

# **Exploring the contribution of complexity theory to the system of political negotiations – a case study of the intractable conflict in Cyprus**

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## **Dedication**

*To my beloved son Konrad for his continuous understanding and support during my thesis work, and to my parents Janina and Alexander whom I dearly love and who have supported and helped me all the way through difficult times.*

# Table of contents

<b>Table of contents</b>	<b>iii</b>
<b>List of figures</b>	<b>vii</b>
<b>List of tables</b>	<b>viii</b>
<b>Conference proceedings</b>	<b>ix</b>
<b>Statement of originality</b>	<b>x</b>
<b>Acknowledgments</b>	<b>xi</b>
<b>Abstract</b>	<b>xii</b>
<b>Chapter 1</b>	
<hr/>	
<b>Introduction</b>	<b>2</b>
1.1 The context of the study	3
1.1.1 <i>Conflict in Cyprus</i>	
1.1.2 <i>Attempts at resolution through negotiations</i>	
1.1.3 <i>Reductionism and linearity in negotiations</i>	
1.1.4 <i>Fractal dimension in negotiations</i>	
1.2 Rationale of the study	9
1.3 Problem statement	10
1.4 Research objectives and research questions	11
1.5 Methodology and methods: The case study	12
1.5.1 <i>The real-life context of the case study</i>	
1.5.2 <i>Theoretical framework and literature review</i>	
1.6 Limitations of the study	14
1.7 Structure of the thesis	15
<b>Chapter 2</b>	
<hr/>	
<b>Research methodology and methods</b>	<b>17</b>
2.1 Methodology and research design	17
2.1.1 <i>Complexity lens</i>	
2.1.2 <i>Exploratory and explanatory and (interpretative) nature of the study</i>	
2.2 Ontology and epistemology of political negotiations	18
2.2.1 <i>Ontology</i>	
2.2.2 <i>Epistemology</i>	
2.3 Phenomenology	22
2.3.1 <i>Appreciation of the philosophy based on phenomenology</i>	
2.3.2 <i>Hermeneutic phenomenology</i>	
2.4 Case study methodology	24
2.5 Research method	26
2.5.1 <i>Collecting data</i>	
2.5.2 <i>Interview protocol</i>	
2.5.3 <i>Conducting the interviews</i>	
2.6 Triangulation	30
2.7 Data analysis (content analysis)	31
2.7.1 <i>Content analysis</i>	
2.7.2 <i>Transcription and coding</i>	
2.8 Limitations of the thesis	34
2.9 Ethical considerations	35

## **Chapter 3, part 1**

<b>The Cyprus conflict and political negotiations</b>	<b>36</b>
3.1 Geographic location and strategic significance	36
3.2 The emergence of nationalism in the 19th and 20th centuries	37
3.3 End of British colonial rule and de facto division of Cyprus	37
3.3.1 <i>De facto partition and peacekeeping</i>	
3.3.2 <i>Attempts to establish a workable peace</i>	
3.4 The involvement of the United Nations	39
3.5 Continued attempts to resolve the Cyprus stalemate in the 21st century	39

## **Chapter 3, part 2**

<b>The system of political negotiations 2008-2014</b>	<b>41</b>
3.6 The system of political negotiations (2008-2014)	41
3.7 Recent periods of negotiation	45
3.7.1 <i>The period of the 2013 Greek Cypriot elections, renewed talks and financial crisis</i>	
3.7.2 <i>Negotiations 2014</i>	
3.8 Negotiations chapter by chapter	49
3.8.1 <i>Property chapter</i>	
3.8.2 <i>Territory chapter</i>	
3.8.3 <i>Security and Guarantees chapter</i>	
3.8.4 <i>Governance and Powersharing chapter</i>	
3.8.5 <i>Economic Matters chapter</i>	
3.8.6 <i>EU Matters chapter</i>	
3.9 Convergence paper: 2008-2012	60
3.10 Summary	61

## **Chapter 4**

<b>Literature review: Complexity theory and selected concepts of relevance</b>	<b>65</b>
4.1 Complexity theory	65
4.2 The nature and application of complexity theory	68
4.2.1 <i>Uncertainty, unpredictability and bifurcation points</i>	
4.2.2 <i>Complexity in biological systems</i>	
4.2.3 <i>Complexity in socio-economic systems</i>	
4.2.4 <i>Complexity in political systems</i>	
4.2.5 <i>Complexity in social systems</i>	
4.2.6 <i>Simple/complicated/complex/chaotic</i>	
4.3 Characteristics of linear and nonlinear systems	83
4.3.1 <i>Linear systems</i>	
4.3.2 <i>Nonlinear systems</i>	
4.4 Reductionism	94
4.5 Self-organization	100
4.6 Emergence	104
4.7 Attractors, perturbations (and Butterfly Effect)	111
4.8 System boundary	117
4.9 Feedback loops	121
4.10 Fractals	122
4.11 Complex adaptive systems	128
4.12 Leverage points	129
4.13 Conventional negotiation theories and practices	133
4.14 Conclusion	135

## **Chapter 5**

---

<b>Results: Findings and discussion for research question 1</b>	<b>138</b>
5.1 Research question 1	138
5.2 Elements of reductionism and linearity in the history of Cyprus	139
5.3 Discussion in relation to historical reductionism and linearity in Cyprus	141
5.4 Elements of reductionism and linearity in the current system of political negotiations (2008-2014)	142
5.5 Summary of the findings and discussion	152
5.5.1 <i>Findings and discussion in relation reductionism and linearity in the current system of political negotiations in Cyprus</i>	
5.5.2 <i>Briefly on reductionism and linearity</i>	

## **Chapter 6**

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<b>Results: Findings and discussion for research question 2</b>	<b>159</b>
6.1 Research question 2	159
6.2 Recursive patterns in the system of political negotiations in Cyprus (2008-2012)	159
6.3 Psychological fractal dimension	160
6.3.1 <i>Blame, demonization, and 'them' versus 'us' mentality</i>	
6.3.2 <i>Distrust/mistrust</i>	
6.3.3 <i>Fear, pain, anxiety</i>	
6.3.4 <i>Behaviour and thinking mindset</i>	
6.3.5 <i>Discussion and findings in relation to psychological recursive patterns in the system of political negotiations in Cyprus</i>	
6.4 Political fractal dimension	176
6.4.1 <i>Elections</i>	
6.4.2 <i>Elitist formula to negotiations</i>	
6.5 Cyclical fractal dimension	183
6.6 Contradictory perceptions	184
6.7 Summary of findings for RQ2	185

## **Chapter 7**

---

<b>Results: Findings and discussion for research question 3</b>	<b>189</b>
7.1 Research question 3 Leverage points in the system of political negotiations	189
7.1.1 <i>Divergence in Greek and Turkish Cypriot paradigms</i>	
7.1.2 <i>Identification of leverage (points) within the system of political negotiations</i>	
7.1.3 <i>Paradigms</i>	
7.1.4 <i>Transcending paradigm</i>	
7.2 Summary of findings for RQ3	213

## **Chapter 8**

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<b>Application of aspects of complexity theory in the context of the Cypriot political negotiations</b>	<b>220</b>
8.1 Cypriot political negotiations as a (multidimensional) complex system	220
8.1.1 <i>EU-Turkey dimension</i>	
8.1.2 <i>Gas and oil dimension</i>	
8.1.3 <i>The Russian dimension</i>	
8.1.4 <i>Economic concerns and banking/fiscal crisis dimension</i>	
8.1.5 <i>Interpretations</i>	
8.2 The boundary of the system of political negotiations	228
8.2.1 <i>Diversifying input into the system of negotiations</i>	
8.2.2 <i>Boundary analysis</i>	

8.3	Reductionism, linearity and sequential approach to negotiations	233
8.3.1	<i>Divergent paradigms to create disintegration of the system of political negotiations</i>	
8.3.2	<i>A more holistic system of political negotiations</i>	
8.4	Self-organization and emergence in the system of political negotiations	240
8.5	The fractal perspective on political negotiations in Cyprus	242
8.5.1	<i>Psychological and mental fractal dimension</i>	
8.5.2	<i>The political fractal dimension</i>	
8.5.3	<i>The cyclical fractal dimension</i>	
8.5.4	<i>Contradictory perceptions</i>	
8.5.5	<i>Multiple fractal dimensions</i>	
8.6	Attractors in the system of political negotiations	249
8.6.1	<i>The effects of attractors</i>	
8.6.2	<i>Civil society's input</i>	
8.7	Leverage and adaptability in the system of political negotiations	254
<hr/>		
<b>Chapter 9</b>		
<b>Conclusions</b>		<b>256</b>
9.1	Rationale for the thesis	256
9.1.1	<i>Themes and questions</i>	
9.1.2	<i>A gap in the literature</i>	
9.2	Synthesis of findings for the research questions and overall conclusions	257
9.2.1	<i>Findings for the research questions</i>	
9.2.2	<i>Interpretations</i>	
9.3	Contribution to the body of knowledge and practice	262
9.4	Contribution to theory	263
9.5	Limitations of the research	263
9.6	Directions for future research	264
<hr/>		
<b>References</b>		<b>265</b>
<hr/>		
<b>Appendices</b>		
Appendix A:	Participant Information Sheet	2
Appendix B:	Ethics Approval 1	5
Appendix C:	Ethics Approval 2	8
Appendix D:	Contacts for Information on Project and Independent Complaints Procedure	10
Appendix E:	Interview Questions	13
Appendix F:	The Cyprus conflict and political negotiations	15
3.1	<i>Geographic location and strategic significance</i>	17
3.2	<i>Cyprus as a contested island (the period 1828-1959)</i>	18
3.3	<i>Emergence of nationalism</i>	20
3.4	<i>Separation of ethnic groups to solve complex problems</i>	23
3.5	<i>End of British Colonial Rule</i>	26
3.6	<i>Attempting to solve the intractable conflict of Cyprus</i>	27
3.7	<i>The Annan Plan</i>	41
3.8	<i>Regional and international dimension of the Cyprus problem</i>	48
3.9	<i>Summary</i>	51

## List of figures

Figure 2.1	Illustration of the process of research design	33
<hr/>		
Figure 4.1	Cynefin framework (Snowden & Boone, 2007)	78
Figure 4.2	Illustration of trajectories that converge towards (a) a stable stationary point, (b) a limit cycle, and (c) a strange attractor (in Helbing & Lämmer (Ed.), 2008, p.2), reproduced with permission from Springer Publishers.	86
Figure 4.3	Example of a set of variables that influence one another (Senge, 2006, p.55)	89
Figure 4.4	The behaviour of attractor basins. We have attractor basins A and B, a strong attractor B and a weaker attractor A. The black dot in attractor basin B represents the current state of the system.	113
Figure 4.5	An attractor landscape displaying multiple attractor basins within the dynamical system. Each of the basins attracts and collects, as well as producing various trajectories (Goudarzi, et al. DNA reservoir computing.)	115
Figure 4.6	Examples of the Koch curve (or Koch snowflake) which was developed by Helge von Koch through a process of recursion. The Koch curve exhibits irregular boundaries and self-similarity across scales. (Image reproduced under Creative Commons license.)	124
Figure 4.7	Examples of the Sierpinski gasket which is the result of continuous iterative process. To generate Sierpinski gasket, one must start with one triangle and every time replace it with three sub triangles. The developer of the gasket was Waclaw Sierpiński (illustrated by Stanislaus, 2013).	125
<hr/>		
Figure 8.1	The diagram represents the system of political negotiations in Cyprus between the years 2008-2014 operated under the auspices of the UN Good Offices Mission of the Secretary General Ban Ki-Moon. The centre of the diagram depicts the entrenched positions of the Greek and Turkish Cypriot sides on negotiated chapters of Property, Territory, Securities and Guarantees, Governance and Powersharing, Economic Matters and European Matters. (Source: B. Rapaport)	222
Figure 8.2	The diagram illustrates the entrenched positions of the Republic of Cyprus (RoC) and the Turkish Republic of Northern Cyprus (TRNC). The system of political negotiations in Cyprus was characterized by linear, reductionist and sequential thinking between the years 2008-2014. (Source: B. Rapaport)	234
Figure 8.3	The diagram illustrates the entrenched positions of the Republic of Cyprus (RoC) and the Turkish Republic of Northern Cyprus (TRNC). (Source: B. Rapaport). The system of political negotiations in Cyprus was characterized by linear, reductionist and sequential thinking between the years 2008-2014 – a closed look up (Source: B. Rapaport)	237
Figure 8.4	The ideal type of Complex System of Political Negotiations. The diagram depicts the system of political negotiations in Cyprus to adopt a connected approach, linking chapters in a dynamic way, in order to make concessions with full awareness of the connections between the elements of the system. (Source: B. Rapaport)	239
Figure 8.5	The diagram depicts (detail from Figure 8.4) a system of political negotiations where negotiated chapters are represented as autonomous, independent subsystems to connect and interconnect with each other. (Source: B. Rapaport)	240
Figure 8.6	The diagram depicts the most prominent areas of fractal dimension. It is evident that the psychological fractal dimension, represented in red colour, is the strongest and the most explicit dimension followed by a political fractal dimension represented in green and further followed by cyclical fractal dimension represented in yellow (Source: B. Rapaport)	248

## List of tables

Table 4.1.	Characteristics of simple and complex systems (Harrison, 2006, p.3)	76
Table 4.2	Researchers who report on and discuss emergence in system	107
<hr/>		
Table 6.1	Winners of Republic of Cyprus's elections	179
Table 6.2	Winners of Turkish Republic of Northern Cyprus's elections	179



## Conference proceedings

The researcher has published two papers, one of which deals with reductionism and linearity in the context of bilateral and multilateral negotiations.

### *Published papers 2012*

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Understanding the dynamics of system-of-systems in complex international negotiations. (IEEE SOSE 2012 7th International Conference on System of Systems Engineering, Genoa, Italy) (Authored).

Understanding the dynamics of system-of-systems in complex regional conflicts. (Complex Adaptive Systems Conference 2012, Missouri University of Science and Technology, Washington DC, USA) (Authored)

### *Personally presented at the following conference*

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Understanding the dynamics of system-of-systems in complex regional conflicts (Complex Adaptive Systems Conference 2012, Missouri University of Science and Technology, Washington DC, USA) (Authored)

### *Presented on my behalf by Dr Alex Gorod, Visiting/Adjunct Fellow at the University of Adelaide*

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Understanding the dynamics of system-of-systems in complex international negotiations (IEEE SOSE 2012 7th International Conference on System of Systems Engineering, Genoa, Italy) (Authored)

## Statement of originality

I hereby certify this thesis and the research contained within comprises no information that has been presented and accepted for any award including degree at any university or institution of higher learning. This thesis is to the best of my knowledge does not include information that has been published previously or has been written by any person, except where references indicates otherwise in the text. Furthermore, I attest that the work contained herein will not be used at any time for the submission of any additional qualification at any other institution of higher learning, without the express written consent from the University of Adelaide.

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## **Abstract**

The thesis explores the nature of political negotiations that has been in place in Cyprus since 1968 under UN Good Offices Mission auspices, with special attention to the period 2008 and 2014 when the process of full-fledged negotiations under the auspices of the United Nations Secretary General was revived through the establishment of six main chapters on substantive issues with the intention to reach an agreement based on bizonal, bicomunal federation with both communities enjoying political equality.

Cyprus has experienced a long-standing intractable conflict between Greek and Turkish Cypriots since before 1974 when the government of Turkey exercised unilateral intervention based on the 1960 Treaty of Guarantee, ultimately leading to UN engagement to stabilise the conflict. The major outcome of the intervention was the division of the island into two sections, the South and North, with the ceasefire line (1974) to become the United Nations Buffer Zone (green line) persisting through time. Since then the conflict may be described as a stalemate with neither side gaining ground over the other and effectively no binding progress made.

Through a series of intensive interviews with Greek and Turkish Cypriot political leaders and United Nations experts together with a number of other well-informed academics on both sides of the island, as well as more general research, the thesis explores their experiences and views on the nature of political negotiations in the 2008-2014 period. Part of the research concentrates on obtaining their perceptions on the nature of the stalemate as a prominent feature of political negotiations. The other part pays attention to an exploration of the readiness of the parties to accept an alternative to the conventional wisdom of political negotiation methodology, through selected ideas drawn from complexity theory. These mainly include ideas from systems thinking notably the concept of leverage points, supported by several other aspects of complexity.

The evidence-base for the thesis leads to the core argument that the elements of reductionism, linearity and sequential approach to political negotiations between 2008 and 2014 period, together with strong psychological dimension embedded in the psyche of the Greek and Turkish Cypriot communities on both sides of the island, penetrated the system of political negotiations and is a major obstacle preventing the sides reaching settlement.

Further, employment of a political elitist formula into the system of negotiations produced additional obstacles to negotiations, as it became clear from the interviews that both the Greek and Turkish civil society on Cyprus were not involved in the process of negotiations which led to a lack of momentum being achieved.

In terms of original knowledge, the contribution of the research identifies reductionism and linearity in the system of the political negotiations as a likely cause of stalemate. The thesis introduces ideas from complexity theory, notably fractal and systems thinking theories that offer an alternative interpretation and approach, which appeared to attract the interest of practitioners as a feasible and innovative way of facilitating political negotiations.

A major awareness while undertaking the research was the unknown elements, which may be termed 'political will' that run beneath the surface of the conflict in Cyprus.

**Exploring the contribution of complexity theory to the system  
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## Introduction

*The whole is more than the sum of its parts.*

*Aristotle*

The research reported in the thesis examines the problem of reductionism, linearity and a sequential approach (RLS) as a possible cause of periodic stalling in the system of political negotiations in the seemingly intractable conflict in Cyprus. The thesis focuses specific attention between the years 2008-2014, which implemented a revived approach to political negotiations through the United Nations Good Offices Mission. This was considered at the time to offer a real prospect for gaining momentum for achieving a significant breakthrough. The goal of the research was to determine to what extent RLS in the political negotiations unintentionally fostered impasse or stalemate, and potentially prevented the conflicting sides from reaching a comprehensive settlement.

Concurrently, the problem of a recursive, self-similar pattern of psychological dimension exhibited in the psyche of the Greek and Turkish Cypriot sides, possibly acting as a brake and stalemate in the system of political negotiations, was also investigated. The psychological dimension appears as a deeply embedded paradigm impacting the state of mind of the Greek and Turkish Cypriot negotiating sides and communities on both sides of the island. This psychological dimension manifested itself in the employment of a political elitist formula into the system of political negotiations and possibly acted as a restraint on negotiating behaviour, making change and progress towards a comprehensive settlement difficult.

Viewing political negotiations in Cyprus through the lens of complexity, provided a novel and innovative perception on negotiations and how these could be viewed, analyzed and designed by the Greek and Turkish Cypriot sides. The political negotiations in Cyprus are to be understood as a complex (multidimensional) system which is connected and interconnected through time and space (the historical narrative) in a non-linear fashion.

The research sought to demonstrate how the concepts of interconnectivity and leverage points from complexity theory could be used by the Greek and Turkish Cypriot sides to set in motion the stagnated political negotiations – moving them from a state of impasse to a state of fluidity. It was

hoped that viewing the political negotiations through the lens of complexity theory would deepen our understanding of the Cypriot political negotiations system and the ways it might be enhanced.

It is important to note at this juncture in the thesis that there are also other factors that further explain its intractability of the Cypriot conflict, but which lie outside the scope of the thesis.

## **1.1 The context of the study**

### **1.1.1 Conflict in Cyprus**

The location of the island of Cyprus has always had geostrategic and economic importance in the Eastern Mediterranean region. Major Powers throughout history have sought to control the island since prehistoric times. Cyprus has been occupied by the Assyrians, the Egyptians, the Persians, the Rashidun and Umayyad Arab Caliphates, the Lusignans, the Venetians, the Crusaders, the English, and finally the Ottomans (Hadjidemetriou, 2007; Hannay, 2005; Mallinson, 2005; Michael, 2011; Morgan, 2010; Papadakis, Peristianis, & Welz, 2006).

In 1878, Britain took assumed control over the island in order to protect its interests in the Suez and continued to control it until 1960. Greek Cypriots, who had hoped the British would assist them in establishing *enosis* (**union**) with Greece, were bitterly disappointed when the British not only ignored their wishes, but used Turkish Cypriot fear of *enosis* to counterbalance the Greek Cypriot nationalist movement. From 1878 through the two world wars and into the Cold War, Greek Cypriots agitated by both political and terrorist means for *enosis* and the withdrawal of the British (Hadjidemetriou, 2007; Hakki, 2007; Mallinson, 2005; Pericleous, 2009).

On the other hand, the Turkish Cypriots, who traced their initial occupation of the north of the island back to the 16th century, became inspired by the values advocated by Mustafa Kemal Atatürk and readily adopted the secularism, modernisation, westernisation and new Turkish alphabet he and his party were promoting and embraced Turkish nationalism. Turkish Cypriots would not tolerate the idea of *enosis* and demanded that they be incorporated into the Ottoman – later the Turkish – state. In practical terms, this meant the return of Cyprus to its ‘previous owner’ before the British assumed control in 1878 (Hadjidemetriou, 2007; Mallinson, 2005). The two irredentist ethno-nationalisms, having opposing and completely incompatible aims, pursued a protracted antagonism throughout the 20th century. Even after the establishment of the independent Republic of Cyprus in 1960, both Greek Cypriot and Turkish Cypriot elites continued to cherish

their nationalist dreams, resulting in ethnic conflict and the development among the Turkish Cypriots of ideas of *taksim* (**partition**) (Pericleous, 2009).

The nationalist aspirations and allegiances of the Greek and Turkish Cypriots, together with political turmoil in the region, had serious ramifications for both communities on the island. The collapse of the Greek government in 1965 stirred old tensions between the Greek and Turkish Cypriots (Hadjidemetriou, 2007; Mallinson, 2005) who had been in conflict since 1821 (Hadjidemetriou, 2007; Mallinson, 2005). The year 1967 experienced increased intercommunal clashes to which Turkey responded with a military threat to invade the island (Hakki, 2007; Mallinson, 2005).

Following these events, the Turkish Cypriots aimed at political autonomy, a move not perceived favourably by the Greek Cypriots (Diez & Tocci, 2009). Even though the Greek and Turkish Cypriots have attempted to reconcile their nationalist aspirations for *enosis* (union) versus *taksim*, respectively, through intercommunal talks which first began in the spring of 1968 under the UN Good Offices Mission auspices, no agreements have been made between the sides (Hadjidemetriou, 2007; Papadakis et al., 2006; Pericleous, 2009).

Meanwhile, the formation of the Greek Cypriot paramilitary organisation EOKA-B in 1970s supported *enosis* aspirations with Greece (Diez & Tocci, 2009). The Greek government provided military support for emerging Greek Cypriot pro-*enosis* factions. This resulted in increased intra-ethnic friction, eventually culminating in a *coup d'état* on 15 July 1974 (Diez & Tocci, 2009; Joseph, 1997; Papadakis et al., 2006).

When Archbishop Makarios was overthrown, Nicos Sampson was appointed as the President of Cyprus. Given the dynamic and unpredictable developments on the island, Turkey decided to exercise its right of unilateral intervention based on the 1960 Treaty of Guarantee to invade Cyprus (Diez & Tocci, 2009). By invading the island in 1974, she acquired 37% of the island, forcing 160,000 Greek Cypriots and 40,000 Turkish Cypriots to look for refuge in the southern and northern parts of Cyprus respectively (Hadjidemetriou, 2007). The invasion took 4,000 lives (killed), with 1,450 people missing and 17,000 enclaved (Hadjidemetriou, 2007).



Since 1968 negotiations over the division and control of the island that were set in motion under UN auspices have continued unsuccessfully. Ironically, a United Nations Peacekeeping Force (UNFICYP) was actually on the island when Turkey invaded. In an attempt to maintain law and order and prevent all-out war, the United Nations (UN) expanded their mission and the enlarged force was redeployed to patrol the Buffer Zone.

Over the ensuing years, the leadership of the Greek and Turkish Cypriots failed to reach a comprehensive settlement, despite continuous negotiation and mediation efforts. As a consequence, almost half a century later the Greek and Turkish Cypriots still find themselves emotionally, psychologically and geopolitically trapped on a divided island, with the prevailing ‘negative peace’ maintained by the United Nations.

The Cypriot conflict presents a long-standing, socio-economically and politically intertwined discourse, which has been nurtured and externally shaped by great powers both regionally and internationally (Hadjidemetriou, 2008). Historical memories and experiences of the Cypriot society have been perpetually intertwined with the contemporary socio-economic and political intricacies carried in the fabric (Papadakis et al., 2006) of the conflict and negotiations to reach intractability (Hannay, 2005).

The historical turning points are thoroughly discussed in subsequent chapters. For the purposes of this thesis, the invasion of 1974 and subsequent events signify major and critical incidents for the Cypriot people, who continue to live in two very separate zones on the same island. Negotiations to resolve the conflict have continued for four decades, with the current case study focussed on talks that occurred between 2008 and 2014 without resolution.

### **1.1.2 Attempts at resolution through negotiations**

The research specifically focused on political negotiations conducted between the years 2008-2014. The significance of this time period is explained later in the introduction. On 21 March 2008 the newly elected President of the Republic of Cyprus Demetris Christofias and the Turkish Cypriot leader Mehmet Ali Talat committed themselves ‘to restart full-fledged negotiations under the auspices of the United Nations of the United Nations Secretary-General’ (UN Cyprus Talks, online, n.d.). The Secretary General Ban Ki-moon confirmed his support for the peace process and revived the good offices mission in Cyprus.

The direct talks began on 3 September 2008 where both leaders focused on reaching an agreement based on a bi-zonal, bi-communal federation with both communities enjoying political equality (UN Cyprus Talks, online, n.d). The political negotiations for the comprehensive settlement were divided into six main chapters, alongside the established six working groups (UNSC, S/2009/610; Morelli, 2014, Napolitano, 2011). In addition to six working groups, seven technical committees focusing on confidence-building measures were established (UNSC, S/2009/610). The chapters were:

- 1 Property
- 2 Territory
- 3 Economic Matters
- 4 EU Matters
- 5 Governance and Powersharing
- 6 Securities and Guarantees.

The dividing of complex problems into discrete elements and addressing each element in a sequential manner is characteristic of reductionism and linearity. The reductionist approach, which in this thesis is considered as problematic, adopted by the Greek and Turkish Cypriots to negotiations with the aim of reaching a comprehensive settlement strongly resembles a similar reductionist approach adopted in 1974 when Cyprus was originally divided into two separate zones as part of an attempted solution to the dispute over control of the island.

The division of Cyprus has been preserved since 1974 and transformed into the status quo. The island remains divided and the conflict continues to be unresolved, giving impetus to the investigation of reductionism, linearity and a sequential approach as core influences in negotiation. The physical division of the island imprinted negatively on the psyche of the Greek and Turkish Cypriot sides resulting in the emergence of elements of reductionism, linearity and a sequential approach to the system of negotiations, significantly contributing to psychological divergence (fractal dimension) which transmuted into the form of entrenched and stalemated positions of the Greek and Turkish Cypriot sides between the years 2008-2014. The political and cyclical (fractal) dimension complemented psychological and mental (fractal) dimension contributing to stalemate.

### **1.1.3 Reductionism and linearity in negotiations**

The subjects of reductionism and linearity are not commonly discussed in relation to political negotiations and have not been examined in the context of the Cyprus conflict. Alternative studies in these fields provide parallel interpretations, suggesting that the linear cause-effect relationships should be marginalised in favour of non-linear and dynamical processes, such as those represented by complexity theory. As a result, the Cypriot conflict, like others, could be reframed accommodating dynamical approaches and insights (Vallacher et al., 2013).

Researchers have further highlighted the difficulties related to linear reductionist thinking in the field of peacebuilding (Ricigliano, 2015), specifically referring to descriptive analysis of conflict life cycles. The research indicates that linear interpretations of cycles of violence ranging from 'low-intensity' to 'violent conflict' and to de-escalation and 'post conflict and recovery' (Ricigliano, 2015) are inadequate when faced with the complex reality of situations like Cyprus in which any sequence of events is liable to be unpredictable, dynamic and uncertain (Ricigliano, 2015).

However, human beings tend to perceive the complex reality of their environment in a simplified manner (Aquilar & Galluccio, 2008), while international negotiations within the intractable conflicts are dynamic and typically protracted, characterized by interconnectivity between the issues (Druckman 2001; Zartman & Touval, 2010). Empirical studies indicate that negotiations conducted in an environment in which there are strong divergent views exhibit non-linear effects and properties (Gabbay, in Avenhaus & Zartman (Eds.), 2007). Linearity assumes a proportionality of cause and effect, while nonlinearity and complexity stand for the absence of such proportionality, given the divergent views, behaviours and responses of the actors (Carment & Rowlands, in Avenhaus & Zartman (Eds.), 2007; Alberts & Czerwinski, 1997). Nonlinearity stems from a sophisticated intelligence among the actors (O'Neill, in Avenhaus & Zartman (Eds.), 2007).

The political actors operating in such complex systems are the same individuals who may, by way of pattern rooted in the human psyche, simplify complexity, ambiguity and uncertainty and therefore consequently introduce policies, undertake decisions or negotiate based on a simplified perception of the world (Aquilar & Galluccio, 2008).

Negotiations are usually analysed using statistical approaches or based on strategic decision making such as 'game theory'. The statistical methods and game theoretical models assume 'linearity' or 'monotonicity' with actors aiming for optimal solutions:

*As the utility of a course of action increases, actors do not become gradually more likely to choose it but switch over abruptly as soon as it becomes optimal. (O'Neill, in Avenhaus & Zartman, 2007, p.29)*

Complex negotiations are difficult to solve with analytical approaches only (Raiffa, Richardson, & Metcalfe, 2002). The qualities of a sophisticated negotiator are essential to adequately address embedded complexities in negotiations by utilising negotiation approaches 'from different angles and with different purposes in mind' (Raiffa et al., 2002, p.85).

Zartman and Faure (2005) point out the lack of appreciation of the negotiation process as opposed to the focus on negotiation outcomes, indicating that negotiations should adapt and respond to the dynamics of the conflict (Zartman & Faure, 2005). Furthermore, conflict resolution processes contain multiple negotiation phases, varying from 'progress, stalemate, regression, progress, and so forth', emphasising that negotiation is a non-linear endeavour (Druckman & Stern, 2000, p. 311).

The following point made by Raiffa, Richardson and Metcalfe (2002) further strengthens the observation that the reductionism and linearity 'issue by issue' employed in negotiations in contexts such as the Israeli-Palestinian conflict do not reconcile with the overall embedded complexity and interconnectivity between the negotiated issues:

*The U.S. mediators did not want both sides to come to the negotiating table with fixed packages. A dance of packages had already been tried, and the gaps were formidable. The mediators tried initially to get the principals to build up a package issue by issue, but they expected that this strategy would not work - there would be too much claiming along the way that would interfere with creating joint value and too much posturing to appease the hard-liners on the negotiating teams. The mediators were right. By day two, Begin and Sadat would not talk to each other. What could be done? (p. 323)*

#### **1.1.4 Fractal dimension in negotiations**

In order to understand the problem of recursive (behaviour) patterns, it is useful to introduce the concept of fractals as an explanatory device. The concept of fractals (Mandelbrot, 1983) is not commonly discussed or referred to in political negotiations or conflict resolution. The concept is borrowed from fractal geometry (Mandelbrot, 1983), specifically referring to texture and the roughness of the texture of various physical objects and their degree of scalability and self-similarity (Cilliers, 2001; Mandelbrot, 1983).

However the concept is transcendental to other domains and able to bridge the gap between the geometry, physics, mathematics, organizational fractality and the wider world of thought (Klein & Rossler, cited in Erçetin & Banerjee, 2015; Levick & Kuhn, 2007). Fractality is also rarely explored in the context of psyche and the emergence of identity to encompass psychological boundaries (Marks-Tarlow, 2008). The current research explored fractality in the context of political negotiations in Cyprus in an attempt to establish whether a fractal structure (fractal dimensions) may have contributed for the system of political negotiations to stall periodically between 2008 and 2014.

### **1.2 Rationale of the study**

Reductionism and linearity are characteristic of the system of political negotiations in Cyprus, and arguably one of the reasons negotiations remain in stalemate. They determine the periodically static nature of the negotiations between the years 2008-2014. The other possible reason for periodic stalemate in negotiations are recursive, self-similar and scalable across the island, patterns of psychological and mental (fractal) dimension, political (fractal) dimension and cyclical (fractal) dimension.

The need for the research reported in this thesis is supported by several other reasons. The work of scholars provides a solid account with respect to traditional conflict resolution and negotiation approaches. Conventional multilateral political negotiation processes are rooted in 'principled negotiation (getting to yes)' and 'game theory' models, where the focus is on linear modes, where incremental changes aim to reduce differences between the conflicting sides or increase the value (e.g. win-win; increasing the pie) for the conflicting sides by mainly pure mathematical economic calculations. For instance, the application of game theory in political science covers overlapping issues of fair division, political economy, public choice, war bargaining, political theory and social

choice theory (Avenhaus & Zartman, 2007). However, there is inadequate coverage in the literature of complexity theory in the context of conflict resolution and negotiations. To date little work has been published on political negotiations in the Cypriot context, examining the use of complexity theory in such an intractable situation. The problems of RLS (reductionism, linearity and sequentialism) alongside self-similar, recursive patterns of thinking embedded in the Cypriot political negotiations have been extensively acknowledged by experts in the field of politics and conflict resolution. The psychological dimension, alongside the political and cyclical dimensions was also acknowledged by the same experts.

In response to linearity and reductionism, complexity theory offers a prism through which political negotiations can be viewed, understood and conducted (Gallo, 2013). The study aims to encourage the addition of holistic, supplementary forms of understanding to political negotiations in Cyprus alongside conventional linear approaches. Understanding and managing complexity could shift the thinking paradigm of participants in negotiations so that they begin to comprehend the full process of multilateral negotiations, deepening and broadening their understanding in relation to managing complexity within the context of negotiations (Zartman & Crump, 2003).

### **1.3 Problem statement**

The goal behind the research for this thesis was to determine whether political negotiations held between the years 2008-2014 were of a linear, reductionist and sequential nature (with embedded recursive patterns), preventing the sides from achieving a comprehensive settlement, and whether it is possible to introduce a game changer by viewing Cypriot political negotiations as a complex multidimensional system understood through the prism of complexity science to arrive at integrative thinking, embedding the concept of interdependence (from the Joint Declaration signed by the Greek and Turkish Cypriot sides in 2014) in future negotiation.

The research therefore sought to answer questions related to reductionism, linearity and a sequential approach embedded in the system of political negotiations between 2008-2014, which contributed to periodical stalemates and prevented, either completely or partially, the Greek and Turkish Cypriot negotiating teams from reaching a workable settlement. The study also attempted to answer questions related to recursive, self-similar patterns embedded in the system of negotiations which further contributed to stalemates in negotiations. To provide a comprehensive

answer to this question, the research included a number of literature sources and, most importantly, findings drawn from extensive discussions and interviews conducted in Cyprus in 2013 and 2014 to draw conclusions related to the factors that shaped negotiations.

#### **1.4 Research objectives and research questions**

The research reported in this thesis was based on a comprehensive interdisciplinary literature review and field interviews. The drive behind the thesis was stimulated by exploration (of the literature review) of complexity theory and literature on current negotiation processes in Cyprus. The literature gap was identified in relation to the current understanding of Cypriot political negotiations, and led to the following broad thematic questions:

- How selected aspects of complexity theory could be applied into the context of political negotiations of the intractable conflict in Cyprus, aiming to understand the nature of stalemate
- How aspects of complexity theory could improve and advance the domain of political negotiations in Cyprus

The conversion of broad thematic questions produces the following specific research questions:

***RQ1:** To what extent have elements of reductionism, linearity, and a sequential approach in the system of Cypriot political negotiations between the years 2008-2014, either completely or partially contributed to periodic stalemate/s?*

***RQ2:** To what extent did the conflicting sides adopt recursive approaches to political negotiation system in Cyprus, resulting in similar courses of action which contributed to periodic stalemate/s in political negotiations?*

Due to the United Nations limited mandate, which aims to facilitate the Greek and Turkish Cypriot negotiating teams rather than drive negotiations, the negotiating process is described as *Cypriot owned and Cypriot led*. Given this unique setting, a further question was posed:

***RQ3:** To what extent 'leverage points' can assist the Greek and Turkish Cypriot sides to move a periodically stalemated system of political negotiations in Cyprus from the state of stalemate into a state of motion?*

The research comprehensively, but also selectively, explored the notion introduced by Donella Meadows (1997) of leverage points as places to intervene in the system. Leverage points are

explored in the context of the political negotiation processes in Cyprus, which are viewed as a system.

In addressing these research objectives and questions, the study contributes to the theory and practice of political negotiation, particularly in intractable conflicts.

### **1.5 Methodology and methods: The case study**

Case study research excels at bringing us to an understanding of complex issues and can extend experience or add strength to what is already known through previous research. Case study research emphasises the detailed contextual analysis of a limited number of events. It is empirical and investigates real-life, contemporary phenomena.

The methodology has its critics, who believe the small sample and intense investigation lead to bias, and would prefer case studies were used only as exploratory tools. Researchers in all disciplines continue to use the case study, however, to look deeply into real life issues. The studies generally follow a fairly defined pattern of:

- determining the research questions
- selecting the case(s)
- gathering data in the field
- evaluating and analysing the data
- preparing the report.

The finer aspects of case study methods will be discussed in detail in Chapter 2.

#### **1.5.1 The real-life context of the case study**

The Cypriot conflict is notable for its intractability and complexity. Negotiations in the Cypriot context are depressingly similar, with little progress and extensive periods of stagnation and stalemate. The time frame selected for the purpose of the research (2008-2014) is important as it encompasses a period (sample tissue) with varied scenarios and degrees of complexity in an attempt to reach a comprehensive settlement. This period is viewed as the two fold phase, the phase between 2008-2012 and subsequent phase between 2012-2014. During the first phase between 2008 to 2012, the Greek and Turkish Cypriots experienced some degree of progress and the *Convergence Paper 2008-2012* was produced. The *Convergence Paper* explicitly outlines areas of



convergence (agreement) as well divergence (disagreement) by the Greek and Turkish Cypriots alike on disputed issues. Even though the *Convergence Paper* was produced, the sides could not reach a comprehensive settlement.

The second phase between the years 2012 up to 2013, mainly represent a two year period of stalemate between the sides. However, the phase between mid 2013 to February 2014 saw the parties drafting a Joint Communiqué which was officially adopted on 11<sup>th</sup> February 2014. The Communiqué outlined an agreement between the Greek and Turkish Cypriot sides to resume structured negotiations which had been stalled since 2012. The Communiqué explicitly included a characteristically distinctive approach of *interdependence* (UNSC, 2014, A/69/2, p. 57), where the sides agreed that:

*All unresolved core issues will be on the table, and will be discussed interdependently.*  
(Christou, 2014)

Even though the Greek and Turkish Cypriots resumed negotiations post February 2014, by the middle of the year negotiations had stalled. The period of after February 2014 was outside the scope of the research, and therefore it is not the intention of the researcher to reflect any further on this.

### **1.5.2 Theoretical framework and literature review**

The theoretical framework for the research was derived from an interdisciplinary literature review. The research involved an expanded theorem of complexity theory, building upon the existing knowledge of conflict resolution, with specific reference to political negotiations in intractable conflicts, the case study of Cyprus. The intent of the research was to expand the boundaries of the current understanding of the political negotiation processes in Cyprus.

Examination of the negotiations through the lens of complexity theory was a central aim of the research and an essential stage to further enhance and enrich understanding of political negotiations in Cyprus. Exploration of aspects of interconnectivity explained by complexity theory and the concepts of leverage points may serve to initiate a paradigm shift and bridge the gap between reductionism, linearity, the divergent, entrenched positions of the sides, predominantly driven by psychological dimensions, alongside political and cyclical dimensions and emerging philosophies that are yet to overcome the fragmented thinking characteristic of the Cypriot negotiations. It is

hoped that the the results of the research will provide a multidimensional, integrative approach for further research in the context of political negotiations within intractable conflicts across the world. Therefore, better understanding and advancement of complexity theory within political negotiations in Cyprus may contribute to the production of novel and innovative thinking among Greek and Turkish Cypriot negotiation practitioners.

The research is complemented by the multifaceted work of scholars from the field of complexity science, systems thinking and systems dynamics, directly and indirectly associated with disciplines in conflict resolution.

Furthermore, the research considered the systems thinking approach, specifically the notion of leverage points introduced by Donella Meadows (1997). The concept was explored and applied to the context of political negotiations in Cyprus, along with elements of patterns of thinking and principles of leverage in learning organisations (Senge, 2006).

Little or no work has been done on using complexity theory in the context of political negotiations in intractable conflicts, and very little evidence was found in which the researchers explored political negotiations in the context of complexity theory in Cyprus. Therein lies the original knowledge contribution the research makes.

## **1.6 Limitations of the study**

Despite the fact that reductionism and linearity in the academic literature has been addressed in various disciplines, nevertheless the debate around these concepts has been limited and not found in the context of Cypriot negotiations. Similarly, the contribution of complexity theory applicable to the context of the Cypriot negotiations and conflict was not found.

The case study of Cyprus was carefully selected due to the ongoing intractability of the conflict and periodical stalemate in political negotiations. The scope of the research study was restricted to understanding RLS (reductionism, linearity and a sequential approach) to political negotiations alongside recursive patterns (fractal dimension) and leverage points, as well as aspects of complexity theory solely within the parameters of the Cypriot political negotiations.

