.7361	0.2639	0.8136

Table 11.3 (continued)

Measures	Factor loading 1	Factor loading 2	Uniqueness	Communalities	Alfa if item deleted
Q49. I am concerned about what other people think of me		0.4137	0.8237	0.1763	0.6883
Q50. I am quick to notice changes in my mood	0.5078		0.7421	0.2579	0.8093
Q51. I am usually aware of my appearance	0.6323		0.5736	0.4264	0.8017
Q52. I know the way my mind works when I work through a problem	0.6062		0.6155	0.3845	0.8023
Q53. Large groups make me nervous		0.4976	0.8336	0.1664	0.6987

because of this lack of correlation. One of the most important results is that the self-awareness dimension can be divided into two principal factors that are also comprehensible because of the high number of items that this dimension contains. In fact, other dimensions were quite small and never bigger than six items each. The self-awareness dimension, in contrast, contains 22 items so it is more than plausible to split it, using some sub-dimensions that better reflect a construct.

Blanking the loadings with a score <0.3 gives a good highlight of the composition of the two different factors; except for Q42, which has too high a uniqueness, all items are used, so it is possible to establish a good understanding of the composition of the two factors. Factor 1 is composed of 13 items and it can be seen as a dimension which describes "the self for the self", that is, how much respondents take themselves into consideration both in how they feel and how they do things. A good point here is that Q39 ("I never take a hard look at myself") is negative, suggesting that that a low score in this item is related to good scores in the others, meaning that how people look at themselves is an important feature of this dimension.

4   Conclusion

A career is something that cannot be changed very quickly and frequently. It is one of the major decisions in an individual's life and it is generally made at an early age. Giving the right decision about one's career is not easy. People generally make their decisions unconsciously about what they really want and in what subjects they can be really successful. So, it is very important first to be aware of one's own abilities, strengths and motives.

As originally proposed by Bandura (1977), self-efficacy expectations refer to a person's beliefs concerning his or her ability to perform a given task successfully and can be useful in understanding and predicting behaviour. Overall, low self-efficacy could lead to avoidance, whereas stronger self-efficacy expectations could lead to approach behaviour (Betz and Luzzo 1996). Individuals with stronger self-efficacy could be more successful in the career that they have chosen, as their beliefs about the abilities, skills and capabilities to perform the selected job are positive. However, beliefs alone are not enough to make a right career choice and to attain a high performance in the job.

As highlighted in our literature review, the first step in making a career decision is self-analysis. An in-depth knowledge of one's attitude, skills, principles, likes, and so on, is necessary. In career decision-making, a good decision needs to be made at an appropriate time, and this requires adequate skills. Every career requires skills and developing these is a continuous process. Before choosing a career, one has to not only focus on the benefits but also carry out a self-analysis to check whether one's qualifications and aptitudes fits the chosen occupation (Lakshmi and Joseph 2008).

In our study, the results showed that according to the descriptive statistics the self-awareness and the sub-dimensions of career decision-making self-efficacy did not differ from each other in both groups (Italian and Turkish students). This result led us to think that we had hypothesised correctly at the beginning of the study as our assumption was the students with higher self-awareness would make an effort according to

the needs of this awareness, and as a result would have higher scores for career decision-making self-efficacy.

Future studies will analyse the relation among these variables, career decision-making self-efficacy and self-awareness, starting from these preliminary results. Moreover, analysing the relation between gender, school grade (under the assumption that students would attain higher awareness gradually), success (average marks) and other demographics and career decision-making self- efficacy and self-awareness while making the comparison of two different culture would add additional value to the literature. In addition to this, the following studies will also contain research from the vocational life in order to better evaluate the effect of career decision-making self-efficacy and self-awareness for capacity building of the companies.

4.1   Final Thoughts

The career decision-making process is a very important process in an individual's life. Different researchers have studied this process from different perspectives and proved that career decision-making is affected by many different factors. In addition to this, in our literature review we did not encounter any research specifically studying self-efficacy and self-awareness in the career decision-making process. The result was that, in our study, we wanted to add value to the literature by pointing out the importance of self-efficacy and self-awareness in the career decision-making process. As mentioned, lack of self-awareness and low self-esteem could lead to difficulties in career decision-making. Therefore, we wanted to drive self-efficacy and self-awareness from among all the factors that affect the career decisions of an individual, as we also wanted to highlight in our study the difficulties that a student can encounter in the career decision-making process.

In conclusion, the beliefs and the perceptions about oneself are very important factors that can lead one's decisions to be right or wrong. At this point, it is important that the beliefs or perceptions about oneself are resource-intensive so that they are not the result of dysfunctional beliefs. In order to avoid these difficulties in career decision-making and to be

able to make more appropriate decisions, individuals should have a deep understanding of their emotions, should evaluate their behaviour and should be conscious of their strengths, weaknesses and motives. It is not easy though to discover all these in oneself, especially at an early age without any help. Consequently, we think that the biggest duty lies on the shoulders of all educators to guide young people in their career decision-making.

References

Amir, T., & Gati, İ. (2006). Facets of career decision-making difficulties. *British Journal of Guidance and Counselling, 34*(4), 483–503.

Atwater, L., & Yammarino, F. J. (1992). Does self-other agreement on leadership perceptions moderate the validity of leadership and performance predictions? *Personnel Psychology, 45*(1), 141–164.

Bandura, A. (1977). Self-efficacy: Toward a unifying theory of behavioral change. *Psychological Review, 34*(2), 191–215.

Bandura, A. (1979). Reflections on self-efficacy. In C. M. Franks & G. T. Wilson (Eds.), *Annual review of behavior therapy: Theory and practice.* US: Guilford Publications

Bandura, A. (1980). Gauging the relationship between self-efficacy judgment and action. *Cognitive Therapy and Research, 4*, 263–268.

Barber, L. K., Munz, D. C., Bagsby, P. G., & Grawitch, M. J. (2009). When does time perspective matter? Self-control as a moderator between time perspective and academic achievement. *Personality and Individual Differences, 46*, 250–253.

Baumeister, R. F. (2005). *The cultural animal: Human nature, meaning, and social life.* New York: Oxford University Press.

Betz, N. E., & Luzzo, D. (1996). Career assessment and the career decision-making self-efficacy scale. *Journal of Career Assessment, 4*, 313–328.

Betz, N. E., Klein, K., & Taylor, K. M. (1996). Evaluation of a short form of the career decision-making self-efficacy scale. *Journal of Career Assessment, 4*, 47–57.

Blustein, D. L. (2008). The role of work in psychological health and well-being: A conceptual, historical, and public policy perspective. *American Psychologist, 63*, 228–240.

Bresciani, S., Ferraris, A., & Del Giudice, M. (2016). RandD internationalization in Asian developing countries: Evidence from European multinationals. *Mercati and Competitività, 3*, 25–44.

Buss, A. H. (1980). *Self-consciousness and social anxiety*. San Francisco: Freeman.

Buss, A. H. (2001). *Psychological dimensions of the self*. Thousand Oaks: Sage.

Campbell, J. A., Champe, J., & Pimpleton-Gray, A. (2017). A career exploration and decision-making psychoeducational group: Supporting undergraduate students and training graduate students. *Journal of Counseling in Illinois, 4*(1), 8–23.

Carver, C. S., & Scheier, M. F. (1998). *On the self-regulation of behavior*. New York: Cambridge University Press.

Chiesa, R., Massei, F., & Guglielmi, D. (2016). Career decision-making self-efficacy change in Italian high school students. *Journal of Counseling and Development, 94*, 210–224.

Choi, K., & Kim, D. Y. (2013). A cross cultural study of antecedents on career preparation behavior: Learning motivation, academic achievement, and career decision self-efficacy. *Journal of Hospitality, Leisure, Sport and Tourism Education, 13*, 19–32.

Chung, B. Y. (2002). Career decision making self-efficacy and career commitment: Gender and ethnic differences among college students. *Journal of Career Development, 28*(4), 277–284.

Church, A. H. (1997). Managerial self-awareness in high-performing individuals in organizations. *Journal of Applied Psychology, 82*(2), 281–292.

Covey, S. R. (2004). *The 8th habit: From effectiveness to greatnes*. New York: Free Press.

Duval, T. S., & Silvia, P. J. (2001). *Self-awareness and causal attribution: A dual-systems theory*. Boston: Kluwer Academic.

Duval, T. S., & Wicklund, R. A. (1972). *A theory of objective selfawareness*. New York: Academic.

Fejfar, M. C., & Hoyle, R. H. (2000). Effect of private self-awareness on negative affect and self-referent attribution: A quantitative review. *Personality and Social Psychology Review, 4*(2), 132–142.

Ferraris, A., Erhardt, N., & Bresciani, S. (2017a). Ambidextrous work in smart city project alliances: Unpacking the role of human resource management systems. *The International Journal of Human Resource Management*, 1–22. https://doi.org/10.1080/09585192.2017.1291530.

Ferraris, A., Santoro, G., & Bresciani, S. (2017b). Open innovation in multinational companies' subsidiaries: The role of internal and external knowledge. *European Journal of International Management, 11*(4), 452–468.

Folkman, S. (1984). Perceived control and stress and coping process: A theoretical analysis. *Journal of Personality and Social Psychology, 46*, 839–852.

Froming, W. J., Walker, G. R., & Lopyan, K. J. (1982). Public and private self-awareness: When personal attitudes conflict with societal expectations. *Journal of Experimental Social Psychology, 18*(5), 476–487.

Gangestad, S., & Snyder, M. (2000). Self-monitoring: Appraisal and reappraisal. *Psychological Bulletin, 126*, 530–555.

Gati, I., Landman, S., Davidovitch, S., Asulin-Peretz, L., & Gadassi, R. (2010). From career decision-making styles to career decision-making profiles: A multidimensional approach. *Journal of Vocational Behavior, 76*(2), 277–291.

Germeijs, V., Luyckx, K., Notelaers, G., Goossens, L., & Verschueren, K. (2012). Choosing a major in higher education: Profiles of students' decision-making process. *Contemporary Educational Psychology, 37*(3), 229–239.

Gibbons, F. X. (1990). Self-attention and behavior: A review and theoretical update. In M. P. Zanna (Ed.), *Advances in Experimental Social Psychology* (pp. 249–303). San Diego: Academic.

Goleman, D., Boyatzis, R., & McKee, A. (2002). *The new leaders – Transforming the art of leadership into the science of results*. London: Time-Warner.

Govern, J. M., & Marsch, L. A. (2001). Development and validation of situational self-awareness scale. *Consciousness and Cognition, 10*, 366–378.

Guan, P., Capezio, A., Restubog, L. D. S., Readb, S., Lajom, J. A. L., & Li, M. (2016). The role of traditionality in the relationships among parental support, career decision-making self-efficacy and career adaptability. *Journal of Vocational Behavior, 94*, 114–123.

Hall, D. T. (2004). Self-awareness, identity, and leader development. In D. V. Day, S. J. Zacarro, & S. M. Halpin (Eds.), *Leader development for transforming organizations: Growing leaders for tomorrow.* Mahwah, NJ, US: Lawrence Erlbaum Associates Publishers.

Higgs, M. (2000). Do leaders need emotional intelligence? A study of the relationship between emotional intelligence and leadership of change. *International Journal of Organizational Behaviour, 5*(6), 195–212.

Jiang, Z. (2014). Emotional intelligence and career decision-making self-efficacy: National and gender differences. *Journal of Employment Counseling, 51*(3), 112–124.

Kenny, D. A., & De Paulo, B. (1993). Do people know how others view them? An empirical and theoretical account. *Psychological Bulletin, 114*, 145–161.

Kim, E. Y. (1993). Career choice among second-generation Korean-Americans: Reflections of a cultural model of success. *Anthropology and Education Quarterly, 24*, 224–248.

Kline, P. (1994). *An easy guide to factor analysis*. New York: Routledge.

Lakshmi, S. S., & Joseph, C. (2008). Career decision-making: A tool for progress. *Journal of Soft Skills, 2*(2), 40–46.

Lee, J., & Kim, M. (2015). Parental attachment, career decision self-efficacy, and commitment to the career choice among Korean college students. *Journal of Asia Pacific Counseling, 5*(1), 39–52.

Leong, F. T. L., & Chou, E. L. (1994). The role of ethnic identity and acculturation in the vocational behavior of Asian Americans: An integrative review. *Journal of Vocational Behavior, 44*, 155–172.

Leong, F. T. L., & Serafica, F. C. (2001). Career development of Asian Americans: A research area in need of a good theory. In F. T. L. Leong & A. Barak (Eds.), *Contemporary models in vocational psychology: A volume in honor of Samuel H. Osipow*. Mahwah, NJ, US: Lawrence Erlbaum Associates Publishers.

Lindstrom, L., Harwick, R., Poppen, M., & Doren, B. (2012). Gender gaps: Career development for young women with disabilities. *Career Development for Exceptional Individuals, 35*, 108–117.

Manning, M. M., & Wright, T. L. (1983). Self-efficacy expectancies, outcome expectancies, and the persistence of pain control in childbirth. *Journal of Personality and Social Psychology, 45*, 421–431.

May, R. (1967). *Psychology and the human dilemma*. New York: Van Nostrand Reinhold.

Nawaz, S., & Gilani, N. (2011). Relationships of parental and peer attachment bonds with career decision making self efficacy among adolescents and post adolescents. *Journal of Behavioral Sciences, 21*(1), 33–47.

Nunnally, J. C. (1978). *Psychometric theory*. New York: McGraw-Hill.

Paulsen, A. M., & Betz, N. E. (2004). Basic confidence predictors of career decision making self efficacy. *The Career Development Quarterly, 52*(2), 354–362.