The research process was qualitative in nature and sought to apply elements from complexity theory to a process of negotiations, which was characterized by reductionism, linearity and a sequential approach to political negotiations in an attempt to understand more fully the reasons for

the periodical stalling of the negotiations between the years 2008-2014. Therefore, the boundary of the research contributed to limitations and impacted the results and findings of the case study.

Having introduced the rationale of the research and the leading questions it is useful to outline the structure of the thesis in following chapters.

## **1.7 Structure of the thesis**

**Chapter 1** of the thesis introduces the current research study followed by the (brief) context/background of the intractable Cypriot conflict and attempts at resolution through negotiations. The chapter also focuses on an existing theoretical gap in this field of knowledge (bridges the gap between political negotiations and complexity theory) which attempts to understand to what degree reductionism, linearity and (sequential manner) to political negotiations led negotiations to periodic stalemate/s and how aspects from complexity theory could provide/contribute to a novel platform of thinking for political negotiations in the context of the intractable Cypriot conflict. The chapter introduces research problem followed by research objectives and questions. The chapter correspondingly discusses theoretical foundations, justification of the study and an overview of an adopted research methodology.

**Chapter 2** presents a research methodology and research design for this study. The ontology and epistemology is discussed. This chapter justifies reasons for choosing the case study approach. The case study research is of a qualitative, exploratory, and of an interpretative nature.

**Chapter 3** continues the literature review by examining the contextual background of the Cypriot conflict and negotiations. The chapter then shifts its attention to examination/exploration of political negotiations conducted between the years 2008-2014 for the purpose of establishing a core foundation of the research study. The chapter focuses on identifying elements of reductionism and linearity in political negotiations in these years. The chapter concludes by identifying a theoretical gap in political negotiations within the context of complexity theory.

The literature review in **Chapter 4** extensively covers theoretical perspective of complexity theory. It begins with a general understanding of complexity theory and shifts discussion to specific aspects applicable to the context of negotiations. The chapter pays special attention to concepts of connectivity and interconnectivity, dynamicity, autonomous independent systems, emergence, fractals and self-similarity, and self-organization. A thorough discussion of complexity concepts derived from a vast range of disciplines offers parallels for the political negotiation system within

the Cypriot intractable conflict. The chapter concludes with a theoretical foundation and conceptual framework for the research study.

**Chapter 5, Chapter 6 and Chapter 7** present findings, results and discussion for research questions 1, 2 and 3 respectively. The chapter presents an explorative nature to addressing research questions. The study research includes interviews with expert practitioners and Greek and Turkish Cypriot experts in the field of politics and conflict resolution. The collected views, insights and perceptions have been used for data analysis. The chapter concludes with the summary of the findings.

**Chapter 8** explores Cypriot political negotiations in the context of complexity theory as per the research objective of this study. It specifically applies aspects of complexity theory to political negotiations for the purpose of conceptualizing a framework. The focus of this chapter is to view political negotiations in Cyprus through the lens of (the aspects) complexity in the form of hybridization.

**Chapter 9** presents the conclusions of the thesis. The chapter focuses on providing benefits that complexity theory offers to political negotiations in Cyprus. The chapter focuses on a connected and integrative understanding of negotiation system. The chapter summarizes contributions both to theory and practice in the field of complexity theory and political negotiations in Cyprus. The chapter provides insights on limitations of the study and directions for an ongoing research in the future.

In summary, the reported research explored reductionism, linearity and a sequential approach in the system of the Cypriot political negotiations. The research was qualitative and of an exploratory nature. The case study method was adopted to generate data, along with aspects of phenomenology. The research attempts to answer questions around reductionism, linearity, and the sequential manner of political negotiations regarding Cyprus and the potential leverage to be introduced to the negotiating system. The research study results, findings and discussion form the basis for a potential shift in perception and thinking with respect to the Cypriot political negotiations.

## **Research methodology and methods**

The following chapters explore aspects of complexity theory identified from a multidisciplinary literature review and the application of these features in the context of Cypriot political negotiations, with the current chapter focussing on the research methodology and methods used to conduct the research. It begins with the research questions which define the research paradigm and the research objectives. This is followed by an examination of the ontological and epistemological nature of political negotiations.

The research focussed on aspects of political negotiations in Cyprus in the context of complexity theory. Of particular interest is how reductionism, linearity and a sequential manner, as well as self-similar recursive patterns embedded in the system of negotiations, contributed to periodical stalemates in negotiations between the years 2008-2014. A logical inclusion in this investigation was to look at how the introduction of leverage points into the system of negotiations might assist in moving the negotiations from stalemate into a state of motion and fluidity.

The chapter also explains why the qualitative case study and aspects of phenomenology were chosen as appropriate methodologies for this research, as well as detailing the research design, data analysis procedures, validity of the results and limitations of the case study approach. Also noted are the ethical considerations taken into account during the course of the study. Exploration of complex phenomena, such as political negotiations in Cyprus between 2008 and 2014, justified the exploration of complexity theory and the use of case study methodology.

### **2.1 Methodology and research design**

#### **2.1.1 Complexity lens**

The nature of this thesis is rooted in the intractable social dilemma. The thesis explores political negotiations in Cyprus between the years 2008-2014 through the lens of complexity. Thus, the adoption of a complexity lens with which to examine the context of political negotiations in Cyprus holistically shapes the contribution to knowledge. The research bypasses existing conventional theories on negotiations to explore political negotiations in Cyprus from the viewpoint of aspects of complexity theory from within multidisciplinary fields. For the purposes of the research, the

complexity lens was drawn from multidisciplinary research conducted by complexity scholars, which indicates that complex systems encompass large numbers of elements which dynamically and unpredictably interact with each other to create the whole. The political negotiations regarding Cyprus have been viewed as a complex system encompassing numerous, autonomous systems and subsystems interacting with each other in unpredictable and dynamic ways.

### **2.1.2 Exploratory and explanatory and (interpretative) nature of the study**

The research is of a qualitative, exploratory, explanatory and interpretative nature, and is based on a case study of political negotiations in Cyprus conducted between the years 2008-2014. The research questions incorporate an element of 'what', which suggests that the research is of an exploratory nature, while questions posed during interview proceedings in Cyprus incorporated elements of 'how' and 'why', suggesting that the research is of an explanatory nature (Yin, 2003, pp.6-7). Questions incorporating 'how' and 'why' were asked about the events prior and post 1974 related to the Cypriot conflict and political negotiations for the purposes of revealing an implicit narrative.

The interpretative nature of the research is reflected in the researcher's ability to present and interpret data provided by the interviewees. Qualitative, interpretative research acknowledges the importance of 'language' as well as 'issues of power, authority, and domination in all facets of the qualitative inquiry' (Creswell, 2007, p.248).

## **2.2 Ontology and epistemology of political negotiations**

The methodology of the research exposes the phenomena of complex systems in the context of a social dilemma. The subject of the research was the system of political negotiations in Cyprus. It is therefore vital to understand the philosophical principles guiding the research.

### **2.2.1 Ontology**

Ontology is one of the areas of the social sciences that explores the nature of reality, which is the main characteristic of ontological inquiry (Creswell, 2007, pp.16 & 248). According to Crotty (1998), 'ontology is the study of being' (Crotty, 1998, p.10). The ontological perspective is therefore concerned with the reality of the world and the essence of existence, where it mainly explores meaningful reality as a means by which to understand the existence of realities beyond the human mind (Crotty, 1998; Marsh & Stoker, 2010). For example, some philosophers argue that the

existence of the world was prior to the development of the human being. That is, whether human beings were consciousness of the world or not, the world existed. The argument about a world without human beings stretches to further queries about whether the world was meaningful prior to human existence and whether the meaning of the world emerged out of human interaction with it. Some philosophers imply therefore that meaning was created when human beings made sense of the world (Crotty, 1998, p.10).

The ontological dimension of the research offered multiverse realities and the perceptions of interviewees to form the basis for identification of the themes out of which excerpts have been presented in Chapters 5, 6 and 7 (Creswell, 2007, p.17). The perceptions, alongside the realities reported by interviewees to the researcher (in conjunction with the multidisciplinary views of complexity scholars), and the researcher's interpretations form the fundamental basis for results, discussion and findings. The interpretivism finds its roots in an ontological inquiry where the social reality generates 'meanings for actions and situations' (Crotty, 1998, p.11). However, Guba and Lincoln note that 'the existence of a world without a mind is conceivable. Meaning without a mind is not' (Crotty, 1998, pp.10-11).

**The political ontology.** The research considered elements of politics, and therefore the central inquiry for the researcher was political, with a complexity emphasis. (Marsh & Stoker, 2010). Therefore, the key ontological questions related to the nature of the system of political negotiations in Cyprus. To address the question, Marsh & Stoker (2010) point out that 'the definition of political sees it as a social process that can be observed in a variety of settings' (p.7). The authors specifically note that:

*politics is about more than what governments choose to do or not do; it is about the uneven distribution of power in society, how the struggle over power is conducted and its impact on the creation and distribution of resources, life changes and well-being. (p.7)*

### **2.2.2 Epistemology**

Epistemology is concerned with meaning and knowledge (Colby, Jessor, & Shweder, 1996). The discovery of meaning and knowledge can be achieved through research in the field through observation 'which makes sense of as much as possible of what they have seen as [one has] observed' (Colby et al., 1996, pp.55-56). For this research, the observation took place in Cyprus.

Epistemological questions posed were: What are the relations of the interviewees to the conflict and political negotiations in Cyprus? How have the events in Cyprus unfolded and shaped the perceptions of the interviewees?

Interestingly, Diesling (cited in Colby et al., 1996) points out to the following:

*the point is not to prove, beyond doubt, the existence of particular relationships so much as to describe a system of relationships, to show how things hang together in a web of mutual influence or support or interdependence or what have you, to describe the connections between the specifics the ethnographer knows by virtue of having been there. (p.56).*

Diesling (cited in Colby et al., 1996) also note that:

*being there produces a strong belief that the varied events you have seen are all connected, which is not unreasonable since what the fieldworker see is not variable or factors that need to be 'related' but people doing things together in ways that are manifestly connected. (p.56)*

Colby et al. (1996) further point out that researchers who gather data in the field (fieldworker) cannot isolate themselves from incoming abundant data, as they are exposed to seeing and hearing things around them related to the studied case. The researchers further note that experienced researchers take notes or record incoming information from what they hear or see. This teaches them to be aware of additional layers of knowledge which they might have not anticipated acquiring (Colby et al., 1996, p.56).

When in the field, researchers focus on reflecting the realities of social life (Colby et al., 1996, p.97). The studied realities affect researchers' life realities, constraining them in terms of what they can do (Colby et al., 1996, p.57). The point of view of the interviewee is well captured by researchers, as they acquire diverse points of view from others.

Thus, social researchers capture the points of view of interviewees, which are later analyzed (Colby et al., 1996, p.57). Although the interviewees (key actors) interpret their experiences as they talk, it must be acknowledged that the accuracy of their interpretations lies in the point of view and upon understanding of the researcher, who not only observes, but discusses, both formally and informally, the events reported by the interviewees. Observing, listening, discussing, querying,



these are all done in order to give meaning to events and objects, while establishing the points of view of the key actors, and their accuracy (Colby et al., 1996).

Thus, ethnographic epistemology is first and foremost concerned with investigating the point of view of those who are being studied. In this research case study, the investigation was of political negotiations in Cyprus and the various actors involved (Colby et al., 1996). Moreover, the authors note that the viewpoints, observations and interpretations of the studied actors may not be consistent with the objective facts. The views of the actors may change and often the actors themselves are not always sure as to the meaning of events, and their interpretations might be vague, abundant in interpretations or uncertain. The researcher should respect confusion and vague interpretations from the point of view of investigated actors, although this causes the researcher difficulty when attempting to correctly describe and assess the object being studied (Colby et al., 1996).

Researchers in the social sciences are criticized for being ‘as undecided as the actors we study’ (Colby et al., 1996). If the findings and the conclusions of the research are ‘shaky, controversial, or open to question’ (p.60), so the researcher should be feeling the same.

*And we should do that even if what we are studying is a historical controversy whose outcome we now know, even though the actors involved at the time couldn't. Conversely, if the actors involved think the piece of science involved is beyond question, so should we.*  
(p.60)

The qualitative research from the point of view of epistemology should by no means invent the view point of the actor, but rather it should only attribute to actors those ideas and the perceptions they hold, if the researcher is interested in understanding the actors ‘actions, reasons, and motives’ (p.60). The authors interestingly note that the studied actors are those people who find interviews to be an escape from their local society or culture, and perceive the ethnographer as somebody who is willing to help them escape. And researchers attempt to capture breadth in their field work, that is, ‘to find out something about every topic the research touches on, even tangentially’ (p.65).

## 2.3 Phenomenology

### 2.3.1 Appreciation of the philosophy based on phenomenology

Descriptions of phenomenology focus on the ‘profound lesson for all inquiry’ (Derrida, 1999, p.71). In order to understand the ‘beyond’ as opposed to what is known, a human being needs to be receptive to the difference of the ‘beyond’ (the unknown) understanding and the difference created to what is known. Therefore a question is posed about how it is possible to transcend ‘individual, social, cultural and historical bounds?’ (Barnacle, 2001, p.v). There are several definitions of phenomenology. Pollio and the co-authors define phenomenology as the ‘significant description of the world of everyday human experience as it is lived and described by specific individuals in specific circumstances’ (Pollio, Henley, & Thompson, 1997, p. 28).

The meaning of the word ‘phenomenology’ is derived from Greek, a combination of the words ‘phenomenon’ and ‘logos’, meaning ‘the study of phenomena’ (Barnacle 2001, p.vi). There is no limit on what phenomena should be the subject of a study. This, therefore, naturally implies that the subject of the inquiry in terms of phenomenology is boundless. It has been further asserted that ‘our ideas, our values, our acts, even our emotions are, like our nervous system, cultural products’ (Geertz, 1965, cited in Barnacle, 2001, p.vi). These products can act as a barrier or screen from the everyday world and may well inhibit what sense is made of the experience’ (p. vi). Max van Manen maintains that the validity of:

*making something of a text or of lived experience by interpreting its meaning is more accurately a process of insightful invention, discovery, or disclosure – grasping and formulating an ... understanding is not a rule-bound process but a free act of ‘seeing’ meaning. (van Manen, cited in Barnacle, 2001, p.79)*

An openness towards ‘the voice of the text’ is required by the researcher, since the ‘text’ is seen as dynamic and living as new insights and understanding are gleaned outside the text under the magnifying glass of inquiry. This is defined by the Hans-Georg Gadamer as something that is ‘joining, or fusing, of horizons between researcher and participant’ (Barnacle 2001, p.viii). And therefore it can be seen as something as ‘engendering a process of open dialogue between interpreter and text’ (p.viii).

### 2.3.2 Hermeneutic phenomenology

Phenomenology defines meaning and understanding through the search of the unknown. According to Barnacle (2001), phenomenology ‘offers something unique’ (p.4). ‘It directs thought toward, in the words of Edmund Husserl, ‘the things themselves’’ (p.4), and is divided into three types, such as hermeneutic phenomenology, existential phenomenology, referring to the psychology, sociology, the human sciences and interpretative sociology. Hermeneutic phenomenology – the essence of the foundations of knowledge – preoccupied Descartes and other philosophical thinkers of the sixteenth and seventeenth century. The foundation of the essence of knowledge, or, in other words, ‘knowledge claims’ commonly refers to a common sense and sensory perception. However, these claims are undermined by the notions of reality and illusion. A common sense understanding that a chair or a house exist is based on sensory perception.

However, it was argued that knowing ‘with absolute certainty between reality and illusion is something that our senses alone cannot do, and this means that in terms of providing us with knowledge they are not beyond doubt’ (Barnacle, 2001, pp.4-5). It was the fact that doubt existed around the difference between reality and illusion that was of concern to Descartes, who therefore concentrated his attention on the mind of human beings – the internal world of human beings (Barnacle, 2001, p.5). Descartes’s famous dictum therefore was ‘I think; therefore I am’ (p.5), and the notion of ‘I think’ becomes the essence of the epistemological certainty (p.5).

According to Descartes, this overcomes the ‘problem of fallibility of the senses’ (p.5), asserting that the ability to think is possible separately of the sensual experience (p.5). This hypothesis further asserts that ‘epistemological certainty is possible but only on the basis of separating thought or consciousness from the world of senses (p. 5). In Cartesian thought, cognitive thinking is superior to sensory perception and sensory perception becomes secondary (p.5). Descartes thus unleashed the concept of a mind/body and subject/object dichotomy (p.6). This has led to the inquiry.

*For if all we can be certain of is the fact that we are conscious—and conscious only of internal mental processes—how can we claim to know anything about the outside or sensual world? In other words, if the knowing subject can only have certainty of themselves as a subject who is conscious, how can they claim to know anything about the world around them?—even if it exists at all? This is no minor problem. It challenges the*

*very foundations of knowledge (those same foundations that Descartes was trying so desperately to secure). (p.6)*

It was in the twentieth century that Edmund Husserl developed a parallel model to Descartes's theory and called it phenomenology, that is, the study of phenomena (Barnacle, 2001, p.6). Instead of separating the subject (knower) and the object (known), Husserl never considered a 'thought' nor an 'object' of knowledge in isolation. He looked at the relations between consciousness and objects of knowledge – firstly at the relation and secondly the role of the object in that relation (p.6), and turned his attention to 'things themselves' (p.6). In other words, Husserl focussed on the perspectival nature of understanding (Barnacle, 2001).

During the research in Cyprus in 2013 and 2014, the researcher explored the 'beyond' (Derrida, 1999, p.71) during data collection and observations. The subject of inquiry (Barnacle, 2001; Geertz 1965) was the system of political negotiations (2008-2014). During the interviews and observations, the researcher was open to voices, insights and perceptions (Barnacle, 2001), which created an intimate and open dialogue (Barnacle, 2001) between the researcher and the interviewees. Throughout the substantial literature review, the researcher carefully examined and attempted interpreting the meaning behind the text of the Cypriot conflict and political negotiations (van Manen, 1990). The researcher followed Husserl's advice not to separate an 'object' and 'thought' (Barnacle, 2001, p.6).

## **2.4 Case study methodology**

The methodology adopted to address the research questions and achieve the objectives was a combination of case study and phenomenological inquiry. The narrative of the political negotiations in Cyprus between the years 2008-2014 was the case study, which was qualitative in nature. The nature of case study methodology continues to be debated since some researchers see it as simply 'a choice of what is to be studied', envisioning the case within a bounded system (Stake, cited in Creswell, 2007). Various other authors assert, however, that the case study can be an inquiring comprehensive research strategy or a methodology (Denzin & Lincoln, 2005; Merriam, 1998; Yin 2003), and is a valid part of a qualitative study or 'an object of the study' (Creswell, 2007, p.73).

From a theoretical perspective, the case study reported in this thesis describes a bounded system (Creswell, 2007). Therefore, exploration of the particular case selected for the research was comprehensive and data were detailed. Collection involved 'multiple sources of information' (Creswell, 2007), including 'observations, interviews, audio-visual material, documents and reports' (Creswell, 2007). The case study approach is common in the social sciences, predominantly due to its initial popularity in psychology, where it was used by Freud, and in medicine, law and political science. Therefore, the case study approach has a rich history and appears widely in various disciplines. Historically, the case study approach can be found in anthropology and sociology (Creswell, 2007), as well, and data can be both quantitative, as well as qualitative (Yin 2003; Creswell 2007). The qualitative approach to a case study has an explanatory, exploratory and descriptive component (Creswell, 2007). Merriam (1998) promotes the case study approach in education (Creswell, 2007). Stake (1995) promotes a multi case study approach and establishes procedures for case studies in his example 'Harper School' (Creswell, 2007).

Yin (2009) explains that a case study approach is characterized by 'how' and 'why' elements of inquiry related to a specific 'set of events over which the investigator has little or no control' (Yin 2009, p.13). Yin (2003) further asserts that the research strategy of case studies is an 'empirical inquiry that investigates a contemporary phenomenon within its real-life context, especially when the boundaries between phenomenon and context are not clearly evident' (Yin 2003, p.13). A case study:

*investigates a contemporary phenomenon within its real-life context, especially when the boundaries between phenomenon and context are not clearly evident. ( p.13)*

Yin (2003) further suggests that the case study approach specifically aims to discover highly pertinent contextual conditions (p.13), and the boundary between phenomenon and context is blurred. This is specifically seen in the historical context, where historical conditions are intertwined with contemporary, as well as non-contemporary events. The fact that phenomena and context are rarely distinguishable leads to the technical definition of a case study:

The case study is an inquiry that:

- copes with the technically distinctive situation in which there will be many more variables of interest than data points, and as one result

- relies on multiple sources of evidence, with data needing to converge in a triangulating fashion, and as another result
- benefits from the prior development of theoretical propositions to guide data collection and analysis.

The reasons why the case study approach was adopted for the present research are fivefold. Firstly, the case study explains the ‘causal links in real life interventions that are too complex for the survey or experimental strategies’ (Yin, 2003, p.15). Secondly, the case study describes an intervention and the real life context in which it occurred. Thirdly, case studies can illustrate certain topics within an evaluation, again in a descriptive mode. Fourthly, the case study strategy may be used to explore those situations in which the intervention being evaluated has no clear, single set of outcomes. Fifthly, the case study may be a meta-evaluation, a study of an evaluation study (Stake, 2010).

*The case studies can be written from different angles and for various motives which include the simple presentation of individual cases or the desire to arrive at broad generalizations based on case evidence. (Yin, 2003, p.15)*

The case study focused on ‘investigating an empirical topic by following a set of pre specified procedures’ (Yin, 2003, p.15), and these values were adopted during the investigation. To justify a selected methodology, an appropriate comparison between a phenomenological and positivist paradigm was adopted, followed by the analysis of the research methodologies as appropriate.

## **2.5 Research method**

### **2.5.1 Collecting data**

Research involving case study methodology requires the researcher to use and develop investigation skills during data collection (Yin, 2003). Yin (2003) outlines the following attributes required for the researcher when collecting data, pointing out that a good case study investigator should:

- be able to ask good questions – and interpret the answers
- be a good ‘listener’ and not be trapped by his or her own ideologies or preconceptions
- be adaptive and flexible, so that newly encountered situations can be seen as opportunities, not threats

- have a firm grasp of the issues being studied, whether this is a theoretical or policy orientation, even if in an exploratory mode, in order to reduce the relevant events and information to manageable proportions
- be unbiased by preconceived notions, including those derived from theory, as well as sensitive and responsive to contradictory evidence (Yin, 2003, p.59).

Prior to collecting data in Cyprus, large amounts of effort and preparation were put into determining and formulating specific research questions (Leenders, Mauffette-Leenders & Erskine, 2001; Yin, 2003). The literature review provided the researcher with substantial information in relation to the conflict and political negotiations and related issues prior to the first field trip to Cyprus. The fundamental knowledge from the literature later translated into the researcher's ability to 'create a rich dialogue' with interviewees (Yin, 2003, p.59). During the interviews on location in Cyprus in 2013 and 2014, the researcher employed Yin's (2003) approaches as outlined above, which can be summed up as asking 'good questions', listening carefully to the interviewees, adopting flexible approaches with interviewees, adaptability, having a good grasp of the studied issues, exercising an unbiased approach, being sensitive and responsive to contradictory evidence (Yin, 2003). Being able to employ these attributes assisted the researcher to explore deeper layers of the subject being investigated and gain substantial amounts of knowledge, as well as explore additional avenues related to the studied subject.

### **2.5.2 Interview protocol**

The interview protocol was based on the interdisciplinary literature review and theoretical constructs. Preliminary conversations with academic and political figures were held prior to interviews in Cyprus in order to ensure that the relevance of theoretical constructs based on the literature review would be embedded in the interviews.

On the whole, the researcher undertook an 'elite' approach to the interviews. The researcher interviewed 'elite individuals' who were 'considered to be influential, prominent, and/or well informed in an organization or community; they are selected for interviews on the basis of their expertise in areas relevant to the research' (Rossman & Marshall, 2006, p.105). That is to say, only those leading figures with an intimate knowledge of the Cyprus conflict and its stalemate condition were sought out for in depth interviews. During the two separate trips to Cyprus, the interview questions were of an open ended nature. The interview questions were directly related to the subject of inquiry.

In addition to the open ended questions, the researcher took the liberty of posing direct questions relating to the interviewee's responses. The interviewees were highly familiar with the subject of the inquiry, i.e., the system of political negotiations and conflict in Cyprus (Rossman & Marshall, 2006, p.105), and were able to provide abundant insight and context rich information and knowledge with the researcher. As a result, comprehensive, in-depth interviews were able to be conducted during two separate trips to Cyprus. At all times, the researcher remained neutral during the interviews, the data analysis and the writing of the conclusions.

### **2.5.3 Conducting the interviews**

Interviews were conducted in two separate field trips to Cyprus in 2013 and 2014. They were preceded by consultation with a UN representative in order to determine who would be the most appropriate people to interview in terms of expertise and knowledge on issues related to the Cypriot conflict and negotiations. The UN representative provided a list of the most appropriate contacts, ensuring equal numbers of participants from both sides of Cyprus (to avoid bias).

**Confidentiality.** The researcher was advised to contact potential interviewees via email or phone. Prior to sending an introductory email to the potential interviewees, the content of the email was verified and validated by the UN representative, and only after a thorough verification of the content of the email, was it sent to the interviewees. Once a potential respondent indicated their willingness to be interviewed, appointments were scheduled accordingly.

Prior to their first interview, each participant was provided with a physical copy of a Participant Information Sheet encompassing all the necessary information about the study as per ethics requirements (see Appendix A). Due to political sensitivity on the island, confidentiality, anonymity and privacy (measures) were ensured throughout the course of the research conducted on Cyprus, as well as throughout the entire course of the PhD and post research period. The names and rank positions are therefore not revealed in the thesis or in the stored files due to confidentiality measures. The study and the content of the interview questions were approved by the Human Research Ethics Committee, The University of Adelaide (Ethics Approval Number, Project No H-2013-031; see Appendices B and C). The Contacts for Information on Project and Independent Complaints Procedure are in Appendix D.



The interviews consisted of open-ended questions and conversations with the participants (Thompson et al., 1989). They were carried out in a manner to ensure positions of equality, namely each participant received equal treatment and understood the researcher's goals, the topic and the relevant themes, especially those concerning issues related to Cypriot political negotiations. Interviewees were invited to provide their insights and views on the Cypriot conflict and political negotiations, as well as additional information as required with spoken prompts, such as 'could you please explain about this issue more', 'could you clarify', 'could you give me an example' and so forth. The Interview questions are in Appendix E.

**The interview process.** The study participants were, by and large, interviewed face-to-face in their offices in a confidential atmosphere on both sides of Cyprus (the Republic of Cyprus and the Turkish Republic of Northern Cyprus). Some participants preferred for an interview to be held on a more neutral territory, such as in the café or in the foyer of a hotel, either on the Greek or the Turkish Cypriot side of the island.

Some participants expressed their willingness to be interviewed at the Home for Cooperation, located in the neutral territory (buffer zone) between Greek and Turkish Cypriot check points in the heart of Nicosia and administered by the United Nations. (The Home for Cooperation is a buffer zone accessible to all people on the island and serves as a key point of contact between Greek and Turkish Cypriots. It is a location where members of the communities can engage in order to promote peacebuilding, intellectual dialogue and cooperation. 'It encourages people to cooperate with each other beyond the constraints and dividing lines (Home for Cooperation, 2015, online). A number of interviews were conducted on the UN premises within the buffer zone, and two interviews were held in the participants' homes.

During the course of the research, the researcher resided in one of the UN premises in the buffer zone, and was granted special permission allowing for entry and exit to the buffer zone as required.

The total number of interviews was 65, although the total number of participants was only 25. The reason for this was that on a number of occasions an interviewee was only available for a limited amount of time due to work commitments or a busy travel schedule. In these circumstances additional interviews had to be scheduled. The interview participants were highly ranked individuals in the fields of politics, negotiations, academia and the UN.

The interviews lasted between half an hour and two hours, and were audio recorded. All the interviews were solely transcribed by the researcher to guarantee confidentiality and privacy. Transcription of the interviews lasted six months. The collected data was identified using the following method of classification:

Case name – The Case Study of Cyprus

Coded name – Anonymous/numbering

Interview location – Cyprus (varied)

Face-to-face

Duration – 30 minutes to 2 hours

## **2.6 Triangulation**

Rossmann and Marshall (2006) indicate that multiple sources of data are ‘used to corroborate, elaborate, or illuminate the research in question’ (Rossmann & Marshall, 2006, p.202). Deriving data from multiple sources substantially ‘strengthen the study’s usefulness for other settings’ (p.202). In support, Yin (2003) indicates that multiple sources of gathered data increase the overall quality of a case study (p.99).

To achieve triangulation (multiple sources into a point of convergence) (Rossmann & Marshall, 2006; Yin, 2003), the data presented in this thesis were confirmed through cross verification of the multiple insights and views of the interviewees in order to maintain an integrated and coherent case study.

The researcher used multiple sources of evidence, including interviews conducted in Cyprus during 2013 and 2014. The views and insights on the political negotiations and the conflict provided equally by Greek and Turkish political figures and academics, along with UN experts from various divisions of the UN, and civil society persons from both sides of the island were compared to cross check the data, and assist the researcher in avoiding bias.

In addition to the primary data, triangulation was supplemented by secondary data collection, which included investigation of UN documentation provided to the researcher. The documentation was highly confidential in nature and only a temporary viewing and limited access were allowed to the researcher. Documents were returned the same day (everyday) as per UN protocol.

Since the data collection was conducted in Cyprus during 2013 and 2014, the researcher adhered to the (ethnographic) epistemological inquiry. Numerous observations were made during the stay in Cyprus, mainly during face-to-face interviews, discussions and meetings with key Greek and Turkish political figures and academics, UN experts, and persons from within the Greek and Turkish Cypriot civil society. Observations were also conducted during UN meetings (although access was limited for reasons of confidentiality). General observations were also made in relation to the workings of the UN, although exposure to UN work was also limited. Observations were also made in relation to the actual physical division of the island during a tour of the buffer zone in Nicosia organized by the UN in 2014. Generic observations were made in relation to the overall dynamic of the divided island during the stay in 2013 and 2014 and the behaviour of both communities towards each other was also not insignificant.

The following section describes techniques adopted for the purpose of analysis of the collected data.

## **2.7 Data analysis (content analysis)**

The following section explains how data analysis was conducted using content analysis, coding, editing, and iterative explanation building.

### **2.7.1 Content analysis**

An interpretivist approach was adopted for the analysis of the data, which took place once the researcher had returned to Australia. Observations made during the two trips in Cyprus were complementary to the research analysis (Rossman & Marshall, 2006, p.156). The following approach was adopted in light of the sensitivity of the content of the data:

*the researcher should use preliminary research questions and the related literature developed earlier in the proposal as guidelines for data analysis. This earlier grounding and planning can be used to suggest several categories by which the data initially could be coded for subsequent analysis. (p.156)*

**Editing approach.** As suggested by Rossman and Marshall (2006), the collected data were read through multiple times prior to analysis. Thereafter, the interview responses were interpreted and information considered important in the context of the research was highlighted (Rossman & Marshall, 2006). The researcher was open to the subtle language patterns that emerged to produce

meaningful sections of information (Rossman & Marshall, 2006) which were cut, pasted and rearranged as text (Crabtree & Miller, 1992) in a cyclical fashion. Analysis of the text allowed common phrases, connections and developing themes among the data to be identified. The content analysis and editing established and defined relationships, which resulted in a credible interpretation of the data out of which the themes emerged (Rossman & Marshall, 2006).

### **2.7.2 Transcription and coding**

The collection of data was conducted during two trips to Cyprus in 2013 and 2014. All interviews were transcribed by the researcher alone using *NVIVO* software, followed by application of a coding technique. The technique focused on the following levels of coding, *open*, *axial* and *selective*:

*Open coding*: Open coding is used to identify data suitable for further analysis. Provisional and tentative codes are regarded as open to all possible theoretical directions observed in the data (Charmaz, 2006; Saldaña, 2009).

*Axial coding*: Axial coding is designed to confirm the properties and dimensions observed in the data by examining it for evidence of when, how and why something was happening, and whether it was happening in the way indicated by the open coding (Saldaña, 2009).

*Selective coding*: Selective coding integrates all other codes and categories in order to identify a core category or essential theme. As Strauss (1987) explains, this final cycle of coding puts ‘analytic meat on the analytic bones’ (p.245).

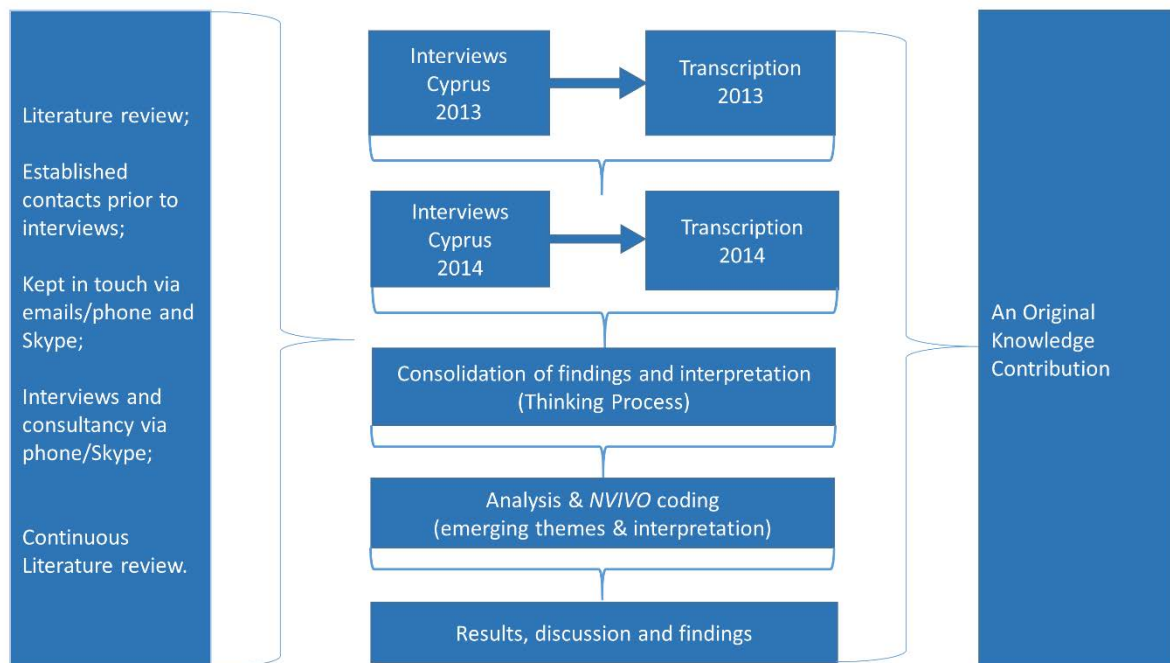
The coding process was solely administered by the researcher despite encouragement for a collaborative approach by various authors (Miles & Huberman, 1994; Saldaña, 2009). No third parties were involved in the process of coding. This was because the:

- interviews were confidential due to the political sensitivity on Cyprus
- interviewees were highly ranked politicians and academics from both sides of the divided island, as well as UN representatives who had direct or indirect involvement in the system of political negotiations
- interviewees expressed openly their unwillingness to be identified in the research in any form. High levels of confidentiality, anonymity and secrecy were therefore maintained at all times throughout data collection, analysis and throughout the course of the PhD and beyond

- information (insights and views) provided by the interviewees was of a politically sensitive nature, and preservation of confidentiality was of the highest priority, given the trust the participants placed in the researcher
- the study was exploratory and explanatory, and involving third parties in the process of transcription and coding could have exposed the data to misinterpretation by assistants inexperienced in the research area. No one but the researcher had been present in Cyprus or attended the interview sessions.

Misinterpretation of the data could have posed a significant risk to the study due to a possible shift in the overall construct of the research. To support this argument, Lampert and Ervin-Tripp (1993) assert that, even when substantial training and guidance is provided to coders, they are unlikely to be in the position to provide adequate assistance, as their judgement might be affected by their background, as well as the fact that they were not exposed to the context in Cyprus during the researcher's two separate trips in 2013 and 2014.

Figure 2.1 outlines the research design, including the process of preparation for the interviews in Cyprus, transcription of interviews in 2013 and 2014, consolidation of findings, analysis and NVIVO coding, emerging themes and interpretation and formation of findings which led to an original knowledge contribution.



**Figure 2.1** Illustration of the process of research design

## **2.8 Limitations of the thesis**

The research faced various limitations. The scope of the research as initially set by the researcher drew a clear boundary between the subject of the inquiry and exclusions, meaning that the researcher was limited by authorities of the UN Good Offices Mission. The exclusions have been acknowledged by the researcher. The researcher was aware of the complexities that this research study encompassed, and therefore had to make difficult decisions about setting clear boundaries for the scope of the research. The boundary of the study within which the research has been defined produced three research questions. The research questions comprehensively address an investigated phenomenon. Due to the multidimensional complexity of the system of political negotiations and the political sensitivity on the island (of all sides involved), the 'definite is elusive' and therefore evidence is not conclusive.

Another limitation lies in the academic framework itself, which limits reporting on the research to 80,000 words, producing an additional boundary.

In addition, a substantial amount of data was collected, which has been transcribed and thoroughly analysed by the researcher. Although the data collection involved multiple sources of evidence and was very comprehensive, only a selective amount of evidence could be used for the thesis, due to limitations imposed by the academic framework.

The diversity of the commentaries makes the data well worth noting. Each interview participant had their own idiosyncratic state of mind, and their diverse opinions demonstrated that they were interpreting events through their own individual lenses. Therefore, even though a certain degree of common ground was observed, overall, finding common ground among the respondents was elusive.

Another limitation can be found in the qualitative methodology, since it may indicate a bias by the researcher and the interview participants since their world view must affect their interpretations of events. The data analysis was selective and based on an inductive approach that relied on the perception and interpretation of the researcher.

## **2.9 Ethical considerations**

The case study of Cypriot political negotiations required the strictest ethical standards to protect the anonymity of the participants and the confidentiality of their contribution to the study. Therefore:

- All the audio recordings were made in a strictly private environment as per the interviewees' requests.
- All the audio recordings were and are kept safely with the researcher only.
- All the notes taken during the interviews were kept confidentially and anonymously with the researcher.
- Transcription and coding of all the audio recordings were done solely by the researcher without the involvement of the third parties.
- Password protection was used for all soft copies of materials so that access is limited to the investigator only.
- All the data is stored under the strict supervision of the researcher.
- Access to the data is strictly for the researcher only.
- Due to the fact that the Cypriot political negotiations are of domestic, regional and international significance, confidentiality, anonymity and secrecy was and continues to be maintained to the highest level by the researcher.
- No names of the interviewees were revealed during the course of the research.

The following chapter presents the contextual background of the Cypriot conflict and political negotiations. The chapter is divided into Part I and Part II. Part I covers the background of the Cypriot conflict and negotiations between the Greek and Turkish Cypriot sides up until the year 2008. The Part II focuses on political negotiations conducted between the years 2008 and 2014.

## **The Cyprus conflict and political negotiations**

The historical background of the current Cypriot conflict can be traced back to 1828, and the Cypriot history discussed in this chapter outlines the turning points and critical events, which over these decades shaped the system of political negotiations that took place between the years 2008-2014. This brief outline of the history provides a picture of the context of the Cypriot conflict, and is essential to the understanding of this thesis and the underlying assumption of the research that the uncertainty, unpredictability and multidimensional dynamics of current domestic and regional affairs and past experiences embedded in the historical trajectory of the conflict cannot be ignored when attempting to understand why political negotiations have periodically stalled.

It should be noted that the current chapter presents Part 1 and Part 2. The Part 1 focuses on the contextual background of the conflict and political negotiations until the year 2008. While Part 2 focuses on negotiations between the years 2008-2014. It is noted, however, that only a brief version of Part 1 is presented in this chapter. The full version of Part 1 is in Appendix F.

### **3.1 Geographic location and strategic significance**

Geographically, Cyprus occupies a strategic position in the Eastern Mediterranean Sea. The island is located 40 miles south of Turkey, 60 miles west of Syria and Lebanon, northwest of Israel, 240 miles north of Egypt and 575 miles east of Greece. Due to its location, the island is a geostrategic point for the region in terms of 'large scale land, sea and air operations in the Middle East' (Joseph, 1997, pp.58-59) and has rarely been self-governing, falling under the rule of Mycenaean, Phoenicians, Assyrians, Egyptians, Persians, Macedonians, Romans, Byzantines, Franco English, Franks, Venetians, Ottomans and the British Empire (Dodd, 2010; Hannay, 2005; Mallinson, 2005; Michael, 2010; Morgan 2010; Papadakis et al., 2006).

The Ottoman Empire, centered on modern Turkey, was founded in 1282, and controlled at various stages in its history the populations of 39 modern states, including Greece. On Cyprus, what were to become the Greek and Turkish Cypriot communities co-existed peacefully over extended periods of time as the Ottomans exhibited a reasonable level of tolerance towards non-Islamic religions and cultures (Babaoglu, 2015; Pericleous, 2009). These circumstances allowed both the Muslim and the Orthodox populations to mix socially and commercially, but the concept of a unified 'Cypriot people' never existed (Dodd, 2010, p.2).



From around 1828, the Ottoman Empire began to fail as the concept of nationalism gripped Europe. Cyprus was lost to the empire in 1878 following the Russo-Turkish War, during which the British occupied the island for geostrategic reasons, and in 1914, proclaimed Cyprus a British protectorate and integrated it into the British Empire when the Ottomans joined the Central Powers and entered World War I. The colony of British Cyprus was proclaimed a decade later, in 1925 (Dodd, 1993).

### **3.2 The emergence of nationalism in the 19th and 20th centuries**

By the time Cyprus was given independence from Britain in 1960, anti-colonialism and nationalism had been pulling empires apart for over 100 years. Of particular importance for Cyprus was that in 1828, Greece won independence from Turkey (Dodd, 2010; Mallinson, 2005; O'Malley & Craig, 2001; Papadakis et al., 2006; Pericleous, 2009).

The awakening of the ethnic Greek state aroused in the Greek Cypriots and other ethnically Greek peoples in territories throughout the Ottoman Empire a desire for liberty and self-determination, out of which emerged the concept of *enosis* (Pericleous, 2009), i.e., union with Greece, an idea taken to heart by Greek Cypriots from 1930 (Kitromilides, 1990).

The Hellenic aspirations in the region aroused a feeling of danger and insecurity among the Turkish Cypriots, which inspired Turkish nationalism in the Muslim Turkish community on the island (Fouskas & Tackie, 2009; Joseph, 1997; Pericleous, 2009). Some Turkish Cypriots (armed and organised as the TMT) began to agitate against the union of Cyprus with Greece, calling instead for the partition of the island into Greek and Turkish regions, or *taksim*. Violence between the two ethnic communities escalated, alongside rebellion against the British (Hannay, 2005; Papadakis et al., 2006; Pericleous, 2009).

### **3.3 End of British colonial rule and de facto division of Cyprus**

In August of 1960, Britain granted Cyprus independence. A powersharing arrangement meant a ratio of 70:30 Greek to Turkish Cypriots in government. The security arrangement stood at a 60:40 (Diez & Tocci, 2009). Critically, the guarantor powers of Britain, Turkey and Greece were provided with the power to unilaterally take action to re-establish 'the state of affairs established by the present Treaty' if the arrangement in Cyprus faltered in some way (Colman, 2010; Hannay, 2005; Michael, 2011).

Some researchers believe that British colonial rule had birthed a 'static bi-communal system'. Once they decided to give up their colony, their lasting legacy was only an unworkable constitution that institutionalized ethno-communalism, because it failed to take into account 'the psychological and sociological fact that the power-protection system' increased 'suspicion, antagonism and conflict between the communities' (Michael, 2009, p.27).

### **3.3.1 De facto partition and peacekeeping**

Following independence, ethnic violence soon escalated to crisis and threatened the possibility of war between Greece and Turkey. In 1963, the Turkish Cypriots withdrew from all government positions, and numbers of Turkish Cypriots moved from mixed or isolated villages to Turkish enclaves (Aksu, 2003; Diez & Tocci, 2009; Hannay, 2005; Michael, 2011; Papadakis et al., 2006; Pericleous, 2015; Hadjidemetriou, 2008). A period of instability followed, and skirmishes at the beginning of Christmas week 1963 between Cypriot Turks and Greeks left 500 people dead. In order to de-escalate ethnic tension and forestall a military intervention on the part of Turkey (Diez & Tocci, 2009), a **United Nations Peace Keeping Force (UNFICYP)** was placed in Cyprus in March 1964 (Mallinson, 2005).

### **3.3.2 Attempts to establish a workable peace**

**Acheson Plan.** During 1964, the United States attempted to end the conflict by introducing the Acheson Plan (partition of the island between the two NATO allies Greece and Turkey). The proposal, in two different forms, was rejected.

**Galo Plaza Lasso Plan.** The UN focused on establishing a unitary state, including, nevertheless, Turkish Cypriot autonomy within the Republic of Cyprus (Mallinson, 2005), and rejected the idea of a solution that involved Turkish influence (Diez & Tocci, 2009; Hadjidemetriou, 2007). This was rejected by Turkey and the Turkish Cypriots immediately.

**U Thant and direct dialogue.** In 1966, the UN Secretary General U Thant attempted to overcome the stalemate through direct dialogue, but after 18 months with no dialogue between the two sides, mediation was abandoned (Diez & Tocci, 2009; Varnava & Faustmann, 2009).

**Continued stalemate.** Developments beyond the island contributed to serious political turmoil in the region after 1966. The collapse of the Greek government in 1965 (Hadjidemetriou, 2007;

Mallinson, 2005) was followed by a military coup (Hadjidemetriou, 2007; Joseph, 1997; Mallinson 2005), and the political instability nearly led to war between Greece and Turkey in 1967.

Increased intercommunal clashes in Cyprus led to Turkey conducting an air raid and threatening a military invasion. In response, an intercommunal round of talks began in the spring of 1968 under the auspices of the UN Good Offices Mission. No substantial achievements were made, however.

**The Turkish invasion.** In 1974, the pro-*enosis* factions on Cyprus and the mainland Greek junta organised a *coup d'état* to overthrow the Greek Cypriot leadership, which they perceived to be standing in the way of union (Diez & Tocci, 2009; Joseph, 1997; Papadakis et al., 2006).

However, after the *coup*, the Greeks and Greek Cypriots, depending on which faction they supported, turned on each other. Turkey became alarmed, fearing that the Greeks would *enosis* in these circumstances, and swiftly exercised its unilateral right to intervene according to the 1960 Treaty of Guarantee by invading Cyprus on 20 July 1974 (Diez & Tocci, 2009).

The Turkish military occupied 37% of the island, displacing 160,000 Greek Cypriots while attracting 40,000 Turkish Cypriots (Diez & Tocci, 2009; Fouskas & Tackie, 2009; Hakki, 2007; O'Malley & Craig, 2001; Pericleous, 2009; Varnava & Faustmann, 2009), which resulted in the de facto partition of Cyprus, creating two separate, distinct geographical, political, ethnic and religious zones (Diez & Tocci, 2009; Fouskas & Tackie, 2009; Varnava & Faustmann, 2009; Vassiliou, 2010).

### **3.4 The involvement of the United Nations**

Following the coup and the Turkish invasion, the United Nations Security Council extended and expanded their original 1964 mission to prevent the dispute turning into a war, and UNFICYP began patrolling the **United Nations Buffer Zone in Cyprus**. For over 40 years the UN and the UNFICYP have maintained a 'negotiating culture' (Pericleous, 2009, p.172) in Cyprus and prevented the outbreak of war on the island.

### **3.5 Continued attempts to resolve the Cyprus stalemate in the 21st century**

Of all the efforts to resolve the Cyprus problem, the Annan Plan was the most comprehensive and detailed designed by the United Nations (Hannay, 2005; Pericleous, 2009; Sözen, 2007), calling for the reunification of the island and formation of the United Cyprus Republic (UCR) as a 'bizonal

federal structure comprised of two constituent states, the Greek Cypriot State and the Turkish Cypriot State' (Sözen, 2007a, p. iii). The Annan Plan was inspired by the evolution of the previous negotiations and incorporated principles, proposals and agreements reached by the two sides over many years (Hannay, 2005; Sözen, 2007a). It was intended to bridge the gaps on all the issues between the two sides, and was workable and pragmatic (Sözen, 2007a).

In a referendum in 2004, however, Turkish Cypriot support of the Plan was 65%, while 76% of the Greek Cypriots rejected it (Sözen, 2008). Thereafter, political negotiations stalled for four years. This period is marked by an absence of written explanation of what was happening behind the scenes until the political negotiation process restarted in 2008.

## **The system of political negotiations 2008-2014**

As one might expect, the history of conflict in Cyprus from 1828 up until 2008 had a significant bearing on the system of political negotiations during 2008-2014. The 2008-2014 period was central to the current research and critical to demonstrating the conceptual framework that shaped the research. Chapter 3, Part 2, therefore, is a core construct of this thesis, and is explored in order to highlight the reasons for stalemate in political negotiations.

### **3.6 The system of political negotiations (2008-2014)**

In February 2008, presidential elections took place in the Republic of Cyprus. Demetris Christofias of the AKEL party was elected President of the Republic of Cyprus (Mirbagheri, 2009; Morelli, 2014). In his inaugural address Christofias outlined his commitment to negotiations to achieve a 'just, viable, and functional solution' (Morelli, 2014, p.4) to the conflict and his unwillingness to resume negotiations on the basis of the Annan Plan (p.3). On the other side, the Turkish Cypriot leader Mehmet Ali Talat expressed confidence that there could be a 'new partnership state in Cyprus, based on the political equality of the two peoples and the equal status of two constituent states' (p.4). Together he and Christofias revived full-fledged negotiations for a settlement of the divided island.

The preparatory period between March and August 2008 yielded a framework for negotiations (Napolitano, 2011). During this period the Greek and Turkish Cypriot leaders 'issued two Joint Declarations under the UN's auspices on 23 May and 1 July 2008' (Napolitano, 2011, p.3). Both leaders committed themselves to the Joint Declarations which sought partnership in the form of 'bi-zonal, bi-communal federation with political equality' (Migdalovitz, 2008, p.1). The leaders also aimed at a 'federal government with a single international personality, as well as Greek and Turkish-Cypriot constituent states of equal status' (Migdalovitz, 2008, p.1). Christofias also aimed at demilitarization of the island through the withdrawal of Turkish troops (Morelli, 2014).

Negotiations began on 3 September 2008 (Michael, 2011; Mirbagheri, 2009). The potential solution needed 'to secure legal basic rights and interests of both' (Migdalovitz, 2008, p.1) and if a compromise solution were achieved, it would be put to a referendum on both sides of the island (Migdalovitz, 2008). The leaders agreed to the negotiating format of 'talks by Cypriots for

Cypriots' (Kaymak & Faustmann 2008, p.926) and the principle of 'Cypriot-led, Cypriot-owned' (Michael, 2011, p.196). This attitude reflected their experience with the failed intervention of the 2004 Annan Plan. Neither side wanted outside mediation (Kaymak & Faustmann 2008, Michael, 2011), and the idea of 'Cypriot-led, Cypriot-owned' became a guiding principle for the sides and was reinforced by the UN Secretary General Ban Ki-moon:

*[B]oth leaders must take responsibility for the course of the talks, for their success or their failure. No one else can do this. Cypriot leadership means that it is the leaders who must propel the process forward and defend it against those who would seek to derail it. (Michalis Stavrou Michael, 2011, p.196)*

The two sides established six main chapters on key substantive issues and six working groups as part of the commitment to restart negotiations under the auspices of the United Nations of the United Nations Secretary-General (UNSC, S/2009/610; Kaymak & Faustmann 2009; Migdalovitz 2008; Morelli, 2014; Napolitano, 2011; UN Cyprus Talks, online, n.d).The chapters were established as part of the framework designed to reach a comprehensive settlement. The chapters were identified as:

- Territory
- Property
- Securities and Guarantees
- Governance and Powersharing
- Economic Matters
- European Matters (UNSC, S/2009/610; Kaymak & Faustmann 2009; Migdalovitz, 2008; Morelli, 2014; Napolitano, 2011).

The leaders also opened the crossing point at Ledra Street in Nicosia (Kaymak & Faustmann, 2009; Mirbagheri, 2009; Pericleous, 2012).

In addition, a set of confidence-building measures (CBMs) was established by the seven technical committees alongside the working groups (UNSC, S/2009/610). The overall focus of CBMs was to improve the daily lives of the Cypriots and encourage 'greater interactions among them' (UNSC, S/2009/610, p.1). The CMBs specifically focused on 'crime, economic and commercial matters, cultural heritage, crisis management, humanitarian matters, health and environment' (UNSC, S/2009/610, pp.1-2).

Following the establishment of working groups and technical committees, negotiations recommenced. Christofias avoided provisions outlined in the Annan Plan, proposing instead ‘that the 1977 and 1979 High Level Agreements and the UN Security Council resolutions should form the basis of negotiations’ (Kaymak & Faustmann, 2009, p.929). Christofias also rejected proposals made by Talat on the issue of governance because they were based on the provisions of the Annan Plan (Michael, 2013; Pericleous, 2012). Contrary to Christofias, the Turkish Cypriot leader Talat was committed to the Annan provisions (Kaymak & Faustmann, 2009; Pericleous, 2012) and made ‘hard-line proposals far beyond the Annan Plan’ (Pericleous, 2012, p.100).

As a consequence of fundamental disagreements, very soon the entrenched positions of the sides resurfaced. Both leaders found themselves in positions of uncertainty and ambiguity which was reflected by their communities respectively (Kaymak & Faustmann, 2009; International Crisis Group, 2014; Morelli, 2014).

By the end of 2009 many felt that the negotiations would not lead to positive outcomes, specifically when upcoming elections were to be held in the North in 2010 with possibly Eroğlu emerging as a new candidate for the Turkish Cypriot society, TRNC. After approximately 60 meetings within 18 months of negotiations beginning, Christofias and Talat failed to achieve substantial progress and were not close to a settlement (Kaymak & Faustmann, 2009; Morelli, 2014), leaving the sides distrustful of one another and without hope of progress (Pericleous, 2012). The negotiations between the two leaders Christofias and Talat concluded in March 2010 in a stalemate (Morelli, 2014).

On 18 April 2010 Derviş Eroğlu was elected as President of the Turkish Republic of Northern (TRNC) Cyprus. Eroğlu was perceived to be a hardliner, envisioning TRNC to be a mono-ethnic state (Pericleous, 2012), as had the former Turkish Cypriot leader Rauf Denktaş (Morelli, 2014; Pericleous, 2012). Eroğlu’s political party advocated for a permanent division of the island, calling for a ‘soft divorce’ similar to the Czech and Slovak Republics. He also heavily criticized his predecessor Talat for providing Greek Cypriots with excessive concessions. Despite Eroğlu’s political stance, he was keen to continue negotiations under his presidency. He also wrote to UN Secretary-General Ban Ki-moon advising he was willing to resume negotiations. For their part, the Greek Cypriots were highly sceptical that much would be accomplished (Morelli, 2014).

The first formal meeting between Eroğlu and Christofias was held under the auspices of the United Nations which appointed UN Special Advisor to the Secretary General on Cyprus, Alexander Downer, to observe. The sides focused on the issue of Property, which had not been addressed during the previous round of negotiations (Morelli, 2014). Working groups and technical committees from both sides met regularly, but by September 2010 Eroğlu expressed concern over the poor level of progress.

The Turkish Cypriots expressed dissatisfaction with the way they were being treated, which they perceived to be disrespectful and contemptuous (Morelli, 2014), and by October 2010 Eroğlu explicitly stated that the Turkish Cypriot side no longer believed they could achieve a satisfactory settlement and that the willingness of the two communities to live together was diminishing.

Similar concerns were expressed by the Greek Cypriot leader Christofias, for the Greek Cypriots, who was concerned about the possible impact that mainland Turkey's domestic and regional turmoil would have on any potential agreement, and expressed his belief that nothing more could be achieved (Morelli, 2014). No progress was made.

In July of 2011, Christofias and Eroğlu met in Geneva with Ban Ki-moon in an attempt to provide momentum for the talks (Morelli, 2014). The hope in 2011 was potentially to see the achievement of a long term desired settlement, with 'rotating presidency of the EU to assume on 1<sup>st</sup> July 2012' (Morelli, 2014, p.7). The negotiation process continued through 2011, however with very little progress, while the differences prevailed. However, neither side felt much of a need to solve the conflict, even with the ongoing support of Ban Ki-moon, with whom they met regularly in New York (Morelli, 2014).

Polling on the island in 2011, conducted as part of the Cyprus 2015 initiative revealed growing pessimism on the island. Turkish Cypriots also recorded a growing uncertainty and tendency to vote 'no' for reunification (Morelli, 2014). The polling also revealed that confidence building measures should be implemented to boost the trust levels between the two communities and that further discussion of the parameters of the negotiations should be initiated (Morelli, 2014).

In 2012, Christofias and Eroğlu were invited to the 'Greentree2' in New York to discuss mutual issues of concern, such as governance, economy and EU affairs, with later plans in the year to



approach ‘security-related issues’ (Morelli, 2014, p.8). The intention was to reach a comprehensive agreement, which will allow the already reunified Cyprus to assume the EU rotating presidency in July 2012 (Morelli, 2014). Despite the invitation to New York, both leaders were unable to overcome challenges on issues of ‘property rights, security, territory, mainland Turks, and citizenship’ (Morelli, 2014, p.8).

The unresolved long standing issues between the two leaders discouraged any meeting and Christofias was warned by the Greek Cypriot opposition not to accept any ‘deadlines or UN arbitration, or to agree to an international conference without explicit agreements on internal issues’ (Morelli, 2014, p.8). ‘Greentree2’ was eventually held in New York based on the submitted proposals of both sides, but led to no agreement (p.9).

In 2012, Christofias aimed for negotiations to continue ‘during the EU presidency’. However, the UN Secretary-General Ban Ki-moon via Special Adviser Alexander Downer announced that due to unresolved issues an international conference would not take place, and that the UN was not going to host talks where the sides could not agree. By the end of 2012, the UN sponsored talks had stalled with both sides blaming the other for the lack of progress (Morelli, 2014).

### **3.7 Recent periods of negotiation**

#### **3.7.1 The period of the 2013 Greek Cypriot elections, renewed talks and financial crisis**

In 2013, Nicos Anastasiades of the AKEL was elected as President for the Republic of Cyprus, following an election campaign after which little political negotiation took place between the Greek and Turkish Cypriot sides because of the fiscal and budget crisis facing the Greek Cypriots (Morelli, 2014). Anastasiades was a 2004 Annan Plan supporter who proposed the renewed talks should be drawn up based on the 2006 set of principles agreed to by the former Cypriot leadership, as well as the ‘1977 and 1979 high-level agreements between the Greek and Turkish Cypriot leadership’ (Morelli, 2014, p.10). Anastasiades intended to appoint a principal negotiator as his representative. The President himself did not intend to participate directly in negotiations, leaving that to other Greek Cypriot representatives (Morelli, 2014, p.10).

Although Anastasiades supported the 2004 Annan Plan, the Turkish Cypriots were extremely cautious with respect to Anastasiades’s stance on the issues, fearing that he might have diverged

from his pro-Annan convictions and adopted more hard line views (Morelli, 2014, p.10). In addition, the Turkish Cypriot leader Eroğlu had changed the emphasis of his speeches, referring to a new dynamic, new negotiation frameworks, and two distinct states (p.10).

The election of President Anastasiades did not prompt the establishment of a timetable for resumption of the negotiations (Morelli, 2014). Yiannis Omirou, the leader of the Parliament, expressed a desire to redefine the Cyprus problem to accentuate the violation of international law due to the Turkish invasion and occupation, and condemning the Turkish Cypriot stance. He suggested using 'Cyprus's EU membership and Turkey's EU prospects to exert pressure on Ankara to terminate the island's occupation and international and European law' (Morelli, 2014, p.10).

In December 2012, Eroğlu emphasized that the solution to the Cyprus problem could only be viable if the realities of the island were considered, namely the acknowledgement of two communities with 'two separate languages, religions, nationality and origin and two different states'. Therefore, even though there are prospects for a solution that would allow the two communities to live and prosper together, nevertheless it should be also understood that 'it is [not] realistic to establish one state from two separate states' (statements made by Turkish Cypriot leader Eroglu on various occasions in December 2012 as provided to CRS by the Turkish Cypriots cited in Morelli, 2014, p.11).

In 2013, the Republic of Cyprus was facing a banking and fiscal crisis, and Anastasiades refused to resume negotiations with the Turkish Cypriots, believing that first and foremost he had to tackle the financial crisis in the Republic (Morelli, 2014). In May 2013, the Foreign Minister Ioannis Kasoulides repeated Anastasiades's position in New York and Washington. The Republic of Cyprus was committed to negotiations, but insisted on dealing with the fiscal crises first. Kasoulides stated that the Greek Cypriot side would not be committed to convergences achieved by Christofias and Eroğlu, or bound by any timetables. The Turkish Cypriots, however, would be permitted to use the port of Famagusta, once Varosha was returned to its rightful owners as part of the confidence building measures (Morelli, 2014).

The Turkish Cypriot leadership, on the other hand, emphasised the need for negotiation timetables and the need for two separate, co-equal states. Although Turkey was pro a negotiated solution, it emphasised that this had to come within the timetable or could expect to fail (Morelli, 2014).

Anastasiades and Eroğlu met in May 2013, and in July 2013 the Ambassador for the Foreign Ministry Andreas Mavroyannis was appointed as the Greek Cypriot negotiator, while the Turkish Cypriot side appointed Kudret Ozersay as their negotiator (Morelli, 2014). After a long period of hesitation and arguments over how negotiations should be commenced, in late 2013 and early 2014, both sides attempted to agree on a Joint Declaration outlining 'goals or outcomes' they wanted to achieve (Morelli, 2014, p.11). Initially the Turkish Cypriots were unwilling to commit to the idea of a Joint Declaration, later agreeing to the need to develop language within the Declaration with which they would be comfortable (Morelli, 2014).

### **3.7.2 Negotiations 2014**

On 8 February 2014 the two sides agreed on a Joint Declaration prepared with the assistance of the United States, which provided the momentum to restart negotiations. The Joint Declaration provided a new momentum for restarting negotiations, which, after long deliberation, restarted on 11 February 2014 (International Crisis Group, 2014). This was the sixth major effort since 1977 under the auspices of the UN to find a settlement that would result in a bi-zonal, bi-communal federation (International Crisis Group, 2014). Given the disagreements over aspects of the Joint Declaration, few observers were optimistic enough to believe that the Greek and Turkish Cypriots were capable of achieving settlement in 2014.

Meetings were held periodically between Anastasiades and Eroğlu, as well as Andreas Mavroyannis and Kudret Ozersay once negotiations were restarted (Morelli, 2014). There was some confusion as to what would be the starting point for each of the chapters in negotiations since neither side wanted to revisit convergences achieved previously. Only unresolved issues were to be considered, indicating that some of the earlier agreements were going to be accepted. The sides continued to meet throughout 2014 without making progress. In July, Eroğlu submitted a 'roadmap' toward a settlement with the suggestion of holding a national referendum by the end of 2014, which was immediately rejected by Anastasiades (Morelli, 2014, p.12). For their part, the Greek Cypriots presented a 17-point plan explaining their positions to be addressed to achieve agreement in the future. The Turkish Cypriots responded with a 15-point counter proposal (Morelli, 2014).

Both proposals were rejected (Morelli, 2014). Not only were the 2014 negotiations made difficult by the two sides changing their positions and demands frequently, each blamed the other for a failure to recognise previous ‘convergencies’ agreed during Christofias-Talat period. As a consequence, the Greek Prime Minister Antonis Samaras stated in July that there was no significant progress, while the Turkish Cypriot Foreign Minister Özdil Nami stated that the peace talks were finished. The last meeting was on July 26; however, the talks resumed in September 2014 (Morelli, 2014).

Presidential elections in Turkey resulted in Erdogan being elected President. Controversially, he preferred a two state solution that guaranteed political equality. A well-respected think tank in Washington suggested that a ‘separation’ leading to a two state solution should be seriously considered by the sides, and a stalemate prevailed. It was the 40<sup>th</sup> anniversary of the 1974 deployment of Turkish military forces on the island and the 10<sup>th</sup> anniversary of the Greek Cypriot vote against the Annan Plan. In August 2014 the United Nations appointed a new UN Secretary General Special Advisor Espen Barth Eide (Morelli, 2014).

Meanwhile, the stalemate in negotiations persisted, with observers pointing out that no progress would be made until national elections were held in Northern Cyprus in April 2015 (Morelli, 2014).

The 2014 Joint Communiqué emphasised the notion of interdependence, implying the need for connectivity and interconnectivity between the negotiated chapters. The introduction of the concept of ‘interdependence’ to negotiations implied that the sides must acknowledge that the negotiations were part of an integrative system rather than disintegration. This had not been explicit in 2008 when the six chapters were constructed, but nevertheless between 2008 and 2012, the two sides reached convergences as outlined in the convergence paper for those years. Divergences were also meticulously recorded. Four decades and thousands of meetings between the opposite sides, including meetings at government and business levels, as well as with priests, had failed. The UN facilitation process had been conducted even-handedly and external arbitration had been offered (International Crisis Group, 2014). The locations of the meetings had been varied (domestically and internationally), and had included private homes, hotels in Switzerland, the UN’s New York headquarters, and in the buffer zone. There had been working breakfasts, lunches and dinners, with and without neckties that had sometimes included spouses (International Crisis Group, 2014).

Moreover, the UN had proposed a substantial number of ‘non-papers’, ‘food for thought papers’, ‘convergences papers’, ‘near convergences papers’, ‘outline papers’, and opening statements of the Secretary General. The forces involved in the Cypriot dilemma exhausted all alternatives without solving the Cyprus problem.

*If the parties are to resolve the Cyprus problem, then they must be given the flexibility to discuss other alternative solution models that presently lie beyond the existing UN basis for a negotiated settlement. (International Crisis Group, 2014, p.5)*

The following section of this chapter outlines issues sited within the six negotiated chapters.

### **3.8 Negotiations chapter by chapter**

#### **3.8.1 Property chapter**

The conflict in 1960s and the Turkish military intervention (deployment of its military forces on the island) created turmoil, leading to 150,000 Greek Cypriots to flee from the north of the island to the south, while 50,000 Turkish Cypriots fled from the south to the north (Morelli, 2014). Properties were abandoned by legal owners in these migrations, with the result that a debate over property is a permanent fixture of the negotiations.

The Greek Cypriots insist that the legal owners of the abandoned properties, who became refugees from the north, have a legal right to their properties in the north in the form of exchange, compensation or recovery (Morelli, 2014). On the other hand, Turkish Cypriots insist that the issue of property should be resolved through ‘compensation, exchange of alternate property, or restitution’ (Morelli, 2014, p.15). Following an extended debate with respect to the property issue, the Immovable Property Commission (IPC) was established. The purpose of the IPC is to provide compensation, and the IPC receives numerous applications. There are, however, fundamental differences pertaining in the Property chapter (Morelli, 2014). With the restart of inter-communal negotiations, the Greek Cypriot President Christofias requested that negotiations focus on the Property chapter, given the deep sense of disagreement between the sides on this issue. The Greek Cypriots ‘insisted that the last word on the fate of any given property should remain with the original owner and that his/her property rights were absolute’ (Napolitano, 2011, p.8). They demanded that the Property and Territory chapters be addressed simultaneously (p.8).

For their part, the Turkish Cypriots refused to connect the Property and Territory chapters at an early stage of negotiations, arguing that they should be negotiated toward the end of the process as part of the final give and take (Napolitano, 2011). In addition, the Turkish Cypriots perceived the chapter of Territory as a key ‘bargaining chip’ and were therefore reluctant to connect the Property chapter with the Territory chapter.

The Turkish Cypriots focused on compensation as the remedy and requested ‘a ceiling on the number of Greek Cypriots who could reclaim their properties in the north’ (Napolitano, 2011, p.8). The reluctance of the Turkish Cypriots to link the Property and Territory chapters was problematic for the Greek Cypriots, who called for congruous territorial adjustments in their favour in order to reduce the number of Greek Cypriot owners with legal claims in the territory of the future Turkish Cypriot constituent state.

Currently, roughly three quarters of the properties belong to Greek Cypriots and if each claimant were granted the restitution of his/her property, it would be impossible for the Turkish Cypriots to implement the principle of bi-zonality. Consequently, as in the Annan Plan, the Turkish Cypriots asked for a ceiling on the number of Greek Cypriots who could reclaim their properties in the north. Finally, the Turkish Cypriots drew a link between territory and security and guarantee chapters in the talks, given that both, in their view, should be dealt with in the final stage of the talks. The deep gap in the parties’ positions thus persisted.

Greek Cypriot land ownership in the north of the island had been considerable, and if each Greek Cypriot claimant were to be compensated or allowed to return to their property, it would be impossible for the Turkish Cypriots to maintain control of the north as an ethnic enclave and therefore the principle of bi-zonality would have to be abandoned (Napolitano, 2011, p.8). Therefore the Turkish Cypriots requested ‘a ceiling on the number of Greek Cypriots who could reclaim their properties in the north’ (p.8). Eventually, however, in 2010 the Turkish Cypriots agreed to link the Territory and Security and Guarantee chapters, under the condition that these two chapters would be negotiated at the final stage of give and take (Napolitano, 2011, p.8).

In September 2010 a Turkish Cypriot proposal provided a general framework for the solution of outstanding problems and contained innovative proposals (Napolitano, 2011). Although the Turkish Cypriots guaranteed that they would not dispute the original owner’s choices for the

disposition of their property, they insisted that decisions must be tempered by present circumstances, and aimed to establish regulations prior to choices being made. The Turkish Cypriots also introduced the concept of 'alternative property' to the three accepted remedies of 'return, compensation and exchange' (Napolitano, 2011, p.8). Alternative property would be a feature of territorial adjustments.

The proposal also suggested a Property Development Corporation (PDC) for the purpose of increasing the value of the relinquished zones, which included the former Greek Cypriot Varosha and the Turkish Cypriot areas in the south of the island. Boosting the value of these zones would benefit both sides, it was argued, and 'raise the financial resources for compensation' (Napolitano, 2011, p.8).

The Turkish Cypriot paper also reinforced the bi-zonality principle 'which meant precise limitations on the number of returnees' (Napolitano, 2011, p.8) for the purpose of maintaining an ethnic majority on both sides of the island. Compensation for properties would be through guaranteed financial entitlements (GFE), where the value of the compensation would be pre-determined by the respective constituent states. Compensation would come from the current users, the sale of public institutions, and the introduction of special taxes, among other schemes (p.8). It was also stipulated that the property of the Orthodox Church of Cyprus and the EVKAF (Muslim Religious Foundation) would be returned only if it had been in use for religious purposes between 1963 and 1974. The rest would be subject to compensation (Napolitano, 2011, pp.8-9).

Proposals from the Greek Cypriots focused on acknowledging the original ownership rights of Greek Cypriots who had fled the north, and restitution as a remedy was prioritized. The UN found that the Greek Cypriot proposal to prioritize the rights of the original owners was problematic. Ban Ki-moon's report on 18 November 2010 (under paragraph §24) encouraged the sides to offer substantive proposals which would provide 'a platform for seeking convergences, rather standing as fixed positions' (Napolitano, 2011, p.9).

The behaviour of President Christofias was, from the standpoint of the observer, ambiguous, in the sense that on the one hand the President expressed pessimism in the eye of the public, dismissing Turkish Cypriot proposals, while on the other, he presented a sincere commitment to find solutions.

The progress of negotiations was insignificant and declined during the summer. The negotiations resumed in October 2010. The tripartite meeting was set up for the sides in New York on 18 November. Meanwhile the sides agreed on some technical points, such as (Napolitano, 2011):

*building schools and hospitals, the sharing of public land by the federation and the constituent states, the development of unutilized land by an ad hoc joint company, and the organization of a donors conference alongside the compensation mechanism. (p.9)*

According to President Talat in an interview conducted by the Turkish Cypriot newspaper Yeni Duzen, it has been noted that the Property chapter is ‘the most difficult chapter in the whole negotiating process because it concerns most of the Cypriot population’ (Napolitano, 2011, p.9). President Talat thought it would have been wise ‘to complete first negotiations on governance and power-sharing, EU matters and the economy, and then turn to the complex property question followed by the related issues of territory and security’ (p.9). Talat added that, if the issue of territory were tackled right away, the Turkish Cypriot community would be destabilized and agitated by Greek Cypriot requests for land. He also remarked that it was necessary to find ways of solving the problem of compensation, because Turkey would not carry the financial burden (Napolitano, 2011).

With negotiations in paralysis, a trigger was needed to break the deadlock, and it was difficult to imagine an agreement on governance matters acting to break a deadlock. Christofias needed something that would assist him domestically and permit concessions on the issues of property, but Eroğlu could concede nothing in the area of Governance, and there could be no trade-off between chapters.

Regardless of this, Christofias’ top current priority was to cash-in some concessions on territory before the final give and take. If he failed to do so, it could damage both him and his AKEL party. Furthermore, a deal which did not include a chance for the original owners to resume control of their properties would be difficult to present to the Greek Cypriots, and Christofias needed to achieve other concessions from the Turkish Cypriot side to fend off domestic attacks (Napolitano, 2011).

In order to break stalemated negotiations, the UNSG Ban Ki-moon invited the Cypriot sides to New York on November 18 2010. The invitation signalled that the international community was



observing and pressing for a successful conclusion (Napolitano, 2011). The Cypriot sides recognized the urge and therefore agreed for intense meetings (Christofias and Eroğlu). The sides also agreed to a Geneva meeting in January 2011 to reach further agreements.

The New York meeting did not proceed well. Christofias raised the issue of territory and settlers. Eroğlu, however, claimed that the Territory and Guarantees chapters had not been included in the talks. In addition, Christofias was not allowed to link the Territory and Property chapters (Napolitano, 2011).

Ban Ki-moon ensured that the negotiations continued in the traditional format that did not entail UN arbitration, but would not be open ended (Napolitano, 2011), and Eroğlu consented to the Geneva meeting after intensive negotiations as the Turkish Cypriot side was always for a specific timeframe.

In sum, the process of negotiations in Cyprus:

*is deeply intertwined with a web of complex interests, partly of the international community and partly of specific countries such as Turkey, Greece, the UK, as well as major actors such as the United States, the European Union and Russia. (Napolitano, 2011, p.11)*

The outcome of the negotiations has been and will continue to be unpredictable. The solution to the Cypriot conflict could be either a 'reunification of the island' or 'formalization of the de facto partition' (Napolitano, 2011, p.11), but the status quo of protracted negotiations cannot continue indefinitely (Napolitano, 2011).

Property is the issue that has proven most difficult to resolve, either as a standalone problem or in connection with Territory. Ultimately trade-offs at this point become unavoidable across the chapters and political pressures from each constituency influence the decision making. Christofias, for example, has been handicapped by uncompromising coalition partners at home, and cannot bring significantly new ideas to the negotiating table. Conversely, Eroğlu's stronger domestic position would allow him to confirm the Turkish Cypriot road map, according to which the parties could try to converge, at least in principle, on a link between 'property' and 'territory', as asked by the Greek Cypriots when all chapters have been discussed and finalized, as proposed by the Turkish Cypriots.

The 'linkage' approach to negotiations has meant that there could be no settlement unless all aspects of the Cyprus problem (for example, constitution, territory, and security) were simultaneously agreed upon (Michael, 2011).

### **3.8.2 Territory chapter**

The chapter on Territory is a highly sensitive matter and viewed by both sides as a bargaining chip. After the Turkish invasion in 1974, Cyprus was divided disproportionately between the Greek and Turkish Cypriots. Before the invasion, approximately 80% of the population of Cyprus was Greek Cypriot, and 20% Turkish Cypriot (Hannay, 2005). The remainder of the island population, accounting for 2%, were Armenians, Maronites, and Latins. In 1960, the Turkish Cypriots controlled slightly more than 36% of the island, including 57% of the coastline, while the Greek Cypriots controlled slightly more than 63% of the island, including 43% of the coast (Hannay, 2005).

In light of these figures, it has always been assumed that during the negotiations, the territory would be divided to reflect the proportions of each ethnic group among the population. For example, before the division of the island, Varosha, Morphou and Karpas were mostly inhabited by Greek Cypriots, and want these areas to be returned to their control, reducing Turkish Cypriot control from thirty seven percent (37%) of the island to twenty nine percent (29%) (Morelli, 2014).

This disagreement would accord with the UN proposed territorial adjustment outlined in 1992 under UN Secretary General Boutros-Ghali, which assigned 28% of the territory of the island to the Turkish Cypriots and around 72% to the Greek Cypriots. This partition was never formally agreed to by any of the negotiating parties. However, the UNSC endorsed it on the basis that it was a reasonable proposal and subsequent negotiations on the issue of territory have been along the lines of these boundaries (Hannay, 2005).

The Boutros-Ghali map includes the return of the town Morphou and the ghost town Varosha to the Greek Cypriots, but not the old city of Famagusta, as part of a push for substantial territorial adjustment. Of greatest concern for the Greek Cypriots was the fate of Greek Cypriot refugees expelled from the north who wanted to return to the homes that had been overrun by Turkish Cypriots in 1974 (Hannay, 2005). The Greek Cypriots aimed to establish a 'link to the three related issues of territory, property and the right to settle in the north' (Hannay, 2005, p.36).

The Turkish Cypriots' position on the territorial issue was to consider this question during the final stage of negotiation process. They wanted to gain governance and security, and as to the issue of territory, property and the linked issue of the right for the Greek Cypriot refugees to return to the Turkish Cypriot state, Denktaş knew he would be expected to make concessions (Hannay, 2005). Concessions made by both sides would lead Cyprus to be bi-zonal and bi-communal. Denktaş's approach, however, was to de-couple the three issues and adopt positions on which he would not yield, such as his proposal for settling all property claims by compensation and allowing no Greek Cypriot returns to the north. The Turkish Cypriots instead put a 'vague and rather complex criteria for determining a territorial adjustment' (Hannay, 2005, p.36).

Another issue related to the territory were the 99 square miles of the British Sovereign Base Area, which was excluded by international law from the 1960 Republic of Cyprus (Hannay, 2005, p.36). They were in the South of the island but contiguous with the Turkish Cypriot side of the Green Line established by the UN (Hannay, 2005, p.37). It was noted that if the UK gave up some of this territory, the result would be an increase in territory for both sides (p.37). The sides intended to solve the issue of territory at the final state of negotiations (Hannay, 2005).

The 2004 Annan Plan addressed the outstanding territorial issues. If adopted, Turkish Cypriot territory would be reduced from 37% to 29%. Varosha and Morphou would return to Greek Cypriot control. UK sovereign bases would be cut by half (International Crisis Group, 2014). Greek Cypriots would gain the territory associated with the UN buffer zone in an arrangement that benefits both sides. The Greek Cypriots would gain territory, while the Turkish Cypriots would not have to pay the Greek Cypriots as much compensation for territory they had occupied and would retain (International Crisis Group, 2014).

Other territorial issues relate to the stationing of Turkish troops on the island and the sharing of maritime zones. International oversight of the Turkish troops is demanded by the Greek Cypriots, while potential future revenue from the maritime zones is a contested point, with the Turkish Cypriots demanding a share from the 'federal shared competence' (International Crisis Group, 2014, p.36).

**Territory: 2008 - 2014.** At the time of the Christofias-Talat/Eroğlu negotiations, Christofias proposed returning the city of Varosha to the Greek Cypriots who would open the seaport of

Famagusta for the Turkish Cypriots for the purposes of international trade. The EU, Greek and Turkish Cypriots would share in the administration of the port. This would have permitted direct trade between the Turkish Cypriots and the European Union, except that it was rejected by Eroğlu (Morelli, 2014).

In 2013 Anastasiades revived the same proposal in the form of ‘confidence building measures’ ‘to test the sincerity of the Turkish Cypriots and Turkey to move forward in the negotiations’ (Morelli, 2014, p.15). Eroğlu indicated that the issue of Territory was ‘a key bargaining chip for the Turkish Cypriots’ and therefore ‘suggested he would not accept any Greek Cypriot proposal on Varosha or other areas’ (p.15). In 2014 the Greek Cypriots indicated that no agreement could be reached with respect to Territory unless the city of Morphou was returned. The Turkish Cypriots rejected this proposal (Morelli, 2014).

In 2010 Christofias attempted to link the issue of Property and Territory by proposing to Eroğlu that 50,000 ‘mainland Turks’ who were living on the island could remain in the north with no need to return to Turkey, to which Eroğlu replied that the TRNC would not bear such ‘social upheaval’, meaning that all citizens living in the north of Cyprus should remain in the north, while additionally indicating that only a small number of Greek Cypriots would be allowed to go back to the north. Eroğlu, in addition, insisted that ‘no one on Cyprus is any longer a refugee’ (Morelli, 2014, p.16).

Ultimately, Christofias’s proposal met with Eroğlu’s rejection. As a result, Eroğlu rejected the idea of sending Turkish mainlanders back to Turkey, while Greek Cypriot parties did not agree for Turkish mainlanders to stay on the island. Essentially, the status quo was maintained (Morelli, 2014).

### **3.8.3 Security and Guarantees chapter**

The issue of Security and Guarantees is challenging in Cyprus due to fundamental differences mirrored in divergent views and outlook over a long period of time. The Greek Cypriots want the Turkish military force to withdraw from the island, given that the European Union could be an effective guarantor if the whole island became part of the European Union. Under at least one version of the proposals for reunification, neither Turkey, Greece nor the United Kingdom would be required to oversee the island (Morelli, 2014).

The reason for the Greek Cypriots' request of Turkish military withdrawal is connected to historical events of 1974 when Turkey exercised its unilateral intervention based on 1960 Treaty of Guarantee. The Turkish military intervention in the northern part of the island in 1974 consisted of 40,000 troops who secured 37% of the island. Although the legality of 'Turkish intervention on Cyprus has been underlined by the Parliamentary Assembly of the Council of Europe Resolution 573 (1974), adopted on 29 July 1974 and by the Athens Court of Appeals in its decision of 21 March 1979, most international bodies describe the operation as an 'illegal invasion' (Hakki, 2007, p.187). The intervention of the Turkish military and its continuous presence on the island creates within the Greek Cypriot community 'serious anxieties and mistrust'. In the letter addressed to the UN Secretary General, Dr Boutros Boutros-Ghali, 17 December 1993, President Clerides outlined the following:

*There is no doubt that the massive presence of Turkish military forces in the occupied part of Cyprus creates serious anxieties and mistrust amongst the Greek Cypriot Community regarding Turkish intentions. It also imposes on the Government of the Republic the need to increase the defensive capabilities of the country by purchasing arms. Further it makes it necessary to request military help from Greece and to include Cyprus in the Greek defensive plans. There are also indications that the above preparations, though entirely defensive in their nature, are misinterpreted and cause anxiety and mistrust within the Turkish Cypriot Community regarding Greek intentions'. (Hakki, 2007, p.275)*

Although the international community condemned Turkish military intervention, the USA and the UK stopped referring to the intervention as an invasion (Hakki, 2007). Regardless of what it is called, however, the Turkish military intervention has had serious ramifications with respect to property, territory, governance, and population dislocation, leading to refugee issues and ultimately contributing to the (permanent) partition of the island.