Scheier, M. F., & Carver, C. S. (1985). The self-consciousness scale: A revised version for use with general populations. *Journal of Applied Social Psychology, 15*(8), 687–699.

Tang, M., Fouad, N. A., & Smith, P. L. (1999). Asian Americans' career choices: A path model to examine factors influencing their career choices. *Journal of Vocational Behavior, 54*, 142–157.

Tice, D. M., & Wallace, H. M. (2003). The reflected self: Creating yourself as (you think) others see you. In M. R. Leary & J. P. Tangney (Eds.), *Handbook of self and identity* (pp. 91–105). New York: Guilford Press.

Tuckman, B. W., & Sexton, T. L. (1992). Self-believers are self-motivated, self-doubters are not. *Personality and Individual Differences, 13*, 425–428.

Vrontis, D., Thrassou, A., Santoro, G., & Papa, A. (2017). Ambidexterity, external knowledge and performance in knowledge-intensive firms. *The Journal of Technology Transfer, 42*(2), 374–388.

Wicklund, R. (1979). The influence of self on human behavior. *American Scientist, 67*, 187–193.

Williams, B., Onsman, A., & Brown, T. (2010). Exploratory factor analysis: A five-step guide for novices. *Australasian Journal of Paramedicine, 8*(3), 1–13.

Xu, H., Hou, Z. J., & Tracey, T. J. (2014). Relation of environmental and self-career exploration with career decision-making difficulties in Chinese students. *Journal of Career Assessment, 22*(4), 654–665.

12

Innovation, Creativity, New Product Development Processes and the Role of Science Parks

Thanos Kriemadis

1 Introduction: Background to Relevant Critical Processes

1.1 The Innovation Management Process

Businesses must innovate if they wish to survive and grow. According to Trott (2008), the idea of innovation is generally acknowledged today and has come to be part of our global culture. However, there are several types of innovation, such as: (1) product innovation (the creation of improved or entirely new products); (2) process innovation (the development of a new manufacturing or research and development process); (3) organisational innovation (the implementation of a new communication or new accounting system); (4) management innovation (for example, Total Quality Management (TQM), quality circles or re-engineering); (5) production

T. Kriemadis (✉)
University of the Peloponnese, Tripoli, Greece
e-mail: thanosk@uop.gr

231

innovation (the just-in-time manufacturing system); (6) marketing innovation (a new sales method); and (7) service innovation (for example, internet-based financial services).

Innovation, according to Faers (2013), may be defined in two ways:

1. "consumer innovation—a product/service or market positioning that meets customers' emerging or unmet needs and is differentiated from the current solutions;
2. business innovation—activity that delivers incremental benefit across the organization's value chain" (p. 35).

Spruce (2013) makes a distinction between an invention and innovation: "An invention is creating something new that the market has not seen before. An innovation is taking an existing concept or idea and improving it, typically using a step-wise process of developmental stages leading to a commercially viable product" (p. 181). Pearce and Robinson (2013) make a similar distinction between an invention and innovation: "An invention is the creation of new products or processes through the development of new knowledge or from new combinations of existing knowledge, while an innovation is the initial commercialization of invention by producing and selling a new product, service or process" (p. 400).

According to Brook (2013), there are the six steps that need to be addressed in order to make innovation happen: (1) networking (exchanging ideas with others with different backgrounds, stimulating lateral thinking, and studying relevant business literature and international scientific journals); (2) identification of proper technologies for the purpose in hand; (3) securing intellectual property rights; (4) testing and proving that the technology works; (5) ensuring the compliance of the technology with regulations and standards; and (6) ensuring that the knowledge needed to support the technology exists.

1.2   The Creativity Process

According to Zimmerer and Scarborough (2008), creativity can be defined as the ability to create new ideas and to invent new ways of

examining and analysing problems and prospects. Innovation is defined as the ability to implement creative answers to problems and prospects in order to improve living standards. Even though creative ideas may come about unexpectedly, they are in fact the outcome of the creative process, which consists of seven steps: (1) preparation (this comprises a formal education, job experience, on-the-job training, other learning activities, membership of a professional association, and being a lifelong learner); (2) investigation (reflecting on the problem and its fundamental components); (3) transformation (looking at the big picture, repositioning the components of the problem, thinking through different approaches to the problem); (4) incubation (taking the time to relax and daydream about the problem or opportunity); (5) illumination (the "Eureka factor" may appear after five minutes or five years); (6) verification (using different methods to validate the new idea through, for example, pilot programmes, simulations, market testing and experiments); and (7) implementation (converting the idea into reality). Zimmerer and Scarborough (2008) also recommend the following strategies in order to cultivate creativity and achieve innovation in today's companies and organisations: (1) incorporating creativity and innovation as fundamental organisational values; (2) employing a diverse labour force; (3) expecting and accepting failure; (4) encouraging curiosity; (5) making available employee training in creativity; (6) supporting employees with the necessary resources; (7) establishing a procedure for capturing ideas; (8) continually communicating with customers; (9) recognising and rewarding employees for creative ideas; and (10) demonstrating a passion for creative behaviour.

Some benefits of creativity, according to Mostafa (2005), may include new products, new processes and methods, increased efficiency, job satisfaction, teamwork, customer satisfaction, greater employee motivation and a more strategic focus at all dimensions of the enterprise. Regarding differences in functional approaches to creativity, Mostafa (2005) identifies that "marketing, technical and management people are more likely to believe in violating organizational rules to accomplish their goals and usually adopt creative roles because innovation is an important part of their jobs, while finance managers are uncomfortable with ambiguity and follow rules" (p. 12). Also, younger managers pursue more creative practices

comparing to older managers, who prefer the status quo. However, creativity is needed, according to Gurteen (1998), at all dimensions and hierarchical levels within a company: "Creativity is the responsibility of each managerial function, each team and each individual and it is not limited to new products, new services and new processes. Paradigms (theories, beliefs, doctrines) block creativity, and limit people's actions and thoughts" (p. 7).

1.3   The New Product Development Process

Conceiving, designing and marketing a new product/service, according to Jacobs, Chase and Aquilano (2009), requires a new product development process that includes the following five steps.

1. Planning, concept generation and concept screening: considering the corporate strategy, identifying the needs of the target market, generating and evaluating alternative product/service concepts, selecting one or more concepts for further development and testing, formulating the new product/service mission and business goals, key assumptions and limitations. According to Slack, Chambers, Johnston and Betts (2006), ideas for new products or services may come from the research and development department, the market research department, the customers (for example, by studying customer complaints), the suppliers, other stakeholders (for example, business consultants) and even competitors (for example, by analysing competitors' designs, known as "reverse engineering" (Trott 2008) or, in the services sector, using "testers" to inspect the services provided by competitors). Next, designers need to evaluate concepts and develop a feasibility study based on the following questions. (1) Is there a big enough market for the new product? (2) Does the company have the necessary capabilities to produce the new product? (3) Does the company have adequate financial resources to develop and launch the new product? (4) What is the projected return on investment? (5) What is the risk of failing in the marketplace regarding the new product development? (6) How much money could the company lose if the new product fails?

2. System-level design: defining the product architecture, the geometric design of the product, and the flow chart diagram for the final assembly process. According to Slack et al. (2006), there is a variety of methods used at this step to assess and improve the preliminary design, such as the Quality Function Deployment, which ensures that the final design of the new product or service actually satisfies the expectations of the customers. Quality Function Deployment involves the relationship between customer requirements and the design characteristics of the new product or service.

3. Design detail: defining the geometry of each part and its production tooling, the specifications of the procured parts, and the process plans for the production and assembly of the product.

4. Testing and refinement: prototypes are tested to determine the level of consumer satisfaction.

5. Production ramp-up: the product is made using the production system and, finally, is launched and distributed on the market.

Wheelwright and Clark (1992) describe a similar set of five phases in the new product development process: (1) idea generation; (2) product definition and selection; (3) design and build prototypes; (4) pilot production; and (5) manufacturing ramp-up.

Jacobs, Chase and Aquilano (2009) mention the following performance indicators in order to measure the product development success: frequency of new product introductions; time from initial concept to market introduction; percentage of sales stemming from new products; engineering hours per product; cost of materials and tooling per product; conformance-reliability in use; design performance; and customer satisfaction.

1.4   The New Service Development Process

According to Fitzsimmons and Fitzsimmons (2008), the new service development process is similar to the product development process presented above. The new service development process includes the development stage, where ideas generation and screening take place,

the new service objectives and strategy are formulated, and the concept is developed and tested. The next stage, analysis, examines whether the new service is a profitable business venture. Service design and testing, marketing design and testing, human resource training, service testing and a pilot run are included in the design stage. Finally, the national or worldwide launch and post-launch review take place in the launch stage.

There are several strategies available for the development of new services, according to Wright (1999):

1. Some companies will be the market leaders. This is a high-risk strategy but can offer great benefits.
2. Other companies will try to emulate the innovations presented in the market and will participate in the early growth phase of a new service.
3. Other companies will join in with alterations before the market becomes saturated.
4. Other companies will rely on size and efficiency to enter the market at a lower price.

2 Science Parks' Organisation, Management and Role in Innovation and New Product Development

2.1 The Science Park Concept

A science park is an area which offers space for scientific or technological research companies and is usually connected with a university or research institute where scientific research and entrepreneurship are developed in tandem. It is a professionally managed organisation, whose primary purpose is to enhance the wealth and prosperity of its community by cultivating the culture of innovation and entrepreneurship for all associated businesses and knowledge-based organisations. It also encourages and manages the knowledge and technology amongst higher education

institutions, research organisations, firms and markets; it enables the development and progression of innovation-based firms through incubation and spin-off practices; and offers other value-added services along with high-quality space and facilities. A "spin-off company" (founded by university members) commercially exploits university research and technological inventions (Sanz 2016).

According to the International Association of Science Parks (2016), science parks play an essential role in the regional economic environment. Having established an innovative framework of policies, strategies, infrastructure and high value-added services, science parks may: (1) stimulate and manage the flow of knowledge and technology between universities and companies; (2) provide environments that cultivate a culture of innovation, creativity and quality; (3) facilitate the creation and incubation of new ventures and spin-off companies; and (4) facilitate the internationalisation of new ventures and spin-off companies by deploying a global network of research institutions and innovative companies throughout the world.

Higher education institutions produce new scientific knowledge, which may be transferred to private industry through science parks (Organisation for Economic Co-operation and Development 1993). According to Monck, Porter, Quintas, Storey and Wynarczyk (1988), the cooperation between higher education institutions and companies located in science parks might include: (1) the transfer of knowledge and technology; (2) the transfer of people (researchers and managerial staff); (3) design, testing and launching of new products; (4) access to higher education institution facilities (for example, laboratories, libraries and support services); and (5) conducting joint research activities.

According to Battelle (2007), science parks cultivate an entrepreneurial spirit that supports entrepreneurs from the higher education institution and the local community as well as the international community. Science parks are "an important component of the innovation infrastructure needed to support today's knowledge economy" (p. xii). They "provide access to specialized university laboratories, employing students as interns, using university services and support, and interacting with researchers at university facilities located in the science park and adding amenities at the same time such as retail and commercial establishments,

residential housing nearby as part of the development scheme" (p. 31). Science parks develop an environment that stimulates innovation, knowledge transfer and entrepreneurship. Possessing a skilled workforce, they commit themselves to regional economic development and creating partnerships with universities, public research institutions and industry. Finally, they have a global focus in the future through the formulation of international partnerships.

Some of the key challenges facing science parks are as follows: (1) they do not generate adequate financial resources to be self-sufficient and thus they need capital; (2) they need to attract more foreign companies, a response to increased competition and globalisation; (3) they must integrate universities to a greater extent; and (4) they need to facilitate partnerships between universities and private companies by bridging cultural barriers.

Central government, according to Lofsten and Lindelof (2002), should provide support for research and development, knowledge and technology transfer, and its dissemination into industry. Science parks are policy mechanisms to encourage research-based innovative activity. US and UK science parks aim to link together universities, public research institutes, private companies and public institutions, creating new joint ventures and facilitating incubator development. (An incubator is a private, public or non-profit organisation that supports the establishment of new ventures or spin-off companies.)

Developing a prosperous and effective science park needs adequate capital and good governance. It also requires a dynamic higher education institution or research organisation to provide the necessary technological know-how, new scientific staff and high-quality, professional facilities. The following three primary methods are used to finance the creation of science parks:

(a) A higher education institution constructs the science park on its private property and raises the capital needed to start its development. The higher education institution formulates a business plan and manages the whole developmental process. Cambridge Science Park and John's Innovation Centre are examples of this method.

(b) A joint venture is created involving a higher education institution and other parties, such as a local authority, development agency or private company. In this way, the higher education institution does not have to contribute all of the capital needed. The University of Warwick Science Park and the Oxford Science Park developed by Magdalen College are examples of this method.

(c) A cooperative venture is created involving a higher education institution with local authority, development agency or private sector developers. It is often a development agency, local authority or private sector (and not a higher education institution) that is leading the project, constructing the buildings and managing the property as well. The goal of the higher education institution is to bring spin-off companies to the science park. Sheffield Science Park and Highfields Science Park are examples of this method (Rowe 2005).

According to the United Nations Conference on Trade and Development (2015), there are many models of ownership and governance of science parks. In Europe, 55% of science parks are publicly owned (local government, universities and regional government), 30% of science parks use a mixed public–private structure (local government, universities and private companies) and 14% are privately owned (private universities and private companies). Financial resources to support both science parks and incubated companies stem from funding sources such as the European Commission, the national government, regional and local government, universities and research institutions, companies and banks.