The Turkish Cypriots and Turkey have positioned themselves to further maintain the Treaty of Guarantee and Alliance pending Turkey's accession to the European Union (Morelli, 2014). They argue that the maintenance of Turkish forces on the island for security purposes is Turkish Cypriots' and Turkey's priority (Morelli, 2014).

### **3.8.4 Governance and Powersharing chapter**

The Governance and Powersharing chapter in the 2008-2012 convergence paper accounts for 20 pages out of the total of 75. The plan to share power and govern the island includes the concept of a six year presidency and vice-presidency. The cabinet of ministers will consist in the main of Greek Cypriots, while the two ethnic groups would be represented equally in the senate. Thus, Turkish Cypriot members would form approximately one quarter of the parliament.

The government would have 22 federal competencies, including EU matters, defence policy and Central Bank functions' (International Crisis Group, 2014). The 'deadlock-breaking mechanisms and ethnic ratios to be applied to courts and the federal civil service' (International Crisis Group, 2014, p.28). It has been emphasized that the departments within the federal civil service 'would have to take decisions according to the principle of political equality as defined by the UNSC' (p.28).

The Greek and Turkish Cypriots alike 'could not agree on the definition whether elements of federation to be called constituent states or federated units and whether it would have ministries or departments' (International Crisis Group, 2014, p.28). The Turkish Cypriots' definition sounded more like independence than federation. The commentary on the issue of governance and powersharing was that the Greek Cypriots strove to maintain a unitary state 'in the manner that they have been accustomed to since 1963' (International Crisis Group, 2014, p.29) and they could continue to do so, while the 'Turkish Cypriots would be allowed its own independent state as part of the settlement' (p.29).

### **3.8.5 Economic Matters chapter**

The least controversial issue included in the negotiations is economic matters. Both sides have expressed support for economic cooperation as they believe that the solution to the Cyprus problem would be good for the economy, but bringing an independent TRNC up to the standards of the EU has not really been given a thorough cost-benefit analysis (International Crisis Group, 2014). A two state solution would introduce or exacerbate current economic challenges, like the paucity of internal trade and separate monetary systems. Refusal to recognize each other's economic and governance institutions keeps feeding the division of the island.

### **3.8.6 EU Matters chapter**

In 1992, the European dimension had not yet emerged, even though the Greek Cypriots had submitted an application to join the European Union. It was assumed that the island would be reunited and therefore in due course accession negotiations would take place which would eventually put a referendum to both sides if the outcome of such negotiations were successful (Hannay, 2005).

In 1998, the Greek Cypriot application for the EU accession was endorsed by the Commission, which consequently prompted accession negotiations the same year (Hannay, 2005). The Turkish Cypriots, however, initially disassociated themselves from these negotiations (Attalides, 2010; Hannay, 2005) as Turkey and the Turkish Cypriots attempted to persuade Europe that EU membership for the Greek Cypriots would be illegal and therefore should not be granted until a settlement was reached in the negotiations. The Helsinki European Council stated clearly, however, that a settlement between the Greek and Turkish Cypriots was not a precondition for EU membership (Attalides, 2010; Hannay, 2005).

The Greek Cypriot application for EU membership had the potential to motivate both sides at the negotiating table, and for the Greek Cypriots accession was seen to be a shield against aggression on the part of the Turkish military stationed on the island. Furthermore, the idea of Greek Cypriot membership of the EU could offer diplomatic advantages, given Turkey's interest in also joining the EU.

By 2004, the UN-proposed Annan Plan resulted in a push by Turkey for a resolution of the Cyprus dispute, which was proving an obstacle to Turkey's entry into the EU. Furthermore, Turkish Cypriots were beginning to see advantages for themselves from joining the EU by way of reunification with Greek Cyprus. A number of European Union, Greek and Cypriot analysts have noted, however, that the Cypriot EU accession was actually a disincentive for the Greek Cypriots to find a solution (Attalides, 2010).

The EU and its member states, however, signalled their preference for the accession of a reunited Cyprus rather than a divided one, and during the last year before their terms of accession were settled by the European Union, 'the Greek Cypriots showed more flexibility on a wider range of issues than at any previous stage of the 30 years of negotiations' (Hannay, 2005, p.46). However,

reunification, as always, faced many political and legal hurdles. From the political side, given the disparity in gross national product (GNP) per capita between the Greek and Turkish Cypriot parts of the island of around 20-25% more GNP in the north than in the south, the EU funding and the subsidy would be higher for the Turkish Cypriot side. Moreover, the disparity in incomes between the north and the south raised concerns among the Turkish Cypriots of a potential influx of Greek Cypriots to the north to buy properties and businesses (Hannay, 2005).

Legal hurdles facing accession of the Republic of Cyprus by the EU, with or without reunification, involved the compatibility of Cypriot law and EU law, referred to as *acquis communautaire*, covering all treaties, EU legislation, international agreements, standards, court verdicts, fundamental rights provisions and horizontal principles in the treaties such as equality and non-discrimination.

It was clear by this point that negotiations to enter the EU and negotiations to resolve the crisis in Cyprus were going to occur somewhat simultaneously, which has posed numerous problems at the technical and political level for all parties concerned (Hannay, 2005). The Turkish Cypriot side had no legislation prepared to be adapted to the *acquis communautaire* (Hannay, 2005). And, although the Commission made attempts to help redraft current legislation, Denktaş refused to adopt and adapt (Hannay, 2005).

Turkish Cypriot leader Denktaş appeared to be disinterested in the fact that the Republic of Cyprus was on the way to becoming an EU member (Hannay, 2005). Nor was Denktaş interested in reunification, insisting on a two state solution for two decades, while he was in power in the North. When the Turkish Cypriot government rejected the Annan Plan, Turkish Cyprus lost a one off opportunity to join the EU, which could have liberated the North from ‘poverty, isolation and economic stagnation’ (Hannay, 2005, p.47).

### **3.9 Convergence paper: 2008-2012**

It is important to note that during the years 2008 through to 2012, the Greek and Turkish Cypriots generated a document called *Convergences 2008-2012*. This promised to be the foundation for divergent and convergent views expressed by both sides. Interestingly, the notion of ‘convergence’ within the document raised questions and prompted debates by political observers as the notion of convergences was perceived to be a somewhat vague concept’ (Morelli, 2014, p.14).



Although the convergence paper was generated, later on both Anastasiades and Eroğlu specifically outlined their non-commitment to *Convergences 2008-2012*, despite the fact that some of the elements from the convergences paper were adopted in the Joint Declaration which was signed between the sides in February 2014. However, both sides have shown signs of uncertainty and ambiguity over the content of the Joint Declaration (despite their initial agreement in February 2014 (Morelli, 2014)).

### **3.10 Summary**

An overall examination of political negotiations and mediation efforts between 1964 and 2004 reveal that the negotiation and mediation forms adopted by the United Nations fall into the pattern of traditional mediation. Neutrality and non-adoption of coercive power served the basis for traditional mediation in Cyprus (Diez & Tocci, 2009). Technique and approaches adopted by the United Nations corresponded to traditional forms of mediation. The core approach by the United Nations was to criticize the sides for not displaying the ‘good will’ to reach a settlement, and therefore no force was exerted on the sides to reach an agreement or push the sides in an intended direction (Diez & Tocci, 2009).

An example of a traditional form of mediation was seen in the Set of Ideas which provided the sides with the ‘conduit between the two sides for proposals that the sides themselves could not advance’ (Diez & Tocci, 2009, p.160). Similarly, the High Level Agreement in 1977 was one for which the ‘UN... provided a vital audience for the two sides that has helped to keep talks going; one example of this was during the inter-communal talks in the 1960s’ (Diez & Tocci, 2009, p.160). The overall conclusion is that the traditional forms of mediation pose limitations on political negotiations (Michael, 2014).

The Annan Plan provided a slightly different approach. Although it was based on mediation, the form of mediation during the Annan Plan took a different form, shifting to arbitration. This slightly new approach resembled elements from arbitration which were seen in the actual process and in ‘the functions performed by the intermediary’ (Diez & Tocci, 2009, p.160). Later on it was acknowledged by the Greek Cypriots that it was a form of arbitration which was imposed on the sides (Diez & Tocci, 2009; Michael, 2009).

The process in the Annan Plan had a clearly defined timetable and was conducted within a concrete framework without the notion of the open-ended discussions (Diez & Tocci, 2009). Both sides had to consult the UN when deciding the final terms of an agreement as the UN had grown to be the arbiter when the sides could not agree at the end of each period of negotiation. The political leaders were not permitted 'to reject the outcome in any direct manner' (Diez & Tocci, 2009, p.161). Whatever was presented to the UN was an 'agreement' and not a 'proposal' open for the discussion by the sides (p.161).

There were opponents to the plan who felt that it had been imposed on the two sides. The plan was, however, 'the distilled product of many decades of negotiations' (Diez & Tocci, 2009, p.161). The UN acted during the Annan Plan period as never before in the history of negotiations, and it was accepted by many that the organisation acted in an appropriate manner, given the long history of failed negotiations. On the other hand, there were people who felt that the UN's actions were those of an outsider imposing themselves on the both sides. Given this attitude, it was easy for Papadopoulos to urge the public to reject the plan (Diez & Tocci, 2009).

Between 2008 and 2012, during the Christofias-Talat round of negotiations, the three major parties – Greek Cypriots, Turkish Cypriots and Turkey – appeared to be genuinely committed to settlement for the first time since 1974 (International Crisis Group, 2014). The round of talks between Anastasiades and Eroğlu sought a 'lighter federation' (International Crisis Group, 2014, p.6). It has been pointed out that the process of negotiations took a cynical turn. As described by the Turkish Cypriot negotiator:

*the talks maintain and preserve the Cyprus status quo. So when you fail, you start again... The UN parameters are the tool we always use against each other...It's like a tennis match. (p.7)*

It has been also said that:

*the whole current set-up is based on not solving the problem.... We can't help the two sides more than they want to help themselves... the international community is waiting for a new idea, everyone, the Turks, the Greek Cypriots, the Turkish Cypriots. Someone's just got to shake them out of their cycle. (p.7)*

The International Crisis Group (2014) emphasized that ‘Anastasiades’s longstanding efforts to forge links/connections with Turkish Cypriot and Turkish leaders offered hope of new impetus (p. 2). The issue of linkage has been further reinforced:

*The linkage approach to negotiations has meant that there could be no settlement unless all aspects of the Cyprus problem (for example, constitution, territory, and security) were simultaneously agreed upon. (Michael, 2009, p.205)*

The Greek and Turkish Cypriots have acknowledged the need for the issues to be negotiated interdependently and therefore they have introduced and reinforced it in their 2014 Joint Communiqué. The notion of linkage was revealed in the Joint Communiqué on 11 February 2014 in the form of the concept of interdependence. It is important to note that although the political negotiations are affected by socio-economic and political domestic, regional and international intricacies, nevertheless the notion of ‘linkage’ has been accentuated throughout this thesis (e.g. absence of linkage between Property and Territory chapters), may suggest that it has contributed to the periodical stalemates in the system of political negotiations.

This chapter focused on reviewing historical events within the intractable conflict in Cyprus and the Cypriot system of political negotiations to serve as the contextual background and the philosophical discourse which would provide a basis for further analysis. The insights from the contextual background of the conflict and negotiations are crucial in understanding why the system of political negotiations between the years 2008-2014 periodically stalled, which left the sides with little or no progress on substantive chapters. This chapter serves as a basis for the analytical framework of the political negotiations within the context of the complexity theory. Due to limitations of the thesis, only a selective account of historical events has been presented in this chapter.

The intractable conflict of Cyprus is multidimensional and not static. The case of Cypriot political negotiations is an impeccable example of an intractable conflict intertwined with complexity, uncertainty, unpredictability, emergence, and domestic, regional and international dynamicity. Historical events not only shaped the very nature of the Cypriot conflict and consequently political negotiations, but also contributed to the creation of the Cypriot divisive mentality (Hannay, 2005), which has in turn contributed to the intractability of the conflict. The historical events have been

intricately intertwined with the Cypriot conflict and political negotiations to reach psychological and socio-economic and political dynamic that has 'obstructed resolution to the Cyprus problem' (Michael, 204, p.117). The islanders' historically shaped divisive mentality translated into the system of political negotiations and prevented the sides from overcoming impediments to finding the middle ground for essential conciliations that could provide for a potential settlement (Hannay, 2005).

An additional challenge in the negotiations was the notion of 'bi-zonal and bi-communal' federation (Michael, 2014, p.117). This notion stems not only from the territorial division of the island since 1974 and consequent political partition between the Greek and Turkish Cypriots, but also from the divisive perceptions of the sides that became pervasive in the psyche of the islanders. The divisiveness was perpetuated in a 'repetitious cyclical pattern where disagreements on the substantial issues saw both sides retreat to their entrenched positions' (p.117). Further obstructions in negotiations were 'dualisms' (p. 117) such as maintaining *vs* changing the status quo, unification *vs* separatism, federation *vs* confederation, unitarism *vs* decentralization (p.117).

Beyond obstruction, there is simply an underlying climate of mistrust between the sides, which inhibits any approach to a settlement. It is this underlying psychological element, as well as the tangible politico-structural nature of the situation that maintains the status quo (Michael, 2014, p.117).

Although the obstacles to settlement have been abundantly acknowledged in the literature, the issue of connectivity (linkages) between the negotiated chapters in the system of negotiations between the years 2008-2014 has to some extent been marginalized. Even though the absence of linkage explicitly revealed itself between the chapters of Territory and Property between the years 2008-2014, nevertheless the sides have only recently acknowledged the notion of 'interdependence' with the introduction of the 2014 Joint Communiqué. This has meant that the political negotiations should have been conducted interdependently and that the failure to consider the connectivity between the negotiated chapters between 2008 and 2014 is now acknowledged.

Chapter 4 introduces complexity theory and selected relevant concepts. It specifically focuses on the exploration of aspects of the complexity theory followed by an analysis of the political negotiation system within the context of complexity theory. An exploration of complexity aspects would be a guiding lens through which political negotiations could be understood and viewed.

## **Literature review: Complexity theory and selected concepts of relevance**

The chapter provides a multidisciplinary review of selected aspects of complexity theory. In particular, the scholarly work on complexity theory in the natural sciences is discussed, along with how the theory has been taken up by the social sciences. The research discussed is primarily based on the collective work of ‘complexity’ scholars from various fields, as well as from the fields of politics and conflict resolution utilizing complexity concepts. The reviewed materials are not restricted to any one stream, but encompass a variety of fields that make use of complexity theory.

The review is cross-disciplinary in nature. It aims to capture the relevant dimensions and convey valuable insights from the complexity literature. The purpose of the research was to introduce various ideas, aspects and concepts of complexity theory into the context of political negotiations in Cyprus, as well as extend the current applicability of aspects of complexity theory beyond the frontiers of the complexity theory domain, and broaden an existing knowledge of complexity theory into the field of political negotiations in Cyprus to subsequently generate a new literature and areas of knowledge for further academic inquiry and expansion.

### **4.1 Complexity theory**

Complexity theory has emerged from various fields and professions as a concept that can be called upon to assist our comprehension of the growing phenomenon of environment-determined complexity (Rapaport, 2012). It was initiated with the discovery of the quantum properties of energy and matter in the 1930s, which resulted in a new understanding of the physical world. One of the distinctive features of complexity revealed was that ‘the simple linear causality proposed in Newtonian theories of the behaviour of matter does not always hold’ (Ball, 2004; Capra, 1982; 1996, 2002; Gleick, 1988, Kauffman, 1996, Lewin, 1993; Prigogine, 1987).

The quantum properties of energy and matter demonstrate that the behaviour of matter can be unpredictable, forming new and emergent patterns without external causes. This insight has led to a new knowledge of nonlinearity (alongside existing linear causality) characterized by unpredictability, resulting in new interpretations and understanding of the behaviour of complex systems (Ball, 2004; Capra, 1982, 1996, 2002; Gleick, 1988; Kauffman, 1996; Lewin, 1993; Prigogine, 1987).

Discoveries in the physical sciences have gradually transcended barriers and spilled into other multidisciplinary and interdisciplinary research domains, from physical through to social sciences, to create a hybridized socio-physical scientific form to explore and tackle problems of social relations, health, the environment, weather, road traffic, internet and more. Emergence of such hybridized cross-scientific understanding has led to complexity analysis (comprehensive analysis) of dynamic interdependencies of global trends in the fields of nature, society, the physical and social sciences (Urry, 2003).

Complexity theory allows the examination of emergent properties and the effective understanding of these properties. Most interestingly, complexity theory is a means of dissolving boundaries between disciplines of the natural (physical) and social sciences (Urry, 2003). Due to the multidisciplinary nature of the theory, there is no one universally accepted definition of complexity. The concept is elusive and not explicitly describable (Cilliers, 1998).

Complexity surrounds us. The physical world is abundant in examples of complex systems. Complexity manifests itself in everyday life, where the notions of unpredictability, uncertainty, fluctuations and instability evolve and form structures in an interconnected web of complex systems within a multidimensional universe of time and space.

Complexity theory explores, *inter alia*, how the components of a system dynamically and interdependently interact to emerge in properties or patterns (Ashby, 2013; Richardson, 1984; Urry, 2003), and scientists attempt to understand how simple life forms (e.g. ants) are able to intelligently organize themselves to collectively create emergent mechanisms, patterns, learning and information systems to address complex dilemmas (Mitchell, 2009).

Scholars in the field of complexity theory understand that the structure of the system is formed by the interaction of the components of the system. Once an interaction occurs within the system, the components rearrange themselves to create a spatial pattern that yields structure. With the change in structure, the system changes (Richardson, 1984).

The evolution of a system occurs through interaction, while effective interactions lead the system to be more organized (Current, 2000), because the interactions and behaviour of the elements of the system lead to the emergence of its dominant characteristics, while also allowing for the creation of

new patterns and relationships (Richardson, 1984). The state of a system is therefore manifested through (emergent) variables and interactive dynamicity (Cilliers, 1998; Vallacher et al., 2013). For that reason complexity is also concerned with the emergent, evolving and changing behaviour of system properties and patterns (Urry, 2003).

Ultimately, the dynamic nature of systems through the increased number of different interactions results in new patterns and a network of subsystems, where the component parts cannot be segregated or analyzed as independent static entities as they are entangled, intertwined, connected and interconnected with each other (Richardson, 1984). The dynamicity constitutes the basis for complex dynamic systems (Juarrero, 2010).

The entangled nature of a complex system generates novel *macroscopic behaviour* manifesting the *spontaneous formation of distinctive temporal, spatial or functional structures* (Vallacher et al., 2013).

Change occurring over time in a system is called a *process*. Commonly, processes emerging within the system may cause changes to the structure of the system that may prove irreversible. The change can be continuous, sporadic or static for long time periods. If the change cannot be reversed, both the structure and the function of the system will be altered (Richardson, 1984).

Independent, multiple, dispersed systems that interact and are interrelated are regarded by researchers as a *system of systems* (SoS). These complex SoS are researched particularly in the fields of sociology, biology, engineering, and the military (Bar-Yam et al., 2004; Rapaport, Ireland & Gorod 2012). Each of the fields of study emphasises SoS with characteristics of particular interest to the discipline. For instance, Sage and Cuppan (2001) emphasize the operational and managerial independence, geographic distribution, emergent behaviour and evolutionary development of complex adaptive systems; while Lukasik (1998) outlines the integration of systems into SoS, ultimately contributing to the evolution of social infrastructure. Finally Kotov (1997) puts emphasis on the complexity found within the systems (Rapaport, Ireland, & Gorod, 2012).

## **4.2 The nature and application of complexity theory**

### **4.2.1 Uncertainty, unpredictability and bifurcation points**

Uncertainty, unpredictability, lack of centralized governance and hierarchical structure are the core features of complex systems. For this reason, complex systems are more susceptible to strong interactions of elements within the system. High levels of interaction yield uncertainty and irreversibility (Urry, 2003). Harrison (2006) defines a system as a set of elements interacting in an interconnected way to create a whole. He portrays a system, in either the form of an atom, or a human being as a living organism encompassing interactive subsystems, or a country or an economy (Harrison, 2006).

Prigogine (1984; 1987) and Nicholis & Prigogine (1977) observe that micro dynamic changes of dissipative structures result in stable macro-appearance, but that the structures seem to be far from equilibrium and even though dynamic systems may acquire a stable macro-pattern, nevertheless with a sudden change, a previously stable macro-pattern may reach a *bifurcation point* where the system disintegrates, a pattern can no longer be distinguished and a state of chaos ensues, out of which a new ordered pattern could emerge (Ball, 2004; Capra, 1982; 1996, 2002; Gleick, 1988; Kauffman, 1996; Lewin, 1993; Prigogine, 1987). The actors in a system are clearly going to be entwined in a co-evolutionary relationship with the other components of the system and the rules that characterise it, and will be constantly pressed to use the rules to adapt as the system changes (Harrison, 2006). Harrison (2006) explains political regimes in the context of complex systems, noting that: 'Through complexity it is possible to understand actors' perceptions of the problems and the solutions deemed possible' (p.97).

### **4.2.2 Complexity in biological systems**

Complex systems can be found in a wide variety of fields and environments. Hence a complex systems analogy can be extended to the sophisticated operability of ant colonies as a collective biological system and a mechanism. Interestingly, individual ants as living organisms perform the simple tasks of finding food or responding to threats of intruders, while their collective behaviour and operability surges to construct complex network structures such as nests, bridges, and underground passages (Mitchell, 2009). The planet earth is another example of a complex system. Earth is a system encompassing living and non-living organisms whose interactions result in systems and subsystems. Thus, the interaction of people on earth is complex (Richardson, 1984).



Another complex system is the brain of the human, where superficially simple neurons in the brain appear to be simple elements of a system. However, neuronal interaction leads to the creation of patterns which may be responsible, in the view of scientists, for emotions, consciousness, perceptions, thoughts and feelings (Mitchell, 2009).

#### **4.2.3 Complexity in socio-economic systems**

An economy can be perceived as a complex system which consists of complex mechanisms entailing various entities, such as individuals, households, businesses, banks, investors, government agencies and market places to conduct buy-sell operations. These entities continuously interact with each other, establishing diverse relationships, whether it is in trade, buy and sell transactions, trade arrangements and transactions, services and investments, exploration, forecasts, innovation and more. An economy is a massive set of behaviours resulting in the formation of markets, prices, forecasts and trading arrangements. Various individual behaviours aggregate into patterns throughout the economy (Arthur, 2013).

The behaviour and the patterns of a market place in a global setting are dynamic, uncertain and hard to predict. Unpredictability contributes to the price fluctuations of commodities, or goods and services and the real estate market. The unpredictable behaviour of the economy and the market may lead to volatility and instability in the banking sector or to financial and fiscal crises, leaving households, the government and business entities in disarray. To achieve a state of equilibrium and market efficiency in the market place is difficult.

Individual behaviour responds to aggregated patterns in a recursive loop. Arthur (2013) implies that the recursive loop connects with the complexity. The interaction of the elements creates patterns, and the patterns cause elements to adapt to emerging changes that further create new patterns and so on. Arthur further suggests that the science of complexity explores the evolution of the economy and the behaviour of individual agents that form patterns and the reaction of these individual agents to the created pattern and how the pattern then adapts. It is clear that the elements within the system have a degree of autonomy, and that these autonomous, independent systems respond to the environment (Arthur, 2013).

In previous years economics attempted to take a simpler approach which was more amenable to mathematical analysis:

*It asked not how agents' behaviors would react to the aggregate patterns these created, but what behaviors (actions, strategies, expectations) would be upheld by—would be consistent with—the aggregate patterns these caused. It asked in other words what patterns would call for no changes in micro-behavior, and would therefore be in stasis, or equilibrium. General equilibrium theory thus asked what prices and quantities of goods produced and consumed would be consistent with—would pose no incentives for change to—the overall pattern of prices and quantities in the economy's markets. (Arthur, 2013, p.2)*

#### **4.2.4 Complexity in political systems**

Political and socioeconomic systems exhibit complexity, as they maintain continuous levels of uncertainty and unpredictability. When these conditions are escalated, they can put systems into a state of flux, disintegration and disequilibrium (Holland, 1992). An example of a complex social system is the European Union. Dinan (2014) asserts that the complexity lies within the scale of integration and in the inability of European Union citizens to understand the whole. The peoples of the EU are familiar with their national political systems. They are, however, distant from the unified whole, which is based on 20 official languages. The connectivity between the nation states and the politics of European integration needs to be improved. Even though the Europeans appreciate the advantages of the European Union, a more cohesive EU integration would benefit all the people, given the level of global and regional uncertainty (Dinan, 2014). Holland (1992) concludes that disequilibrium in political contexts is due to the dynamic interaction of entities within the system. Such interactions create a network which may be changed when bifurcations are introduced into the system (Holland, 1992).

Interestingly, Vallacher et al (2013) view intractable conflicts as social systems which encompass high levels of negative interactions between interconnected elements which eventually amount to intractability. The dynamics of social systems involve complex patterns of thought, action and feelings, often heightened in a conflict-driven context. Real world complexity in intractable conflicts is difficult to understand for both outsiders and those in the system because the complex system encompasses such a unique combination of 'historical, economic and social factors' (Vallacher et al., p.9).

#### **4.2.5 Complexity in social systems**

Luhmann (1981) argues that world society is a social system. He points out that social systems are complex and that meaningful communication is the foundation of a functioning system. The role of communication is to connect actions and events to reproduce and build up a social system. Such systems are *autopoietic*. The environment within which the system exists is likely to include political and economic systems and various other social systems. Ideally, the communication between the social systems will consist of the characteristic communication of the society so that it offers ‘meaningful horizons for further communication’ (Luhmann, 1982, p.131).

*The boundaries of its subsystems can no longer be integrated by common territorial frontiers. Only the political subsystem continues to use such frontiers because segmentation into ‘states’ appears to be the best way to optimize its own function. It therefore becomes impossible to limit the society as a whole by territorial boundaries. The only meaningful boundary is the boundary of communicative behaviour, i.e. the difference between meaningful communication and other processes. Neither the different ways of reproducing capital nor the degrees of development in different countries give convincing grounds for distinguishing different societies. (p. 132)*

Harrison (2006) implies that complex social systems are characteristic of economic markets and world politics because of the levels of volatility and uncertainty. These systems rarely experience temporary equilibrium points, which by definition implies less stability which continues for any meaningful period of time. He further points out that the:

*Dynamic European system has found several momentary points of balance between myriad forces. Tudor England understood the need to change alliances to continually balance power in Europe. Though power was balanced in Europe before World War I and in the Cold War, the conditions were unique to each period. (p.11)*

#### **4.2.6 Simple/complicated/complex/chaotic**

To thoroughly understand the concept of complexity, and in order to make the definition clearer, analysis of complexity characteristics is required (Cilliers, 1998). However, before proceeding with the analysis, a fundamental distinction should be made between the concepts of ‘simple’ and ‘complex’ systems (Cilliers, 1998; Kurtz & Snowden, 2003).

Systems can range from simple to complex (Cilliers, 1998; Nicolis & Prigogine, 1989) and are defined by specific sets of characteristics incorporating various elements. Even though a system

may appear simple, the level of interaction and the behaviour of the components in the system may suggest that a system has a complex (network) structure (Cilliers, 1998; Prigogine 1989; Richardson, 1984). Simultaneously, a system which appears to be complex may eventually be revealed as simple because the level of interaction and the behaviour of various elements within the system are more organized and hierarchical – as in the combustion engine (Cilliers, 1998). Characteristics of complex systems therefore are not ‘determined by the view point of the observer’ (Cilliers, 1998, p. 3).

Harrison (2006) asserts that the system is simple when the ‘units and their relations are fixed’ and when the future state of a system is predictable. For Harrison an automobile is a simple system even though it may look complicated. An automobile is constructed of parts where each part has its own function and the ‘actions of all parts are centrally coordinated toward a collective outcome’ (p.2). Diversity and decentralization are the key differences between simple and complex systems. Parts within the automobile have their own function and role; however the system as a whole is being centrally coordinated through mechanical management systems. On the other hand, the parts of a living system are diverse and therefore have their own autonomy in terms of decision making. This is because parts within a living system (an organism) ‘have discretion in their choice of behavior; they are commonly called ‘agents’ (p.3). The choices of the agents lead to decentralization and therefore to increased complexity.

Harrison emphasizes that centralization in simple systems prevents freedom of choice by its components. In living systems, freedom of choice is prevalent and therefore decentralization leads to choices of actions (Harrison, 2006). For instance, the regimen of ants is perceived to be a more centralized regimen than that which controls a herd of horses, and therefore imposes greater non-freedom of choice. Mammals are perceived to be ‘more complex than ant hills or bacterial infections’ (p.4), which implies that as an increase in the ‘degrees of freedom of choice for individual members in a system increase, the range of individual behaviour increases, making the system more complex’ (p.4).

To that end, it is fundamentally important to understand that if a system is simple, then it is possible to decompose the system into parts. ‘It is nothing more than its parts and their defined relationships’ (Harrison, p.4, 2006). For example, an automobile can be decomposed and

composed again with the same parts or like substitutes, and it will work the way it worked before. However, if a living organism is decomposed by the removal of one or more parts, these parts may be impossible to replace, or, if replaced, may not function as it functioned prior to decomposition or will stop functioning altogether, so that the system is destroyed (Harrison, 2006).

Capra (2002) argues that complex systems are not the sum of their simpler parts (Capra, 2002). Harrison shares the same view, noting that the desire of social scientists to conduct analysis in a controlled laboratory environment, decomposing them into parts is not efficient, as a laboratory 'is designed to close the systems under study' (Harrison, 2006, p.4).

Simple systems are static and therefore 'tend to equilibrium' (Harrison, 2006, p.4). Complex systems on the contrary are dissipative and dynamic. Without the injection of energy into the system, a simple system can remain unchanged for long periods of time. For instance, without human control or the injection of the fuel into an automobile, an automobile will remain a static system in equilibrium. On the contrary, however, a living system is a dynamic system that is self-motivated, and perpetually changes. For living organisms, such as humans, the dynamical changes lead to aging processes and dying, where the dynamic process is one in which cells act and interact and relationships between them change.

Living organisms are dissipative structures since the energy for the organism is being drawn from the environment in the form of oxygen, food or water in order to survive (Harrison, 2006). However, because every element in a living organism acts and reacts with a degree of independence (as well as interdependence) to its environment, it is a perfect example of a set of complex systems. The behaviour of each system in the complex environment is unpredictable and nonlinear enough to be difficult to represent mathematically. To predict the behaviour of a complex system, we therefore rely on the extrapolation of our predictions from historical processes, always running the constant risk of nonlinear change (Harrison, 2006).

*The range of possible system paths for a complex system widens dramatically. Decentralized decision-making and diversity among agents permits a wide range of agent actions and openness to changes in environmental conditions (the state of another complex system), and the prevalence of positive feedback loops inject further uncertainty into the system under study. (p.5)*

If we take the human organism as an example of a SoS, how can a blood cancer be predicted in what appears to be a healthy system (the blood) in the midst of other body systems. As Harrison (2006) points out, the prediction of the behavior of a complex system is challenging for all the reasons above. However, he notes that the simulation of complex system behavior can be achieved through the interaction of agent behaviour (Harrison, 2006).

It should be noted that, as suggested by Cilliers (1998), that there is a distinction between complex and complicated systems. In a complicated system many elements are responsible for sophisticated tasks and yet it is still conceivable to accurately analyze these tasks and system as a whole. Cilliers (1998) notes that a snowflake, a cd player or a jumbo jet are examples of complicated systems, while complex systems are usually concerned with living organisms such as a 'bacterium, brain, social systems, language' (p.3). Complex systems contain a large number of elements interacting dynamically with each other in a nonlinear manner creating 'intricate sets of nonlinear relationships'(p.3). Cilliers (1998) concludes that the analysis of complex systems is dynamic by nature, causing a wide variety of distortions during analysis.

The characteristics of the complex system according to various researchers can be summarized as follows (Cilliers, 1998):

*Complex systems consist of large number of elements. When the number is relatively small, the behaviour of the elements can often be given a formal description in conventional terms. However, when the number becomes sufficiently large, conventional means (e.g. a system of differential equations) not only become impractical, they also cease to assist in any understanding of the system. (pp.3-4)*

A large number of elements are necessary, but not sufficient to create a complex system. The grains of sand on a beach are many, but are not a complex system. In order to constitute a complex system, the elements have to interact, and this interaction must be dynamic. A complex system changes with time. The interactions do not have to be physical; they can also be thought of as the transference of information.

The interaction is fairly rich, i.e. any element in the system influences, and is influenced by, quite a few others. The behaviour of the system, however, is not determined by the exact amount of interactions associated with specific elements. If there are enough elements in the system (of which

some are redundant), a number of sparsely connected elements can perform the same function as that of one richly connected element.

The interactions themselves have a number of important characteristics. Firstly, the interactions are nonlinear. A large system of linear elements can usually be collapsed into an equivalent system that is very much smaller. Nonlinearity guarantees that small causes can have large results, and vice versa. It is a precondition for complexity.

The interactions usually have a fairly short range, i.e. information is received primarily from immediate neighbours. Long-range interaction is not impossible, but practical constraints usually force this consideration. This does not preclude wide-ranging influence – since the interaction is rich, the route from one element to any other can usually be covered in a few steps. As a result, the influence gets modulated along the way. It can be enhanced, suppressed or altered in a number of ways.

There are loops in the interactions. The effect on any activity can feed back onto itself, sometimes directly, sometimes after a number of intervening stages. This feedback can be positive (enhancing, stimulating) or negative (detracting, inhibiting). Both kinds are necessary. The technical term for this aspect of a complex system is *recurrency*.

Complex systems are usually open systems, i.e. they interact with their environment. As a matter of fact, it is often difficult to define the border of a complex system. Instead of being a characteristic of the system itself, the scope of the system is usually determined by the purpose of the description of the system, and is thus often influenced by the position of the observer. This process is called framing. Closed systems are usually merely complicated.

Complex systems operate under conditions far from equilibrium. There has to be a constant flow of energy to maintain the organization of the system and to ensure its survival. Equilibrium is another word for death.

Complex systems have a history. Not only do they evolve through time, but their past is co-responsible for their present behaviour. Any analysis of a complex system that ignores the dimension of time is incomplete, or at most a synchronic snapshot of a diachronic process.

Each element in the system is ignorant of the behaviour of the system as a whole, and responds only to information that is available to it locally. This point is vitally important. If each element ‘knew’ what was happening to the system as a whole, all of the complexity would have to be present in that element. This would either entail a physical impossibility in the sense that a single element does not have the necessary capacity, or constitute a metaphysical move in the sense that ‘consciousness’ of the whole is contained in one particular unit. Complexity is the result of a rich interaction of simple elements that only respond to the limited information each of them are presented with. When we look at the behaviour of a complex system as a whole, our focus shifts from the individual element in the system to the complex structure of the system. The complexity emerges as a result of the patterns of interaction between the elements’.

Table 4.1 depicts characteristics of simple and complex systems exemplified with examples as outlined by Harrison (2006):

**Table 4.1. Characteristics of simple and complex systems (Harrison, 2006, p.3)**

<b>CHARACTERISTICS OF SIMPLE AND COMPLEX SYSTEMS</b>	
<b><i>Simple Systems</i></b>	<b><i>Complex Systems</i></b>
Few agents	Many agents
Few interactions	Many interactions
Centralized decision-making	Decentralized decision-making
Decomposable	Irreducible
Closed system	Open system
Static	Dynamic
Tend to equilibrium	Dissipative
Few feedback loops	Many feedback loops
Predictable outcomes	Surprising outcomes
<b><i>Examples:</i></b>	<b><i>Examples</i></b>
Pendulum	Immune systems
Bicycle	Genes
Engine	Molecules in air
Boyle’s law	Ecosystems
Gravitational system	Markets

Moreover, complexity prevents the construction of predictive models encompassing cause effect features due to a wide variety of ‘explanatory factors’ and ‘omitted variables’, as well as ‘imperfect information’ (Carment & Rowlands, in Avenhaus & Zartman (Eds.), 2007, p.46), although it must be acknowledged that these views are not universally accepted by researchers in the field.



Likewise, as a rule, complex systems are characterized by multiple equilibria and consequently present multiple solutions, whereas game theory does not (explicitly) reflect equilibria multiplicity, but rather is focused on 'a unique equilibrium as a rational outcome of a game' (Wierzbicki, in Avenhaus & Zartman (Eds.), 2007, p.69). Multiplicity of equilibria may lead to conflict escalation due to the actor's choice of a certain equilibrium contradictory to the choice of the other actor, hence it may lead to deeper differences between the actors and decrease the prospects for any kind of agreement (p.69).

Urry (2003) infers that complex systems are seen to be on the edge of chaos because order and chaos create a sense of balance and are not in a state of anarchy or anarchic randomness. A system found on the edge of chaos presents itself to be in an organized disorder.

Urry (2003, p.80), citing both Cilliers (1998) and Gilbert (1995), argues that 'any emergent complex system is then the result of a rich interaction of simple elements that only respond to the limited information each is presented with'. Thus, while across the world billions of actions occur, each is based upon localized information. People act iteratively in terms of what can be known locally and there is no global control over the system. Agents act in terms of the local environment, but each agent adapts, or co-evolves, to local circumstances. But they adapt or co-evolve 'within an environment in which other similar agents are also adapting, so that changes in one agent may have consequences for the environment and thus the success of other agents' (Gilbert, cited in Urry, 2003, p.80).

A further consequence of this flowingness of time is that minor changes are able to produce potentially massive effects in the present or future. Such small events are not 'forgotten'. Chaos theory in particular rejects the common sense notion that only large changes in causes produce large changes in effects. Following a perfectly deterministic set of rules, unpredictable yet patterned results can be generated, with small causes on occasions producing large effects and vice versa. The classic example is the butterfly effect that was accidentally discovered by Lorenz in 1961 (Urry, 2003).

Time and space, he argues, are internal to the processes by which the physical and social worlds themselves operate, helping to constitute their very powers. Such a view leads to the thesis that there is not a single time but multiple times and that such times appear to flow. In the best-selling *A*

*Brief History of Time*, Stephen Hawking summarizes how space and time are now understood as dynamic qualities:

*when a body moves, or a force acts, it affects the curvature of space and time – and in turn the structure of space and time – and in turn the structure of space-time affects the way in which bodies move and forces act. (1988, p.33)*

Quantum theory generally describes a virtual state in which electrons appear to try out instantaneously all possible futures before settling into particular pattern. Quantum behaviour is instantaneous, simultaneous and unpredictable. The interactions between the parts are far more fundamental than the parts themselves. Bohm refers to this as the occurrence of a dance without dancers (Zohar & Marshall, 1994). Conventional notions of cause and effect do not apply within an indivisible whole where the interrelations between the parts are more fundamental than the individual parts. Really there are no parts at all as understood in mechanistic, reductionist thinking. There are only relationships, or, as Capra (1996) expresses it: ‘the objects themselves are network relationships, embedded in larger networks...the relationships are primary’ (p.37), a notion to which this thesis often returns.

Figure 4.1 illustrates the concept of the relationships between ‘simple’, ‘complicated’, ‘complex’ and ‘chaotic’, known as the Cynefin Framework (pronounced *cu-nev-in*), a name chosen by the Welsh scholar Dave Snowden to describe the framework by which the evolutionary and interactive nature of complex systems could be considered, including their inherent uncertainty.

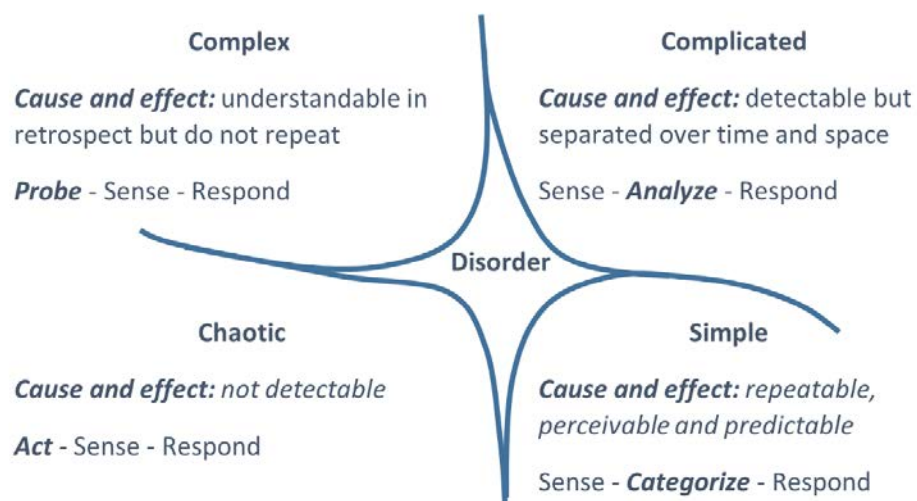


Figure 4.1 Cynefin framework (Snowden & Boone, 2007)

Vos Fellman, Bar-Yam and Minai (2015) assert that the common characteristics of complex systems can be summed up as

- large numbers of constituent elements and interactions
- nonlinearity of the characteristics depicting its behaviour
- various forms of hierarchical structure
- non-decomposability
- unpredictability
- self-organization (vos Fellman, Bar-Yam, Minai, 2015, p.38).

The characteristics of complexity further extend to ideas of

- artificial life
- autopoiesis
- universal bifurcation
- co-evolution
- emergent properties
- stability at far-from-equilibrium states
- fractal dimensionality and scaling behaviour
- power-law behaviour
- self-organized criticality
- sensitivity to initial conditions, as in the butterfly effect
- spontaneous self-organization
- other phenomena observed at the edge of chaos (vos Fellman, In Bar-Yam & Minai (Eds.), 2015, p.38).

Cilliers (1998) notes that observation of a complex system is a necessary step in order to understand the system as a whole. This requires, however, choosing the distance from which an observation will take place. The distance will determine the level of detail a viewer can observe. A short distance means that an observer is in very close proximity to the interacting elements in the system, close enough to determine the form of the individual elements, but too close to discern patterns, the nonlinearity and dynamicity of the system.

Unfortunately, the viability of an observation lies in detecting a meaningful pattern in the interaction of the components of the system as it emerges, changes and evolves (Cilliers, 1998). Therefore, framing the system of a single country with some individuals being economic agents could lend itself as an explanation of political negotiation processes in Cyprus (between the years 2008-2014 in the next chapter).

Cilliers (1998) continues that one of the most observable examples of a system would be an example of a snowflake. Its hexagonal patterned structure provides a good understanding of complexity characteristics. One snowflake consists of a 'large number of elements interacting through the crystalline structure' and it is in temporary equilibrium (Cilliers, 1998, p.5). It is not adaptable to the environment. As the temperature warms, the snowflake will change, but it will not adapt or evolve, but cease to be. The system of a snowflake is therefore not an open system. There is no feedback loop. Although a snowflake is a complex structure, it is only a complicated system (Cilliers, 1998).

An example of a complex system is the function of a mammalian brain. A brain consists of large numbers of neurons richly interconnected with each other to create a neuronal network. Each neuron is understood to be a processor which carefully calculates the sum of inputs it receives. Once this sum exceeds the threshold, the neuron 'generates output. This in turn becomes an input for other neurons, which are connected to the present one/neuron' (Cilliers, 1998, pp. 16-17). The connection between one neuron and another is called a synapse, a conjunction (Greek: *synapsis*) between the nerve cells. The synapse can either 'excite or inhibit the target neuron and it also determines the strength of the influence' (pp. 16-17). The flow of 'information from a sensory organ, for instance, is processed in this way and distributed to other parts of the brain where it can have specific effects, e.g. the moving of a muscle' (pp.16-17). A network of interconnected nodes can determine the function and the level of the operability of the brain and therefore can be modelled.

The transfer of information between neurons is nonlinear because the number and variety of signalling molecules in the area of synapse amounts to many hundreds. Connections between the synaptic nodes may be strong or weak, and the influence of the connection on the activity of the brain and the animal varies accordingly (Cilliers, 1998).

According to Hebb (1949), a model that can self-organize would require that the ‘connection strength between two neurons should increase proportionally to how often it is used’ (Hebb, cited in Cilliers, 1998, p.17). If neurons A, B and C act simultaneously, the strength of the connection increases. However, when the neurons are not sufficiently active, the strength of the connection decays. The same principle applies however the neurons connect. If neurons A and B interact regularly, the strength of the interaction will increase. If their interaction is sporadic, the connection will weaken and wane, while others might grow in strength. Hebb points out that the structure of the system is therefore created through connections and based on ‘local information available at each neuron’ (p.17). The dynamics between neurons and the development of the structure is referred to as ‘learning’ (p.17).

Importantly, when synapses are unable to form strong, likely or common bonds due to injury or illness, other neurons can, to various extents, be recruited and retrained to replace the damaged ones.

The behaviour of the synapses demonstrates the properties of a highly complex system, indeed. Helbing (2008) asserts that a war exhibits complex system behaviour. He offers a number of common characteristics existing within the complex system, complementing Cilliers’s work (p.305):

- There is feedback, both at the microscopic and macroscopic scale, yielding a system with memory, hence so-called non-Markovian dynamics.
- The time series of events is non-stationary, meaning that the character of the distribution may change over time.
- There are many types of ‘particle’, according to the various armed actors, and they interact in possibly time-dependent ways. A conflict’s evolution is then driven by this ecology of agents.
- The agents can adapt their behaviour and decisions based on past outcomes. The system is far from equilibrium and can exhibit extreme behaviour – for example, if the strategies of several groups of agents suddenly coincide.
- The observed conflict constitutes a single realization of the system’s possible trajectories.
- The system is open, with this coupling to the environment making it hard to distinguish between exogenous (i.e. outside) and endogenous (i.e. internal, self-generated) effects.

Richardson (1984) describes the characteristics and structure of a system using a socio-biological analogy. He begins with cells (first level), then moves on to organs (second level), organisms (third level), groups (fourth level), organizations (fifth level), societies (sixth level) and supranational systems (seventh level) (Richardson, 1984). The sixth level refers to **societies**. Society has been defined as

*... the type of social system which contains within itself all the essential prerequisites for its maintenance as a self-subsistent system.*

*In our terminology, such a system is totipotential. The modern form of society is the nation. Nations claim and defend specific geographical territories, have some form of central government, and ordinarily have distinct cultural characteristics. The components of societies are organizations of diverse types and functions. (Richardson, p.23)*

The seventh level refers to **supranational systems**.

*These systems are composed of two or more societies which undertake cooperative decision making and, to a greater or lesser extent, submit to the control of a decider super-ordinate to themselves. The level includes alliances, coalitions, and blocs as well as single-purpose and multipurpose intergovernmental organizations. Societies are represented in the meetings of these organizations by delegates. Examples of multipurpose intergovernmental organizations are the United Nations, the Warsaw Pact, and the European Economic Community. The European Organization for Nuclear Research (CERN) and the Food and Agriculture Organization (FAO) and single – purpose intergovernmental organizations. (Richardson, 1984, p.233)*

Pavard and Dugdale (2006) infer that:

*A complex system is a system for which it is difficult, if not impossible to reduce the number of parameters or characterising variables without losing its essential global functional properties. (Pavard & Dugdale, in Bar-Yam & Minai (Eds.), 2006, p.40)*

Researchers further state ‘that the complex system is completely irreducible’ (Pavard & Dugdale, in Bar-Yam & Minai, 2006, p.40). Researchers explain that due to the irreducibility, it is not possible to produce a simplified representation of reality ‘without losing all its relevant properties’ (p.40).

Pavard and Dugdale (2006) note that the reduction of complexity conforms to traditional scientific and analytic experiments. The reduction of variables allows scientists to study the subject matter in a controlled manner ‘with the necessary replication of results’ (p.40). However, Pavard and Dugdale question the nature of the reductionist analysis and therefore explore four properties of complex systems – non-determinism; limited functional decomposability; distributed nature of information and representation; emergence and self-organization (Pavard & Dugdale, in Bar-Yam & Minai (Eds.), 2006, pp.40-41).

### **4.3 Characteristics of linear and nonlinear systems**

#### **4.3.1 Linear systems**

It is widely understood that in **linear systems** small causes proportionately lead to small effects, while large causes equally lead to large effects. This phenomenon holds true for linear systems, where linear systems accentuate proportionality, consistency and are found to be near a state of equilibrium (Brockmann & Helbing, 2013; Urry, 2003).

Alberts and Czerwinski (1997) argue that the outputs in linear systems are proportional to inputs, ‘where the whole is equal to the sum of its parts, and where cause and effect are observable’ (Alberts & Czerwinski, 1997, p.iii). The notion of proportionality prevails in linear systems. Specifically, outputs are proportional to inputs and ‘system outputs corresponding to the sum of two inputs are equal to the sum of the outputs arising from the individual inputs’ (Jervis, in Alberts & Czerwinski (Eds.), 1997, p.22).

Alberts and Czerwinski further point out that predictable outcomes in linear systems are achievable through ‘careful planning’ and even success can be achieved through ‘monitoring and control’ (Alberts & Czerwinski, 1997, p.iii). In the philosophy of reductionism, these complex problems would be divided into elements, which would then be addressed separately in isolation for better manageability (Gell-Mann, in Alberts & Czerwinski (Eds.), 1997, p.2).

#### **4.3.2 Nonlinear systems**

On the other hand, inspecting components separately and then recombining them to look at the whole system imposes limitations on our understanding of complex **nonlinear systems** (Gell-Mann, in Alberts & Czerwinski (Eds.), 1997, p.8). This approach is considered to be inefficient as

'the whole is more than the sum of its parts' (Gell-Mann, in Alberts & Czerwinski (Eds.), 1997, pp.8-9). Jervis (1997) implies that system is:

*(a) a set of units or elements are interconnected so that changes in some elements or their relations produce changes in other parts of the system and (b) the entire system exhibits properties and behaviours that are different from those of the parts. (Jervis, in Alberts & Czerwinski (Eds.), 1997, p.20)*

This therefore suggests that the system is nonlinear and that outcomes cannot be understood 'by adding units of their relations' (Jervis, in Alberts & Czerwinski (Eds.), 1997, p.20).

Researchers point out that nonlinear systems appear in warfare, where inputs and outputs are not proportional to each other and where the whole is not quantitatively or qualitatively equal to its parts, and cause and effect are ambiguous and not evident. A nonlinear environment is by nature unpredictable and self-organizing to a certain extent, which frustrates conventional planners (Alberts & Czerwinski, 1997). For them, control is difficult because of the inclination of the system to self-organize and the presence of actionable variables that demand new ways of thinking and acting.

Researchers have noticed that complex systems exhibit nonlinear behaviour, where cause and effect disproportionally exist, and are characterized by unpredictability, uncertainty, and abrupt changes that create irreversible patterns in properties. Properties and patterns in complex systems are found to be far from equilibrium (Helbing, 2012; Urry, 2003). Furthermore, Rosenau (1997) (Rosenau, in Alberts & Czerwinski (Eds.), 1997, p.40) explains that a complexity perspective embraces non-equilibrium in human and natural systems that can be understood as a:

*mental set, a cast of mind that does not specify particular outcomes or solutions but that offers guidelines and lever points that analysts and policy makers alike can employ to more clearly assesses the specific problems they seek to comprehend or resolve. (p.40)*

Rosenau (in Alberts & Czerwinski (Eds.), 1997, p.40) argues that a complexity perspective neither negates nor rejects 'the role of history', but focuses on the 'historical context of situations as crucial to comprehension' (p.40). Saperstein (1997) adds that interactions in the system occur in a linear and/or nonlinear fashion in 'a fixed universe' (Saperstein, in Alberts & Czerwinski (Eds.), 1997, p.45). As an analogy, Saperstein provides examples of elements of interaction which are states,



while interaction itself occurs in the form of ‘war, negotiations, trade, cultural or terrorist exchange...’ within the world system (p.45). Saperstein states that if the system is governed by linear rules, then the outcomes are comparable to the inputs. In this case, he states that the prediction of the system is possible and therefore would be ‘useful to the policy maker’ (p.48).

However, if the rules of the system are nonlinear (involving competing human beings, for example), then the system may sensitively respond to ‘small changes in input or system parameters’ (p.48). Such conditions refer to chaos where it is difficult or impossible to control the future behaviour of the system. At the same time, it is possible to predict whether the system will behave chaotically, which means that it is possible ‘to predict unpredictability’, very beneficial for policy making (p.48).

Beyerchen (in Alberts & Czerwinski (Eds.), 1997, p.74) explains that the notion of linearity is an element of a human thinking. It accentuates stability and equilibrium and is focussed on prediction and control. Given these parameters, ‘linear systems are often considered being restrictive, narrow and brittle’ and non-adaptive to the environment. Beyerchen further infers that nonlinearity offers:

*A mix of threat and opportunity...Nonlinearity can generate instabilities, discontinuities, synergisms and unpredictability. But it also places a premium on flexibility, adaptability, dynamic change, innovation, and responsiveness. (p.74)*

Nonlinear systems are generally dynamic and often exhibit unpredictable behaviour. Whereas ‘linear’ implies that movement is in a straight line, nonlinear implies anything but a straight line. The inputs and outputs are not proportional, so that the sum is never the whole of its parts (Czerwinski, 2008). The cause of phenomena in the system is ambiguous, as are the effects (p.10). ‘Outcomes are arbitrarily sensitive to tiny changes in initial conditions’ (p.10). Researchers, such as Andriani Pierpaolo, Peter Allen, Steve Maguire and Bill McKelvey, highlight the fact that ‘gradualism’ and ‘equilibrium’ dominate world perception, while in reality the world is defined by nonlinearity, emergence, and self-organization and therefore complexity theory provides conceptual tools to understand the world (Maguire, Allen, & McKelvey, 2011, p.9).

Other researchers (Allen, Maguire, & McKelvey, 2011; Brockmann & Helbing, 2013; McKelvey, 2011; Urry, 2003) have confirmed that complex systems are predisposed to be far from a state of equilibrium, but enter and exit states of multiple equilibria and therefore ‘multiple stationary

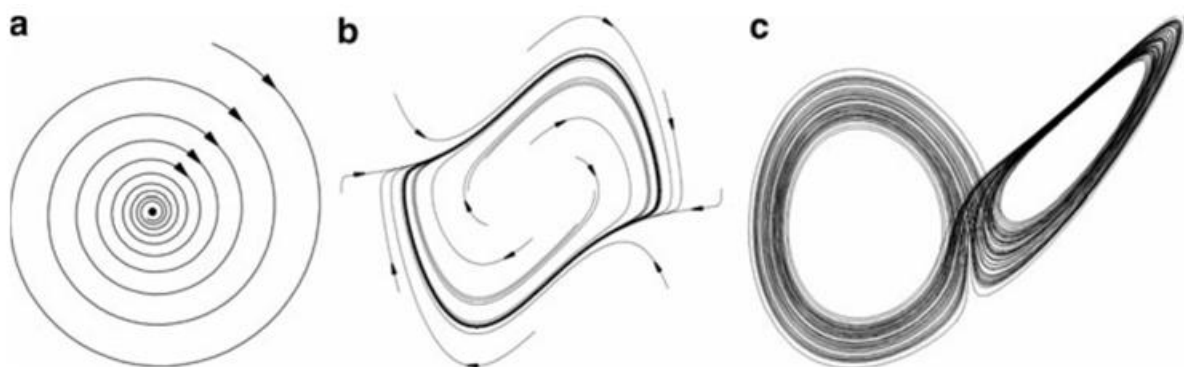
solutions'. Linear systems, on the contrary, appear to have only one stationary state, a single point of equilibrium, and a single optimal resolution. In addition, dynamical systems display a wide range of unpredictable behaviours that evolve without reference to the point of equilibrium (Fleischaker, Colonna & Luisi, 2012).

Jervis (in Alberts & Czerwinski (Eds.), 1997, p.22) finds that interconnections are prevalent in systems and therefore the characteristics of the parts within the system cannot be understood in isolation (p.22). Jervis further claims that linearity has been embedded in strategies to tackle difficult problems, that is:

*if a little foreign aid slightly increases economic growth, then more aid should produce greater growth. But in a system a variable may operate through a nonlinear function. That is, it may have a disproportionate impact at one end of its range. Sometimes even a small amount of the variable can do a great deal of work and then the law of diminishing returns sets in, as is often the case for the role of catalysts. (p.22)*

Urry (2003, p.24), citing Jervis (1997), infers that beyond the assumption of non-proportionality between cause and effect in nonlinear complex systems, there is an assumption of 'no necessary equivalence between the individual and statistical levels of analysis' (p.24), which implies that the notion of an individual in human understanding is very different to the notion of an individual within the context of statistical analysis or 'system level' (p.24). A third assumption is that the 'statistical or system effects are not the result of adding together the individual components. There is something else involved, normally known as emergence' (Jervis, cited in Urry, 2003, p.24).

Figure 4.2 is reproduced from the introductory chapter of Helbing's (Ed.) 2008 book *Managing complexity: insights, concepts, applications*.



**Figure 4.2** Illustration of trajectories that converge towards (a) a stable stationary point, (b) a limit cycle, and (c) a strange attractor (Helbing & Lämmer, in Helbing (Ed.), 2008, p.2), reproduced with permission from Springer Publishers.

Helbing (2012) further emphasise the fact that nonlinear interactions in complex systems do not necessarily result in chaotic behaviour (although they can). But nonlinearity is always 'characterized by emergent, spontaneous coordination or synchronization' (Helbing, 2012, pp.286-287).

Helbing (2012) asserts that robustness is the key outstanding feature of complex systems. Complex systems have a tendency to be attracted back to a 'natural state', therefore perturbations are met with a robust response (Helbing, 2012, p.288). It has been further argued that a complex system can have multiple states and therefore transitions between the states occur. It should be noted that 'phase transitions occur at so-called 'critical points' that are reached by changes of the system parameters' (p.288). During the transition phase, when the system reaches the 'critical point', the system may experience fluctuations that could become dominant and therefore may change the system. The system fluctuations perturb the system from its existing state into a state that forces a transition at a critical point, therefore the change maybe be quite abrupt (Helbing, 2012).

The core differences between linear and complex systems provide an observer with a novel understanding and interpretation of the world around us. This core observation certainly suggests that the physical world is plural and therefore a human observation and perception of the physical world changes to adopt a pluralistic view (Nicolis et al., 1989). Complexity then puts an argument forth that even though there are innovative processes which are based on prediction and certainty, these processes are flawed, given the complexity conception (Helbing 2008; Minai, Braha & Bar-Yam 2010). The resulting state is history-dependent, but different initial conditions will not automatically end up in the same state. This is sometimes called 'hysteresis'.

It may be hard to find the best, i.e. the global optimum, in the potentially very large set of local optima. Many nonlinear optimization problems are NP hard. That is, the computational time needed to determine the best state tends to explode with the size of the system. In fact, many optimization problems are combinatorially complex (Patil, Effken, Carley, & Lee, in Minai, Braha, & Bar-Yam, 2010, p. 274).

Elaborating further, the notion of predictable behaviour in physical systems is based on closed systems and therefore the notion of predictability is not applicable to biological systems. In

contrast, open systems are able to maintain order under non-stable conditions or under non-equilibrium conditions (Allen et al., 2011).

It can be seen that unpredictability contributes to nonlinearity in complex systems, and that any attempt to extrapolate a prediction using historical processes faces the threat of nonlinear change (Harrison, 2006), resulting a wide range of possible system paths. The prevalence of positive feedback loops generates additional uncertainty. Decentralization of the system creates diversity between various agents and allows for actions and openness in 'environmental conditions of a complex system and the prevalence of positive feedback loops inject further uncertainty into the system under study' (p.5) since small changes can have large effects. 'The nonlinearity of open systems prevents the theorist from mapping specific causes to observed effects' (p.8).

Harrison (2006) points to many international relations theorists (e.g., Rosenau 1990, 1997, 2003; Anderson, 1996; Hughes, 1997, 1999; Jervis, 1997; Earnest, 2001a; Urry, 2003; Alberts & Czerwinski, 1997), who accept complexity and nonlinearity as a metaphor for the inordinate intricacy of global and international politics' (Harrison, 2006, p.144). Global politics is seen as a complex adaptive system (Harrison, 2006, p.146).

Senge (2006) employs the concept of linearity in the context of the arms race between the USSR and the US. Senge argues that both sides adopted a world viewpoint coinciding with linear terms. Senge explains linearity between the USSR and the US as follows:

**USSR Arms > Threat to Americans > Need to build US Arms**

**US Arms > Threat to Soviets > Need to build USSR Arms**

Senge (2006) further explains that each of the sides perceived the other side as an aggressor and therefore each side built arms as a defensive response to the threats of the other. Senge (2006) infers that the linear thinking of USSR and US depicted in the form of straight lines eventually creates a circle; this is due to both sides' interaction with each other to create a system consisting of 'a set of variables that influence one another' (Senge 2006, p.55). Figure 4.3 illustrates the circle:

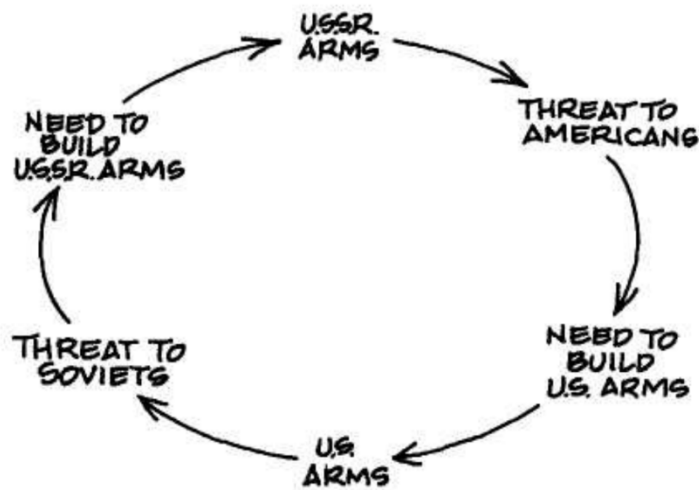


Figure 4.3 Example of a set of variables that influence one another (Senge, 2006, p.55)

Senge (2006) further infers that the circle represents a system of a perpetual arms race in a continuous cycle of aggression:

*The United States responds to a perceived Threat to Americans by increasing U.S. arms, which increases the Threat to the Soviets, which leads to more Soviet arms, which increases the Threat to the United States, which leads to more U.S. arms, which increases the Threat to the Soviets, which . . . and so on, and so on. From their individual viewpoints, each side achieves its short-term goal. Both sides respond to a perceived threat. But their actions end up creating the opposite outcome, increased threat, in the long run. Here, as in many systems, doing the obvious thing does not produce the obvious, desired outcome. The long-term result of each side's efforts to be more secure is heightened insecurity for all, with a combined nuclear stockpile of ten thousand times the total firepower of world War II. Interestingly, both sides failed for years to adopt a true systems view, despite an abundance of systems analysts' sophisticated analyses of each other's nuclear arsenals, and complex computer simulations of attack and counterattack war scenarios. Why then have these supposed tools for dealing with complexity not empowered us to escape the illogic of the arms race? (Senge, 2006, p.56)*

Senge (2006) differentiates between levels of complexity, specifically between 'detail complexity' and 'dynamic complexity' (Senge, 2006, p.56). The 'detail complexity', Senge (2006) explains, is based on the analysis of many variables as it aims to handle the complexity of business analysis and/or strategic plans. 'Dynamic complexity', on the other hand, is where 'cause and effect are

subtle, and where the effects over time of interventions are not obvious' (Senge, 2006, p.56). Senge implies that the way the 'detail complexity' works is that:

*Mixing many ingredients in a stew involved detail complexity, as does following a complex set of instructions to assemble a machine, or taking inventory in a discount retail store. (p.56)*

Senge, however, states that this is not 'dynamic complexity', and explains that:

*When an action has one set of consequences locally and a very different set of consequences in another part of the system, there is dynamic complexity...[and] when obvious interventions produce non-obvious consequences, there is dynamic complexity. (p.56)*

Senge claims that human beings see things in straight lines while systems thinking proposes seeing them in circles. Seeing the world through straight lines imposes limitations on how we perceive the world and therefore results in fragmentation. He emphasises the fact that language 'shapes perception' (Senge, 2006, p.59), and claims that 'Western languages' are based on 'subject-verb-object structure' and therefore are linear. Linear structures generate fragmentation or a fragmented perception of the world. He further argues that in order for humans to perceive the world of interrelationships, the language should be constructed out of circles, as it will open the world beyond.

Linear thinking evokes 'a simple locus of responsibility' (Senge, 2006, p.63). Therefore in the case of the USSR and US arms race each of the sides viewed the problem one-sidedly in a linear fashion. Usually then, it is the case that the sides attempt to blame the other side. Blame and guilt stem from a linear perception of the world with its limited perception of responsibility. When mastering systems thinking we understand that everybody shares responsibility for the system, rather than singling out the other side for disapprobation. Senge concludes that systems thinking is about 'seeing interrelationships rather linear cause-effect chains' (p.58).

*Systems thinking may hold to integrating reason and intuition...Intuition may tell that cause and effect are not close in space and time and that obvious solutions may cause more harm than good, and that short term fixes produce long term problems. (p.153)*

Senge explains that between linearity and intuition there is rationality and that rationality is different to intuition. As per Senge, Einstein said, 'I never discovered anything with my rational mind' (Senge, 2006, p.154).

Senge (2006) suggests that the future for learning organizations is that critical decisions will be based on interrelationships and patterns rather than the dominant modes of today's linear thinking (p.189). He states that 'most organizations are dominated by linear thinking, not systems thinking' (p.216), while, unfortunately, linear thinking tends to support 'reaction to change' rather than 'generating change' (p.216) and that complex and dynamic realities are being dealt with a 'language designed for simple, static problems' (p.243).

*Management consultant Charles Kiefer says it this way: Reality is composed of multiple-simultaneous, interdependent cause-effect-cause relationships. From this reality, normal verbal language extracts simple, linear cause-effect chains. This accounts for a great deal of why managers are so drawn to low leverage interventions...For example, if the problem is long product development times we hire more engineers to reduce times; if the problem is low profits we cut costs; if the problem is falling market share we cut price to boost share. Because we see the world in simple obvious terms, we come to believe in simple, obvious solutions. This leads to the frenzied search for simple 'fixes', a task that preoccupies the time of many managers. (p.243)*

*John Manoogian, director of Ford's Project Alpha says: The find and fix mentality results in an endless stream of short termfixes, which appear to make problems go away, except they keep returning. So, then, we go off and fix them again. The find and fix experts will go on forever...The problems compound in a diverse, cross-functional team such as a management team. Each team member carries his or her own, predominantly linear mental models. Each person's mental model focuses on different parts of the system. Each emphasizes different cause-effect chains. This makes it virtually impossible for a shared picture of the system as a whole to emerge in normal conversation. Is it any wonder that the strategies that emerge often represent watered down compromises based on murky assumptions, full of internal contradictions, which the rest of the organization can't understand, let alone implement? The team members genuinely resemble the proverbial blind men and the elephant—each knows the part of the elephant within his grasp, each believes the whole must look like the piece he holds, and each feels that his understanding is the correct one. (pp.243-244)*

*Often, our linear language and defensive ways of presenting our thinking lead to perceiving false dichotomies and irreconcilable differences. (p.295)*

Rosenau (1997) argue that current conceptual thinking ‘needs to be further enhanced and refined’ (Rosenau, in Alberts & Czerwinski (Eds.), 1997, p.34). Nonlinear thinking and approaches are beginning to join or replace the conformist linear thinking which has been employed for a long period of time. The boundaries of the disciplinary social sciences and of the hard sciences were separate, for example. However, given the need for the enhancement and refinement of critical thinking, the boundaries of disciplinary thinking are becoming less clear cut as nonlinear approaches link disciplinary concepts and experience (p.34).

In complex systems, specifically in complex adaptive systems, minor events can produce large outcomes due to the state of the system at the moment of the trigger event. This phenomenon has been described as the *butterfly effect*. Rosenau (1997) provide historic examples of a butterfly effect such as:

*An assassination in 1914 triggered the onset of World War I*

or that

*The end of the Cold War behave with the election of a Polish Pope more than a decade earlier, just as the release of Nelson Mandela from prison was arguably an event that triggered the end of apartheid in South Africa. (Rosenau, in Alberts & Czerwinski (Eds.), 1997, p.34)*

Depending to the sensitivity of initial condition of the system, the slightest change can lead to completely different outcomes. These outcomes could be beneficial and desired, detrimental or simply unanticipated (Alberts & Czerwinski, 1997, p.38).

Vallacher et al (2013) highlight the significance of nonlinear dynamical systems from within the emerging field of complexity science in which a number of theories are applied to complex adaptive systems in an effort to determine their development, the patterns of relationships in them, how the relationships self-organize, how they are sustained, and how outcomes emerge. A point of particular significance in complexity science is that a complex system possesses many diverse parts that interact to produce global behaviour. These parts resist individual analysis, and the outcomes cannot easily be explained, even when the interactions of the individual constituent elements are closely observed.



Nevertheless, an appreciation of complex adaptive systems is contributing to a transformation in our conceptualization of the physical and social worlds. In the instance of the conflict in Cyprus, complexity science offers an approach that helps make this very complex situation more comprehensible (Vallacher et al., 2013). Rather than focus on the central tendencies of conventional approaches in social conflicts (in the negotiations), such as the amount of trust or prejudice, a dynamical approach involving the examination of patterns of cognition, affect and behaviour is proving much more rewarding for researchers of the conflict and observers (Vallacher et al., 2013).

Tensions can be presented in the form of an oscillation or a random temporal pattern (Vallacher et al., 2013). The researchers highlight the following:

*Interpersonal and intergroup relations are also characterized by coherent higher-order states that function as attractors for cognition, affect, and behavior. The nature of these attractors, in combination with outside influences on the system, shapes the temporal pattern of conflict. If governed by weak attractors, conflict in a relationship displays a linear pattern, with each party responding in a proportional manner to provocations and conciliatory gestures. If governed by strong attractors, conflict in a relationship displays a nonlinear pattern characterized by sustained periods of little overt change punctuated by sudden and dramatic changes in the conflict's intensity. (p.14)*

Coleman (2011) infers that there are limitations with regards to 'standard approaches to social-science research' (p.19), specifically in the context of intractable conflicts. This researcher implies that 5% of the conflicts in the world are very difficult to solve due to their deep rooted intractability. From his perspective, the following conflicts are intractable: 'Israel, Palestine, Sudan, Cyprus, Sri Lanka, the Democratic Republic of Congo, Colombia, Somalia, Lebanon, Afghanistan, Kashmir, North Korea' and more (Coleman, 2011, p.18).

He further argues that the approaches adopted in conventional conflict resolution are prone to failure due to linear thinking, and claims that simply listening carefully to the arguments of the conflicting sides may not be enough to solve the conflict. Moreover, he points out that Western science is based on 'the tradition of linear causality', where 'x causes or leads to y' (Coleman, 2011, p.20), ignoring the nonlinearity of thinking. Coleman encourages participants in seemingly intractable conflicts to understand them in terms of change, evolution and stabilization and 'how they might be resolved by looking beyond their linear connections' (p.20).

#### 4.4 Reductionism

An understanding of complex system behaviour cannot be achieved without an exploration of reductionism. The scientific worldview of reductionism was first introduced by René Descartes in his work *Discourses* in 1637. Descartes perceived the world to be a ‘machine with clockwork mechanisms’. Descartes claimed that the mechanism of the machine could be understood by dismantling its pieces apart and then assembling them back together in order to understand the whole of the mechanism (Mastin, 2008).

The deterministic view of dualism emerged out of Descartes’s vision of the human body and the mind as two separate entities. The body is the mechanistic part of his vision, referred to as *res extensa*, with the more ephemeral mind referred to as *res cogitans*. His concept of dualism raises the important query of how the mind controls the body. According to Descartes, control is achieved through the pineal gland (Kauffman, 2010), which he perceived to be the seat of the soul.

Kauffman (2010) notes that the Nobel laureate (physicist) Steven Weinberg describes reductionism as ‘the explanatory arrows always point downward’ and ‘the more we comprehend the universe, the more pointless it seems’ (Kauffman, 2010, p.10). Kauffman (2010) explains that the essence of reductionism lies in the perception that all things are reducible, that is, can be broken down into component parts for analysis, including ‘the society in terms of people, peoples in terms of organs, organs by cells, cells by biochemistry, biochemistry by chemistry, and chemistry by physics’, therefore reductionism in essence deals with what is ‘down there’ (pp.10-11).

Aristotle’s view of deduction (deduction via syllogism) is encapsulated in the syllogism: ‘All men are mortal. Socrates is a man. Therefore, Socrates is mortal’ providing the Western world with a universal model of reasoning (Kauffman, 2010, p.12).

Traditional science and scientific attitudes grew out of Descartes’ fundamental principle that to understand any complex phenomenon, one must reduce it to its individual components and understand each of them separately (Gleick, 1998). If they are too complex at that point, then the components are reduced further. Reduction logically continues until the smallest possible parts are available for inspection and interpretation. At its heart then, Newtonian or classical mechanics is wholly materialistic, and assumes that all phenomena can be broken down to the smallest particles of matter.

An attitude arises from this that any complex problem can be broken down and its parts analysed to solve a problem. In addition, it is assumed that in the analysis, one is looking for the existence of conditions that could cause no other event other than the one that is being investigated, in other words, deterministic reductionism (McKelvey, 2011). Gleick (1988) notes that reductionism is a common and popular approach in molecular biology, as well as in other disciplines of medicine, in order to understand the phenomena of membranes, nuclei, proteins, enzymes, chromosomes and so forth (Gleick, 1988).

Newton's laws of mechanics are deterministic in nature, specifically under the law of motion, which states that 'there is only one possible trajectory from any point in the state of space' (Kauffman, 2010, pp.12-13).

The *arrow of time* has since 1928 been applied to a variety of situations where time appears to move forward irreversibly, with entropy increasing as predicted by the Second Law of Thermodynamics. As a consequence the distinction has been made between the past and the future and has given rise to the notion of 'time's arrow' (Kauffman, 2010, p.13). Later in the 20th century, the biologist Karl Ludwig von Bertalanffy became the founder and principle author of the *general systems theory* (GST), which has become a bridge between the study of systems in science and the interdisciplinary study of systems in the social sciences. It was Bertalanffy who drew a distinction between the closed systems of physics and the open systems of society, enabling the application of complexity theory to the social sciences.

The Nobel laureate Gell-Mann, as noted by McKelvey (2011), emphasizes differences between the 'old simplicity of reductionism, equations, linearity, and predictions of classical physics; and 'the new simplicity of tiny initiating events'. The way in which small events can produce large outcomes, often unexpected, has been referred to as the 'butterfly effect'. In an open system, perturbations in the initial conditions produce nonlinearity and events are influenced on many levels and multiply dynamically across time and space (Allen et al., 2011).

Contrary to reductionism, complexity theory does not focus on elements themselves, but rather on connections and interconnections between those elements. In the case of the complex problem, complexity theory focuses on connections and interconnections between elements of the problem which create the network structure. It is fundamentally important to emphasize that complexity

(theory) opposes reductionism and linearity. Complexity argues against reduction (of) the whole into its parts in order to understand the whole (Alberts & Czerwinski, 1997; Capra, 2002; Urry, 2003).

Several authors infer that the reductionist approach has reached its limits in understanding and dealing with complex phenomena. Capra (2002) notes that reductionism is effective in science as long as it 'does not fall into the trap of thinking that complex entities are nothing but the sum of their simpler parts' (p.4). Capra further infers from a biological point of view that 'animals depend on the photosynthesis of plants for their energy needs; plants depend on the carbon dioxide produced by animals, as well as on the nitrogen fixed by the bacteria at their roots; and together plants, and animals and microorganisms regulate the entire biosphere and maintain the conditions conducive to life' (Capra, 2002, pp.5-6). Capra concludes that 'no individual organism can exist in isolation' (pp.5-6).

Reductionist and linear thinking cannot deal effectively with the number and variety of interactions and connectivities in an open system (Czerwinski, 2008). Czerwinski (1998, 2008) explains the core assumption of reductionism is that the cumulative product of comprised constituent elements represents the original whole (Czerwinski, 2008), and Alberts and Czerwinski (1997) note that reductionism is based on taking a difficult problem and splitting it into manageable pieces. However, it must be noted that the sum of these parts is actually different from the whole, not equal to it. Therefore, to interrogate the parts in the hopes of finding a solution to a problem will fail to produce the desired result (Saperstein, in Alberts & Czerwinski (Eds.), 1997, p.59). In breaking up a difficult problem into management parts, reductionism:

*does not account for the fact that in any system, the number of ways for pairs of agents to interact is almost, but not quite, equal to half the square of the total number of agents in the system...10 agents can generate up to 45 interactions; 100 up to 4,950; 1,000 up to 499,500; 10,000 up to 49,995,000; and 100,000 agents can generate up to 4,999,950,000.*  
(Czerwinski, 2008, p.27)

Czerwinski (2008) points out that the US military mindset historically adopted linear thinking. He argues that the Cold War between the US and the USSR for 40 years produced a bipolar world highlighting linearity (Czerwinski, 2008). The author also notes that the reductionist approach to

warfare in Vietnam was not sufficient nor efficient, as it was based on centralized control and quantification (Czerwinski, 1998, 2008).

Schmitt (1997) argue in favour of complex systems by explaining that one of the features of complex systems is 'emergence', which is fundamentally different to reductionism. The feature of 'emergence' allows for a 'global behaviour of the system' which is fundamentally different from the 'the behaviour of the parts' (Schmitt, in Alberts & Czerwinski (Eds.), 1997, p.106). The researchers explain that no amount of knowledge on the behaviour of the elements of the system would allow for correct predictions of the behaviour of the system as a whole (p.106). The researchers note that 'the whole is different from the sum of its parts versus the whole is equal to the sum of its parts' (Saperstein, in Alberts & Czerwinski (Eds.), 1997, p.59). Reductionism

*will not work with complex systems: the very act of decomposing the system – of isolating even one component – changes the dynamics of the system. It is no longer the same system. (Schmitt, in Alberts & Czerwinski (Eds.), 1997, p.106)*

Calhoun (in Minai, Braha & Bar-Yam (Eds.), 2011) explains reductionism in the context of Army culture. He points out that Army culture is based on control and bureaucracy and therefore dominated by the linear and reductionist world view approaches of Newtonian physics. Calhoun highlights the fact that prediction and certainty do not lead to innovative processes. Calhoun argues that in order to achieve innovation in Army culture, there is a need for encouraging emergence, which will provide an Army with 'the evolutionarily advantages provided by operating, in peace and in war, at the edge of chaos' (Calhoun, in Minai, Braha & Bar-Yam (Eds.), 2011, p.79).

Rinaldi (in Alberts & Czerwinski (Eds.),1997) extends Calhoun's argument of complex systems by providing example from warfare. He explains that warfare is primarily governed by the Newtonian paradigms of linearity, reductionism and systems which are viewed as closed entities. The Newtonian paradigm is driven by deterministic and predictable outcomes, and therefore military operations and warfare offer abundant in examples of reductionism (Rinaldi, in Alberts & Czerwinski (Eds.), 1997, pp.112-114). The Newtonian paradigm provides a 'simple means for analysis' and 'methodical rules for planning and executing operations' (Rinaldi, in Alberts & Czerwinski (Eds.), 1997, p. 115).

Rinaldi (in Alberts & Czerwinski (Eds.), 1997) argues that complexity theory offers a much more efficient framework for military operations, as it is based on the nonlinear interaction of elements (e.g. military agents) within an open system and it is far from equilibrium (p.115). According to Rinaldi (1997), warfare 'is a nonlinear, complex, adaptive phenomenon', where the actions and interactions of every element shape the environment (p.116). He concludes that complexity theory perspective is much more powerful, given the complexities of warfare compared to the Newtonian paradigm which posits limitations (Rinaldi, in Alberts & Czerwinski (Eds.), 1997).

Coleman (2011) notes, however, that it is human to process only 'a small number of objects at any given time' (p.41), perhaps seven in all, give or take one or two. When stressed, humans can manage fewer objects, and there is a tendency to the premature simplification of the problem and an inability to undertake the comparative analysis that would lead to an understanding of competing points of view, and also to an appreciation of common ground. When solving problems, instead of assessing and weighing each option carefully in order to choose the best option, the human mind tends to choose the first option that appears to be a solution. This phenomenon is a heuristic. It is extremely difficult for humans to process all the scenarios they might face in a complex situation and choose the best possible solution for the problem (Coleman, 2011).

Coleman (2011) implies that when responding to complex problems there is tendency to premature simplification of the problem. The complex situation triggers a human reaction to focus only on a very few aspects. Equally, when the situation offers contradictory information with a need for comparative analysis of different sides, then it may result in a polarized decision favouring one side or the other. Such an analysis assists in lessening the feeling of anxiety because of the resulting feeling of gaining control of the situation. This may, however, also 'lead to misreading of the problem' (p.42).

Coleman (2011) also notes that when complex problems collapse into a simple form, an 'us versus them' problem emerges. When this occurs, an escalation of dislike, distrust and hatred can lead to conflict in perpetuity (p.45). Similar observations are provided by Meadows (1997), who has commented that 'science, logic, and reductionism' dominate 'intuition and holism' (Meadows, 1997, p.4). She points out that psychologically and politically Western societies identify the cause of problems as being external – 'out there' and not 'in here' (p.4). The blame is usually put on

others in order to shift responsibility, and to 'look for the control knob, the product, the pill, the technical fix that will make a problem go away' (p.4).

Coleman (2011) emphasizes that the psychological approach was to explore and study 'small things' (p.58). The author indicates that the 'psychologists studied learning, perception, and cognition by breaking things down into their smaller parts, like sensations, images, and feelings, and then investigating them in their own right' (p.58). He notes that the prominent philosopher Wertheimer argued that the field of psychology should view human perception and behaviour through a unified approach, believing that the broader, more holistic approach would provide a 'meaningful whole' (p.58). Wertheimer believed that merely studying pieces would not provide the whole picture of how a human being feels or explain behaviour. Similar ideas stem from Taoist and Aristotelian principles of holism (Coleman, 2011).