2.2   The Performance Measurement of Science Parks

Financial and non-financial performance indicators such as investment, revenues, return on investment, number of start-ups, number of foreign start-ups, and number of employees, patents and new products created by incubated companies (Condom and Llach 2008) may be used to measure the success of a science park. According to the United Nations

Conference on Trade and Development (2015), some basic performance indicators may include the following:

- area of land under development in hectares and building space constructed in square metres;
- number of incubated companies (especially new technology business), number of scientists, engineers and administrative staff, and category of employment;
- number of companies that have moved out from the science park;
- categories of services offered by the science park, such as consultancy, accounting, marketing, business planning, finance, public relations, technology and knowledge transfer;
- categories of common services offered by the science park, such as video-conferencing, meeting rooms, secretarial support and networking events;
- investment projects attracted by the science park;
- number of patents and university publications, survival rates for incubated companies, overall employment growth, number of students working as interns in the science park, exports and participation in international values chains.

China created the Beijing Zhongguancun Science Park in 1988. It is linked to the best Chinese higher education institutions and research organisations of the Chinese Academy of Sciences. The science park stimulated the Chinese semiconductor and information communications technology industry during the 1990s, developing world-leading and very competitive companies such as Lenovo and the Founder Group.

In 2010, Russia created the Innograd science park close to the business school in Skolkovo. The Russian government has invested substantial public financial resources, offered tax breaks and made great efforts to invite large foreign technological firms in to boost research activities in the park. Having formulated a vibrant strategy at the time of establishing the science park and concentrating on specialised companies running related undertakings that are suitable for the research profile of the higher education institution may enhance the performance of a science park (Helmers 2011).

A high percentage of developing countries do not have the appropriate governing and financial structure necessary to stimulate innovation and entrepreneurship. Private funds such as business angels and venture capitalists frequently withdraw due to a lack of protection for intellectual property rights. Thus, the public sector in developing countries finances innovation and entrepreneurship initiatives. However, public administrators lack the necessary technical and business knowledge and abilities to contribute to the development of entrepreneurship and innovation in their countries. For this reason, public administrations promote the creation of science parks in order to evaluate and train entrepreneurs and evaluate which start-ups should receive public funds (Eesley 2017).

According to Condom and Llach (2008), a science or research park is of moderate magnitude if it has an association with a university and/or research institution, and a focus on research and development with little emphasis on manufacturing activities; in contrast, a technology park is usually bigger and allows for manufacturing activities. Science parks facilitate innovation, creativity and the dissemination of knowledge. Each science park needs to formulate and implement its business policy and strategy to position itself on the market. The term "research park" is used most commonly in the USA, "science park" in Europe and "technological park" in Asia.

2.3 Indicative Examples of Services Provided by Science Parks

Science parks, according to Hansson (2007), allow university professors to commercialise their research output and provide accommodation for small new companies (start-ups or university spin-offs) or well-established ones (large multinationals), enabling them to cooperate with other similar companies, higher education institutions and research institutes. For example, the University of Wolverhampton science park (with over 12,000m^2 of accommodation across four buildings, offering space to 90 plus businesses, with over 700 staff) provides the following services to spin-off companies (tenants): work space; start-up/incubation facilities; research laboratories and fully serviced business accommodation; dedi-

cated on-site facilities management; access to shared laboratory facilities; access to world leading areas of research; superfast broadband; workshops; flexible licence agreements; secure 24-hour access; free car parking for tenants and visitors; and conference and meeting facilities. Additionally, it provides the following business support services: business incubation support and a subsidised start-up package; business support and advice (consultancy, training and education, and innovation support); links with the University of Wolverhampton research and education centres; and spin-off collaboration and networking opportunities (The University of Wolverhampton 2017).

According to Rowe (2005), the benefits of having a higher education institution involved with a science park may include: (1) interaction and communication with knowledge-based small and medium-size companies; (2) a base for higher education institution spin-off companies; (3) the provision of an area for foreign companies who want to cooperate with the higher education institution; (4) financial benefits from the science park which could improve the higher education institution's current operations and strategies; (5) involvement in regional and local development issues; and (6) the establishment of spin-off companies formed by university professors, students and entrepreneurs, commercialising the laboratory research and securing funding for future research.

Science parks are seen by the European Commission as business incubators contributing to regional economic development, job creation and the development of new companies. They distribute new knowledge and technology in combination with innovation and entrepreneurship activities. They implement the idea of a triple helix where universities cooperate with public research organisations and private companies to stimulate economic growth, taking into account the importance of knowledge-sharing. Science parks effectively manage knowledge creation, storage and dissemination, thus facilitating the formation of knowledge-based companies and the development of an entrepreneurship culture at the university. They apply scientific knowledge and promote the transfer of technology that enhances economic growth and prosperity. Knowledge management is actually a tool for innovation (Triado-Ivern et al. 2015; Hansson 2007).

3   Innovations in the Management and Organisation of Science Parks and Spin-Off Companies

3.1   Linking Science Parks with Quality Management

According to Hansson (2007), science parks in the future should integrate innovations such as the TQM systems and, in particular in Europe, the European model for TQM (or the European Quality Award promoted by the European Foundation for Quality Management) in order to deal with the changing needs of the knowledge economy. More specifically, science parks and their spin-off companies need a new organisational culture comprising the following strategic elements: (1) effective top management leadership; (2) a customer-oriented strategy; (3) an empowerment policy for all employees; (4) continuous process improvement; and (5) long-term goals for quality and productivity.

Contemporary management theories and practices analysed below (TQM, the European model for TQM, the American model for TQM, the Japanese model for TQM, the Deming quality management theory and Six Sigma) are considered innovations in the area of business management as well as good management practices creating a new organisational culture in the science parks and their spin-off companies. They satisfy customer needs, empower employees, ensure the product/service delivered by the science park and the spin-off company conforms to predetermined standards, and enhance the quality and productivity of the science park and spin-off companies.

3.2   TQM Principles and Practices

TQM is a relatively new approach to managing private and public organisations. It attempts to improve product and service quality and increase customer satisfaction by changing conservative management methods and systems (Chen et al. 2016; Salih 2008). Chen (1994) describes TQM as a systematic methodology for managing for quality and productivity

and satisfying customers' needs by aiming at the continuous improvement of business processes with the involvement and contribution by all staff of the business. This results in high-quality products and services and ensures the survival and growth of the company in a competitive world.

According to Sashkin and Kizer (1993), TQM is not quality circles, statistical process control or any other tools developed and taught by quality experts. Tools such as flow charts, control charts, fishbone diagrams, the Taguchi method, factor analysis and affinity diagrams are indispensable because they help employees to carry out actions that yield quality, but the tools are not TQM. Tools are essential but not adequate for creating a TQM culture in a company. Top management must make a real commitment to creating a quality-focused culture; the tools and techniques are intended to support it (Chen et al. 2016).

Research examines the extent of TQM principles and practices used by contemporary businesses and organisations and their impact on organisational effectiveness. Most of the studies reviewed indicate that TQM can enhance an organisation's competitive strategy and improve its business performance (Wilkinson et al. 1998). The US General Accounting Office (1991) identifies that the adoption of TQM practices improves corporate performance. More specifically, organisations that implement TQM experience higher productivity, better employee relations, greater customer satisfaction, increased market share and improved profitability.

Swift, Ross and Omachonu (1998) state that institutionalising strategy requires a culture that supports the strategy. A strategy based on TQM entails a major transformation in the way people think and act. TQM experts such as Deming, Juran and Crosby agree on the need for a cultural or value system transformation.

3.3   A New Organisational Culture Based on Quality and Excellence

The quality and excellence culture comprises the following components:

1. There is a consensus as to the significance of top management leadership in implementing TQM and developing a culture of quality within a company (Kedar and Borikar 2016; Swift et al. 1998). The

characteristics of excellent leadership, according to Schmidt and Finnigan (1993), are as follows:

- The leader should stimulate and support the emphasis on quality issues and participate personally in the education, training and recognition programmes of the company.
- The leader should communicate regularly with employees, customers and suppliers.
- The leader should cultivate relationships of trust and honesty and sincerity, boost collaboration and promote improvement teams, empower, employees, manage by fact and develop a learning and continuously improving company (Schmidt and Finnigan 1993).

2. The TQM company is devoted to establishing customer needs, meeting those needs by creating and delivering appropriate and useful products or services—thus producing delighted customers (Salih 2008; Kedar and Borikar 2016). Only by delighted customers, according to Ishikawa (1985), can the company's profits increase. The company may apply the following policies and strategies to ensure it is customer-oriented:

- The company uses information from customers in designing new or improved products or services.
- The company identifies the customer satisfaction level on a regular basis (the extent to which customers are satisfied with company's products or services).
- Customers' grievances and criticisms are collected and analysed frequently in order to detect quality problems.
- The company's processes and procedures that do not add value for the customers are abolished.
- Employees are empowered and inspired to do a superior job in serving customers (to use their judgement in order to make things right for a customer).
- Employees are assisted with continuous training and resources that are adequate for doing the job well (Whiteley 1991; Davidow and Uttal 1989).

3. Employees in a TQM company are empowered, and they have the authority to plan, organise, control and improve their work, taking initiatives that will enhance quality and productivity. Tracy (1990) indicates the following principles for empowering and releasing the hidden potential of its employees:

   - A company empowers employees by providing them with a clear understanding of the job's responsibilities and objectives.
   - It provides them with authority equal to the responsibility allocated to them.
   - It sets standards of quality and excellence that will assist employees to reach their full potential.
   - It gives them with the knowledge, skills and abilities they need to attain standards of quality and excellence.
   - It provides them with the information and knowledge they want to support them in the decision-making process.
   - It gives them feedback on their performance.
   - It recognises, acknowledges publicly and rewards individuals and teams for their efforts at improvement and the results accomplished.
   - It trusts them, enhancing their self-confidence.
   - It gives them permission to fail and risk more, contributing to innovation and creativity development.
   - It creates a positive climate within the organisation, which is the greatest motivator factor for quality and productivity improvement (Kedar and Borikar 2016).

4. The TQM company has decreased the differences in pay between top management and workers. Large pay differences make fair-mindedness and justice in the workplace more difficult to achieve and can damage some of the other quality-oriented cultural issues (Sashkin and Kizer 1993).

5. In TQM companies, teamwork development is realised through the adoption of quality circles. A quality circle is a process, performed by small groups of employees who collaborate to deal with problems related to work. The members of the quality circle meet on a regular

basis under the supervision of a group leader, who facilitates the process of problems solving. Quality circles do not address simply quality issues but also productivity, security, morale, cost, environmental and other issues (Crocker et al. 1984). According to Verespej (1990), working in teams has substantial benefits, such as (1) improved involvement and performance; (2) increased morale; and (3) instilling a sense of ownership and commitment to the product/service/process that the teams create.

6. Employees in a TQM company are encouraged to become company's owners through an employee stock ownership plan, which makes their involvement in quality and productivity issues more effective (Sashkin and Kizer 1993).

7. The TQM company recognises the efforts and accomplishments of individuals and teams both symbolically (via certificates, newsletter stories, putting the employee's name on a plaque, and so on) and in terms of material rewards (via profit-sharing plans, cash bonuses or special privileges) (Sashkin and Kizer 1993).

8. The TQM company is re-engineering its business processes to improve the performance of key performance indicators in the areas of cost, quality, service and speed (Hammer and Champy 1993; Kedar and Borikar 2016).

The quality improvement process itself dictates that companies should (in turn) (1) identify the mission of the process; (2) define customers' requirements of the process; (3) estimate the current state of the process; (4) determine the preferred state of the process; (5) ascertain barriers and root causes; (6) develop improvement resolutions, strategies and plans; (7) implement plans; and (8) monitor results and standardisation (Tague 1995).

3.4 The Deming Quality Management Theory: Deming's Approach to TQM

Deming's philosophy of transformation relies on quality and productivity improvements by minimising the variability of processes. His profound knowledge system comprises the following four inter-related

components: (1) appreciation for a system (the organisation is a system); (2) an understanding of variation (the true causes of variation in product/services management and responding to these); (3) a theory of knowledge (making explicit the underlying theory for the actions); and (4) understanding the psychological reasons for employee behaviour (Redmond et al. 2008).

Deming indicates that the necessity of executive involvement, close attention to the customers' needs and the participation of all staff in the process of continuous improvement are keys to business success. He claimed that 85% of the causes for poor quality production rested with management, and not with employees (Motwani et al. 1993).

The Deming Management Theory is actually a humanistic philosophy. Deming believes that all employees are educable, deserve respect and want to do a good job. Deming connects statistics to management. The Japanese experience offers empirical proof for the reliability of Deming's theory. The Japanese have been practicing the Deming's quality management theory and have increased the competitiveness of Japanese businesses (Deming 1986).

Internationally, the most prominent/major worldwide quality awards (Quality Excellence Award Models) are the European Quality Award in Europe (1994), the Malcolm Baldrige National Quality Award in the USA (1999), and the Deming Prize in Japan (1996), are the major worldwide quality awards (Zhang, 1997).

3.5   Quality Management System: International Standard ISO 9001:2008

The implementation of a quality management system should be a strategic decision taken by an organisation. ISO 9001:2008 includes a number of requirements which an organisation must fulfil in order to achieve customer satisfaction. It is considered good management practice and ensures that the product/service delivered by an organisation satisfies predetermined standards and specifications set by the customer (the customer needs) and the capabilities and strategy of the organisation. Every company uses its own unique method to implement ISO 9001:2008.

Some of the requirements in ISO 9001 consist of: procedures that cover all key processes in the business; checking processes to ensure they are effective and efficient; maintaining adequate documentation; checking output for defects, deploying corrective action where required; regularly reviewing processes and the quality management system itself for effectiveness; and deploying continual improvement.

The model of a process-based quality management system is based on the methodology known as "Plan-Do-Check-Act" (the PDCA Cycle or the Deming Cycle), which can be applied to all processes. PDCA can briefly be described as follows:

Plan—determine the objectives and processes necessary to deliver outcomes;
Do—deploy the processes;
Check—monitor and measure processes, service and product performance against objectives;
Act—continually improve processes/product/service performance.

3.6   Six Sigma Quality

Six Sigma quality refers to the philosophy and practices companies use to reduce defect levels in their products/services/processes. It is a methodology that uses data and statistical analysis to measure and advance a company's operational performance by detecting and removing defects to increase customer satisfaction. Six Sigma requires that a company create a culture which embraces a passion for excellence and continuous improvement with the final target of attaining 3.4 defects per million opportunities.

Six Sigma quality uses the Define, Measure, Analyse, Improve, Create (DMAIC) methodology as follows: (1) define project objectives and internal and external customers; (2) measure the current level of performance against the desired level; (3) analyse the root causes of the business gap; (4) improve the process to eliminate problems using Six Sigma tools; and (5) create strategies to control the long-term sustainability of the improved process (Evans and Lindsay

2008; Fitzsimmons and Fitzsimmons 2008; Jacobs et al. 2009; Johnston and Clark 2008).

4   Conclusions and Implications

The purpose of this chapter was to examine the development of business processes such as the innovation management process, the creativity process, the new product development process, the new service development process, and the role of science parks in encouraging and stimulating these processes. The chapter analysed the several types of innovation, such as: (1) product innovation (the creation of improved or entirely new products); (2) process innovation (development of a new manufacturing and research and development process); (3) organisational innovation (a new communication system or a new accounting system); (4) management innovation (TQM, quality circles, re-engineering); (5) production innovation (the just-in-time manufacturing system); (6) marketing innovation (a new sales method); and (7) service innovation (internet-based financial services). Science parks develop an environment that stimulates innovation, creativity, new product and services development, knowledge transfer and entrepreneurship. They commit themselves to regional economic development and create partnerships with universities, public research institutions and industry. Finally, they have a global focus in the future by formulating international partnerships.

It was pointed out that the cooperation between higher education institutions and companies located in science parks will facilitate the transfer of knowledge and technology, the transfer of people (researchers and managerial staff), the design, testing, launching of new products, the realisation of joint research activities and the commercialisation of university research ideas. It was argued that science parks in the future should integrate more innovations into their management systems such as the implementation of TQM systems, the European model or the American model for TQM, the Deming management method and the Six Sigma, in order to deal with the changing needs of the knowledge economy.

References

Battelle. (2007). *Characteristics and trends in North American research parks: 21st century directions*. Columbus: Battelle Memorial Institute.

Brook, R. (2013). Six steps to successful innovation. In A. Jolly (Ed.), *The innovation handbook* (pp. 140–143). London: Kogan Page.

Chen, M. (1994). *Managing for quality and productivity*. San Diego: San Diego State University.

Chen, C., Anchesta, K., Lee, Y., & Dahlgaard, J. (2016). A stepwise ISO-based TQM implementation approach using ISO 9001:2015. *Management and Production Engineering Review, 7*(4), 65–75.

Condom, P., and Llach, J. (2008). Science and technology parks: Creating new environments favourable to innovation. *Paradigmes*, Issue 0, 141–149.

Crocker, O., Charney, C., & Chiu, J. (1984). *Quality circles*. New York: Methuen.

Davidow, W., & Uttal, B. (1989). *Total customer service*. New York: Harper-Collins.

Deming, W. E. (1986). *Out of the crisis*. Cambridge, MA: MIT.

Deming Application Prize. (1996). *Guide for overseas companies*. Tokyo: Union of Japanese Scientists and Engineers.

Eesley, C. (2017). *Benefits of science parks to entrepreneurs in developing economies*. Retrieved 3 March 2018 from https://aretescholar.org/2017/11/14/doing-business-in-developing-economies-benefits-of-science-parks-to-entrepreneurs/

European Foundation for Quality Management. (1994). *Self-assessment based on the European model for total quality management: Guidelines for identifying and addressing business excellence issues.* Brussels.

Evans, J., & Lindsay, W. (2008). *The management and control of quality*. Mason: Thomson South-Western.

Faers, M. (2013). Innovation that pays off. In A. Jolly (Ed.), *The innovation handbook* (p. 35). London: Kogan Page.

Fitzsimmons, J., & Fitzsimmons, M. (2008). *Service management: Operations, strategy, information technology*. New York: McGraw-Hill/Irwin.

General Accounting Office. (1991). *Management practices: U.S. companies improve performance through quality efforts.* Washington, DC: GAO.

Gurteen, D. (1998). Knowledge, creativity and innovation. *Journal of Knowledge Management, 2*(1), 5–13.

Hammer, M., & Champy, J. (1993). *Reengineering the corporation*. New York: Harper-Collins.

Hansson, F. (2007). Science parks as knowledge organizations—the "ba" in action. *European Journal of Innovation Management, 10*(3), 348–366.

Helmers, C. (2011). Global: What makes science parks successful ? *University World News*, 170.

International Association of Science Parks. (2016). Retrieved 3 March 2018, from https://www.iasp.ws/Our–industry/The–role–of–STPs–and–areas–of–innovation

Ishikawa, K. (1985). *What is total quality control? The Japanese way*. Englewood Cliffs: Prentice Hall.

Jacobs, R., Chase, R., & Aquilano, N. (2009). *Operations and supply management*. New York: McGraw-Hill.

Johnston, R., & Clark, G. (2008). *Service operations management: Improving service delivery*. Essex: Pearson Education.

Kedar, A. P., & Borikar, V. N. (2016). Critical success factors for effective implementation of TQM and TPM. *International Journal for Innovative Research in Science and Technology, 2*(9), 2349–6010.

Lofsten, H., & Lindelof, P. (2002). Science parks and the growth of new technology-based firms-academic-industry links, innovation and markets. *Research Policy, 31*, 859–876.

Malcolm Baldrige National Quality Award. (1999). *Criteria for performance excellence*. Gaithersburg: NIST, United States Department of Commerce.

Monck, C., Porter, R., Quintas, P., Storey, D., & Wynarczyk, P. (1988). *Science parks and the growth of high technology firms*. London: Croom Helm.

Mostafa, M. (2005). Factors affecting organizational creativity and innovativeness in Egyptian business organizations: An empirical investigation. *Journal of Management Development, 24*(1), 7–33.

Motwani, J., Sower, V., & Roosenfeldt, M. (1993). Adapting Deming's philosophy: An evaluative model. *Industrial Management and Data Systems, 93*(8), 3–7.

Organisation for Economic Co-operation and Development. (1993). *Small and medium-sized enterprises: Technology and competitiveness, economic cooperation and development*. Paris: OECD.

Pearce, J., & Robinson, R. (2013). *Strategic management*. New York: McGraw-Hill.

Redmond, R., Curtis, E., Noone, T., & Keenan, P. (2008). Quality in higher education. *International Journal of Educational Management, 22*(5), 432–441.

Rowe, D. (2005). *Universities and Science Park based technology incubators*. Retrieved 3 March 2018, from http://www.warwicksciencepark.co.uk/wpcontent/uploads/2011/03/UniversitiesandScienceParkbasedTechnologyIncubators.pdf

Salih, T. (2008). Total quality management in Education. *Zanco Journal*, 36, 17–34.

Sanz, L. (2016). *Role and importance of science parks*. Retrieved 3 March 2018, from https://ec.europa.eu/jrc/sites/jrcsh/files/20160928-macroregional-innovation-sanz_en.pdf

Sashkin, M., & Kizer, K. (1993). *Putting total quality management to work*. San Francisco: Berrett Koehler.

Schmidt, W., & Finnigan, J. (1993). *TQManager*. San Francisco: Jossey Bass.

Slack, N., Chambers, S., Johnston, R., & Betts, A. (2006). *Operations and process management*. Essex: Prentice–Hall.

Spruce, J. (2013). *Knowledge networks: Collaboration between industry and academia in design*. Retrieved from http://core.ac.uk/download/pdf/42478528.pdf

Swift, J., Ross, J., & Omachonu, V. (1998). *Principles of total quality*. Boca Raton: St. Lucie.

Tague, N. (1995). *The quality toolbox*. Milwaukee: ASQ Quality Press.

The University of Wolverhampton. (2017). Retrieved 3 March 2018, from https://www.wolverhamptonsp.co.uk/accommodation/officeaccomomodation/

Tracy, D. (1990). *Ten steps to empowerment*. New York: Quill.

Triado-Ivern, X., Aparicio-Chueca, P., & Jaria-Chacon, N. (2015). Value added contributions of science parks—the case of Barcelona. *International Journal of Innovation Science, 7*(5), 139–151.

Trott, P. (2008). *Innovation management and new product development*. Essex: Prentice Hall.

United Nations Conference on Trade and Development. (2015). *Policies to promote collaboration in science, technology, and innovation for development: The role of science technology and innovation parks*. Geneva: United Nations.

Verespej, M. (1990, December). When you put the team in charge. *Industry week*, pp. 30–33.

Wheelwright, S., & Clark, K. (1992). *Revolutionizing product development quantum leaps in speed, efficiency, and quality*. New York: The Free Press.

Whiteley, R. (1991). *The customer driven company*. Reading: Addison-Wesley.

Wilkinson, A., Redman, T., Snape, E., & Marchington, M. (1998). *Managing with total quality management*. London: Macmillan Press.

Wright, N. (1999). *The management of service operations*. London: Cassell.

Zhang, Z. (1997). Developing a TQM quality management method model. Research Report from University of Groningen, Research Institute SOM (Systems, Organisations and Management).

Zimmerer, T., & Scarborough, N. (2008). *Essentials of entrepreneurship and small business management*. Upper Saddle River: Pearson Education.

13

Managerial Biases in Mergers and Acquisitions

Yaakov Weber

1   Introduction

The pervasiveness of, and growth in, mergers and acquisitions (M&A) activity around the world stands in sharp contrast to their high rate of failure (Marks and Mirvis 2001; Schweiger and Lippert 2005). This phenomenon persists in spite of consistent evidence that M&A do not enhance the financial performance of the acquiring firms and questions the learning process of top managers. Learning from prior experience, such as one's own successful or unsuccessful actions or environmental opportunities and risks, may help executives to identify ways to uniquely integrate organisations and to refine their routines in future acquisitions. However, the literature on learning from acquisition experience is limited and contradictory (for example, Finkelstein and Haleblian 2002; Hayward 2002). A recent meta-analysis study found that prior

Y. Weber (✉)
School of Business Administration, College of Management,
Rishon Lezion, Israel
e-mail: yaakovw@colman.ac.il

acquisition experience is not significant in explaining variance in post-acquisition performance (King et al. 2004).

Yet, given the high failure rate of M&As, management must be able to attribute their actions and situational characteristics to success and failure factors in order to manage M&A successfully. Attributions of success and failure are a central part of the learning process. For example, empirical findings since the turn of the century suggest that the effect of cultural differences between the acquirer and the target company on the integration process is critical to M&A performance and should be considered by top executives when implementing M&A (for example, Chatterjee et al. 1992; Datta 1991; Datta and Puia 1995; Slangen 2006; Stahl and Voigt 2008). However, no systematic study has been carried out about attribution tendencies in M&A. While some scholars have advanced the importance of a learning perspective on cultural integration in M&A (Bjorkman et al. 2007; Very and Schweiger 2001), a more systematic approach is needed to understand the learning mechanisms at work.

To partially bridge this research gap, in this chapter we examine specific attribution tendencies. By drawing on attribution theory (Heider 1958; Weiner 1979; Hewstone 1989; Martinko 1995), we focus on attributions of success/failure to management's actions and cultural differences. In particular, we hypothesise that perceptions of success increase the tendency to attribute success to management actions and failure leads to increasing attributions to cultural differences. Examining attributions to management actions is important as it helps to determine whether positive experiences lead to increasing confidence in management ability to control M&A processes. Cultural differences have in turn become an increasingly important explanation for problems and failures in M&A research as well as in the media. They thus represent a particularly central structural or external source of explanation, especially blame attachment.

2 Learning, Experience and Performance in M&A

Academics have often argued that firms with previous acquisition experience will do better than those without such experience due to the learning effect (Lubatkin 1983; Vermeulen and Barkema 2001; Very and

Schweiger 2001). However, the data demonstrate that few firms are able to transform this experience into successful performance (for example, Bruton et al. 1994; Kusewitt 1985; Lubatkin 1983). Further studies that looked at the similarities and dissimilarities between previous acquisitions and the focal acquisition using Standard Industrial Classification (SIC) codes to capture variations (Finkelstein and Haleblian 2002; Haleblian and Finkelstein 1999; Hayward 2002) failed to produce consistent results. Yet M&A are complex and heterogeneous. This is why researchers assume, in the first place, that a management that learns how to complete M&A successfully become capable of developing a competitive advantage faster than competitors can learn how to duplicate such a benefit.