Faced with conflict or dissonance, the natural response is to attempt to reduce the tension by looking for an explanation or a resolution, the simpler the better (Coleman, 2011), especially when the situation is perceived as lacking in coherence, is stressful, participants are fatigued and there are time constraints. When dealing with conflict, coherence is responsible for understanding, interpreting and responding to the conflict in an efficient manner. Coleman (2011) however implies that:

*...too much coherence can be just as pathological: for example, the collapse of the nuances and contradictions inherent in any conflict situation into simple 'us versus them' terms, or a deep commitment to a rigid understanding of conflicts based on past sentiments and obsolete information. Either extreme – overwhelming complexity or oversimplified coherence – is problematic. But in difficult long-term conflicts, the tide pulls fiercely toward simplification of complex realities. This is what we must contend with. (pp.63-64)*

Since the time of Descartes, the notions of reductionism and determinism have penetrated many areas of research. Reductionism offers benefits in many areas of sciences and professions, and was adopted for solving problems dealing with closed systems (that is, systems in which neither energy nor matter are exchanged). Techniques for dealing with a closed system, such as reductionism, have often been adopted in the social sciences, unfortunately, where open complex systems are the norm and require different mechanisms for problem solving due to their dynamic exchange of information, people, capital, material and energy with the environment surrounding them.

## 4.5 Self-organization

Nonlinear systems are characterized by features such as self-organization,

**Self-organization.** Self-organization is the emergence of order out of disorder in a complex system. The emergence of a structure is usually spontaneous and is likely to happen without any internal or external interference, with the self-organizing behaviour being driven by the nonlinear interaction of the components in the system (Helbing & Lämmer, in Helbing (Ed.), 2008).

There are many examples of self-organizing structures and complex systems in both the natural and the built environment, and the concept has become increasingly important in a wide variety of disciplines, including physics, chemistry, computer science, robotics, biology, economics and psychology. Simple interactions among the components of a system produce reactions that produce patterns and complex structures, as can be seen in the biology of ants and bees (Helbing & Lämmer, in Helbing (Ed.), 2008, p.3). Such interactions are defined as ‘swarm intelligence’, and are characterized by self-organized and self-directed complex systems in which a pattern has emerged out of the apparently random interaction of the components.

For example, in business, partnerships are created by groups of associates; in playgrounds (psychology), children invent quite sophisticated games and the teams to play them; in physics, stars organize themselves into galaxies. Always, there are critical points in the emergent system when the interactions will either move the system toward stability or toward chaos and breakdown (Helbing & Lämmer, in Helbing (Ed.), 2008). Helbing and Lämmer (2008) point out that the classical control of a closed system, for example, the control of machinery, when applied to a social context, where the governance of decision making is based on regulations, legislation and administrative rules, with attempts to regulate every single element of the system, is prone to failure. Such centralized control requires large amounts of resources, is time consuming and complicated. Therefore, centralized control mechanisms in dynamic, open and complex systems are predisposed to failure due to unanticipated side effects and costs (Helbing & Lämmer, in Helbing (Ed.), 2008, p.7).

The researchers explain that biological systems are different in that there are not specific, detailed procedures. To have a control mechanism that could supervise all the details in a biological system would mean that cells would not be able ‘to contain all construction plans in their genetic code, and



the brain would be too small to perform its incredible tasks' (Helbing & Lämmer, in Helbing (Ed.), 2008, p.7). These writers emphasized that biological systems do not possess a central control mechanism, relying on self-organization instead. Control sufficiently strong to manage a complex system would be destructive, requiring enormous 'resources to put and keep the components of an artificial system together' (p.7), and therefore would be costly and inefficient. The authors suggest, however, that self-organization can be used as part of management plans; however, a sound understanding of complex systems is required (p.7).

Beyerchen (in Alberts & Czerwinski (Eds.), 1997) points out that self-organization allows for structures to emerge from the bottom up, without imposition from external forces. Rosenau (in Alberts & Czerwinski (Eds.), 1997) explains that the parts and agents of a complex adaptive system relate to each other to create 'recurrent patterns' and to self-organize into a whole by acquiring new attributes. The structure of the system is integral to the emergent behaviour of the parts and adapts as the emergent properties mature (Rosenau, in Alberts & Czerwinski (Eds.), 1997, p.36). Greater knowledge of the principles of self-organization would assist the application of conventional predictive techniques related to the desire to control situations where specific emergent systems patterns are desired (Beyerchen, in Alberts & Czerwinski (Eds.), 1997, p.76).

Maxfield (in Alberts & Czerwinski (Eds.), 1997) agrees that as a result of the interactions of agents in a system, self-organization produces new patterns. Complex adaptive systems represent self-organization through multiple layers of actions and interactions, where parts of the lower level interact to create a higher level order. In Maxfield's writing, he refers to an entity in the lower level of a human system as an individual composed of complex adaptive systems, such as organs, brain or immune system, while at another level (for example, an upper level) individuals, families, communities and firms emerge from individual interactions. These entities then further self-organize into regional economies and industries, nations and global economies. Thus, there are multidimensional levels of systems nested within each other and self-organization occurs at all levels (Maxfield, in Alberts & Czerwinski (Eds.), 1997).

*Human organizations are social constructions as opposed to natural constructions. That is, the entity types are creations of our collective imagination to which we attach names, such as firm, industry, and economy. And the rules that determine the interactions*

*between these entities are also socially constructed and are not fixed laws of nature.*  
(p.80)

Human society (resulting from an act of self-organization itself) offers abundant examples of spontaneous self-organization, although we may perceive the resulting patterns as the function of purposeful agency. Human settlements are a perfect example of this. A small band of explorers settle by a river mouth. A fishing industry emerges, followed by a ship building industry, followed by shipping lines carrying goods produced by the settlement, such as wool and wheat. By this point there are wool farmers' associations and wheat growers' co-ops, sailors' unions and fishers' associations. The emergent patterns are numerous and often overlapping (Maxfield, in Alberts & Czerwinski (Eds.), 1997, p.82).

Kauffman (cited in Rinaldi, in Alberts & Czerwinski (Eds.), 1997) also refers to living systems as organized complexity, and believes that self-organization and selection are the core elements of the beginning of a human life. According to Kauffman 'contrary to our deepest intuitions, massively disordered systems can spontaneously 'crystallize' a very high degree of order' when referred to an adaptive self-organization (Kauffman, cited in Rinaldi, in Alberts & Czerwinski (Eds.), 1997, p.116). As Rinaldi (in Alberts & Czerwinski (Eds.), 1997) commented in reference to Kauffman, spontaneous crystallization 'appears to be an innate property of complex systems' (Rinaldi, in Alberts & Czerwinski (Eds.), 1997, p.116). Rinaldi further notes that the reaction and adaptation to an external environment generates self-organization.

*In particular, economic systems are subject to self-organization. The adjustments economies make under the rigors of war are manifestations of the dynamics of adaptive self-organization. (p.116)*

A study of Bak and Chen (1991) looked at self-organized criticality which focuses on interactive systems evolving toward a critical state where minor events can cause a catastrophe. The researchers note that traditional ways of interactive system analysis were exactly the same as the analysis of simple systems because it was believed that predictive methods used to understand the behaviour of a simple system would be equally applicable to the behaviour of an interactive system. It was also assumed that the response of a large, interactive system would be proportional to the disturbance (Bak & Chen, 1991).

Thus, elements of complex adaptive systems were studied separately and microscopically, and large, interactive systems were perceived to be in a state of equilibrium unless disturbed occasionally by an external force. It has come to be understood, however, that traditional forms of analysis applied to large interactive systems (complicated and chaotic) yield different results when compared with simple systems (Bak & Chen, 1991).

Once the difference between simple and interactive systems was understood, the concept of complex systems was developed to further explore and understand how millions of elements interact over a short range, which essentially resulted in the creation of a theory of *self-organized criticality* (Bak & Chen, 1991). The theory highlights the fact that ‘many composite systems evolve to a critical state in which a minor event starts a chain reaction that can affect any number of elements in the system’ (p.46). This suggests that catastrophes become part of the dynamics of the system. Most importantly ‘composite systems never reach equilibrium but instead evolve from one metastable state to the next’ (p.46).

Meadows and Wright (2008) believe that self-organization stems from the capacity of a system to make its own structure more complex. He explains that self-organization can be seen in a snowflake or ice feathers, or in seed sprouts or when a baby learns to speak. Meadows argues that the capacity to self-organize could be ‘sacrificed for purposes of short-term productivity and stability’ (p.79), with the result that humans are treated as ‘mechanical adjuncts to production processes’ or ‘as if they were only numbers’ (p.79).

Self-organization, on the other hand, produces heterogeneity and unpredictability. According to Meadows (2009), freedom and certain amount of disorder encourage experimentation and therefore produce self-organization. Freedom of thought and action and experimentation can, of course, make some individuals very uncomfortable. For those who prefer order, control and power, such freedom is threatening, leading to restrictions on education systems and economic systems that support the status quo rather than foster creative disruption (p.80).

In essence, self-organization is a simple property with simple organizing principles, yet the process ‘can lead to wildly self-organizing structures’ (Meadows & Wright, 2009, p.80). Fractal theory offers potent examples of the results of self-organization when a simple rule is applied in a recursive fashion. Meadows and Wright (2008) define the Koch curve, one of the first

mathematical curves describing fractals, as a triangle with three edges and three equal sides. If we add a new equilateral triangle one third the size of the original to each side of the original, then add smaller and smaller triangles in the same way to the new sides, what will emerge will be a star, now usually termed the *Koch snowflake* because of its apparent complexity. Thus, complex shapes can be elaborated out of simple rules, a principle of fractal geometry (p.80).

#### **4.6 Emergence**

Vallacher et al (2013) explain that the meaning of emergence is that the ‘higher-order property or behaviour’ as a result of element interactions ‘cannot be reduced to the properties of the elements’ (p.60). That is, interaction of simple elements at the system level (may) lead to an emergence of complex properties. The interaction of genes, for example, yields the ‘patterns of pigmentation observed in animals, the shape of plants and shells’ (Meinhardt; Wolfram, cited in Vallacher et al., 2013, p.60), or the ‘arrangement of columns in the brain’s visual cortex’ (Miller, Keller, & Stryker, cited in Vallacher et al., 2013, p.60). These researchers point out that the ‘higher-level properties and behaviours emerge from the internal workings of the system’, which refers to self-organization.

Emergence and self-organization can be also observed in social systems, not just physical and biological ones. And it has proved to be axiomatic that a group cannot be reduced to each individual to find understanding because the properties of a group, such as ideologies, customs, norms and so forth, emerge out of the interactions of individuals. These interactions can be described as an exchange of information through passing judgement on events or impressing one another. The individual acts, paths and/or destinations create organized movement patterns, where individuals might bump into each other and hence over time create repetitive rules, driven by self-interest which promotes emergence and eventually leads to an ‘organized movement pattern’ (Vallacher et al., 2013, p.61).

A group as apparently as much a whole as a university faculty or department, for example, is represented by individuals who share information, pass judgement on each other’s ideas, compete with one another and attempt to impress one another, often while enjoying very collegial relationships. The repeated interactions among the group members give the faculty its structure and its ambience, which cannot be appreciated by examining each individual singularly (Vallacher et al., 2013, p.60). In the context of the Cypriot conflict, the historical complexity is intertwined with

socio-economic and political context, religion and culture, creating patterns of emergence between individuals, society filled with political ideologies, and national sentiment, which eventually feed into political negotiations. A complex historical discourse becomes fuelled by ‘patterns of interaction between individuals, groups, organizations, and authorities [that] are set to unravel and place institutional arrangements on trajectories that will be difficult to alter’ (Bogais, 2015), which eventuate in individual actions ‘and statements, rallies, actions, and reactions all have a snowball effect’ (Bogais, 2015).

Vallacher et al (2013) further explain that it is vital to make a distinction between closed and open systems. This is due to the fact that the dynamics of closed systems entirely depend ‘on the current state of the system’ (p.128) and therefore closed systems are less susceptible to an external input, as they do not accept input from an external environment. Even though closed systems may exhibit emergent properties, these properties are entirely dependent on and reflective of the ‘self-organization of intrinsic dynamics’ and therefore less susceptible, ‘without the sensitivity to external factors that might promote the emergence of different properties’ (p.128).

In contrast, open systems exhibit responsiveness to the environment and therefore ‘self-organization occurs in such systems, but some products of self-organization are better suited to environmental demands and are selected at the expense of less well-suited products of self-organization’ (Vallacher et al., 2013, p.128). The researchers note that open systems are more adaptable to the environment as they are able to accommodate environmental influences and therefore have a much greater capacity to cope and survive in the context of changing environments. Closed systems find it difficult to adapt and often cannot survive in a changing environment (Vallacher et al., 2013).

Lichtenstein and Plowman (2009) opt for understanding organization and leadership in the context of emergence in complex systems. The researchers note that emergence in organizations occurs through interactions that generate emergent outcomes. Emergence, according to Lichtenstein and Plowman, is an interaction of various ‘individual members and managers, networks, and organizations – rather than through the behaviours of a formal manager’ (Lichtenstein & Plowman, 2009, p.618). They further indicate that the concept of leadership changes its character due to the fact that leadership may not solely reside within the leader (Seers, 2005; Uhl-Bien, Marion, &

McKelvey, cited in Lichtenstein & Plowman, 2009, p.618), but rather may emerge out of interactions of various individual organizational members (Plowman & Duchon, cited in Lichtenstein & Plowman, 2009, p.618).

While the conventional leadership of an organization lies within the remit of the CEO and the managerial roles within the organization, the intensity of the interactions ‘between peers rather than between formal leaders and their ‘followers’, means that much of the authority in a group rests with unofficial systems within the system (Lichtenstein & Plowman, 2009, p.618). Lichtenstein and Plowman (2009), however, emphasize that uncertainty and controversy disrupt robustly formed patterns to inspire novelty and experiments, collective action, sensemaking and sensegiving ‘through the artful use of language and symbols, and stabilize the system by integrating local constraints’ (Lichtenstein & Plowman, 2009, p.621).

Nicolis & Prigogine (1989) and Prigogine (1955) argue that there are three conditions of emergence:

- far-from-equilibrium conditions
- perturbations/fluctuations that get amplified near a threshold
- the self-organization of structure that is composed of existing system elements. (Nicolis & Prigogine, 1989; Prigogine, cited in Lichtenstein & Plowman, 2009, p. 628)

Lichtenstein and Plowman (2009) point to the collective work of various authors which all point to four conditions of emergence, and argue that systems and leaders can foster emergence (p. 620):

**Table 4.2 Researchers who report on and discuss emergence in system**

<p><b><i>Dis-equilibrium state</i></b></p>	<p>Creating and maintaining a Dis-equilibrium state of organizing is a central component of emergence theories based on CAST (Goldstein, 1986; Prigogine &amp; Stengers, 1984; Schieve &amp; Allen, 1982). Findings from these three studies confirm that emergence is initiated by activities/events occurring ‘outside the norm’ for each context (McKelvey, 2004a,b) that push the system into a highly dynamic state (Anderson, 1999; Prigogine &amp; Stengers, 1984). Sustaining this Dis-equilibrium state for an extended period of time seems to be a requisite aspect of emergent order creation (Meyer, Gaba, &amp; Colwell, 2005).</p>
<p><b><i>Amplifying actions</i></b></p>	<p>Complexity science shows that when systems are in a Dis-equilibrium state, small actions and events – fluctuations in the system – can be amplified through positive feedback and a cycle of self-reinforcement (Anderson, 1999; Maruyama, 1963). This process of ‘deviation amplification’ (Maruyama, 1963) creates a dynamic whereby the emergence of one action/event in the system increases the likelihood that other similar events will emerge (Arthur, 1990; Krugman, 1996). Dynamic systems sciences have been able to map these deviation loops for many years, with important results (e.g. Hall, 1976; Sastry, 1997). In the dissipative structures model, these amplifications (which already are moving toward a new ‘attractor,’ Goldstein, 2007), grow to a critical point, a threshold (Anderson, 1999; Bygrave, 1989).</p>
<p><b><i>Recombination/’ Self-organization’</i></b></p>	<p>At the other side of the threshold, a new ‘level of order’ in the system comes into being (Anderson, 1999; Lichtenstein, 2007; Lichtenstein et al., 2006). In onemasure, this is created through a recombination of resources—a re-aggregation of some kind, that increases the capacity of the overall system to operate. Emergence is thus the outcome of the system— the creation of a newentity with qualities that are not reflected in the interactions of each agent within the system. Recombination thus ‘expands the pie’ in a real way for all the agents in the ecology.</p>
<p><b><i>Stabilizing feedback</i></b></p>	<p>Finally new emergent order, if it is creating value, will stabilize itself in short order, finding parameters that best increase its overall sustainability in the ecology. Stabilizing feedback anchors the change by slowing the non-linear process that led to the amplification of emergence inthe first place (Sastry,1997). In so doing these role-based actions help institutionalize the change throughout the system (Chiles et al., 2004), by slowly increasing the legitimacy of the new entity.</p>

An interesting idea from biology and neurology is that sets of properties not apparent in the individual can emerge from a collection of individuals. It has been argued, for example, that ants as individual entities may not exhibit higher forms of intelligence, but as a group their collective intelligence ‘is greater than the sum of their individual intelligence’ (Anish, 2011). Other researchers are occupied with similar discussions related to human intelligence and consciousness. As intelligence is the result of the collective interaction of neurons in the brain, it might be an emergent property (Anish, 2011).

McKelvey (2004) highlights the theory of order-creation based on the Prigogine’s school of thought relating to emergence and dissipative structures from 1955. Prigogine ‘emphasizes phase

transition effects, instigated by externally imposing energy differentials, as the cause of order creation' (Prigogine, cited in McKelvey, 2004, p.315). The other school of thought is based on the Santa Fe Institute's studies which imply that the 'order creation results from nonlinear dynamics set in motion by coevolutionary interaction among heterogeneous agents' (Prigogine, cited in McKelvey, 2004, p.315). It has been further emphasized that the 'small instigating events' initiate the coevolutionary process.

A hill built by termites is seen as a piece of architecture due to its passages, caverns and interconnecting tunnels; but the mound occurs as a result of simple rules and simple steps that the termites take and not a centralized grand plan. The pattern – in this case a termite mound – emerges from the interactions of the agents with one another, with the environment and with the system itself (Erçetin, Bisaso, & Saeed, cited in Erçetin & Banerjee, 2015). An example from human experience is the development of a school curriculum, which can be perceived as an emergent pattern (Erçetin, Bisaso, & Saeed, cited in Erçetin & Banerjee, 2015).

Seeing a school curriculum as emergent, that is, neither planned nor controlled, may seem counterintuitive. However, a curriculum does really shape itself once the inputs are all available – student choices, numbers of rooms, available staff and other resources – all these things emerge and interact to generate a pattern (Bisaso & Saeed, cited in Erçetin & Banerjee, 2015).

One of the most interesting aspects of emergence is that simple agents acting collectively can cause highly complex behaviour in the system (Abdu Seid Ali, cited in Erçetin & Banerjee 2015). For instance, the behaviour of the market place emerges out of the behaviour of individual investors. By analogy, emergence is compared to an 'invisible hand', the term coined by Adam Smith (p.270). The personal activities of the individual investors are not coordinated. Each agent is acting on information they have acquired from their environment and out of which they form 'decision rules' (p.270). However, their separate actions in the market interact with other separate actions which interact with other separate actions, and so on. Their behaviour is nonlinear and unpredictable and the outcome may be an 'embellished result' (Abdu Seid Ali, cited in Erçetin & Banerjee 2015, p.271), that is, greater than the sum of its parts. The stock market crash in 1929 is an example of this situation.



Patterns, properties and coherent structures emerge in the complex system. The phenomenon of an emergence is observable at a macro level although the pattern of interaction between various elements of the system occurs at a micro level (Kissane, 2011). Since the interaction between elements commonly reoccurs in a similar fashion, an 'emergent behaviour appears normal, even natural' (p.63). Despite the similarity of recurrences of interactions leading to an emergent behaviour of a system, there is no suggestion that the behaviours 'take on the status of a theoretical law' (p.63), just that the complex system behaviour tends to recur (p.64). Kissane (2011) further states that the international political system notes recurrent behaviour and that the political system is self-organized 'into a certain level of security and stability' and consequently 'the properties of the system, are such that it is highly likely to occur' (Kissane, 2011, p.229).

In another analogy, Holland (2002) views emergence as 'a small number of well-chosen building blocks can be combined to generate a vast array of interesting, non-random structures' (pp.27-28). He observes emergence in the following:

*The 26 letters of the English alphabet suffice to generate the vast literature in English, past and future. The 20 amino acids generate the unending array of proteins that form the basis of life. Chess, defined by fewer than a dozen rules, offers new patterns of play after centuries of study, and the geometry defined by Euclid's five axioms surprises us with new theorems after two millennia of study. (pp.27-28)*

Emergent phenomena possess specific criteria. Firstly, the phenomenon must 'be a repeating pattern in a system that exhibits perpetual novelty' (Holland, 2002, p.28). The repeating pattern is termed *regularity* (p.28). Holland (2002) observes this phenomenon in complex adaptive systems:

*regularities typically distinguish commonalities among some of the agents...When regularities are reinforced by interactions, they become persistent, providing possibilities for 'speciation' and selection. (p.28)*

Secondly, emergent phenomena emerge. The different levels of the system interact from bottom to top and top to bottom (Holland, 2002). Holland notes that the higher levels of interaction in complex adaptive systems emerge out of interactions in the lower levels of the hierarchy, thereby highlighting the third criterion, which is that 'the overall form and persistence of an emergent regularity depends upon both bottom-up and top-down effects' (Holland, 2002, p.28).

The fourth criterion is that ‘the whole emergent regularity is more than the sum of its parts’, and cannot be understood if you reduce it to its individual components, assess them and recombine them (Holland, 2002, p.28). The researcher observes that nonlinear interactions in complex adaptive systems cannot add up the behaviours of the agents to get the behaviour of the whole, since interactions and agent behaviour are nonlinear and not additive. Hence the behaviour of the whole cannot be obtained through the behaviours of the parts (Holland, 2002).

Pavard and Dugdale (in Bar-Yam & Minai (Eds.), 2006b) highlight the fact that:

*The nonlinear and distributed character [of component interactions contribute to the emergence of the system]...Multiple local interactions behave along some global features (emergent), which allow it to evolve towards more effective modes of organization (self-organization) without calling upon exterior or interior structuring operations. (p.46)*

They argue that if the system is self-organized, then the functions of the system evolve over time and are able to respond more efficiently to the environment (Pavard & Dugdale, in Bar-Yam & Minai (Eds.), 2006, p.48), and that such a complex self-organized system is not functionally stable (Pavard & Dugdale, cited in Bar-Yam & Minai, 2006).

Rosenau (1997) define emergence in complex adaptive systems as the acquisition of new attributes through the interaction of the various elements of the system. As emergent properties of the system mature, the fundamental structure of the system remains intact. However, with time, the emergent properties may obscure the basics of the system, and therefore to grasp the fundamental properties of the system there is a need to interrogate its internal dynamics (Rosenau, in Alberts & Czerwinski (Eds.), 1997, p.36).

NATO is an example of an organization which changes through time, and the NATO of 2016 is very different from the NATO of 1949 when it was first established. Emergent properties have not been solely responsible for changes in this complex organization. Internal dynamics have also contributed to the changes and adaptation (Rosenau, in Alberts & Czerwinski (Eds.), 1997, pp.36-37). There is, therefore, an interior whole based on the relationships between the emergent properties that provides coherence to the system Delanda highlights that the whole is based on emergent properties and therefore, without the coherence of the whole, the component properties would be a mere accumulation without substantiation. He attempts to answer whether the whole

can be analyzed as separate parts, at the same time as it has irreducible properties, and quotes Mario Bunge who says that the: ‘possibility of analysis does not entail reduction, and explanation of the mechanisms of emergence does not explain emergence away’ (DeLanda, 2006, p.10).

Harrison (2006) confirms that a complex system is ‘more than the sum of its parts’ and that the properties of such systems are created by interaction and therefore are emergent. Harrison emphasizes the fact that the unit of a social system can be an individual, while the body of an individual is a biological system. The interactions of individuals in political and social settings create emergent institutions (political and social). Harrison points out that the emergent institutions could be of a loose or a more centralized nature (Harrison, 2006).

#### **4.7 Attractors, perturbations (and Butterfly Effect)**

Traditional approaches to conflicts focus on ‘distrust, prejudice, or violence’ between the conflicting sides, while dynamical approaches focus on patterns, such as ‘cognition, affect, and behaviour’ (Vallacher et al., 2013, p.14). The concept of attractors therefore defines interpersonal and intergroup relations as a function for ‘cognition, affect and behaviour’, shaping temporal patterns within conflict’ (p.14). From this emanates a theoretical approach, where weak attractors are equivalent to linear patterns to which conflicting side/s may respond proportionally to ‘conciliatory gestures’, while strong attractors are equivalent to nonlinear patterns with abrupt changes in conflict’s intensity and dynamics (p.14).

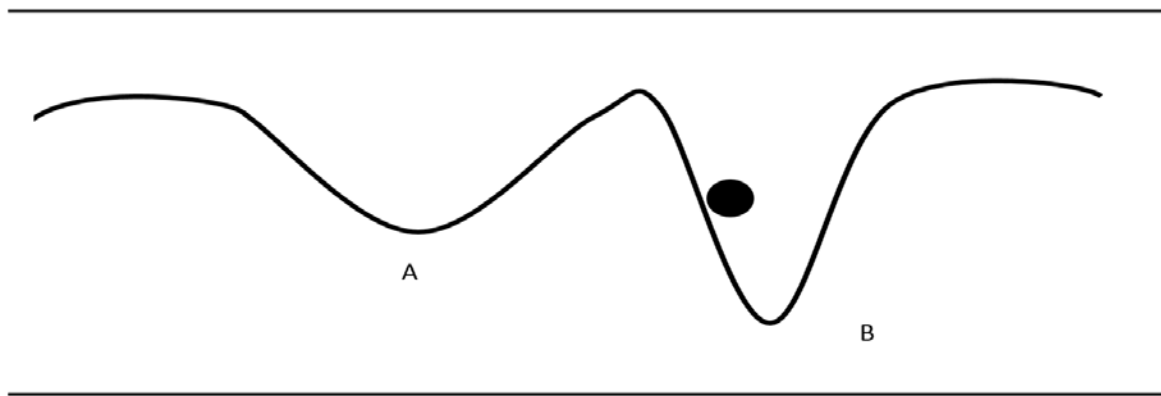
Vallacher, Coleman, Nowak, and Bui-Wrzosinska (2010) explain that the epicenter of an intractable conflict is the *attractor*. In their view an attractor is a potential state or a pattern of change to which a system’s behaviour converges over time, so that even very different states tend to evolve toward the subset of states defining the attractor (Vallacher et al., 2010) . If an attractor is absent, a system may experience various perturbations from other influences, but when it is a driving force, a complex system can resist perturbations that might have moved the system to a different state. It is important to note that ‘an external factor might promote a temporary change in the state of a system, but over time the system will return to its attractor’ (Vallacher et al., 2010, p.265).

An example of pendulum behaviour in a simple system explained by Vallacher et al (2010) promotes understanding of an attractor. Pendulum swings eventually become stable (stabilized

downwards). Disturbances of the pendulum create trajectories which eventually converge into a single state and therefore any perturbations to the swings of a pendulum would have only a temporary effect. However, the authors claim that it is possible for a complex system to have more than a single attractor, given the complexities inherent in the system, which are all interconnected. And commonly, the interplay of the system components ultimately produce a pattern of changes to coordinate a relatively coherent state (Haken, 1978; Hopfield, 1982; Strogatz, cited in Vallacher et al., 2010, p.265). The notion of attractor is therefore similar to the notion of equilibrium or homeostasis (Cannon; Miller, cited in Vallacher et al., 2010, p.265).

Attractors found in psychological and social systems are a 'restricted range of mental states and actions that is commonly experienced by a person or a group' (Vallacher et al., 2010, p.265). Once individual thoughts reach a collective mental state, then that collective system of thought may resist new input/s out of fear of destabilizing its current collective state. New information is interpreted as a threat and then reinterpreted in order to align it with the existing system of the mental state. Individuals holding views that diverge from the collective mental state would be subjected to intense influence from the majority and would be not favoured. As a consequence, any new input would be subject to reinterpretation to fit the existing collective mental state. A system governed by attractors would be in a constant state of evolution, churning toward a certain state, even though the state for which the system is aiming may not be favourable to the system. Despite the introduction of a new input for the purpose of improving the system, there would be resistance and a return to the initial system state (Vallacher et al., 2010).

Figure 4.4 demonstrates the behaviour of attractor basins. We have attractor basins A and B, a strong attractor B and a weaker attractor A. The black dot in attractor basin B represents the current state of the system. The attractor basins represent a local energy minimum (Vallacher et al., 2010, p.266).



**Figure 4.4** The behaviour of attractor basins. We have attractor basins A and B, a strong attractor B and a weaker attractor A. The black dot in attractor basin B represents the current state of the system.

An attractor in an intractable conflict ‘refers to a subset of potential states or patterns of change to which a system’s behavior converges over time’ (Vallacher et al., 2010, p.264). An attractor ‘attracts’ different states of behaviour, as the behaviour itself evolves over time to reach a particular subset of states which eventually defines an attractor. A system in absent of an attractor evolves or changes due to various influences it experiences. However a dynamical system is governed by attractor is more likely to experience resistance to perturbations or influences intending to move the system into a different state or pattern. Even though an external influence or perturbation of a dynamic system may promote a change, nevertheless the change would be only of a temporary nature (Vallacher et al., 2010).

It is very common for dynamical systems to have more than one attractor. For each such attractor, its basin of attraction is the set of initial conditions leading to long-time behavior that approaches that attractor. Thus the qualitative behavior of the long-time motion of a given system can be fundamentally different depending on which basin of attraction the initial condition lies. The width of each attractor valley (basin) in the graph represents the range of states evolving toward the attractor, that is, toward the components of the system to which other components are attracted and evolve. The broad range of states in the wide attractor basin (A) will contain a variety of elements (information and events) that will be inconsistent with the attractor (perturbations). The narrow attractor basin of the system (B), on the other hand, holds a smaller range of values different from the attractor and is able to resist perturbations. While a greater variety of states, that is, values, will evolve toward attractor basin A, attractor basin B has enough system values close to it already that

it and they can resist disturbances. This therefore suggests that a diverse variety of states would evolve toward the basin A than B (Vallacher et al., 2010). The attractor is also characterized by its strength and resistance to change. Even with strong external perturbations it would be difficult to remove the system from a strong attractor. However, even with comparatively weak perturbations it would be possible to remove the system from a weak attractor (Vallacher et al., 2010).

The study by Vallacher et al (2010) states that ‘protracted conflict reflects a strong attractor with a wide basin of attraction’ (p.266). A protracted conflict corresponds to an attractor basin B and therefore any attempts to address the state of such conflict can be comparable ‘to pushing the ball up the hill’(p.266), a meaningless and ineffective act ‘as the ball will roll back to the attractor’ (p.266). The researchers argue that attractor basin B and the meaningless attempts to roll the ball up the hill correspond to attempts in peace agreements initiated by the international community. Most of the time such attempts ‘collapse after the fanfare of the initial breakthroughs subsides’ (p.266). Attractor basin A, on the other hand contains a wide array of ideas and possibility for action that could evolve through cognitive and social mechanisms to satisfy the characteristic behavioural and mental patterns of the groups involved in a conflict.

Helbing & Lämmer (in Helbing (Ed.), 2008) point out that the stationary solutions and non-evolving states (in the case of a conflict) are inherently unstable and subject to disruption with minor perturbations, which may result in the system moving away from a stationary state and being attracted by another state. Any minor changes to the trajectory of the chaotic system will result in unpredictability. The behaviour of such attractors has an oscillatory nature (Helbing & Lämmer, in Helbing (Ed.), 2008). It should be noted that systems behaving in a chaotic manner are characterized by ‘strange attractors’.

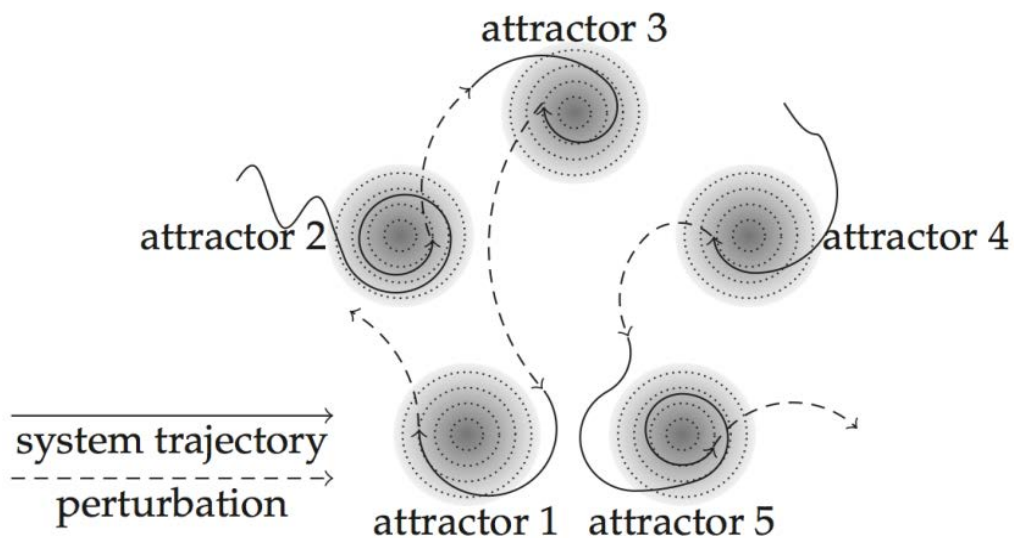
*Thus, a peaceful overture or a logical appeal emphasizing the nonproductive nature of the conflict might initially be taken at face value but over time will become reframed until it provides evidence in support of, rather than in opposition to, the predominant response tendency of the person or group. (Vallacher et al., 2010, p.266)*

New information introduced to an attractor landscape would be open to various interpretations. For example, if we considered an attractor from the perspective of two groups who have negative relations, then the width of the attractor basin would determine whether any kind of positive

gesture from one side or the other would be assimilated into the wide basin of attractors or whether it would remove the system from the basin of attractors. The positive gesture of one group may be perceived as negative by the other.

In terms of the narrow basin attractor, ‘the same element cannot be as readily assimilated and might move the system to a different attractor (corresponding to reconciliation)’ (Vallacher et al., 2010, p.267).

Figure 4.5 represents an attractor landscape displaying multiple attractor basins within the dynamical system. Each of the basins attracts and collects, as well as producing various trajectories. The attractors considered are stationary or steady states. To move the system from one point to another can be done by perturbations in the form of an input which could be, for instance, a form of communication or an overture).



**Figure 4.5** An attractor landscape displaying multiple attractor basins within the dynamical system. Each of the basins attracts and collects, as well as producing various trajectories (Goudarzi, A. et al., online, n.d.).

To gain a further insight into the concept of attractors, Cilliers (1998) explains that the behaviour of the system can be understood through the dimensional state-space. For instance, if the variables (of the system) are temperature, volume and pressure, then the state-space would be three dimensional, and therefore with an increased number of variables, the state-space could reach a ‘thousand dimensional’ state. Cilliers implies that ‘every possible state of the system is being characterized by a unique point in state space, and the dynamics of the system will form trajectories through state-space’ (Cilliers, 1998, p.97).

It has been suggested that the trajectories converging to a particular point in the state-space represent a stable state of the system. In this regard, the particular point equals the notion of an attractor. However, once trajectories diverge from this point, then instability ensues called *repellor* (the point considered to be unstable) (Cilliers, 1998). Once trajectories converge in and diverge out of this point, then it is considered to be 'meta-stable' (Cilliers, 1998, p.97).

Stable systems encompass only a few strong attractors (Cilliers, 1998). The system with few strong attractors 'quickly comes to rest and will not move to another one easily' (p.97). In an unstable system, there are no strong attractors and therefore the system adopts chaotic behaviour. It should be noted that in a self-organized system, the system 'tries to balance itself at a critical point between rigid order and chaos....without becoming unstable' (p.97). Cilliers therefore concludes that the behaviour of the system in either a chaotic manner or in too stable a manner produces little useful activity or outcomes.

A system exhibiting a stable and strong attractor will have so many elements involved in maintaining stability that the system's ability to adapt would be compromised. Cilliers (1998) notes that in order to shift from one stable state into another for the purpose of changing the trajectory and perturbing the system, one would require a very strong stimulus. Even then, the system would tend to respond sluggishly. Nevertheless, Cilliers (1998) points out that if the system is 'poised at the point of criticality' then the (various) states of the system would be optimized at the same time, enabling the system 'to change its states with the least amount of effort' (Cilliers, 1998, p.97).

Low amounts of variability in the introduced inputs are characterized by strong attractors. However, with an increase in variability, the system reaches a critical point, leading to optimization and flexibility. If the input to the system exceeds the intrinsic capability of the system, then the system is forced to exceed the critical point, and, as a consequence is not able to produce stable attractors, which results in chaos. Consequently, 'the resources of a self-organizing system should be neither over-extended, nor under-extended' (Cilliers, 1998, p.98).

McKelvey (2004) suggests that the system oscillates around the stable attractors at the incremental phase. However, with the bifurcation point, the system shifts towards a new state. If the connectivity or resilience properties are not aligned to the environmental pressure, then chaos ensues, maximizing its entropy. Dynamical systems consists of elements which (Vallacher et al., 2013):



*change over time as each element adjusts to the myriad influences from the other elements that make up the system. These elements can be thoughts, feelings, and actions at an individual level; people, groups and norms at a social level, or various institutions such as families, the media, religious organizations, schools, etc., at a broader level. (Vallacher et al., 2013, p.121)*

These elements may mutually stimulate each other, creating feedback loops; each element reinforces the other through a particular trajectory, thus forming a loop. An example of such a loop could be that negative feelings are reinforced which may lead to an escalation of conflict. Feedback loops can also be inhibiting (Vallacher et al., 2013). They are defined as leverage points by Donella Meadows (1999).

#### **4.8 System boundary**

The notion of a boundary is a crucial component of complex systems. Harrison (2006) points out that a boundary surrounding a system is not always clear nor obvious. The boundary of a lake is considered to be arbitrary in nature as ‘it is separated from its shoreline, the air and the sun’ (Harrison, 2006, p.2). Cilliers (2001) confirms that in order to identify the boundaries of a system, one should be able to define which elements belong to the system and which do not (Cilliers, 2001; Wils, 2006). Cilliers notes that complex systems encompass many interacting elements (internally) within the system and the external environment. As a result, the boundary of a complex system is not apparent. Even though the boundary of a complex system has emerged, is found and defined, it is not always obvious (Cilliers, 2001). Senge (cited in Wils et al., 2006) however notes that the interactions of elements need to be examined to establish which ones are the most important ‘to the issue at hand’ (p.36).

Cilliers notes that our description of the system produces the boundary, as does the system’s activity. However, the system’s boundary is ‘neither purely a function of our description, nor is it a purely natural thing’(Cilliers, 2001, p.141). Regardless, the system must be bounded (Cilliers, 2001), and, although complex systems are open systems that experience interactions with the external environment, they maintain their identity through internal regeneration and reproduction (Maturana & Varela, cited in Cilliers, 2001). Due to the composition of complex systems, the definition of a boundary is problematic and therefore requires a ‘boundary critique’, a concept introduced by Midgley et al. (cited in Cilliers, 2001, pp.142) or ‘sense making’, introduced by

Weick (1995) and a 'sense making framework', introduced by Kurtz and Snowden (Kurtz & Snowden, 2003).

Interestingly, the nature of a boundary should not be confused with 'something that separates one thing from another....but something that constitutes that which is bounded' (Cilliers, 2001, p.141). Therefore, the boundary should be perceived as 'enabling' and not 'confining' (p.141). Cilliers provides an example of an eardrum, which forms the boundary between the inner and outer ear. The eardrum allows for sound waves coming from an outside environment to go through. Without the eardrum, the sound waves would not be able to go through at all. Therefore, the eardrum is an interface, an enabler which is 'more concerned with the margins of the system, and perhaps less with what appears to be central' (p.141).

The 'place' of the boundary is another issue to be considered, as human beings tend to visualize in spatial terms and therefore human beings tend to visualize a system in a particular place in space. This tendency is common in biological examples of complex systems. Social systems, compared to biological systems, are not limited to a physical location but could exist in a virtual space. However, 'non-contiguous subsystems could be part of many different systems simultaneously' (Cilliers, 2001, p.142). Thus, systems penetrate one another, and, while boundaries are not lost, they are porous and dominated by interactivity between systems. Hence no sharp and certain demarcation line exists between systems. When boundaries are specified, their renegotiation should be allowed in order to maintain the flexibility of the system (Cilliers, 2001).

Hendrick (2009) agrees with Cilliers's (2001) point, but encourages us to identify a boundary while acknowledging the interdependencies and interactions among the systems and subsystems (Hendrick, 2009; Wils et al., 2006). Wils (2006) stresses that we should remain conscious of the whole system - and the importance of the perspective shift - as the system offers an overview of the system as a whole, at the same time to never ignore the intricacies of the subsystems and the individual view it offers (Wils et al., 2006).

The interactions of specific elements in the system define the system itself. These interactions exceed the sum of the parts and therefore do constitute the whole. Interactions and inter-relationships within the system offer new emerging properties which are not quite attributable to the existing elements within the system. These researchers further stress out the fact that systems

exhibit in a sense permeable boundaries and sub-systems. These on their own perform functions and create patterns of interactions with system elements (Wils et al., 2006, p.13). They provide further intriguing observations by outlining the importance of the system boundary demarcation, thus switching between the bird and frog eye for the sake of exploring the role of external actors (Wils et al., 2006).

Demarcation of the system boundary is partly the problem of the conflict system and therefore part of the dispute between the sides (Wils et al, 2006). Territorial issues and disputes could be one of the conflict issues in the cases of Israel-Palestine, Turkey-Kurdistan, Cyprus. The researcher notes that demarcation of the system boundary is important in order to avoid falling into the trap of saying everything is connected to everything, as climate change and global economy are also part of the system and the conflict problem. Therefore demarcation of a boundary is crucial.

The demarcation of the boundary of the system in a conflict situation is also important due to the fact that the dominating party of the conflict may attribute the causes of the conflict to the opposing side, to poverty or a lack of proper education. The weaker side of the conflict tends to include overlapping structures in the conflict analysis, including the interests of the third parties, for example. In addition, the military engagement of major powers is also critical when tackling local conflict scenarios (Wils et al., 2006).

Researchers have also observed that systems such as social systems generate their own boundaries by distinguishing themselves from their environment when deciding what activities and components belong to them and assign meaning and importance to interactions (Wils et al., 2006). The researchers further extend the thought of a boundary to civilian conflict management (CCM), emphasizing the importance of interactions in demarcating the boundary of a system even further:

*Interactions between actors who are capable of contributing to the resolution of the specific conflict configuration;*

*Interactions communicated by structures that contribute directly to the perpetuation and reproduction of patterns of conflict and violence. (Wils et al., 2006, p.36)*

The above enables us 'to define the system environments better' (Wils et al., 2006, p.36) as well as understand external actors who contribute to reproduction of conflicts and therefore are part of the conflict system. On the contrary 'political processes upon which local actors have no or very little

influence – such as globalization processes, environmental disasters (e.g. tsunamis) or US presidential elections – must be assigned to the system environment. These factors are part of the problem but not part of the solution’ (p.36). All in all, it is important to differentiate the interactions in the conflict system from those within the system environment, since they differ from those within the conflict system itself (Wils et al., 2006).

Wils et al. (2006) outlines the importance of the definition of the system boundary and therefore emphasizes the following:

*A clearly established and defined reference system is a key element of a good strategic focus of peacebuilding projects and programmes. Which conflict system or sub-systems are the interventions intended to address? Which elements are part of the system and which are not? Which function does the reference framework play in the overarching (conflict) system? How are actions on the micro and meso levels of society connected to changes on the macro level? (Wils et al., 2006, p.35)*

Hendrick (2009) stresses the fact that it is possible to artificially define a system boundary in order to show relationships and priorities while increasing the awareness of other systems in the same environmental space, while Wils et al (2006) link ‘resistance’ and ‘boundary’, explaining that the concept of resistance in this context of ‘deep structures of conflict system’ helps to identify the points of entry for the agents of change (p.40).

Sigmund Freud in psychoanalytic psychotherapy saw resistance as an ‘antipathy towards making unconscious psychological contents conscious’ (Wils et al., 2006, p.40). Rejection of the unknown and alien at the boundaries ‘generates a collective feeling of identity’ and reinforces system boundaries (p.41), but the concept of resistance in systems theory implies the presence of large amounts of energy and emotion to provide a perturbation that could result in change (p.40). The fear of losing the familiar results in resistance (p.41).

The organization of living systems can be regarded as part of the domain of molecular autopoietic systems, but Varela, Maturana, and Uribe (1974) note that components are not simple in autopoietic systems. Interactions, linkages, mobility and decay are the key properties of such systems. One of the necessary features of such systems is a ‘boundary’ produced by dynamics (Varela, Maturana, & Uribe, 1974).

Senge (2006) investigated organizations and managerial issues from the perspective systems, and agrees with the views of other researchers that 'living systems have integrity' (Senge, 2006, p.51). Senge (2006) argues that in order to understand issues, one must see the whole, and emphasizes that seeing the whole means particularly understanding:

*major functions, such as manufacturing, marketing, and research interact; but there are other issues where critical systems forces arise within a given functional area; and others where the dynamics of an entire industry must be considered. (p.51)*

This is what Senge calls the 'principle of the system boundary' (Senge, 2006). It specifically refers to the fact that:

*interactions that must be examined are those most important to the issue at hand, regardless of parochial organizational boundaries. What makes this principle difficult to practice is the way organizations are designed to keep people from seeing important interactions. One obvious way is by enforcing rigid internal divisions that inhibit inquiry divisional boundaries, such as those that group up between marketing, manufacturing, and research. (p.51).*

Senge further points out that the 'principle of the system boundary' is difficult for companies to practice, as conventional practices aim to enforce 'rigid internal divisions that inhibit inquiry across divisional boundaries, such as those that grow up between marketing, manufacturing, and research' or by leaving things behind for somebody else to clean the mess up (Senge, 2006, p.51).

Schryver (in Zartman (Ed.), 2010) implies that:

*boundaries are not the neat, linear divisions that appear on a map and that we might imagine separating political entities. Instead, they are fluid, porous, and are continually being negotiated and renegotiated between the various communities living in the borderland. They include both zones of mixing and zones of separation on either side. (p.4)*

## **4.9 Feedback loops**

Complex systems more often than not have multiple feedback loops.

*Positive feedback loops strengthen the cause and the subsequent effect in an ever increasing cycle that can lead to nonlinear transitions and systems collapse. For example, atmospheric scientists hypothesize that positive feedback loops cause Venus's swirling toxic mists and 900-degree surface temperatures (Schneider 1989). Some*

*scientists fear that climate change on Earth could also progress with a nonlinear shift in the system. (Ocean Studies Board et al., 2001, cited in Harrison, 2006, p.5)*

Effects in simple systems can feedback on their causes. It has been stated that the process is slowed down by negative feedback loops, while positive feedback loops speed up the process. ‘The thermostat is the classic example of a simple system with a negative feedback loop’ (Harrison, 2006, p.4).

*As the air cools below the set-point temperature, an electrical circuit closes to turn on the furnace and blow hot air into the room. When the air is returned to its set point, the circuit opens and the furnace shuts down. The homeostatic behavior of animals reflects feedback from activity (hunger, hunt, satiation, sleep). Environmental selection operates on the individual agent as a form of feedback; behavior can change from punishment/reward contact with the environment. (p.5)*

The positive feedback loops in complex systems can impact upon the initial conditions of the system and therefore make it ‘unable to absorb shocks’ in order to re-establish the original equilibrium (Urry, 2003).

#### **4.10 Fractals**

The concept of ‘fractal’ was coined by Mandelbrot in the 1970s. The meaning of ‘fractal’ derives from the Latin word ‘fractus’ indicating fractured, broken or not smooth. Mandelbrot was the father of the theory of fractals. According to Mandelbrot, conventional Euclidian geometry focuses on smooth geometrical figures shaped perfectly, such as circles, triangles, rectangles, cones and so forth. However, in reality, nature consists of patterns that are neither smooth nor simple, but are rather fragmented and irregular (Mandelbrot, 1983). As Mandelbrot points out, the shapes of the clouds are not smooth nor circular; the shapes of the mountains are not smooth, nor are they a straight line like triangles; lightning does not travel in a straight line, nor does the river flow in a straight line. Mandelbrot states ‘Clouds are not spheres, coastlines are not circles, and bark is not smooth, nor does lightning travel in a straight line’ (Mandelbrot, 2006, p.15).

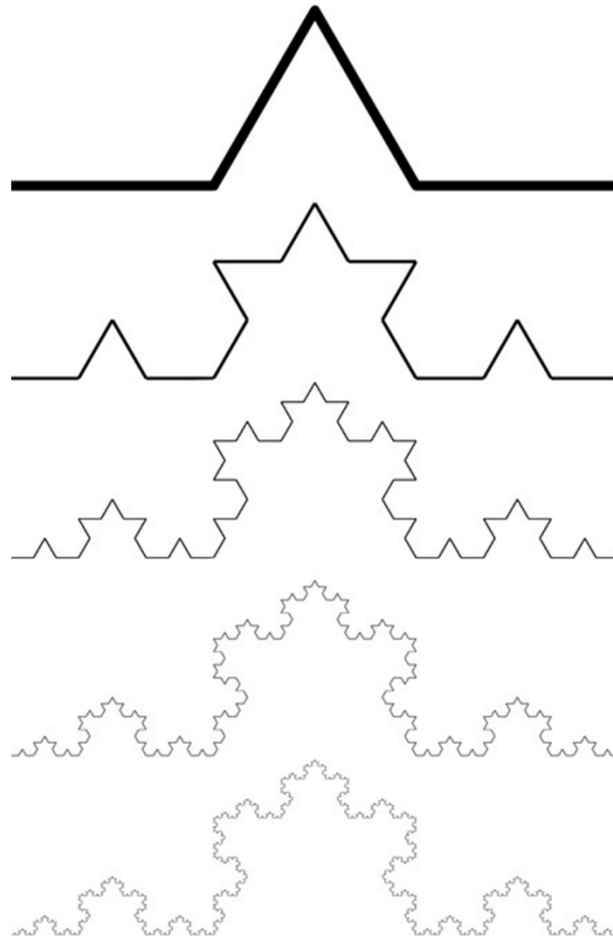
Mandelbrot notes that nature exhibits a different degree of complexity and that conventional geometry cannot explain factors that fractal geometry can. Fractal geometry is a study of texture or the roughness of the texture which is present and can be found everywhere. Scaling is the feature of the fractal which ‘expresses that the degree of their irregularity and/or fragmentation is identical at

all scales' (Mandelbrot, 2006, p.15). The geometrical similarity of a shape and the cascade that it generates is described as being *self-similar*, one of the critical features of fractals, which can be found throughout nature, from the shapes of leaves to mountains and clouds (Mandelbrot, 1983). Interestingly Mandelbrot implies that 'each piece of a shape is geometrically similar to the whole, both the shape and the cascade that generate it are called self-similar' (Mandelbrot, 1983, p.34). Mandelbrot implies that fractals can be found everywhere (Mandelbrot, 1983).

Cilliers (2001) points out that the structure of a complex system exemplifies fractal like properties of self-similarity at all scales of the system (Cilliers, 2001; Young, 2011). Fractals can be divided into *structure fractals* which are usually spatial and static, and *process fractals* which are dynamic and containing spatial and temporal aspects (Yackinous 2015, p.213).

The theory of fractals has further advanced with findings in natural and scientific contexts (Snyder, 1995; Glickman, 2001; Kara 2008, cited in Erçetin & Banerjee 2015, p.152). Kluge (2000), for instance, infers that the world is full of fractals, from branching tubes, tree leaves, the veins in a hand, puffy cumulus cloud, tiny oxygen molecules, DNA molecules and the stock market (Kluge 2000, cited in Erçetin & Banerjee, 2015). Chaos and fractals bridge the gap between the physical world and the world of thought, between physics and philosophy, mathematics and nature, and computer and art (Klein & Rossler, 1998, cited in Erçetin & Banerjee, 2015). In highlighting the importance of the concept of fractals, Erçetin & Banerjee (2015, p.153) refer to important early texts discussing fractal theory and application, written by Mandelbrot (*Fractal geometry of nature, 1982*), Bamsley (*Fractals everywhere, 1988*) and Peitgen and Richter (*The Beauty of fractals, 1986*).

The most prominent feature of fractals is that they are self-similar at all spatial scales (Yackinous, 2015). The self-similarity repeats itself over and over again to generate fractal objects. The most known generated fractal objects are the Koch curve and Sierpinski gasket. Figure 4.6 depicts the Koch curve, which was developed through a process of recursion by Helge von Koch (Yackinous, 2015).

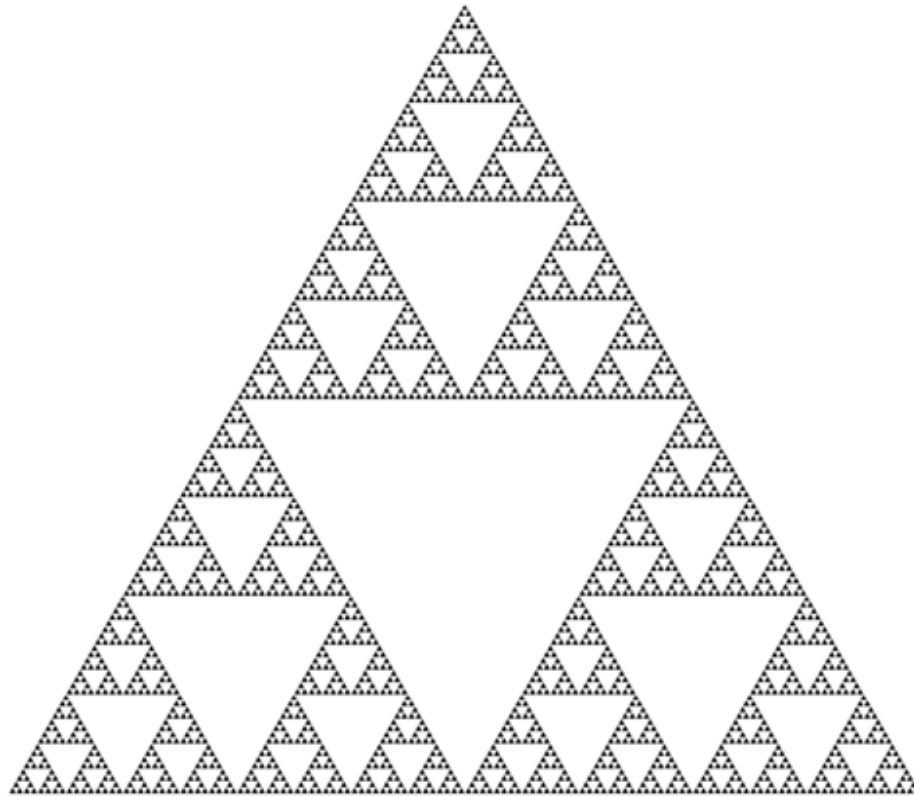


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**Figure 4.6** Examples of the Koch curve (or Koch snowflake) which was developed by Helge von Koch through a process of recursion. The Koch curve exhibits irregular boundaries and self-similarity across scales. (Image reproduced under Creative Commons license. (Original by Chris Phan)

Figure 4.7 depicts a Sierpinski gasket which is the ‘parameter  $n$  is the iteration number’ (Yackinous, 2015, pp.217-218). Fractals are the result of a continuous iterative process. The more often the process is repeated, the more developed the fractal (Yackinous, 2015).





**Figure 4.7** Examples of the Sierpinski gasket which is the result of continuous iterative process. To generate Sierpinski gasket, one must start with one triangle and every time replace it with three sub triangles. The developer of the gasket was Waclaw Sierpiński (illustrated by Stanislaus, 2013, reproduced under Creative Commons license).

A study by Li Yan-zhong (2005) looked at administrative organization from the fractal theory point of view, and found differences between hierarchical, bureaucratic and linear administrations and those he described as fractal. Fractal administrative systems were self-similar throughout their design, operations and functions (Yan-zhong, 2005). The administrative system consists of independent fractal units which are iteratively generated across the organization, thus containing small and even smaller fractal units as in the iterative process outlined by Mandelbrot. The self-similar fractal administrative units undertake similar functions and operations. The author concludes that the characteristics of the fractal administrative organization add up to 'self-similarity', 'iteration', 'self-organization', 'dynamic process' and 'simple regularization in complexity' (Yan-zhong, 2005, pp.10-11).

Levick and Kuhn (2007) in their explorative study on fractality and organization conclude that the fractal view requires a different mindset that is opposed to the hierarchical interpretation of power and control. The researchers found that the departments within an organization can be viewed as

subsystems and at the same time possess a fractal like nature. They have indicated that the decision making and strategies employed by the Chief Executive Officer for example would be echoed at each fractal level scalable across departments and individuals.

Zimmerman and Hurst (1993) explain that self-similarity exists in various natural structures (i.e. broccoli and/or human protein). Self-similarity offers (a sense of) order to irregularity and it is recursive across many scales. The authors note that the fractal boundary is complex due to its scalable multidimensional appearance. They also note that the fractal boundary could be either physical or cognitive in nature (Zimmerman & Hurst, 1993).

Permeability is another fractal boundary characteristic. The position of an observer is crucial if one aspires to determine the boundary of a fractal. The position of an observer could provide different interpretations as to the boundary of the fractal. The researchers provide an example of the cloud and the blue sky. At first, the boundary between the cloud and the blue sky is clearly defined as the observer observes the cloud from the distance. However, if the observer would observe the cloud from a short proximity, then the boundary of the cloud would become blurry and therefore it would be difficult to clearly define the boundary of the cloud as compared to the boundary of the sky. Hence the angle from which an observation takes place is critical to our perception.

Therefore the researchers conclude, the 'cloud is permeable over a wide range of scales – opportunities for exchange with the environment exist at many levels' (Zimmerman & Hurst, 1993, p.338). They imply that fractals occur in the form of recurrent patterns as behavioural and conceptual patterns, and 'recurrent patterns of relationships, values, symbols and gestalts' (p.338). Application of fractal theory in relation to self-similar and recursive patterns explain biological, physical and financial, economic and political fractality in the theory of fractals.

Marks-Tarlow (2008) in her conceptualization applies fractal geometry into the context of the psyche and the emergence of identity. She implies that the notion of fractals assists in understanding multidimensional emergence of the self across time. The fractal properties of self-similarity or power laws assist in formulating understanding in relations to preservation of identity in the neurobiological levels ranging from short lived interactions, ongoing and/or slow moving large-scale events. The author extends Mandelbrot's fractal inquiry by saying that fractal geometry extends the view beyond the isolation of the self from the other (p.180). The fractal edges are

dynamic, encompassing the ‘inner and outer’ space (p.180). Similar to other authors, Marks-Tarlow (2008) articulates permeability in the sense that the boundaries of fractals are open and closed and therefore there is a level of difficulty in separating ‘brain from the mind, mind from the body and body from the world’ (p.180). In emotional terms, these notions correspond to the

*intersubjective capacity to experience the other as one’s self or to experience oneself as autonomously functioning, despite being embedded in the physical environment or even while resonating deeply implicitly, behaviourally, if not explicitly with another person.*  
(p.180)

Marks-Tarlow (2008) implies that the psychological boundaries are dynamic zones of transaction across various states, dimensions, and scales of existence. Since

*fractals reside in the eyes of the beholder, being of variable length depending upon the resolution used. In this way, fractals can model vibrant relationships where there is always more to discover the closer one looks.* (p.180)

Stanley et al. (1996); Stanley, Amaral, and Plerou (2000); Axtell (2001) note that the fractal structure was found in US manufacturing businesses (cited in McKelvey 2016, p.60). While McKelvey and Salmador Sanchez (2011) also point out to that fractality was found in more than 60 cases in financial economics (cited in McKelvey 2016, p.60). The findings from the study of Barabási (2002) specify fractal networks structured ‘in the physical, biological and social worlds’ (McKelvey, 2015, p.60). The fractal structure also appears to be in social and business circles (e.g., Barabási & Bonabeau, 2003; De Vany, 2003; Dodds, Watts, & Sabel, 2003; Watts, 2003; Battiston & Catanzaro, 2004; Gay & Dousset, 2005; Powell et al., 2005; Souma et al., 2006; Chmiel et al., 2007; Saito, Watanabe, & Iwamura, 2007; Song, Jiang, & Zhou, 2009; Hu, Qi, & Wang, 2013; Nobi et al., 2013; Zhai, Yan, & Zhang, 2013; Mizuno, Souma, & Watanabe, cited in McKelvey, 2016, p.60).

Saperstein (in Alberts & Czerwinski (Eds.) (1997) state that the fragmentation of the Czech Republic and Slovakia, as well as other ethnically divided communities, has fractal boundaries. They also note that even though the boundaries between ethnically divided communities seem to be ‘smooth’ in nature, nevertheless the authors claim that this is far from the reality (Saperstein, in Alberts & Czerwinski (Eds.), 1997, p.59).

#### **4.11 Complex adaptive systems**

Holland (2002) asserts that complex adaptive systems (CAS) consist of vast array of components interacting with each other, called agents. The agents 'may range from firms in an economy or participants in a market to antibodies in the immune system or signalling proteins in a biological cell' (Holland, 2002, p.25). Agents in CAS interact in a nonlinear fashion. The interactions are specified by specific rules and actions, where each agent defines rules and strategies for interaction with other agents. Holland infers that the agents in CAS are predisposed to adapting, learning and modifying their rules in a search for improvements as their experience accumulates. The researcher, however, also notes that there are agents which, despite interactions, are 'passive and do not adapt, such as rock or a chair' (p.30). He highlights the fact that adaptive agents detect information and process it, making CAS a complex network for sending and receiving signals. Even in the absence of a central control, Cilliers (2001) notes, complex systems are dynamic and adaptable, but require a particular structure for encoding information. The structure of the system may exhibit rigidity and not be flexible enough to adapt to new information (p.146).

Holland (1992) differentiates between complex systems and complex adaptive systems. The immune system, for instance, consists of many interactive and mobile elements referred to as antibodies. The role of antibodies is to continuously protect the human system from constantly changing invaders, such as bacteria (antigens). Holland implies that since the amount of bacteria is infinite, 'the immune system cannot simply develop a list of all possible invaders' (p.18). An immune system however adapts and changes in order to 'fit to its antibodies as new invaders appear' (p.18). Therefore an immune system has the capability to adapt and this makes it difficult to simulate the system (p.18).

Holland (1975) argues that organizations are adaptive systems (Holland, cited in Boisot & Child, 1999) and they must match the complexity of their environment to succeed (Ashby; Wiener, cited in Boisot & Child, 1999), by either keeping pace with it or to secure sufficient autonomy from the environment to escape its constraints (Varela et al., cited in Boisot & Child, 1999).

Complex adaptive systems (CAS) operate in such a way that the removal of any of the interacting parts will fundamentally alter the dynamics of the system (Guastello & Liebovitch, in Guastello, Koopmans & Pincus (Eds.), 2011). Attempting to change parts of a CAS is fraught with

uncertainty since the parts of the system tend to adapt ‘in such a way as to protect the system from the intrusions of the outside tinkerer’ (Guastello & Liebovitch, in Guastello, Koopmans & Pincus (Eds.), 2011, p.4).

From the point of view of organizational adaptation, Allen, Maguire and McKelvey (2011) claim that flexibility and the ability to ‘morph into different configurations’ are the keys to adaptation. The self-awareness and perception of an organization in the light of the network dynamic and the way in which individuals in the organization connect are also required for adaptation. Understanding its own network may assist organizations to adapt, as well as reconfigure design and evaluation processes and performance of the working teams (Allen et al., 2011).

Senge (2006) however infers that the shared vision is the force in people’s hearts and minds. He implies that generative learning occurs when people aim for the same vision because it is very important to them. However, when people are genuinely excited about their vision, then they are able to create and adapt (p.191).

#### **4.12 Leverage points**

The concept of *leverage points* stems from the science of systems thinking and was first introduced by Donella Meadows. According to the author there are 12 leverage points, which are defined as places for intervention in the system (Meadows & Wright, 2008). Meadows notes that the introduction of leverage may or may not have an effective impact on the behaviour of the system. The following is the list of the leverage points as per Meadows (Meadows & Wright, 2008, pp.147-165):

12. *Numbers*: Constants and parameters such as subsidies, taxes, and standards

11. *Buffers*: The sizes of stabilizing stocks relative to their flows

10. *Stock-and-flow structures*: Physical systems and their nodes of intersection

9. *Delays*: The lengths of time relative to the rates of system changes

8. *Balancing feedback loops*: The strength of the feedbacks relative to the impacts they are trying to correct

7. *Reinforcing feedback loops*: The strength of the gain of driving loops

6. *Information flows*: The structure of who does and does not have access to information

5. *Rules*: Incentives, punishments, constraints
4. *Self-organization*: The power to add, change, or evolve system structure
3. *Goals*: The purpose or function of the system
2. *Paradigms*: The mind-set out of which the system—its goals, structure, rules, delays, parameters—arises
  1. *Transcending paradigms*

The leverage points introduced in this section are a selective account due to their relevance to the context of political negotiations in Cyprus. Therefore, only the most relevant leverage points are introduced – *paradigms* and *transcending paradigms*. According to Meadows & Wright (2008) the most effective leverage point is *transcending paradigms*.

***Goals: The purpose of the system***

The goal of a system is defined by a common purpose attributable to the system, with the aim of attaining the desired result, which was initially set by the system. A goal has leverage superior to the leverage of self-organization, feedback loops and information flow levels. This is due to the fact that whatever goal/s the system sets up, other levels of leverage conform to that particular goal (Meadows & Wright, 2008).

The *balancing feedback loops* and *reinforcing feedback loops* have their own goals within systems, which could be much smaller systems or elements of such systems. Feedback loops, by addressing the goals of the elements of smaller systems and subsystems conform to a much larger complex system (Meadows & Wright, 2008). Meadows also emphasizes that changing actors within the system would not necessarily change the system. If the actors conform to the ideas of the same old system, a change would only be a low level intervention. However, if the appointed actor can change the system by creating new system goals, then the leverage would be of a high level (Meadows & Wright, 2008).

***Paradigms: The mind-set out of which the system arises***

Meadows implies that the *shared idea*, *set of beliefs*, and *values* which are collectively or individually perceived by society constitute a paradigm (Meadows & Wright, 2008). According to Meadows, *values* and *beliefs* are nested at deep levels of the human mind, and therefore the paradigm is considered to be the source of the system, where from ‘shared social agreements about

the nature of reality, come system goals and information flows, feedbacks, stocks, flows, and everything else about systems' (Meadows & Wright, 2008, p.163).

Paradigms are very strong leverage points, according to Meadows & Wright (2008). To shift one's paradigm is challenging, even though Meadows believes shifting one's paradigm may occur in the blink of an eye, the way a thought appearing in the mind may lead to novel thinking. Thomas Kuhn (cited in Meadows & Wright, 2008) implies that in order to change a paradigm, one must persistently point out failures and anomalies of the past. Kuhn (1962) also notes that confident and loud talk with assurance will also shift the paradigm (Meadows & Wright, 2008). Meadows suggests that individuals work toward their goals with open minded people and people willing to change rather than with people whose views are opposite to those of your own and reactionary in nature. Meadows also points out that system models should be constructed as they provide people with a visual perception and the ability to view the system from outside (Meadows & Wright, 2008).

### *Transcending paradigms*

Transcending paradigms are the highest and the most significant leverage point (Meadows & Wright, 2008). One must understand that 'no paradigm is true' and therefore one must be flexible enough not to be attached or devoted to the ideas of paradigms (p.164). Even though certain paradigms might have shaped one's view, there is a need to understand that the universe and the world are complex and therefore utterly beyond human capacity to comprehend. Even though human beings perceive the world through their own paradigm lenses, there would be lenses which might augment the reality of the universe. Therefore, a willingness to accept or at least consider the unknown without attaching it to any known parameter, together with a flexible and adaptable approach, can be very empowering. Intervention in a system will meet resistance, but flexible thinking could be a means of finding leverage points for intervention in a complex system, so broad, flexible thinking is required.

A system in a chronic state of stagnation cannot be amended using parameters, which are too variable in nature (Meadows, 1997). Changing the parameters of a system is too simple a strategy and parameter **change** is the least useful intervention (Harrison, 2006). Harrison notes that

Meadows's most effective and critical leverage point is a paradigm **shift** as it arises out of the mindset from which the system emerges (Harrison, 2006).

Harrison (2006) states that

*in Gramscian language, a social paradigm or 'mind-set' is supported by a hegemony of economic and political goals and intellectual and moral discourse (Hoffman 1984). Redirecting political trajectories requires change in both structures and ideas; in the language of complexity, it means reinforcing changes in both institutions and internal models. Gramsci's approach was incremental, but ideational change may be better accepted when it is so sudden and substantial as to be an epiphany. (p.192)*

Senge (2006) notes that the notion of leverage points is the core of systems thinking. Senge explains that small, well thought through actions may generate significant sustainable changes in the system. He points out that non-systemic thinking is common and tends to focus on low level leverage, addressing the problem symptomatically, avoiding the underlying layers or causes (Senge, 2006). Senge points out that systems thinking allows us to see through complexity to generate deeper understanding of the underlying layers of the system. With that in mind, systems thinking does not avoid, nor does it marginalize, complexity, but it builds a much more coherent narrative of the problem, for the purposes of constructing long term restorative solutions (Senge, 2006).

Senge notes that points of lowest leverage work for short-term problems, while high leverage points are those which for which small actions produce large results. Strong leverage points are not obvious (Senge, 2006). Senge notes that difficult problems require a high level leverage – a change which, with a minimum effort, would lead to lasting, significant improvement. Senge (2006) also notes that the high level leverage points are not obvious to the actors in the system, as they are not close in time and space. To find the high level leverage points requires an examination of the underlying structures of the system rather than events (Senge, 2006).

The exploration and application of leverage points can be found in the areas of energy, climate and global security (Greyson, cited in Barbir & Ulgiati 2008), in studies related to a biosphere reserve in Vietnam, in sustainability in university courses and curricula (Lidgren, Rodhe, & Huisingh, 2006), in sustainability of waste management (Seadon, 2010), in food industry focusing on promoting healthy diet and preventing obesity (Malhi et al., 2009).



### 4.13 Conventional negotiation theories and practices

Conventional multilateral theories and approaches to negotiations are rooted in principled negotiation (getting to yes) and/or game theory models and so forth. Typically, these theories focus on incremental changes that aim to reduce differences between the conflicting sides or increase the value for the conflicting sides by mainly mathematical and economic calculations (i.e. win-win; increasing the pie). An application of ‘game theory’ in political science covers overlapping issues of ‘fair division’, ‘political economy’, ‘public choice’, ‘war bargaining’, ‘positive political theory’ and ‘social choice theory’. An example of game theory was spoken of by Downs in 1957 where he asserted that the theory is focused on a one-dimensional policy space, and the convergence of the political candidates to the ideology chosen by the median voter/s (Downs, 1957).

*A game theoretic explanation for democratic peace is that the public and open debate in democracies sends clear and reliable information regarding their intentions to other states. In contrast it is difficult to know the intentions of non-democratic leaders, what effect concessions will have, and if promises will be kept. Thus there will be mistrust and unwillingness to make concessions if at least one of the parties in a dispute is a non-democracy. (Levy & Razin, 2004)*

Interestingly, Wierzbicki (in Avenhaus & Zartman (Eds.), 2007) raises intriguing insights in relation to conflict and negotiations:

*In more complex situations, characterized by nonlinear or multicriteria models, equilibria are essentially nonunique (a nonlinear equation usually has multiple solutions). The analysis of multiple equilibria, their stability, etc., is for various reasons not very far advanced in game theory that concentrated on arguments for choosing a unique equilibrium as a rational outcome of a game. In addition, multiple equilibria often lead to conflict escalation processes. If one player chooses an equilibrium that seems rational to him, and another responds with a choice of a quite different equilibrium, the outcome might be a deep disequilibrium, harmful to both sides—and to the players’ cooperative agreement. (p.69)*

It is therefore evident that finding a unique equilibrium would equate to finding a unique solution which would imply linear approach in political negotiation setting. This therefore overlooks the importance of unique complex systems theory approach, so far rarely explored in the context of political negotiations. The significance of an approach lies in the exploration and application of the

aspects of the complexity theory related to systems of systems, emergence, self-organizations, nonlinearity and dynamicity within political negotiations, and so forth.

Zartman and Faure (2005) point out to the insufficient coverage of the processes of negotiations as opposed to the outcomes, indicating that there is very little analysis done with respect to negotiations in dynamic conflicts. The process of negotiations should respond to the dynamics of the conflict (Zartman & Faure, 2005). The same concept of linkages in complex multilateral negotiations and conflict dynamicity could lend itself organically to specifically political negotiations in the context of the intractable conflict in Cyprus.

Exploring further, given the complexity of intractable conflicts, political negotiations in such contexts could not be a simple affair. It is widely recognized by experts that international negotiations are dynamic and typically a protracted state of affairs (Druckman, 2001; Zartman & Touval 2010), with linkages among the issues characteristically embedded in the setting of multilateral negotiations (Zartman & Touval, 2010). Raiffa, Richardson & Metcalfe (2002) therefore indicate that political negotiations in intractable conflicts are difficult to solve with analytical approaches and tricks only. The qualities of a sophisticated negotiator are essential to adequately address embedded complexities in negotiations by approaching negotiations from different angles and 'with different purposes in mind' (Raiffa, Richardson & Metcalfe, 2002, p.85).

It has been equally noted by a number of experts in the field of conflict resolution and complexity science that analysis of various properties of dynamical, complex systems could be

*equally valuable in understanding important issues of social conflict. What is more, the language and concepts of this approach offer a promise of integration of existing knowledge in the fragmented field of conflict studies. (Vallacher et al., 2013, p.46).*

The literature review related to conventional theories on negotiations pointed out that the need for complex integrative analysis, strategy and implementation has been acknowledged at an international level and at the UN Peacebuilding Commission. However, due to substantial underfunding and insufficient resources, the UN unfortunately cannot undertake such a task. The organization has recognized that a network of institutions and individuals from transdisciplinary fields needs to be established to support the work of complexity to feed into the Commission. In Geneva, there are efforts to 'identify existing policy, advocacy, research and operational

competencies across the range of responsibilities of the Commission' (Hendrick, 2009, pp.83-84).

Other researchers have also pointed out that the studies of:

*international relations have failed to use complexity as a general theory of complex systems ('complex systems theory') because, while complexity is a meaningful metaphor, complex adaptive systems – at least as conventionally formulated by theorists like Holland (1992, 1995, 1998) and, in political science, Jervis (1997), Axelrod (1997), and Axelrod and Cohen (1999) – differ in important ways from social and political systems. Although they may behave in complicated and confusing ways, social systems have structures of authority that may be inconsistent with the definition of complex adaptive systems. These differences are more than mere definitional or typological differences; we argue that in social systems, authority serves to minimize complexity. One therefore cannot use complex systems theory to model even partly centralized or hierarchical systems—precisely those types of systems that proliferate in the world of politics. (Harrison, 2006, p.144)*

#### **4.14 Conclusion**

Disintegration of the whole into separate parts and then reassembling these parts is referred to as 'reductionism' and 'linearity' and therefore may work for simple and complicated systems. Numerous sources researching in the discipline of complex systems point out, however, that the 'whole' cannot be understood as the sum of its separate parts, and that reducing the whole into constituent parts does not assist in understanding the whole. As a result, reductionist and linear approaches to complex problems (complex/chaotic systems) are not efficient as these systems are defined by dynamic element interactions (nonlinear interactions) with each other creating relationships, connectivities and interconnectivities, patterns and network structures, as well as unpredictability and uncertainty.

Complex systems dynamically emerge and evolve over time out of interactions of the system components. The emergence of patterns is therefore evidence of the self-organization of elements of the system. Complex systems are considered to be far from equilibrium, which results in a situation where a relatively minor stimulus may cause large effects, that is *perturbation* (e.g. *bifurcation point*). Perturbation generates movements in the system, moving it from one state into another, but may also cause the system as a whole to enter a state of chaos.

Complex systems are open systems that experience dynamic internal interactions between system components, as well as interactions between the system and its components with the external environment, leading to cross boundary interactions. The definition of a boundary is not always obvious and clear, often resulting in the creation of an artificial boundary by the actors of the system, who are predisposed to precisely define the scope of a system (what is in the system and what is out of the system). On the other hand, the precise definition of a boundary is not required (Cilliers, 2001) for systems involving living organisms, boundaries are not generally fixed, but are renegotiated over time.

The state of a system can be influenced by ‘attractors’ around which the system coalesces and stabilizes through the input of positive and negative feedback loops. This aspect of complexity theory explains that a system can in fact be somewhat perturbed by the introduction, for example, of ‘leverage points’. The system may display chaotic patterns of behaviour around ‘attractors’. Stable systems have strong attractors, while unstable systems have weak attractors.

Adaptability is another aspect of complexity theory. Mutual adaptability defines coevolution. This refers how the system adapts to its environment and how human beings adapt to the changes occurring in the system and environment.

Another aspect/concept of complexity theory explored in this chapter was ‘leverage points’ introduced by Meadows (1999) and reinforced by Meadows and Wright (2008). ‘Leverage points’ are defined as places to intervene in the system. There are twelve leverage points, however only the most relevant leverage points are introduced in the thesis.

The final concept of complexity theory introduced in this chapter was *fractals*. The concept was coined by Mandelbrot and focuses on self-similar recursive patterns found in the environment.

An overview of multidisciplinary literature introduced aspects of complexity theory for the purpose of exploring Cypriot political negotiations through the lens of complexity. The literature review of complexity theory was of a multidisciplinary nature, drawn from various fields of disciplines and domains. The literature of complexity theory on conflict resolution was identified, although it was of a limited nature. No specific literature on political negotiations in Cyprus was identified in the context of complexity theory. There was, in fact, a significant gap revealed in our understanding of

political negotiations in intractable conflicts, which could be improved through the application of the lens of complexity theory. (Numerous discussions with interview participants indicated that the UN Good Offices Mission has not utilized complexity theory in negotiations in Cyprus).

It is to note that only a relatively small number of 'complexity' scholars have theorized conflict resolution, peacebuilding, genocide or intractable conflicts in a context of social complex phenomena (Coleman, 2011; Ricigliano, 2015; Vallacher et al., 2013). The concepts of complexity theory create a 'complexity lens' through which political negotiations in Cyprus will be explored in Chapter 4. The literature review confirms the need for exploration and investigation of the political negotiations in the context of complexity theory.

The following Chapters 5, 6 and 7 present the results, findings and discussion related to the research questions. Specifically, Chapter 5 examines RQ1; Chapter 6 examines RQ2; and Chapter 7 examines RQ3. The research questions are examined in relation to the case study of the Cypriot political negotiations held between the years 2008 and 2014. The thesis proposes aspects of complexity theory as a framework for exploring these questions. The core strength of the theory lies in the emphasis on a range of attributes dealing with complex entrenched problems, such as the Cypriot case study.

## **Results: Findings and discussion for research question 1**

This chapter presents the results, findings and discussion related to the research question 1 (**RQ1**). The chapter begins by presenting and discussing themes identified in the course of the analysis related to the Cypriot political negotiations. After the presentation of the results and discussion, a summary of findings for **RQ1** is presented.

It is vital to note that due to the substantial volume of collected data and the length of the single case analysis, only the most relevant data are included in this section of the thesis. The results are presented in the form of excerpts from the interview transcripts.

With most of the interviewee responses there was broad agreement and common perception of the comments quoted in the pages that follow. Those that were selected for inclusion in the thesis usually not only reflected such consensual understanding on various aspects of the Cypriot situation, past and present, but were the more articulate expression of what was always a complex matter.

### **5.1 Research question 1**

This section of the thesis offers results, findings and discussion relevant to the following question:

**RQ1** *To what extent have elements of reductionism, linearity, and a sequential approach in the system of Cypriot political negotiations between the years 2008-2014, either completely or partially contributed to periodic stalemate/s?*

The qualitative findings of this thesis revealed elements of reductionism, linearity and a sequential approach embedded in the system of political negotiations in Cyprus between the years of 2008 and 2014. Many interview participants confirmed that the system of negotiations exhibited elements of these concepts. The interviewees provided their valuable insights in relation to **RQ1**. It is noted, however, that only the most relevant data is presented in this section. Meaning only those responses that were directly related to the **RQ1** have been reported in the thesis. This implies a degree of selectivity, but only for the purpose of answering **RQ1**.

## 5.2 Elements of reductionism and linearity in the history of Cyprus

Although the focus of the research is on the system of political negotiations conducted between the years 2008-2014, nevertheless it is crucial to note that elements of divisiveness were apparent on the island and were prevalent to the events of 1974.

For example, the partition and division of Cyprus as part of the solution to multiethnic problems emerged with the rise and fall of colonial rule throughout the history of the island (Chapter 3). A leading author, Coufoudakis (1976), states that the 'partition and/or political division have been applied as solutions to the problems of such multiethnic societies and states that give an element of uniqueness to the post-World War II period' (Coufoudakis, 1976, p.27). The same author notes that 'partition and the political division remain part of the solution to complex problems of multiethnic societies and states' and that the division and the partition are a result of colonial collapse (pp.27-28).

Henderson et al. (1974), in turn, indicates that the 'division of a territory is seen as an artificial imposition by external sides...' (Henderson, 1974, p.434). Pericleous (2009) points out that similar partition measures have been introduced in Ireland, India and Palestine. Pericleous highlights the fact, therefore, that the British government was fully aware of possible partition ramifications when it introduced the strategy of partition to the island in order to suppress the Greek Cypriot *enosis* (Pericleous, 2009).

However, there is neither consistency nor convergence between the Greek and Turkish Cypriots as to historical interpretations, specifically when it refers to the emergence of the Cypriot conflict. Similar views were expressed by Interviewee 713\_0011, who acknowledged interpretive divergence of the sides' views on the subject of the emergence of the conflict. The interviewee further commented on the pervasive conditions to which both sides were exposed before the utter and complete division of the island following the events of 1974 (invasion).