Cultural differences, for instance, are an example of large variations between M&As. Most management researchers and practitioners point out that cultural differences and integration efforts during the post-merger integration period are critical to performance (for example, Stahl et al. 2005; Schweiger and Goulet 2000; Shimizu et al. 2004). However, the relationships between the cultural distance, the level of integration and merger success is not clear, and the results of empirical studies are contradictory (Schweiger and Goulet 2000; Stahl et al. 2005). For example, while some studies point out the negative effect of national culture on the success of international M&A (Datta and Puia 1995), other findings show that the level of culture conflict can vary in different international combinations (Very et al. 1997), and greater national culture distances may be positively related to performance (Morosini et al. 1998). The conclusions reached by Very, Lubatkin and Calori (1996), that "mergers are a complex phenomenon, sometimes influenced by national cultural differences, sometimes by organisational influences, sometimes by both and sometimes by neither" (1996: 374), are apparently still valid. Table 13.1 provides a summary of some of the key studies.

Most of these studies have considered cultural differences to be the cause of integration problems. For example, Chatterjee et al. (1992), Datta (1991) and Weber (1996) found a negative a negative relationship between organisational cultural differences and post-acquisition performance. In international settings, scholars have argued that acquisitions of firms from culturally closer nations lead to better outcomes than those from more distant national cultures (for example, Datta and Puia 1995;

Table 13.1 Studies on cultural differences in M&As

Study	Findings	Significance level	Measure of cultural differences	Measure of performance	Time dimension
Datta (1991)	Differences in management style are negatively associated with shareholder value	$p < 0.001$	Perceptional	Objective (stock market)	Measures collected separately; performance was known when cultural differences were measured
Chatterjee et al. (1992)	Perceived cultural differences are negatively associated with shareholder value	From $p < 0.001$ to $p < 0.05$ depending on the time frame of CAR performance measure	Perceptional	Objective (stock market)	Measures collected separately; performance was known when cultural differences were measured
Morosini and Singh (1994)	National cultural differences are positively related to sales growth when independence strategy is used	$p < 0.05$	Objective (Hofstede scores)	Perceptional	Measures collected separately; cultural differences were known when performance was measured

(*continued*)

Table 13.1 (continued)

Study	Findings	Significance level	Measure of cultural differences	Measure of performance	Time dimension
Very et al. (1996)	Cross-border M&A are not consistently less attractive than domestic M&A	p-values ranging from non-significant to $p < 0.001$ depending on attractiveness dimension and country of origin	Objective (domestic versus cross-border)	Perceptional	Measures collected separately; cultural differences were known when performance was measured
Weber (1996)	Perceived cultural differences are negatively associated with effectiveness of the integration process, but not significantly associated with financial performance	$p < 0.01$ for full sample	Perceptional	Perceptional (effectiveness of the integration process), objective (financial performance measured as return on assets of the acquiring firm)	Both measures were collected with the same questionnaire; cultural differences were known when performance measured as effectiveness; cultural differences were not known when performance was measured as financial performance

(continued)

Table 13.1 (continued)

Study	Findings	Significance level	Measure of cultural differences	Measure of performance	Time dimension
Very et al. (1997)	Mixed	$p < 0.01$	Perceptional (cultural attractiveness)	Perceptional	Both measures were collected with the same questionnaire: cultural differences were known when performance was measured; performance was known when cultural differences were measured
Morosini et al. (1998)	National cultural differences are positively related to sales growth	$p < 0.05$	Objective (national cultural distance with Hofstede scores)	Perceptional, validated against archival sources (details of the validation tests not reported)	Measures collected separately; cultural differences were known when performance was measured

(continued)

Table 13.1 (continued)

Study	Findings	Significance level	Measure of cultural differences	Measure of performance	Time dimension
Capron et al. (2001)	Cross-border M&A are negatively related to divestiture of target's assets	$p < 0.01$	Objective (domestic versus cross-border)	Perceptional	Measures collected separately; cultural differences were known when performance was measured
Van der Zee and Van Oudenhoven (2002)[a]	Similarity of cultural (both at national and organisational cultural levels) is significantly correlated with success	$p < 0.05$	Perceptional (cultural similarity); compared with objective data (Ronen and Shenkar 1985) clusters	Perceptional	Both measures were collected with the same questionnaire; cultural differences were known when performance was measured; performance was known when cultural differences were measured

(continued)

Table 13.1 (continued)

Study	Findings	Significance level	Measure of cultural differences	Measure of performance	Time dimension
Schoenberg (2004)	Differences in risk are negatively related to performance. Differences in formality and decision-making styles are unrelated to performance	$p < 0.001$	Perceptional	Perceptional	Both measures collected with the same questionnaire: cultural differences were known when performance measured; performances was known when cultural differences were measured
Brock (2005)	National cultural differences increase integration-related problems and resource-sharing difficulties	p-values ranging from 0.258 to 0.000	Objective (Hofstede scores)	Perceptional	Measures collected separately; cultural differences were known when performance was measured

(continued)

Table 13.1 (continued)

Study	Findings	Significance level	Measure of cultural differences	Measure of performance	Time dimension
Slangen (2006)	The level of post-acquisition integration moderates the relationship between national cultural distance and cross-border acquisition performance, with cultural distance having a negative impact on performance at high levels of integration, and a positive impact at low levels	$p < 0.05$	Objective (national cultural distance with Hofstede scores)	Perceptional	Measures collected separately; performance was known when cultural differences were measured

[a]The study examined different forms of cooperation. Sixty-seven percent of the sample were joint ventures, 22% strategic alliances and 11% mergers.

Javidan and House 2002; Weber et al. 1996). However, some researchers, for instance Morosini, Shane and Singh (1998), have argued that national cultural differences may actually be a source of synergy and learning and have found evidence supporting this view. Other studies have examined whether other factors moderate the impact of cultural differences on performance. For example, Slangen (2006) has found that the degree of integration has a significant on this relationship. Still others have concentrated on the dynamics of the integration process rather than on a pre-merger or pre-acquisition fit. Particularly important issues are how attractive the other organisation is considered and what kind of integration approach is taken by the acquirer (Nahavandi and Malekzadeh 1988). To avoid unnecessary problems, these should ideally be compatible (for example, Morosini and Singh 1994).

On the whole, we know a great deal of how cultural differences and their management may explain M&A performance. However, so far little attention has been focused on managers' own perceptions of cultural differences in M&A processes. There are some analyses pointing out that cultural conceptions are situation-specific subjective constructions, thereby questioning the validity of studies attempting to measure objective cultural differences (for example, Vaara 2002). Such studies have also provided interesting examples of how cultural differences may be used in discourse around post-acquisition integration. For example, they seem to offer convenient attribution targets when accounting for disappointments and failures (Vaara 2002). Nevertheless, to date, we lack systematic analyses examining how exactly managers' experiences can affect their views on the role of cultural differences in M&As. This is why we now turn to attribution theory as a theoretical basis for such an analysis.

Any measure that defines an acquisition in terms of its two- or four-digit SIC code cannot capture such variation. This led Hayward (2002) to suggest that "field work would provide opportunities to ascertain managers' perceptions about how acquisitions differ and how they draw inferences from those differences" (2002: 36). In this vein, the present paper attempts to extend previous works by drawing on work from attribution theory and by using perceptual measures to understand how top managers perceive and interpret information.

3   M&A and Attribution Theory

Managers need to "make sense" of their experiences for learning to take place. Interpretation is a process through which information is given meaning (Daft and Weick 1984). Yet there are obstacles that may prevent learning from experience. Human beings are limited in their abilities to absorb and interpret information. Thus, as managers, they may incorrectly associate either success or failure with factors that have nothing to do with the actual performance of their organisation (Levitt and March 1988).

Acquisitions present a special challenge for management attempting to develop specific capabilities for managing pre- and post-merger stages. Because mergers occur relatively infrequently and unpredictably, management's ability to accumulate the large amounts of observations needed to capitalise on simple mechanisms is limited. Moreover, mergers occur in heterogeneous forms (Haspeslagh and Jemison 1991), which are inherently causally ambiguous (Lippman and Rumelt 1982). Thus, much effort is needed to develop and update acquisition-specific methods, procedures and systems that lower the degree of causal ambiguity between decisions, actions and performance. A substantial effort expended on teaching, training and communication, one involving many managers and employees, may reduce the cognitive complexity of the operation by clarifying the situation and the associated tasks, simplifying decision-making and facilitating the coordination of the implementation of many sub-tasks.

Attribution theory aims to understand people's causal explanations for specific events and phenomena (Heider 1958; Kelley 1967; Jones and Nisbett 1972; Weiner 1979; Hewstone et al. 1989; Martinko 1995). Heider (1958) postulated that people have an ingrained need to understand and control their environments, and thus try to develop causal explanations for significant events. These explanations are attributions that play a fundamental role in cognition and thereby have a major impact on people's behaviour. A central issue in attribution is that of locus of control, that is whether specific outcomes are attributed to internal or external causes. Internal causes include things such as people's own

actions or ability in particular settings. External causes are others' actions or phenomena that the people in question cannot control. It is precisely the tendency to attribute success or failure to internal or external causes that is central in attribution theory.

In simple terms, there is usually a tendency to attribute success more to one's own actions or ability than to external causes. In turn, failure is more easily explained by external than internal causes. The underlying reasons for these tendencies include people's need to preserve a positive image of themselves, as well the inclination to try to learn from failures and avoid behaviour associated with less successful outcomes (for example, Weiner 1995). These general attribution tendencies may differ greatly depending on the characteristics of the people involved. For example, some people are more prone than others to assume credit or blame or more deterministic in nature. These attribution tendencies are also linked to the perceived difficulty of the task in question as well as to interpretations of the abilities of the key actors and the efforts made to carry it out.

Attribution theory has also been applied to management and organisation research. A number of studies indicate that managers in organisations tend to use self-affirming attributions when explaining success or failure. For example, executives tend to take credit for corporate performance and to put blame on outside events in the event of failure (for example, Bettman and Weitz 1983; Salancik and Meindl 1984; Schwenk 1990; Gronhaug and Falkenberg 1998). Outsiders in turn tend to attribute the responsibility for negative events to market conditions or insiders (for example, Schaffer 2002). These tendencies have important implications. In particular, they indicate that experiences of success easily lead to over-optimism and even sustain illusions of control. Other things—such as cultural differences—may in turn be used as easy attribution targets when explaining failure. Overall, such attribution tendencies should thus be taken seriously when explaining organisational success and failure (see also March and Sutton 1998).

To date, such attribution tendencies have not been given much attention by M&A scholars. Duhaime and Schwenk (1985) referred to attributional phenomena in their analysis of cognitive simplifications in M&As. Vaara's (2002) analysis of narratives of post-merger integration also draws on some central ideas of attribution theory. However, the fact remains that we lack a systematic analysis of specific attribution tendencies with respect to issues such as cultural differences.

4 Propositions Development

Managers involved in M&A processes need to make sense of their experiences. As explained, this involves attributions of success and failure to various causes, such as their own actions and/or cultural differences. M&As can be seen as processes where managers play a central role, both in the actual decision-making as well as in the ensuing integration phase. In fact, there seems to be a general tendency—among practitioners, the media and researchers—to assume that managers can, to a significant extent, control these processes and are thus responsible for the outcomes. Based on the central propositions of attribution theory, we can hypothesise that positive experiences will strengthen this tendency, while negative ones will lead to the opposite tendency. Thus, our first hypothesis can be formulated as follows:

4.1 Proposition 1: A Positive Performance Will Lead to Increasing Attributions to Managerial Agency

It should be emphasised that this tendency is an important one as it is linked to some of the key problems in M&As. In fact, researchers have frequently pointed to the severe problems related to the "illusion of control" that plague M&A processes (Duhaime and Schwenk 1985; Jemison and Sitkin 1986; Haspeslagh and Jemison 1991). In simple language, it may thus be that it is precisely the positive experiences gathered in specific settings that lead to overly optimistic views on control and consequent problems in the new cases that managers are involved with.

Cultural differences then present a very interesting category of external causes that can be used in explaining success or failure. In brief, based on the central ideas of attribution theory, it is likely that these external causes are less important when making sense of successful outcomes but play a particularly central role when explaining less successful cases. Thus, we would expect managers to downplay the importance of cultural factors in successful cases and in turn emphasise them in cases of failure. This leads us to formulate our second hypothesis, as follows:

4.2   Proposition 2: Positive Performance Will Negatively Affect Attributions to Cultural Differences

Such a tendency may in fact characterise our understanding of M&As more generally. In fact, it seems to be the case that practitioners, the media and researchers themselves reach for cultural differences as a readily available discourse that can be used when making sense of failure.

5   Discussion and Conclusion

The starting point of our analysis was the lack of attention given to attribution tendencies in the M&A context. In particular, we focused attention on the tendencies to attribute performance to managerial actions versus cultural differences. We first suggested that positive performance would lead to increasing attributions to managerial agency. We then proposed that positive performance would decrease attributions to cultural differences.

These findings have important implications for M&A research. Attribution tendencies can be analysed by various kinds of methods. While experimental research designs are often used for such purposes, we argue that it is most fruitful to examine managers' perceptions in real-life cases. First, experiences of success seem to lead to an overly positive view of the managers' ability to control these processes. Thus, in addition to inadequate experience, prior successes too may sustain dangerous illusions of managerial control (for example, Duhaime and Schwenk 1985; Haspeslagh and Jemison 1991). This is important as it may mean that prior successes may lead to overly risky adventures.

Second, cultural differences clearly serve as convenient attribution targets for failure. This suggests that many studies examining the role of cultural differences may actually suffer from ex-post reconstruction effects. This may have significant methodological consequences for studies of cultural factors in M&As, as well as in other contexts. In simple terms, some research findings concerning a linkage between "real" cultural differences and performance may have been strongly influenced by this tendency to emphasise cultural differences in less successful cases.

Methodological implications are relevant for the importance of using measures of cultural differences that can be both objective and comprehensive. Moreover, cultural differences may be measured in various units of organisations as well as on different managerial levels. Differences among various units and levels can be used to assess the reliability and validity of results. Qualitative and quantitative analyses can enrich the assessment of cultural differences.

This chapter also has practical implications. Managers should be aware of managerial biases related to cultural differences and relationships to M&A performance. Furthermore, the implications are relevant to all stages of M&As, such as pre-merger planning, negotiation and the post-merger integration stage.

References

Bettman, J. R., & Weitz, B. A. (1983). Attributions in the board room: Causal reasoning in corporate annual reports. *Administrative Science Quarterly, 28*, 155–183.

Bjorkman, I., Stahl, G. K., & Vaara, E. (2007). Cultural differences and capability transfer in cross-border acquisitions: The mediating roles of capability complementarity, absorptive capacity, and social integration. *Journal of International Business Studies, 38*(4), 658–672.

Brock, D. M. (2005). Multinational acquisition integration: The role of national culture in creating synergies. *International Business Review, 14*(3), 269–288.

Bruton, G. D., Oviatt, B. M., & White, M. A. (1994). Performance of acquisitions of distressed firm. *Academy of Management Journal, 37*, 972–989.

Capron, L., Will, M., & Swaminathan, A. (2001). Asset divestiture following horizontal acquisitions: A dynamic view. *Strategic Management Journal, 22*, 817–844.

Chatterjee, S., Lubatkin, M. H., Schweiger, D. M., & Weber, Y. (1992). Cultural differences and shareholder value in related mergers: Linking equity and human capital. *Strategic Management Journal, 13*, 319–334.

Daft, R., & Weick, K. E. (1984). Toward a model of organizations as interpretation systems. *The Academy of Management Review, 9*(2), 284–295.

Datta, D. K. (1991). Organizational fit and acquisition performance: Effects of post-acquisition integration. *Strategic Management Journal, 12*, 281–297.

Datta, D. K., & Puia, G. (1995). Cross-border acquisitions: An examination of the influence of relatedness and cultural fit on shareholder value creation in U.S. acquiring firms. *Management International Review, 35*, 337–359.

Duhaime, I., & Schwenk, C. (1985). Conjectures on cognitive simplification in acquisition and divestment decision-making. *Academy of Management Review, 10*, 287–295.

Finkelstein, S., & Haleblian, J. (2002). Understanding acquisition performance: The role of transfer effects. *Organization Science, 13*, 36–47.

Gronhaug, K., & Falkenberg, J. S. (1998). Success attributions within and across organizations. In C. Eden & J.-C. Spender (Eds.), *Managerial and organizational cognition: Theory methods and research* (pp. 93–107). London: The Cromwell Press.

Haleblian, J., & Finkelstein, S. (1999). The influence of organizational acquisition experience on acquisition performance: A behavioral learning perspective. *Administrative Science Quarterly, 44*, 29–56.

Haspeslagh, P., & Jemison, D. B. (1991). *Managing acquisitions: Creating value through corporate renewal*. New York: The Free Press.

Hayward, L. A. (2002). When do firms learn from their acquisition experience? Evidence from 1990–1995. *Strategic Management Journal, 23*, 21–39.

Heider, F. (1958). *The psychology of interpersonal relations*. New York: Wiley.

Hewstone, M., Wagner, U., & Machleit, U. (1989). Self-, ingroup, and outgroup achievement attributions of German and Turkish pupils. *Journal of Social Psychology, 129*, 459–470.

Javidan, M., and House, R. J. (2002, September). *The impact of national culture on large cross-border mergers: Lessons from GLOBE*. Paper presented at the Strategic Management Society Conference, Paris.

Jemison, D. B., & Sitkin, S. B. (1986). Corporate acquisitions: A process perspective. *Academy of Management Review, 11*, 145–163.

Jones, E. E., & Nisbett, R. E. (1972). The actor and the observer: Divergent perceptions of the causes of behaviour. In E. E. Jones, D. E. Kanouse, H. H. Kelley, R. E. Nisbett, S. Valins, & B. Weiner (Eds.), *Attribution: Perceiving the causes of behaviour* (pp. 79–94). Morristown: General Learning Press.

Kelley, H. H. (1967). Attribution theory in social psychology. In D. Levin (Ed.), *Nebraska symposium on motivation* (pp. 192–238). Lincoln: University of Nebraska Press.

King, D., Dalton, D., Daily, C., & Covin, J. (2004). Meta-analyses of post-acquisition performance: Indications of unidentified moderators. *Strategic Management Journal, 25*, 187–200.

Kusewitt, J. B. (1985). An exploratory study of strategic acquisition factors relating to performance. *Strategic Management Journal, 6*(2), 151–169.

Levitt, B., & March, J. (1988). Organizational learning. *Annual Review of Sociology, 14*, 319–340.

Lubatkin, M. (1983). Mergers and the performance of the acquiring firm. *Academy of Management Review, 8*, 218–225.

March, J. G., & Sutton, R. I. (1998). Organizational performance as a dependent variable. *Organization Science, 8*, 698–710.

Marks, M. L., & Mirvis, P. H. (2001). Making mergers and acquisitions work: Strategic and psychological preparation. *Academy of Management Executive, 15*(2), 8094.

Martinko, M. J. (1995). The nature and function of attribution theory within the organizational sciences. In M. M. Martinko (Ed.), *Attribution theory: An organizational perspective* (pp. 7–13). Delray Beach: St. Lucie Press.

Morosini, P., & Singh, H. (1994). Post-cross-border acquisitions: Implementing national culture compatible strategies to improve performance. *European Management Journal, 12*, 390–400.

Morosini, P., Shane, S., & Singh, H. (1998). National cultural distance and cross-border acquisition performance. *Journal of International Business Studies, 29*, 137–158.

Nahavandi, A., & Malekzadeh, A. R. (1988). Acculturation in mergers and acquisitions. *Academy of Management Review, 13*, 79–90.

Ronen, S., & Shenkar, O. (1985). Clustering countries on attitudinal dimensions: A review and synthesis. *Academy of Management Review, 10*(3), 435–454.

Salancik, G., & Meindl, J. (1984). Corporate attributions as strategic illusions of management control. *Administrative Science Quarterly, 29*, 238–254.

Schaffer, B. S. (2002). Board assessments of managerial performance: An analysis of attribution processes. *Journal of Managerial Psychology, 17*, 95–115.

Schoenber, R. (2004). Dimensions of management style compatibility and cross-border acquisition outcome. *Advances in Mergers and Acquisitions, 3*, 149–175.

Schweiger, D. M., & Goulet, P. K. (2000). Integrating mergers and acquisitions: An international research review. *Advances in Mergers and Acquisitions, 1*, 61–91.

Schweiger, D. M., & Lippert, R. L. (2005). Integration: The critical link in M&A value creation. In G. K. Stahl & M. E. Mendenhall (Eds.), *Mergers and acquisitions: Managing culture and human resources*, *Stanford business books* (pp. 17–46). Stanford: Stanford University Press.

Schwenk, C. R. (1990). Illusions of management control? Effects of self-serving attributions on resource commitments and confidence in management. *Human Relations, 43*(4), 333–347.

Shimizu, K., Hitt, M. A., Vaidyanath, D., & Pisano, V. (2004). Theoretical foundations of cross-border mergers and acquisitions: A review of current research and recommendations for future research. *Journal of International Management, 10*, 307–353.

Slangen, A. H. (2006). National cultural distance and initial foreign acquisition performance: The moderating effect of integration. *Journal of World Business, 41*, 161–170.

Stahl, G. K., & Voigt, A. (2008). Do cultural differences matter in mergers and acquisitions? A tentative model and meta-analytic examination. *Organization Science, 19*, 160–176.

Stahl, G., Mendenhall, M. E., & Weber, Y. (2005). Research on sociocultural integration in mergers and acquisitions: Points of agreement, paradoxes, and avenues for future research. In G. Stahl & M. E. Mendenhall (Eds.), *Mergers and acquisitions: Managing culture and human resources* (pp. 401–411). Stanford: Stanford University Press.

Vaara, E. (2002). On the discursive construction of success/failure in narratives of post-merger integration. *Organization Studies, 23*, 213–250.

Van der Zee, K. I., Van Oudenhoven, J. P., & Bakker, W. (2002). Individual differences in adaptation and wellbeing. In D. Gorter & K. I. Van der Zee (Eds.), *Frisians abroad*. Leeuwarden: Fryske Akademy Press.

Vermeulen, F., & Barkema, H. G. (2001). Learning through acquisitions. *Academy of Management Journal, 44*, 457–476.

Very, P., & Shweiger, D. (2001). The acquisitions process as a learning process: Evidence from a study of critical problems and solutions in domestic and cross-border deals. *Journal of World Business, 36*(1), 11–31.

Very, P., Lubatkin, M., & Calori, R. (1996). A cross-national assessment of acculturative stress in recent European mergers. *International Studies of Management and Organization, 26*, 59–86.

Very, P., Lubatkin, M., Calori, R., & Veiga, J. (1997). Relative standing and the performance of recently acquired European firms. *Strategic Management Journal, 18*, 593–614.

Weber, Y. (1996). Corporate cultural fit and performance in mergers and acquisitions. *Human Relations, 49*, 1181–1202.

Weber, Y., Shenkar, O., & Raveh, A. (1996). National and corporate cultural fit in mergers and acquisitions: An exploratory study. *Management Science, 42*, 1215–1227.

Weiner, B. (1979). A theory of motivation for some classroom experiences. *Journal of Educational Psychology, 71*, 3–25.

Weiner, B. (1995). Attribution theory in organizational behavior: A relationship of mutual benefit. In M. M. Martinko (Ed.), *Attribution theory: An organizational perspective* (pp. 3–6). Delray Beach: St. Lucie Press.

14

A Dynamic Learning Perspective on Innovation Control: Balancing Freedom and Constraint

Minna Saunila and Martti Mäkimattila

1   Introduction

In order to translate innovation capability into successful results via products, technologies, services or business models, firms require innovation control. In other words, companies need to manage and measure their innovation capability and related processes in an active and result-oriented way (Adams et al. 2006). Clearly defined goals and control mechanisms for timing, resources and quality are essential. Innovation control can help organisations define what resources (in terms of quantity, type and personnel capabilities) are needed to implement each action.

M. Saunila (✉)
Lappeenranta University of Technology, Lahti, Finland
e-mail: Minna.Saunila@lut.fi

M. Mäkimattila
Lahti University of Applied Sciences, Lahti, Finland

Recent innovation research has complemented perspectives related to individuals and their environments, which feature both group and organisational aspects. The shift in the focus of innovation studies underlines an important stream of research on innovation control systems. As work occurs within companies, individuals' surroundings are largely affected by control mechanisms (Davila et al. 2009). The application of innovation control frequently displays a strong ambidexterity between the strong use of measurement mechanisms and significant amounts of freedom in order to enhance creativity. Thus, organisational-level innovation control seems to be an auspicious research area that should concentrate on both the individual and collective processes, with organisational needs in mind (Saunila 2017). These three levels of analysis (individual, group and organisational) are extensively represented in the literature on innovation and learning (see James et al. 2013). However, little is known about the ways in which management actions advance these three levels of innovation control in practice. In order to flourish, the controlling processes should be able to balance the rival forces of freedom and constraint (see Simons 2000). Research into innovation is also developing a better understanding of innovations as a managed and controlled process (Chebbi et al. 2017; Davila et al. 2009; Janssen et al. 2011; Saunila et al. 2014).

However, the existing conceptualisations of innovation control actions remain limited and have not addressed the different dimensions related to dynamic processes. This study examines the combination of and control over innovation resources, at both individual and team levels, that are used to achieve organisational goals. Individual interests and organisational capabilities are analysed during a reformation of the innovation process and the organisational structures of a media company. This study could be beneficial to those who are attempting to make sense of the complex context of innovating daily content and building multi-channel platforms to create businesses for the future. We believe that innovation control discussions could be enriched by applying approaches from a dialectic perspective and by presenting them in an organisational learning context. Furthermore, describing different types of controls and observation levels during the innovation process (for example, James et al. 2013; Saunila 2017) might help us understand the cognitive and

dialectic dimensions when addressing personal and managerial characteristics in accordance with situational demands (Bledow et al. 2009a, b).

In this chapter, we note the challenge of developing innovations as outcomes requiring exploration and exploitation on multiple levels of organising. Enabling individuals, teams and organisations to participate efficiently in innovation activities requires control of resources. In addition, the recent literature suggests that management control systems influence innovation (see Henri 2006; Franco-Santos et al. 2012; Saunila 2017) but does not specify how control mechanisms inform and assist innovation. In the following, we continue the earlier discussion of dialectic perspectives with respect to innovation (see Bledow et al. 2009a, b) and innovation control (see Davila et al. 2009; Haustein et al. 2014), while stressing the need for a multi-level approach to controls. The research question is, "How does innovation control integrate with innovation as a multi-level process?"

The chapter is structured as follows. The literature review introduces the theories of innovation and management control, after which a case study using several research methods is presented. This chapter also discusses control mechanisms that operate on multiple levels of an organisation to drive innovation. We describe the dynamics of the innovation process, which requires various controls to refine ideas devised through innovation. Finally, theoretical conclusions and some managerial suggestions for flexible control and developing processes that aim to build an innovative organisation are presented.

2   Literature Review

2.1   The Dialectic Approach to Innovation as a Multi-Level Dynamic Process

The dialectic perspective on innovation focuses on the dynamics of intentional development and on the introduction of useful new ideas (Bledow et al. 2009a). Innovations include creative ideas and their implementation in the form of products, processes, services and organisational innovations (Schumpeter 1934; Tidd et al. 2005). Following the dialectic

approach (Bledow et al. 2009a, b), based on previous work by March (1991), it is seen that in the contexts of knowledge and learning, "exploration" includes terms such as search, variation, risk-taking, experimentation, flexibility, and discovery. "Exploitation" refers to concepts including production, selection, implementation and execution. The different characteristics of various phases of innovation as knowledge-based processes can be identified (Chebbi et al. 2017; Chesbrough 2003; Tidd et al. 2005). Recent discussion has highlighted the idea that innovation is more of a complementary dynamic process with integrated feedback loops than a linear set of pre-planned steps to final outcomes (cf. James et al. 2013; Mäkimattila 2014; Mäkimattila et al. 2013; Santoro et al. 2017; Thrassou et al. 2018a, b). Actions at different levels need to be synchronised. Although grounded in the tasks of individuals, the group initiative is to handle uncertainty related to the tasks and to entrust challenging demands to group processes (Brav et al. 2009). Individuals, teams and organisations need to manage conflicting demands and to self-regulate and control issues via alternative pathways that lead from ideas to innovations.

According to Bledow et al. (2009a, b), the core point of the dialectic approach is the integration of complementary and even opposite cognitions, emotions and activities for facilitating successful innovation. The variety of interests and temporal challenges leads to one of the key issues: how individuals, teams and organisations can control conflicting processes. Bledow et al. (2009a, b) pointed out that shifting between several alternatives and integrating them is more likely to result in new solutions than committing to a single alternative in the early phase. The dialectic approach emphasises the idea that a problem representation is not a static cognitive structure but rather a constant, constructive process that synthesises previous problem representations with novel information (Bledow et al., 2009a, b). Based on the dialectic perspective, Bledow et al. (2009a, b) state that in practice, there is no easy way to manage innovation or to separate exploration and exploitation during innovation processes. Managers should instead be flexible in their approach to complementary activities and, depending on the situation, move from aims related to enforcing a particular structure to keeping complementary actions open to exploration. The flexibility to shift between structuring

and opening processes is important to the different demands that surface during the innovation process (Bledow et al. 2009a, b; Mäkimattila 2014; Vrontis et al. 2012).

Bledow et al. (2009a, b) discussed and presented innovation demands and activities with embedded tensions at different levels within organisations. The authors described challenges at individual, team and organisational levels when exploring and exploiting innovation—for example, by presenting ambidexterity from the regulation of explorative and exploitative actions on multiple organisational levels. Mäkimattila (2014) and Fjeldstad et al. (2012) related similar findings concerning management structures and self-organisation, as well as motivation and situational awareness, but focused more on intra-organisational aspects related to enabling inter-organisational collaboration for innovation. Prajogo and Ahmed (2006) found that organisations need to enhance certain behavioural and cultural practices to achieve a high innovation performance. Only within these ancillary environments is it possible for organisations to enhance their potential for more effective working to attain desired outcomes and high performance in the area of innovation. Empirical studies have shown that highly innovative firms have slack structures in the front-end phase of the innovation process and develop more formal controls and structures at the back-end stages of the innovation process (Van der Panne et al. 2003).

2.2 Controls for Innovation

Since control aims to ensure the achievement of an entity's purpose, plans and targets, control at an organisational level can be said to encompass the processes in which someone deliberately influences what another individual, group or organisation will do (Tannenbaum 1968). Furthermore, prior research has pointed out the interactive relationship between management control and organisational behaviour. Researchers have suggested that the application of control mechanisms is a social phenomenon, as behaviour mediated by these mechanisms is shaped by the feelings, values and basic beliefs of the individuals and the organisation, as well as the community and society within which the organisation operates (Franco

and Bourne 2003; Nudurupati and Bititci 2005). This notion is also applicable to the idea of innovation as a process.

Many authors have concluded that in today's world, innovation is best understood as a largely repetitive process that can be managed and thus requires particular attention to the design of management control (for example, Davila et al. 2009; Haustein et al. 2014; Janssen et al. 2011). According to Davila et al. (2009, p. 285), innovation is "about taking advantage of exceptions; experimenting, failing and succeeding; uncertainty and volatility; inefficiencies; adapting to unforeseen opportunities; and foremost creativity". These types of process, such as specifying an idea that becomes the foundation of a new firm or a new service, require motivational surroundings. Control processes, such as goal-setting, performance measurement and reward systems, are important in shaping this environment (Davila et al. 2009). In particular, when referring to innovation as a process, the need exists for a relevant control system to manage it. Where the only formal control mechanism is to choose between go/no-go decisions, managers are only able to hope that internal controls in the department (or "clan control") can lead to successful outputs. This structure has proven to be limited and useful only for basic research activities (Davila et al. 2009).

Based on previous studies (Franco-Santos et al. 2012; Henri 2006), indirect and interactively used control mechanisms and performance measurements can benefit innovation. According to Revellino and Mouritsen (2009), innovation has to undergo a number of phases and activities, each of which calls for different controls that mediate between the innovation and its environment. Control systems can be divided based on the style of use; some examples of contrasting styles include organic or mechanistic (see Chenhall 2003), interactive or diagnostic (see Simons 2000), and direct or indirect (see Hutzschenreuter 2009). The division is usually designated based on the degree of interplay with personnel. Interactive systems enhance the dialogue and knowledge exchange based on presumptions. The aim of these systems is to enhance idea development, but they do not impact other aspects of the innovation process (Davila et al. 2009). Labitzke, Svoboda and Schultz (2014) demonstrated the positive influence of informal controls on innovation activity, but with respect to formal controls, no significant effect on innovation

activity was noted. Ylinen and Gullkvist (2014) found organic forms of control to increase project performance in both exploratory and exploitative innovation. Radical innovation, especially in the early stages of development, is characterised by a strong dependence on flexible and social controls, whereas diagnostic control occurs mainly in late development and commercialisation (Chiesa et al. 2009).

Recent studies have revealed that to foster innovation, multiple control mechanisms should be implemented simultaneously. There is still little systematic evidence as to how control mechanisms inform and assist innovation and how the effects of one form of control are complementary to and simultaneously rely on another form of control (Malmi and Brown 2008). The framework of Merchant and Van der Stede (2007) was selected as a reference for this study because it regards results and action controls as typically administrative and more direct types of control but includes also more indirect types of controls. These include personnel control, which enables employees to control and motivate themselves, and cultural control, which encourages mutual monitoring. Instead of personnel control, idea control and resource control are used to represent the indirect controls. However, personnel are involved in all control mechanisms. We chose this division of controls because it is not limited to a certain industry, organisation size or set of business characteristics.

3 Research Methodology

The study results were derived from case study research. Due to the exploratory nature of the research, the case study method was considered appropriate, given the lack of existing theory combined with the importance of the phenomenon in practice. Accordingly, the guidelines of abductive reasoning were adopted when conducting the research. According to Kovács and Spens (2005), this approach seeks to develop theories by concentrating on interpreting and understanding a phenomenon that has not yet been researched.

Data were collected from a Finnish company associated with multiple areas of the media business. The case company includes many units and departments that have distinct roles and responsibilities in the organisation,

with some common and some discrete functions. The case company offers a variety of services; for example, it publishes several newspapers, operates a radio channel and offers web-based services. In addition to the main business units, the support functions include distribution and printing as well as administrative and IT departments. The case company employs approximately 270 workers and faces fierce competition caused by the shift from traditional to new media, while struggling with the need to cope with a rapidly changing operating environment. Nowadays, cost-cutting is not a solution for success and profits, and the case company realises that innovations are required to ensure future performance. An innovation process has been developed for the company via a digital idea-collection system, but the system did not fulfil its expectations and was therefore not adequately used. There were problems in the encouragement of positive interaction in idea development and implementation because some of the business units were also each other's competitors. In a two-year research period, collaborative actions were undertaken to frame the innovation process from idea to innovation and to determine the types of organisational preparation needed to better utilise external innovation. In such a dynamic context, a company needs control to manage innovation and to clarify how innovation control integrates innovation proceeding at different levels.

A single case was chosen to obtain valuable in-depth information about innovation control under a condition of change and organisational readjustment. Multiple sources of data were utilised, and several researchers were involved to obtain triangulation and to ensure valid and reliable results (Eisenhardt 1989; Flyvbjerg 2006; Pålshaugen 2009; Voss et al. 2002; Yin 1994). The research process included four prior phases of data collection and was performed concurrently with the organisation's strategic development process. Collecting different types of data allowed for data triangulation (see Table 14.1). The data included written works by the case company's employees as well as taped and transcribed interviews. Interview questions were open-ended and planned in advance, but the discussions were unofficial and allowed researchers to present further questions. Two researchers simultaneously analysed the data by content analysis and engaged in discussions for the purpose of forming a common understanding. At this time, theory triangulation was adopted. The goal of this process was to employ different theoretical frameworks for

Table 14.1 Data used to examine innovation control in a case company

Purpose	Data	Number of people involved	Output
To clarify the state of innovation activities and future needs	Interviews	15 senior managers and innovation agents	Prerequisites of the successful innovation process
To clarify the output of the interviews	Group interviews	15 senior managers and innovation agents	Development targets of the innovation process and related activities
To create the control mechanisms of the innovation process	Development	3–6 innovation agents 2–4 researchers	Description of the innovation process and control mechanisms (manageable self-organisation)
To form a common understanding of the results and benefits of the completed process	Final interviews	6 innovation agents	Elements functioning well in the current innovation control system and development of future targets

introducing new concepts. Although the study originates from management control research, innovation management and organisational learning research were also used to integrate the existing theory with new contexts.

4   Results

Organisational management has different expectations and needs when it comes to innovation control. Many interviewees maintained that decisions to shift from structuring a given situation to keeping it free and open to exploration should be made based on the innovation process's phase and situation. With respect to the case organisation, it is crucial that routine evaluations be made at each level to avoid management

delays and to ensure that workers will not feel pressured to take unofficial action. One undesirable phenomenon is the tendency to bring every issue to the top level of an organisation. The decision-making mechanisms must fit the needs of the organisation without causing inertia or time delays.

In the case organisation, the employees responsible for innovation activities clarified the challenge faced by the company: it is easy to place emphasis on only those actions that are visible, which makes it easier to cut other efforts rather than controlling them and targeting them to organisational goals. The employees recognised that the organisation should also exploit resources in the early phases of the innovation process and have the buoyancy to combine different control mechanisms. The trick is to let an organisation adjust organically, based on the innovation. These challenges should be met simultaneously to ensure the functioning of daily operational activities that create company revenue with which to finance ideas and innovations, and which will thus translate into future success stories. Based on the process employed in the case company, if the organisation is focused only on operations and existing products and/or services, the incremental innovations developed are predominately related to these current products and processes. In this case of incremental improvements, the emphasis of the innovation process is on the late phases and direct control mechanisms. If the organisation is adapting more radical innovations, the role of indirect control in the early phases is pronounced.

The complexity of the control mechanisms becomes clear when considering which individuals are needed to take part in the organisation's decision-making. In this case study, it was apparent that the decision-making paths were ambiguous and required clarification. The general practice was that to push ideas forward, employees were required to talk to managers, who had the authority to make decisions. In the case company, decision-making was distributed among different management groups, and orders given were perceived to be only partially optimal rather than conveying complete agreement with a proposed concept. The result was that employees were trying to perform their daily tasks without benefiting from the input of different levels within the organisation.

Based on the interviews, individuals with different knowledge bases and backgrounds may create the most fruitful ideas. Initially, creative individuals develop an idea when the opportunity to address a particular need is clear. After this initial spark, the idea is elevated to the team level, where it is supplemented with additional ideas. At an organisational level, it is linked with other teams' perspectives in such a way that individuals connect things to their own challenges related to the innovation process. The idea is additionally linked at that time to the company's strategy. When the innovation is complemented, it will return to the original point of departure (to the individuals who will apply it to the realised operating environment). This requires a variety and mixture of controls at different stages.

Choosing the right ideas and managing activities related to these ideas at the right levels requires an understanding of the process of exploring complementary ideas and then exploiting them at both the group and organisational levels. The interviewees stated that the loops that link the individuals with ideas to group-level refinement and organisational interest before returning to the individual level of complementary ideas must be fully realised. This is not usually visible through direct action and result control mechanisms. In the case company, the management of exploration and exploitation, as well as shifting between the competing processes of convergent and divergent thinking during the innovation process, was overcome by forming an innovation agent group—a group of individuals set up to provide the pre-requisites for idea development and to align innovations for strategy and to support management in innovation activities. Allowing individuals from different functions and job descriptions to further innovation processes, including connections with management for total business optimisation, was seen as a proper solution for innovation control. Such an innovation agent group combined individuals and their processes, namely the development of the innovation process, the fostering and generation of new ideas, and the selection and transformation of these ideas into successful innovations. In contrast, the traditional approach refined ideas within one's own unit and department.

Also in the case company, prior attempts were made to solve management problems related to the innovation process by collecting ideas for

the IT system, but this strategy failed and was attributable to a lack of control mechanisms for fostering an interactive "debate platform" where innovation could be complemented. Resources had been used within units to promote innovation because a common arena for dialogue was missing. Due to the new agent solution, which included the development of a group that supported innovation outside the boundaries of the organisation's operational units, a dialectic was achieved through which the implementation and application of indirect control mechanisms took place in a different way. Agents encouraged interaction and built a common understanding regarding innovation activities. Management supported this. The group also catalysed and supported the innovation process, forming a connective platform across units in the organisation. Such a group within an organisation selects the ideas for further development and guides the process of implementation. The development of the new group was a reflection of innovation control. The agents' role was to ensure the resources and progress of innovation development. They also built link innovations to strategy and support management. The results are summarised in Table 14.2.

5   Implications

The aim of this study was to examine how innovation control integrates innovations that proceed as a multi-level process. A case study with multiple data sources was conducted to reveal the roles of different controls in innovation activities and their complementary roles in innovation control. Our study found that diverse phases of the innovation process have distinct demands with respect to innovation control. The early phase should be supported by indirect control mechanisms, with idea development guided in a free and supportive manner; the concept phase should be agitated by the organisation seeking multiple options and the defined shared goal; and the project development phase should have direct mechanisms with which to control execution and resources (see Fig. 14.1). The balancing of freedom and constraint based on agent group construction allows individual, group and organisational interests to merge and produce practical measures.

Table 14.2 Innovation control in different phases

Phase of innovation process	Outcomes from dialectic perspective	Focus on control characteristic
Signals and opportunity recognition	Interaction platforms and organisational culture—everyone's job includes acquiring and sharing cross-functional information	Cultural control, exploration
Idea generation	A platform to integrate ideas from different departments; culture that supports this supportive	Idea control, exploration
Idea evaluation	Systematically conduct evaluation in cross-functional teams and link to organisational strategy	Idea control, exploration
Refining concepts	Products and services create value for the user/customer; organisation of platforms for refining and connecting individual cognitive processes to add new ideas in the dialectic process	Idea control, exploration, and exploitation
Decision to develop further	A common view between different departments on how to proceed with innovation is achieved	Resource control, exploitation
Starting project	As soon as possible by assessing profitability in terms of internal or external resources, costs, etc.	Action control, exploitation
Running research and development project	Clearly lead process by utilising internal and external resources	Action control, exploitation
Testing	Gather user/customer feedback for all levels	Results control, exploitation
Implementing	Implementation internally communicated before external actions	Results control, exploitation
Measuring innovation process	Define measures that cover the whole process	Results control, exploitation
Learning	Individuals enable learning throughout the organisation	Results control, exploitation

5.1   Theoretical and Practical Implications

From a theoretical perspective, we integrated the lines of research on innovation and management control. The results add to our understanding of controlling and combining innovation resources at individual and
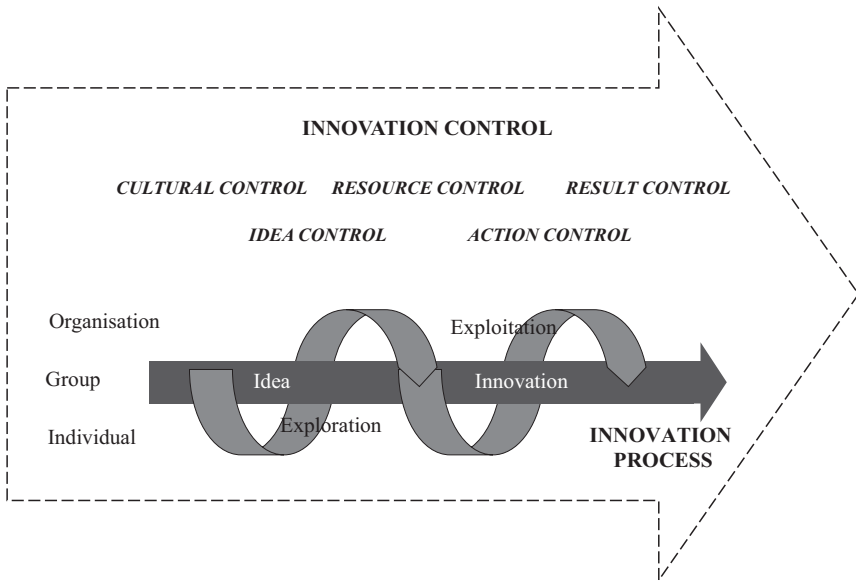
Fig. 14.1 Multi-level approach to innovation control

group levels to achieve organisational goals. The study findings reveal that different phases of the innovation process have different demands regarding control mechanisms—after all, the purpose of control is not to prevent the dialectic process of innovation. A multiplicity of control mechanisms is needed, but these mechanisms require different emphases during different phases of the process. It is easy to put the emphasis on only those actions that are visible, which in turn makes it easier to reduce efforts in areas rather than take steps to ensure that they are clearly directed and measured. The organisation should use innovation control to allocate resources in the early innovation process. Companies should also have the capability to locate suitable employees with both knowledge and expertise in addition to controlling (to some extent) these actions. The challenge is to let the organisation adjust based on the phase of the innovation process and the control mechanisms involved.

Innovation control is not the only means through which the innovation process can be managed, especially in the early phases. The motivation and

ability of individuals to dialogue and to engage in constructive debate is also extremely valuable in reaching a joint, actionable result. On the other hand, no organisation's innovation process works without control. In the case company examined in this study, an agent group formed a dialectic platform for dialogue. This platform made possible the dynamic process of combining different levels, including loops that brought complementary ideas back to the individual cognitive level upon the organisation's observation of proceeding innovation.

In terms of practical implications, our results propose that the balance between exploration and exploitation in the innovation process is strongly influenced by different control mechanisms. Companies should have a clear vision of the innovation control mechanisms at work at different phases of the innovation process. Innovation control should also focus on the early stages of the innovation process and not only on the concept and implementation phases. Innovation controls have to be flexible and variable to accommodate the demands of rapidly changing operating surroundings.

5.2   Limitations and Future Research Directions

The study has some limitations, which can be considered in further research. Our study builds on one case study within a particular context. Additional case studies are needed to ensure the generalisability of the results. However, several studies have provided empirical arguments about the different needs of control in diverse phases of the innovation process (Revellino and Mouritsen 2009). The present study confirms these arguments by providing supplementary evidence about the different control mechanisms involved. Our study acknowledges the difficulties of studying dynamic phenomena, such as innovation controls in a rapidly changing business context. We assume that we have managed the challenge well with a combination of various methods of data collection. An opportunity for future research also exists in the study of the managerial role of controls and an innovation agent group as a solution to balancing freedom and constraint on multiple levels.

6 Conclusions

Rapid changes in business environments and in customer expectations are compelling organisations to rethink and readjust their management controls. These pressures will force firms to focus on how they integrate innovation control at individual, group and organisation levels. Balancing control between freedom and constraint creates mutual understanding and favourable conditions for the evolution of innovation. Control should not be used to prevent the dialectic process of innovation but should rather support it in a constructive and efficient manner. A multiplicity of control mechanisms is needed, but these mechanisms require different emphases at different phases of the process that support the development of innovation.

References

Adams, R., Bessant, J., & Phelps, R. (2006). Innovation management measurement: A review. *International Journal of Management Reviews, 8*(1), 21–47.

Bledow, R., Frese, M., Anderson, N., Erez, M., & Farr, J. (2009a). A dialectic perspective on innovation: Conflicting demands, multiple pathways, and ambidexterity. *Industrial and Organizational Psychology, 2*(3), 305–337.

Bledow, R., Frese, M., Anderson, N., Erez, M., & Farr, J. (2009b). Extending and refining the dialectic perspective on innovation: There is nothing as practical as a good theory; nothing as theoretical as a good practice. *Industrial and Organizational Psychology, 2*(3), 363–373.

Brav, A., Andersson, K., & Lantz, A. (2009). Group initiative and self-organizational activities in industrial work groups. *European Journal of Work and Organizational Psychology, 18*(3), 347–377.

Chebbi, H., Yahiaoui, D., & Thrassou, A. (2017). Multi-country collaborative innovation in the internationalisation process. *International Marketing Review, 34*(1), 109–137.

Chenhall, R. H. (2003). Management control systems design within its organizational context: Findings from contingency-based research and directions for the future. *Accounting, Organizations and Society, 28*(2–3), 127–168.

Chesbrough, H. W. (2003). *Open innovation: The new imperative for creating and profiting from technology*. Boston: Harvard Business School Press.

Chiesa, V., Frattini, F., Lamberti, L., & Noci, G. (2009). Exploring management control in radical innovation projects. *European Journal of Innovation Management, 12*(4), 416–443.

Davila, A., Foster, G., & Oyon, D. (2009). Accounting and control, entrepreneurship and innovation: Venturing into new research opportunities. *European Accounting Review, 18*(2), 281–311.

Eisenhardt, K. M. (1989). Building theories from case study research. *Academy of Management Review, 14*(4), 532–550.

Fjeldstad, Ø. D., Snow, C. C., Miles, R. E., & Lettl, C. (2012). The architecture of collaboration. *Strategic Management Journal, 33*(6), 734–750.

Flyvbjerg, B. (2006). Five misunderstandings about case-study research. *Qualitative Inquiry, 12*(2), 219–245.

Franco, M., & Bourne, M. (2003). Factors that play a role in "managing through measures". *Management Decision, 41*(8), 698–710.

Franco-Santos, M., Lucianetti, L., & Bourne, M. (2012). Contemporary performance measurement systems: A review of their consequences and a framework for research. *Management Accounting Research, 23*(2), 79–119.

Haustein, E., Luther, R., & Schuster, P. (2014). Management control systems in innovation companies: A literature based framework. *Journal of Management Control, 24*(4), 343–382.

Henri, J. F. (2006). Management control systems and strategy: A resource-based perspective. *Accounting, Organizations and Society, 31*(6), 529–558.

Hutzschenreuter, J. (2009). *Management control in small and medium-sized enterprises.* Wiesbaden: Gabler.

James, L., Guile, D., & Unwin, L. (2013). Learning and innovation in the knowledge-based economy: Beyond clusters and qualifications. *Journal of Education and Work, 26*(3), 243–266.

Janssen, S., Moeller, K., & Schlaefke, M. (2011). Using performance measures conceptually in innovation control. *Journal of Management Control, 22*(1), 107.

Kovács, G., & Spens, K. M. (2005). Abductive reasoning in logistics research. *International Journal of Physical Distribution and Logistics Management, 35*(2), 132–144.

Labitzke, G., Svoboda, S., & Schultz, C. (2014). The role of dedicated innovation functions for innovation process control and performance—an empirical study among hospitals. *Creativity and Innovation Management, 23*(3), 235–251.

Mäkimattila, M. (2014). *Organizing for systemic innovations—research on knowledge, interaction and organizational interdependencies.* Doctoral dissertation, Lappeenranta University of Technology.

Mäkimattila, M., Melkas, H., & Uotila, T. (2013). Dynamics of openness in innovation processes—A case study in the Finnish food industry. *Knowledge and Process Management, 20*(4), 243–255.

Malmi, T., & Brown, D. A. (2008). Management control systems as a package—Opportunities, challenges and research directions. *Management Accounting Research, 19*(4), 287–300.

March, J. G. (1991). Exploration and exploitation in organizational learning. *Organization Science, 2*(1), 71–87.

Merchant, K. A., & Van der Stede, W. A. (2007). *Management control systems: Performance measurement, evaluation and incentives.* Harlow: Pearson Education.

Nudurupati, S. S., & Bititci, U. S. (2005). Implementation and impact of IT-supported performance measurement systems. *Production Planning and Control, 16*(2), 152–162.

Pålshaugen, Ø. (2009). How to generate knowledge from single case research on innovation? *International Journal of Action Research, 5*(3), 231–254.

Prajogo, D. I., & Ahmed, P. K. (2006). Relationships between innovation stimulus, innovation capacity, and innovation performance. *R&D Management, 36*(5), 499–515.

Revellino, S., & Mouritsen, J. (2009). The multiplicity of controls and the making of innovation. *European Accounting Review, 18*(2), 341–369.

Santoro, G., Vrontis, D., Thrassou, A., and Dezi, L. (2017). The internet of things: Building a knowledge management system for open innovation and knowledge management capacity. *Technological Forecasting and Social Change.*

Saunila, M. (2017). Understanding innovation performance measurement in SMEs. *Measuring Business Excellence, 21*(1), 1–16.

Saunila, M., Ukko, J., & Rantanen, H. (2014). Does innovation capability really matter for the profitability of SMEs? *Knowledge and Process Management, 21*(2), 134–142.

Schumpeter, J. A. (1934). *The theory of economic development.* Cambridge, MA: Harvard University Press.

Simons, R. (2000). *Performance measurement and control systems for implementing strategy.* Upper Saddle River: Prentice Hall.

Tannenbaum, A. S. (1968). *Control in organizations.* New York: McGraw-Hill.

Thrassou, A., Vrontis, D., & Bresciani, S. (2018a). The Agile Innovation Pendulum: Family business innovation and the human, social, and marketing capitals. *International Studies of Management and Organization, 48*(1), 88–104.

Thrassou, A., Vrontis, D., & Bresciani, S. (2018b). The Agile Innovation Pendulum: A strategic marketing multicultural model for family businesses. *International Studies of Management and Organization, 48*(1), 105–120.

Tidd, J., Bessant, J., & Pavitt, K. (2005). *Managing innovation: Integrating technological, market and organizational change*. Chichester: Wiley.

Van der Panne, G., Van Beers, C., & Kleinknecht, A. (2003). Success and failure of innovation: A literature review. *International Journal of Innovation Management, 7*(03), 309–338.

Voss, C., Tsikriktsis, N., & Frohlich, M. (2002). Case research in operations management. *International Journal of Operations and Production Management, 22*(2), 195–219.

Vrontis, D., Thrassou, A., Chebbi, H., & Yahiaoui, D. (2012). Transcending innovativeness towards strategic reflexivity. *Qualitative Market Research: An International Journal, 15*(4), 420–437.

Yin, R. K. (1994). *Case study research*. Thousand Oaks: Sage.

Ylinen, M., & Gullkvist, B. (2014). The effects of organic and mechanistic control in exploratory and exploitative innovations. *Management Accounting Research, 25*(1), 93–112.

Index