The interviewee also pointed to an emerging divisiveness appearing throughout Ottoman colonial rule, which was later preserved during British colonial rule (colonialism), transforming religious division into ethnic and cultural division. Interviewee 713\_0011 provided a detailed account of the growth of divisiveness between the Greek and Turkish Cypriot sides, which was, in the view of the interviewee, further transformed into reductionism and linearity during political negotiations from 2008-2012/2014:

*A lot of Greek Cypriots begin in 1974, so the problem is invasion in 1974. They don't go to 1963 which is where most Turkish Cypriots will go to, the communal strike at that time. Others go back to colonial period and how the right to self-determination was not exercised by the Cypriot people as a whole. You know, you probably know that the...you know neither the Greek Cypriots nor the Turkish Cypriots wanted independence. Turkish Cypriots wanted division of the island. Greek Cypriots wanted union of the island with Greece. So independence was not something that the locals asked. It was something that was seen as a pragmatic solution to dealing with the Cyprus problem. So you may go back to the Colonial Period and say a lot of the problems began here. You can even go back to the Ottoman empire and the division there of the population for administrative reasons, the Millet System, the Millet System was the administration of the empire on the basis of the religious affiliation. So the Ottoman Empire respected, in most cases respected the religion of the groups that it occupied, of the territories, of the peoples that came under its rule. But divided them and gave them, gave them statuses, gave them autonomy in terms of (not clear)...internal affairs, you know certain groups that are not Muslims had to pay more taxes. Those who are Muslims paid less taxes, but had to do military service for example.*

*So you've had that kind of division already built on... And the British Colonial Rule in some respects exacerbated those divisions and turned the religious divisions into ethnic divisions. In the Ottoman Empire there were religious divisions. The distinction was religious, was not ethnical or cultural...the groups moved into ethnic groups, because at the end of 19th century we also had the beginning of the Nationalist movements in Europe and that also determined very much the ethnic conflict and the ethnic claims and the conflicting ethnic claims in the region. Interviewee 713\_0011*

Interviewee 713\_0036 revealed that the process of 'separation' began long before the issues were aired during negotiations. The interviewee commented that the two communities on the island had begun to separate physically and emotionally as early as the 1950s:

*It started with political separation...through the antagonism of the communities, then it started with geographic separation in the 50's, and then 63'-64' most of it, and then it was just fulfilled in '74. It was a process to which nationalists in both communities led. Interviewee 713\_0036*

Another interviewee, Interviewee 713\_0027, made the following observation about the solution to the Cypriot problem which had been proposed by Prime Minister Ismet Inonu, a former military chief of staff to the father of modern Turkey, Kamalat A Turk:



*...Ismet Inonu said the problem is very easy, we will draw a line such that 30% of the territory lies above the line and 70% below. We will move all the Greek Cypriots from above the line to below the line, move all the Turkish Cypriots from below the line above the line. Then we will establish two states, now States in English it can be like State of Israel, or State of Kuwait, or it can be United States of America, or United States of Mexico, and there is how you interpret the English word whether he meant the sovereign states like State of Israel or... because he said it before what he said later in the same conversation, he said 'after pacification of the movement of these population, the two states can sit down and negotiate how they are going to share to coexist in this island, we do not exclude a federal settlement... Interviewee 713\_0027*

The interview responses are observations of the divisive effects of British and Ottoman colonial rule which led to political and ethnic separation and strategies employed by foreign actors aiming to resolve the conflict using reductionist and linear approaches. This demonstrates how the divisive nature of political affairs were firmly embedded in the fabric of Cypriot life well before a system of negotiation was designed and implemented.

### **5.3 Discussion in relation to historical reductionism and linearity in Cyprus**

Elements of reductionism emerged out of the Ottoman and British colonialism and the partitioning of Cyprus. The longstanding Ottoman colonial period contributed to the division of the Cypriot population into autonomous groups for administrative purposes, which was further perpetuated during British colonialism and turned religious divisions into ethnic divisions. The pursuit of the strategic discourse adopted by the Turkish Prime Minister Ismet Inonu to solve the problem of Cyprus and the unilateral intervention exercised by Turkey as one of the guarantor powers in 1974, established explicit (physical) linear boundaries between the Greek and Turkish Cypriot sides, exacerbating divisiveness and disunity, thus reductionism and linearity. The historical discourse of Ottoman and British colonial rule as part of the vested interest in the region, alongside the foreign interventionism aimed at solving the intractable conflict, one may argue, also penetrated the system of political negotiations in the form of reductionism and linearity.

Coufoudakis notes that the rule of Cyprus by the Ottoman Empire for more than three hundred years prior to British rule contributed to the partition as it established bi-communalism and planted the seeds for the current conflict (Coufoudakis, 1976). Supplementary to Ottoman colonial rule and British government measures, as the contextual background indicates (Chapter 3), the self-centred

aspirations and self-determination based on ethnic identities of each of the sides perpetuated politicization of the conflict and further contributed to the fragmentation of the island (Joseph, 1997) (Chapter 2). These circumstances translated to intra-ethnic violence and the escalation of domestic tensions in the 1950s to potential crisis and war between Greece and Turkey contributing to the island's disunity, or, as Joseph (1997) argues, the island became a 'symbol of Western disunity' (Joseph, 1997). Moreover, it has been strongly believed that the British colonial rule also encouraged a 'static bi-communal system' due to colonialism and nationalist rhetoric (Michael, 2011, p.27).

Despite United Nations attempts to resolve the conflict by establishing the United Nations Forces in Cyprus (UNFICYP) and the United Nations Good Offices Mission in 1964, together with United States and various international state actors such as Turkey, Greece and NATO, a unilateral intervention by Turkey to invade Cyprus on 20 July 1974, yielded an utter and ultimate division of Cyprus into the South and North, and by doing so created a static status quo which persists to this very day.

The next section explores interviewee responses in relation to reductionism, linearity and the sequential manner evident in the system of political negotiations in Cyprus between the years 2008-2014.

#### **5.4 Elements of reductionism and linearity in the current system of political negotiations (2008-2014)**

The section begins by presenting commentaries of interviewees in relation to reductionism, linearity and sequential manner embedded in the system of political negotiations in Cyprus between the years 2008-2014. The interviewees provide their insights into how negotiations were conducted in these years.

Responses from Interviewee 713\_0011 reveal the reductionism and linearity in the negotiations. The interviewee implies that if negotiations were related to a simple affair, then the sequential approach to negotiations might have been appropriate. However, given the complexity of the negotiations, the sequential approach produces limitations:

*...if things are easy 1,2,3,4...then negotiators can use their usual tactics, if things are more complex, then official negotiation has limitations... Interviewee 713\_0011*

Interviewee 713\_0013 demonstrated an understanding of complexity theory and acknowledged that elements of a complexity approach were not used in Cypriot negotiations. The interviewee pointed out that even though simplification of a complex situation might occur, this would be followed by complexity re-emerging. The interviewee noted that a model based on multiple social factors had been proposed, but had never been fully developed or introduced. The tool might have informed negotiations so that the opinions of more than two people could be taken into account. The way in which the interviewee perceived the nature of a complex social problem is revealed by the following comment:

*...you can't have simplistic solutions to complex problems, but at the same there are ways to model and predict outcomes even in complex situations. That's how I understand complexity theory. Now, so in terms of that I wouldn't say that I have seen complexity approach being used at all, because it requires really kind of solid knowledge of complexity theory of mathematics if you want to do it properly. And I don't think that's the skills that negotiators often have, and there is always the temptation to try and simplify problems. Now simplification is not always a bad thing, I mean as basic principle of mathematical modelling is first you simplify to its absolute basic...a problem, and then you recomplexify, so then you build up the other parameters, variables that you feel are relevant in consultation with local stakeholders with others. And this is an approach that we have been using with the...a new tool that we are developing with organization called SeeD which is the Social Cohesion and Reconciliation Index, where essentially we looked at the Cyprus issue as the social issue, actually social problem in this case to look at, with huge amount of complexity, but also we did tend to realize that some factors are more important than others, so although you may have thousands of factors driving reconciliation, out of thousand you can narrow it down to 20 or 25 which are really matter through statistical analysis. And then you can rebuild your model back up, and create a certain amount of controlled complexity which allows you to a certain extent predict certain outcomes of different approach and also to kind of understand where we are on the reconciliation spectrum. But that's the only example I know of that ... even approaches, you know, but that's not the negotiations level, although this tool would clearly be useful policy advise tool for the negotiators. At the moment it's still being developed so it's not being used, but eventually I think it maybe one way to actually making roads at the negotiation level to actually have a more informed negotiations process that takes into account much more than just the opinions of two people.*

Interviewee 713\_0013

The same interviewee added:

*...the reductionist approach doesn't work, it never has. Interviewee 713\_0013*

The comments of Interviewee 713\_0018 underlined the problem of reductionism, which manifests itself in non-productive negotiations:

*There was this rationale of dealing with the different dossiers separately. And I think this was not very productive... Interviewee 713\_0018*

Interviewee 713\_0020 emphasized the fact that the sequential approach to negotiations created new problems and issues. The interviewee referred to the period 2008-2012, and further explained that taking the situation in Cyprus as it currently stood, the Greek Cypriots were willing to share power with the Turkish Cypriots, as long as control of Territory and Property were given back to the Greek Cypriots. However, the Turkish Cypriot side aimed at negotiating the powersharing first, while the Greek Cypriots aimed at negotiating property and territory issues first.

If the negotiations fail to advance, each side is left with a certain number of negotiating concessions or gains. However, there is always the fact that a basic provision of the negotiations is that 'nothing is agreed until everything is agreed'. Therefore, when taking issues in sequence and separately to other chapters, lead negotiations to stalemate, and the sides might have lost some negotiating powers and negotiating advantages as indicated by the interviewee:

*In the past [2008-2012], almost always one issue was discussed after the other....but the other obvious thing which is also recognized in the textbooks about negotiations is that when you take items in sequence, you create a new negotiating problem, which is, that each item if you take it separately, that when you are negotiating it is quite clear each side is going to get something in some areas and give something in other areas. This is what negotiations are. When you take items in sequence you create a new negotiating issue... because each side wants to negotiate the items where it thinks it will gain first. Interviewee 713\_0020*

Reductionism and a sequential approach prolonged negotiations, as indicated further by Interviewee 713\_0022:

*There was a great discussion at the beginning of the talks, whether issues were going to be taken one by one, and all to fit together and be accepted or not, when the whole system...all issues will be discussed and the decision will be a global. But issues were*

*going to be discussed separately. I think that one of the reasons of the prolongation was that all the issues were discussed separately, and the theory and the political decision was that, that agreement will happen as a whole and when the whole will be completed and every issue will be decided, on all issues will be agreed. So and this, and this came this prolongation, the discussion was that whether it was better, every...during the discussion the issues in which there was an agreement to be accepted and applied.*  
*Interviewee 713\_0022*

Interviewee 713\_0022 pointed out that the issues could not be looked at in isolation of the whole, providing an example from the Territory chapter:

*It's problem again, because you concentrate the whole issue on each separate problem, for example when we discussed the territorial is not only the solution you try to give, it's not only separated on the territorial issues, but the whole political problem is coming on, how the bi-zonality, the distribution of power the all these things are coming again together' ..... 'Separation of the issues their problem, because become ...cannot be solved. And always new difficulties appear, and even, even in the cases there was proximity in the facing of the issues, finally everything collapsed because the central point, the central line as you mentioned was missing and perhaps this was connected to the political will to solve the problem finally. Or the obstacles were bigger than the political will. So we continue to be in this deadlock for such a long period of time. And we can see that even things on which were agreed in the past, then we are starting from the beginning and they start again and again and so on... Interviewee 713\_0022*

Interviewee 713\_0024 reinforces the outstanding failure of reductionism:

*You can't discuss things separately. Interviewee 713\_0024*

while Interviewee 713\_0030 recognized reductionism to be a simplistic state of affairs, but that a complexity approach would be a 'new' and 'original' approach to a political situation. He spoke of how politicians deal with every day affairs and described the approach as one of intervention and manipulation. Politicians, he felt, did not appear to understand how things merged:

*They (refers to politicians) just make routine dealing with everyday affairs and they see politics, they approach politics as just this kind of intervening or manipulating or handling...everyday political affairs with that horizon, tomorrow, next year, they can't see how things merge together. Interviewee 713\_0030*

This interviewee, without using the specific terms, described reductionism, linearity and a sequential approach to negotiations that had resulted in conflict for 50 years:

*As far as negotiators themselves are concerned, I don't think that this will play but a marginal role, because they are Technocrats, they have particular issues, a list of issues and they have to go through them, put forth their positions which at first, at the first stage will be the entrenched positions of each side and then see how by 'give and take' as they say they will come to a compromise. This is the method that has been throughout almost 50 years of intercommunal talks and the crisis. And I am afraid, if it was just this and only this there wouldn't be a hope or a chance for a breakthrough again... this approach of issue by issue conflictual approach, and how you win points, like a chess, playing a chess and you are trying to make such moves as to win your opponent... Interviewee 713\_0030*

Interviewee 713\_0034 reinforced the idea that the issues in negotiations cannot be viewed in isolation from the rest of the package due to connectivity between them. Nevertheless, the approach of viewing issues in isolation was a guiding philosophy of the negotiations. The interviewee further highlighted that the notion of 'nothing is agreed, until everything is agreed' is not efficient or realistic:

*Well there has been sort of agreement that 'nothing is agreed, until everything is agreed', in other words that seems issues are related and connected to/with each other, the Negotiators will never close a deal on a particular issue without the wholesale agreement being sealed first. So each issue may be agreed upon, but until the final agreement is reached it is officially open, so that a give and take negotiation can take at a later stage. That let's say that the guiding philosophy of the negotiation, and it has always been the guiding philosophy of the negotiations. So regarding connectivity I would say that negotiations it is more difficult to reach a deal, because no issue can be isolated from the rest of the package, they are so interconnected if not only thematically then also in diplomatic terms. That the final deal will be reached at the very end, when even some things on something that was agreed previously on the specific issue may even change at that point. So yes, and this makes it more difficult to reach a negotiation, on the other hand it may mean that one side concede something on one issue, and the other concede something on another issue of the negotiations. Interviewee 713\_0034*

The same interviewee further reinforced the fact that the negotiations have been conducted mostly in a reductionist and sequential manner as 'A, B, C, D, E'. From interviewee observations, politicians do not establish connections between the specific issues:

*Now more specifically regarding the significance of the connections between the issues, I cannot think of the last time that someone linked two issues in their public rhetoric. Usually they are mentioned in the same sentence, but separately distinctively. So You have Territory, you have the return of Refugees, you have Guarantor Powers, you have A, B, C, D, E being mentioned as separate issues by politicians. So I think the politicians, my, let's say not so much empirical observation, I mean I have not done empirical research about this, but my main conclusion as to that question would be that politicians do not usually establish connections between specific issues. Interviewee 713\_0034*

This interviewee further indicated that the politicians discussed issues separately, without linking chapters to one another:

*Mostly there is the reductionist approach, and sometimes they also contradict themselves. So for example the President recently was in the States, and agreeing let's say for the UN Assembly and when he came back he said something about all Refugees to return to their homes. And obviously that cannot happen if there is going to be a solution, realistically that is impossible for example. Or certain politicians may say that all Turkish Settlers should return to Turkey, but they do not specify who they see as the Turkish settler, or who they define as the Turkish settler. So yes, all these issues are mostly mentioned separately and rarely have I personally heard a politician to establish a linkage between different chapters, at least in so far as public rhetoric is concerned. Interviewee 713\_0034*

Interviewee 713\_0038 indicated that negotiating chapters in isolation automatically imposes limitations and limits progress. The interviewee emphasized that the modality of negotiations should be open to account for all the chapters to be considered at the negotiating table simultaneously:

*Well for many years I have been saying, somebody who was involved in negotiations myself in 2008 when negotiations started I believe that negotiating each chapter by itself without connecting them to the other chapters can take place until a limit, until a certain time, but after that time I believe that solving each issue by itself is not possible. So since 2010 for example, I have been an adamant supporter of the idea, that the negotiations should take place in such a mode, in such a modality that all the chapters should be open on the table. And the two sides should engage in what I call 'give and take' between the chapters.... Interviewee 713\_0038*

The same interviewee elaborated further:

*So obviously these issues are connected in many different forms and should be connected in many different forms if you want to solve the Cyprus problem. Because at the end of the day this is a 'give and take' issue, one side should give something in return for something else in different dossiers. So obviously this is complex, it looks complex, but nonetheless they are very much interlinked if you want to solve the Cyprus problem. Interviewee 713\_0038*

The following comment from Interviewee 713\_0049 also reinforces reductionism, linearity and a sequential approach:

*...Until now they were looking at each issue separately, so they would take one and see where there are convergencies, where the differences and put it aside. You know ok, ok we made progress, let's move to the next one and by next one ...if there was time we would come back to the first. That lacked these linkages, these connections... Interviewee 713\_0049*

Interviewee 713\_0050 acknowledged that the chapters in negotiations were treated in a separate fashion which produced limitations. He also pointed out that even though the sides had combined the chapters at the Greentree initiative in 2011, the negotiations still had not produced positive outcomes:

*Because they are interconnected (interviewee refers to negotiated chapters), but they were treated separately and you can only go so far with each of them, and then you got to the stage which is what, two thousand, whenever the Green Tree was, I think that was early 2011 late, when they finally started trying to put this altogether, but maybe it didn't work, because they haven't been put together from the beginning, so now this time round they are trying to do this altogether. I am still not convinced that they will manage it actually. I still think, I don't know if you were at the meeting the other day when, it's just to do with some of the characters of those involved in the negotiations, on the Turkish Cypriot side he is lawyer and he is a details lawyer, so the risk of getting into the weeds on a one specific subject and then not interlinking it, I think it's quite high. So, but you do have to treat it as a whole, because it is like, it is like almost a matrix and certainly for sure the Turkish Cypriots think of it like that, and especially Kudret, because he is very much, if you take something I take something, or if you give something I give something, so for him it's all you know, like I said, that changes and that changes, so... Interviewee 713\_0050*



And Interviewee 713\_0053 reinforced the point that the 'chapter by chapter' approach was not practical:

*...Discussing things chapter by chapter is not practical, because people's view on one thing may shift by what happens to another... Interviewee 713\_0053*

Interviewee 713\_0058 noted that the sequential approach to negotiations simply led the sides into a stalemate:

*...The previous set of negotiations, when President Christofias was leading the Greek Cypriot side were quite different. I didn't have experience of Christofias Talat, I mean others did and I am sure they have spoken to you about that, but for me what is happening now is very different from Christofias and Eroğlu which came to see utterly pointless process, where the two leaders would get together every so often they would prepare statements at each other and really nothing would be achieved and they were going to go through everything sequentially! So they got stuck on Governance and never really moved beyond Governance... What I saw with Christofias and Eroğlu was not very good, not very productive or helpful. And I think that's ultimately why they stopped. Interviewee 713\_0058*

Interviewee 713\_0059 also commented on the sequential approach, pointed out that ultimately many negotiators had to acknowledge the interconnectivity of the issues:

*...Let say that they had the EU matters they would finish with EU matters, then will turn to the next chapter and then in the end they realized that everything so much connected to the last chapter. Interviewee 713\_0059*

The same interviewee admitted that the conflicting sides could not agree on anything by negotiating in isolation, but were resistant to talking about the issues 'all together'. The interviewee also added that the sides were indecisive as to their common vision:

*I think it is because what if these 5 years is the process, it was really 5 years because it stopped in 2012 [the interviewee refers to negotiating sequentially]. If it achieved anything it sort of did see through, you know ok what are these things we just can't agree on by negotiating and isolation, they have always were quite resistant to talking about them all together, I think it's mainly, I think it was a Turkish Cypriots that had to be brought round to do that and there is the resistance is that they kind of know that one second of that stage and they are in the end game, so because both sides sort of want the solution, but sort of don't want the solution. They kind of want to live together, but don't*

*want to live together; they don't want to live together at all actually. Interviewee 713\_0059*

Interviewee 713\_0061 confirmed that reductionism was apparent in negotiations. He explained the connectivity appearing between the negotiated chapters with respect to Governance and Powersharing, as well as Property and Territory:

*[The interviewee refers to reductionist approach in political negotiations, when negotiators attempted to solve each chapter/element separately] It will never work unless in a most improbable of circumstances, each Chapter is equally important to the two sides, is equally important to the two sides, and is improbable in the extreme. So doesn't matter which conflict you take you are going to find, in this case Governance and Powersharing and in particular Powersharing itself is fundamentally important to the Turkish Cypriots who are 20% of the population. For the Greek Cypriots, return of their properties or compensation for their properties and territorial adjustment is fundamentally important given their perceptions of their country being invaded and occupied. So that is a really, really important issue. That's the, in one sense is the most important issue for them. That is a very negative issue for the Turkish Cypriots, because they have got to give up the houses, they have got to pay the compensation and they have got to move people because of the territorial adjustment, so it is a very negative issue for Turkish Cypriots, it is a very positive issue for Greek Cypriots'*

*For Greek Cypriots sharing a presidency through a rotating presidency, sharing power, giving the Turkish Cypriots effectively veto over a federal decision making, that's pretty much a negative for them where they are 80% of the population. Creating two zones, a Greek Cypriot zone and Turkish Cypriot zone, formalizing, because it exists already, but formalizing that in an agreement, it's not really great for the Greek Cypriots either 80% of the population, and they actually both heavily, they own 80% of the property on the north in Cyprus and turning that into a Turkish Cypriot zone legalized, it already is, but legalizing that complete negative to the Greek Cypriots. It's a gift by them to the Turkish Cypriots. So you see how they, the chapters are need to be traded off between each other. Interviewee 713\_0061*

The same interviewee referred to the emerging linearity in negotiations and the complexities of the situation:

*...But as I said what happened in 2008 was that the leaders sucked it up into themselves. It was Christofias who did it really, Talat didn't want to do this, but he was forced into it. So then they started linear reading, got to Governance, and we went I think to Property and then back to EU and Economy, I can't remember the order of it, but we had this*

*waves of going through things which produced those documents. But in the end, when they got closer to Talat term in 2010, Christofias wasn't ready to announce those papers; Talat wanted those papers in red, black and blue to be published, so that we could, and then at the end Talat made his press conference saying but Christofias said stay quite. And that in a sense the Turkish Cypriots hold Christofias responsible really in some respects for his electoral defeat and that then would have shown the big picture in the public domain. They continued that under the role of Christofias but again they didn't make much progress, and they tried to focus more on the Property, Territory, Security because a lot have been done on the other side. Now as far as I understand with this concept of framework agreement, they want to have deal with the big ticket items and not get bogged down. Interviewee 713\_0061*

Interviewee 713\_0061 implied that the sequential approach to negotiations is limited and does not work. The interviewee stated that a holistic approach with trade-offs between the chapters would be a more appropriate approach to negotiations:

*They are all connected [refers to negotiated chapters] because where one side needs to make a concession in one chapter which is politically important to them and less important to the other side, there are other chapters which might be important to the other side, but not so important to the first side. So to conduct a successful negotiation you have to trade off concessions between the chapters, so in that sense they are all connected. In some respects, there are even more directly connected Territory and Property are directly connected with each other. That is the more Territory the Greek Cypriots gain the less they solve the quick, the more they solve the problems of Property, returning Property to the original owners. So, there is that very direct connection between those two chapters. But more generally, you can only succeed, I doubt that you can succeed in the negotiations, but you can only succeed in these negotiations if you trade off concessions between the chapters. So you need a holistic approach rather than what I call a sequential approach, where you just go from one chapter to the next, solve the problem in chapter one, you move to chapter two, solve the problem, you can't do that, you have to trade off concessions in one chapter with concessions in another. Interviewee 713\_0061*

Interviewee 713\_0051 suggested that the negotiations were broken and with the 2014 Joint Communiqué the sides were going to attempt to re-establish the connectivity between the issues. The interviewee also emphasized the risk of 'falling back on one specific chapter':

*In terms of the negotiating process, I would say they were broken and we might be in a bit of the transitional period when we see whether there are permanent, you know, I mean there are attempts to let say re-establish the connections going on at the moment. And I think if we are at the stage of let say of Kudret's analysis is correct, that close to the end of what they are calling the screening process and then they are going to move to a more substantive issues. Then at least it's an opportunity to re-establish those connections, one other things we were just saying in Nado, is that kind of what I said before, is that there is still risk that they will fall back into the winds of one specific chapter. So that needs, in fact what they were saying they need to remind Turkey to keep focus on the big picture. And I think that's it is not easy to keep focus on the big picture, because partly because some of the characters involved, but just because, I remember writing, being a note taker when they spent 40 minutes on the footnote. So their capacity, it's partly to do with the will. If both sides really do want to do it. And there is a question mark about how fast the Greek Cypriots want to move. The Turkish Cypriots say they want to move quickly, partly because, well they have always said that. The Greek Cypriots, we don't know this, they are saying privately they want to move quickly to the UN, but then the briefing people in the press saying about 18 months is our timeline. Which means that they are hoping Eroğlu will lose the elections, so actually another outside influence, is obviously election timetable as such. Interviewee 713\_0051*

The summary above captures that the various negotiators were aware of the problem of reductionism, linearity and sequential approach (RLS) and possibly a partial cause of the stalemate that characterizes the Cypriot negotiation system. Support for this shared understanding is evident in other commentaries in the literature.

## **5.5 Summary of the findings and discussion**

### **5.5.1 Findings and discussion in relation reductionism and linearity in the current system of political negotiations in Cyprus**

The very essence of human thinking is to reduce complex phenomena into constituent parts for the purpose of a better comprehension and understanding. According to Aquilar and Galluccio, individuals perceive the complex reality of the environment in a simplified manner (Aquilar & Galluccio, 2008). Political actors and leaders operating in complex realities are the same individuals who may, by way of patterns rooted in the human psyche, simplify complexity, ambiguity and uncertainty and therefore introduce policies, make decisions and negotiate based on linearity and reductionism which originated from a simplified perception of the world (Aquilar &

Galluccio, 2008). Similarly, the system of political negotiations in Cyprus exhibits reductionism, linearity and sequential organization, with negotiations divided into six main chapters:

- Governance and Powersharing
- Securities and Guarantees
- Territory
- Property
- Economic Matters
- European Union Matters.

The findings for RQ1 are based on multiple interview analyses and provide significant insight into the system of political negotiations in Cyprus. The findings reveal that the elements of reductionism, linearity and a sequential approach to negotiations are explicit in the system of political negotiations in Cyprus. The majority of the interview participants indicated that the chapters in the system of negotiations were treated as an issue by issue approach, in isolation from one another, sequentially. The interviewees highlighted the problems associated with reductionist, linear and sequential approaches which have prolonged the negotiations through stalemate.

Synthesizing the findings with the literature review of the contextual background on negotiations, one can notice linearity evolving in the period 2008-2012. As has been indicated by Napolitano (2011), the Greek Cypriot side demanded that the Property and Territory chapters be connected, which would not be acceded to by the Turkish Cypriots who wanted to use these chapters as bargaining chips during the 'give and take' phase of negotiations (Napolitano, 2011, p.8).

The reluctance of the Turkish Cypriot side to connect the Territory and Property chapters posed a problem for the Greek Cypriot side, as the Greek Cypriots

*called for congruous territorial adjustments in their favour in order to reduce the number of Greek Cypriot owners with legal claims in the territory of the future Turkish Cypriot constituent state. (Napolitano, 2011, p.8)*

About three quarters of the properties in the TRNC were formerly owned by Greek Cypriots, and if each Greek Cypriot claimant were to have their property granted through restitution,

implementation of principle of bi-zonality would be impossible (Napolitano, 2011). Furthermore, the Turkish Cypriots have requested ‘a ceiling on the number of Greek Cypriots who [can] reclaim their properties in the North’ (p.8). Over time, the Turkish Cypriots have agreed to connect the Territory and Security and Guarantee chapters, but only if these two chapters are left for the final stage of ‘give and take’ (p.8).

The findings in this section are consistent with the interdisciplinary literature and feed into conclusions on reductionism and linearity reinforced by Vallacher et al (2013) in their collaborative effort to understand an intractable human conflict through the lenses of complexity theory and nonlinear dynamical systems (Vallacher et al., 2013). Similar observations on reductionism and linearity were also made in the field of peace-building under the umbrella of conflict resolution (Ricigliano, Ramsbotham, & Zartman, 2011). Reductionism leads to stagnation and impedes negotiation according to author Michael (2011). The same author notes that by not opening the 35 chapters needed to complete accession negotiations between Turkey and the European Union, Turkey risks the accession stalling (Michael, 2011). Michael (2011) further notes:

*According to Joseph Camilleri, both intra- and inter-societal conflict can have far-reaching consequences for regional identity and institution building, but the linkages between the conflict, the mechanism that it brings into play and the outcome it produces are neither consistent nor monodimensional. One key illustration of this complex set of linkages is how post-Kemalist politics has manifested itself in northern Cyprus. (p.200)*

A similar conclusion was reached by Zartman and Faure (2005), who established that ‘if each one of the issues were treated separately, each would lead to deadlock’ (Zartman & Faure, 2005). Zartman and Faure (2005) noted that a tendency to treat issues separately had been observed in US-Soviet negotiations (1972-1979) on the second Strategic Arms Limitation Talks (SALT II) Treaty. Authors indicated that the two issues, ranked as high priorities for US-Soviet negotiations (1972-1979), were not linked. Once the issues were linked, an agreement could be reached (Hopmann 1996):

*Originally, the Russians devised a classic concession - convergence approach to reduce the number of SS-18s on the Soviet and the number of air-launched cruise missiles (ALCMs) on the US side. However, the USA did not want the ALCMs to be considered strategic missiles, because the range was rather short. They preferred to put them in the category of gravity bombs. A protracted deadlock resulted from this basic divergence.*

*The two issues were not structurally linked, but they were ranked as high priorities for each country. Each party was more eager to strengthen its own military capabilities than to reduce those of the other. The two issues were finally linked, and an agreement was reached in which the Soviets could retain their SS-18s and the Americans were allowed to deploy a specified number of ALCMs. (pp.83-84)*

The intractable conflicts and political negotiations bear a strong resemblance to complex realities where qualities of uncertainty, unpredictability and dynamicity prevail. The approach adopted by the sides directly refers to empirical evidence from the interdisciplinary literature review on complexity theory. The outstanding feature of the concept of reductionism is that it requires a division and partition of complex problems in order to manage them (Alberts & Czerwinski, 1997). Gell-Mann's (1997) work argues that the division of complex problems into constituent states then combining these back into one whole constitute serious limitations when dealing with complex linear systems (Gell-Mann, in Alberts & Czerwinski (Eds.), 1997, p. 8).

Nonlinearity in a complex system where a multitude of elements continuously and dynamically interact with each other is, therefore, the reality. By the same token, the fundamental factors occurring in a complex system of the intractable conflict, where multitude dynamicity of hostile elements continuously interact, contributes further to the state of intractability (Cilliers, 2001; Pruitt & Olczak, 1995; Rutherford et al., 2014; Vallacher et al., 2010; Vallacher et al., 2013). The principle laws of complexity theory with respect to nonlinearity hold true for the system of political negotiations in Cyprus, whether this is formally acknowledged or not. As has been pointed out in Chapter 3, in terms of the interaction of systems and subsystems, the negotiated chapters exhibit interconnection and dynamicity, although the connectivity has been marginalized (Alberts & Czerwinski, 1997) due to historical and colonial arrangements and practices that have resulted in a divisiveness and reductionist worldview.

In addition, the human psychology tends to reduce problems in order to assist understanding complexity. As demonstrated by the literature review on reductionism and linearity (Descartes and Newtonian laws), the world is understood through deterministic means where the analysis of constituent parts prevails, the very same notion holds true and appears to apply in the Cypriot system of negotiations.

Looking at the world through the Descartes and Newtonian lens of reductionism, both sides have fallen into the trap of hardening and cementing the boundaries of the negotiated chapters without an adequate flow of connectivity and interconnectivity between them. The findings from the interview analysis and the interdisciplinary literature review (Chapter 3) oppose the reductionist, linear and sequential manner of Cypriot negotiations, although it continues for the historical, political, social and psychological reasons identified.

Even though the system of political negotiations exhibits elements of reductionism, the importance of socioeconomic and political, domestic and regional dynamics should not be diminished nor ignored. In this respect, the negotiations which took place following the Greek Cypriot presidential elections in 2008 were challenged by the dispute over the Republic of Cyprus's exclusive economic zone for the exploration for gas and oil which derailed ongoing negotiations. In March 2010, negotiations between Christofias and Talat had been suspended due to upcoming elections in the North of Cyprus on 18 April (Security Council Report [SCR] <sup>1</sup>, 2010). The negotiations resumed in May 2010 with the newly elected Turkish Cypriot president Eroğlu (SCR, 2010).

In mid-2012, the Turkish Cypriot side suspended negotiations due to the assumption of the European Union rotating presidency and the possible change in the dynamics of the Greek Cypriot leadership due to elections. The sides continued to hold each other responsible for the absence of progress in negotiations (Morelli, 2013).

In 2011 the dynamics related to the Greek Cypriot hydrocarbon exploration and exploitation and the question of how the revenue would be distributed and whether the issue should be addressed at the negotiating table increased tensions between the Greek and Turkish Cypriot sides and Turkey (Gürel, Mullen, & Tzimitras, 2013). [The discovery of gas in the Cypriot and Israeli waters meant that the simplest way to gain European clientele via the pipeline was through Turkey (Morelli, 2013)]. The financial crisis in 2013 in the South of the island in parallel to the election period of the

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<sup>1</sup> SCR is independent and impartial; it advocates transparency but does not take positions on the issues before the UNSC. Security Council Report was incorporated on 17 November 2004 in New York as a not-for-profit organisation.

SCR's mission is to advance the transparency and effectiveness of the UNSC by making available timely, balanced, high-quality information about the activities of the Council and its subsidiary bodies; by convening stakeholders to deepen the analysis of issues before the Council and its working methods and performance; by encouraging engagement of the Council with all member states and civil society; and by building capacity on Council practice and procedure through assisting incoming members and other training and assistance programmes.



Greek Cypriot President Nicos Anastasiades prolonged negotiations while other dynamics emerged on the island. Even though negotiations continued with on and off periods, progress on negotiations would have been encouraged by the United Nations Council Resolutions (i.e. resolution 1986) ‘to intensify the momentum’ and ‘improve the public atmosphere in which negotiations are proceeding’ as per previous rhetoric of United Nations Security Council Resolutions [UNSC, S/RES/1986 (2011), 2011].

One cannot therefore conclude that the elements of reductionism, linearity and sequential approach to negotiations were the sole reason for the stalemate in the system of political negotiations. At the same time, however, one cannot ignore nor negate the fact that the elements of reductionism and linearity contributed to stalling the system as reported by the interviewees in reflecting on the process of political negotiations. From the findings and the literature review, it would be logical to conclude that the elements of reductionism were partially responsible for prolonging or stalling the negotiations.

Following the stalemate in 2013, the sides agreed on resuming negotiations with the signing of a Joint Communiqué on 11<sup>th</sup> February 2014. The Communiqué explicitly acknowledged the notion of ‘interdependence’ which, upon the researcher’s inquiry, was defined as the interconnectivity between the negotiated chapters. Reductionist, linear and sequential approaches to political negotiations that are focused on the dissection of the whole into constituent parts without explicit acknowledgement of connectivities between them appears to be an inefficient approach in the case of complex systems. This matter will be further discussed in the final chapter.

### **5.5.2 Briefly on reductionism and linearity**

The discussion of findings finds support in the literature review on reductionism.

The literature on reductionism refers to breaking down a complex problem into manageable elements that can be addressed separately (Alberts & Czerwinski, 1997). Linearity refers to the arrangement of nature, where the input is proportional to the output, where the ‘whole is equal to the sum of its parts, and where ‘cause and effects are observable’ (Alberts & Czerwinski, 1997, p.iii). As noted in the literature review, the notion of linearity is contradictory to nonlinearity, and therefore predominantly not applicable to complexity theory. The nonlinear environment in a

complex system is based on factors such as the interdependency and interactivity of elements forming complex living entities (Vallacher et al., 2013).

Nonlinearity is characterized by a lack of proportionality between the input and output. Cause and effect are not apparent because the whole is not equal to the parts (Alberts & Czerwinski, 1997). The elements in the system are not linearly related, but are clearly nonlinear. Therefore a change in one element does not generate a proportional change in another element (Vallacher et al., 2013). Moreover any changes occurring in the elements cannot influence the separation of the values from various other elements which together constitute a system (Vallacher et al., 2013).

Therefore, fundamentally, a nonlinear environment is based on notions of interdependence, interactivity, unpredictability, dynamicity, connectivity and interconnectivity, uncertainty, self-organization, and emergence, and it conforms to complexity theory (Alberts & Czerwinski 1997; Cilliers, 2001; Current, 1986; Glass, Colbaugh, Ormerod, & Tsao, 2013; Minai et al., 2010; Vallacher et al., 2013).

The discussion in this section opposes the ideas drawn from Descartes's work *Discourses* (1637), which was essentially based on a mechanistic perception of the world, where the whole could be understood through dismantling and analysis of constituent parts, along with a Newtonian mechanical perception based on a simplified, isolated physical world of linear, one-way causal flows, and deterministic reductionism (Chapter 3). These ideas have been widely adopted in various disciplines as the predominant method of solving problems.

## **Results: Findings and discussion for research question 2**

This chapter presents the results, findings and discussion related to the research question 2 (**RQ2**). The chapter begins by presenting and discussing themes identified in the course of the analysis related to the Cypriot political negotiations. After the presentation of the results and discussion, a summary of findings for **RQ2** is presented.

### **6.1 Research question 2**

This chapter of the thesis addresses results, findings and discussion to the following question:

**RQ2** *To what extent did the conflicting sides adopt recursive approaches to political negotiation system in Cyprus, resulting in similar courses of action which contribute to periodic stalemate/s in political negotiations?*

Analysis of the system of political negotiations in Cyprus revealed elements of recursive patterns in the system of political negotiations between the years 2008-2012/2014. It is vital to note that the reported participant responses were (of a face value) their immediate responses to the questions. Further probing might have had produced variations to the reported responses and hence the findings.

### **6.2 Recursive patterns in the system of political negotiations in Cyprus (2008-2012)**

Research question 2 explores elements of recursive patterns embedded in the system of political negotiations in Cyprus between the years 2008-2014. The theory of fractals (Mandelbrot 1983) constitute the theoretical basis for research data analysis in this section. Fractal theory perceives recursive patterns as ‘infinitely complex patterns that are self-similar across different scales’ (Mandelbrot, 1983). The patterns are typically created by a repetition of a (simple) process over and over again in an ongoing feedback loop. Recursion is the drive behind the patterns. These patterns are called fractals. Fractal theory is deemed appropriate as the objective of RQ2 is to understand repetitive approaches in the system of political negotiations and how these contributed to periodic stalemate 2008-2014.

The section begins with participant interview responses. The responses reveal considerable variations in points of view. Variability led to the identification of cluster themes in relation to

recursive patterns in the system of political negotiations in Cyprus. The themes presented shed light on the formation of recursive patterns and the embeddedness of these in the system of political negotiations, and how these, over a specified period of time, contributed to stalemate in the system of negotiations. The themes also include the recursion of actions, which formed patterns that the Greek and Turkish Cypriot sides adopted into the system of negotiations. This is followed by the researcher's analysis, findings and summary of results.

It is important to note that due to the substantial volume of qualitative research data, only the most relevant themes to RQ2 are presented in this section.

The analysis of responses with relation to embedment of recursive patterns in the system of political negotiations revealed that the majority of interviewees acknowledged, one way or another, recursion of patterns in the system of the negotiations between the years 2008-2014. The interview questions were open ended in nature and therefore captured interviewees' rich and varied responses. However, analysis of the data indicates that the comments of the interviewees did vary and were of a heterogeneous nature.

### **6.3 Psychological fractal dimension**

#### **6.3.1 Blame, demonization, and 'them' versus 'us' mentality**

Interviewee 713\_0025 felt blame and demonization to be factors recurring in the system of negotiations between the years 2008-2012, as well as in previous rounds of negotiations. The interviewee indicated that underlying thinking, basic assumptions and basic desires were the main (recursive) patterns of obstacles in the system of political negotiations:

*...Now and previous lead to that, it just seems to me that it is a kind of a similar pattern of trying but not really trying, and laying a lot of blame and demonizing the other in the meantime and never preparing the ground beforehand so... Apart from that case, which I think was a special case, having to do with both sides wanting to enter into the EU; I think the rest did follow a very similar pattern.*

*...the underlying thinking, or the basic assumptions, or the basic desires of the two sides.*  
*Interviewee 713\_0025*

Interviewee 713\_0028 noted that the efforts of both sides to avoid blame validate the previous point made in relation to 'blame' as being a recursive pattern in negotiations:

*...In the previous round of negotiations, where at some stage both sides were just dragging it on, nobody wanted to be blamed for the failure of negotiations, nobody was prepared to do what was necessary what to come to a deal, and it is very feasible that we end up in another situation where we talk for the sake of talks. And for the sake of not being decided to proclaimed for the breakdown of talks (unclear sentence), you should probably know that it is as much about the solution of the Cyprus problem as it is for not being blamed for non-solution of the Cyprus problem. ...The Turkish Cypriot side is the last effort, they are not even hiding that they would like to see a deadline and this over and that this is always plan of recognition of them all (unclear) which is a very odd way to negotiate. Interviewee 713\_0028*

Interviewee 713\_0026, who also expressed a view on the economy, explained that the key obstacles to successful negotiation are psychological and found at the macro level, while the micro level presents negotiated chapters:

*...the problem is at the macro level and not at the micro level. The chapters are the micro. The psychological dimension of the problem is at the macro level... And if you can aim at impacting, influencing that macro level, it is going to sink down to the chapters...But the obstacles are the psychological ones, I mean when I say psychological, I mean the sentimental as well...naturally. I mean 'This is ours'. The perceptions that this is ours, not theirs. This 'US and THEM'... mentality. Not togetherness mentality...*

*We need to impress on the Greek Cypriot perception that it is not theirs only. It is ours - Turkish Cypriots and Greek Cypriots. And they have to work together. If we are going to turn this into an opportunity and a blessing and not the curse, it is only then this will be possible. Therefore, we can create proposal aim at for example, if hydrocarbons is one of the key potential catalysts to transform, to facilitate settlement...aim at negotiating table today, forming a bi-communal committee on how hydrocarbons can be turned into a catalyst and how the two sides can work together on the hydrocarbons issue. Interviewee 713\_0026*

In a long comment, Interviewee 713\_0006 noted a psychological dimension at the macro level, but argued that the overall outlook and the perception of the sides, and the visionary level should be focused on. The interviewee revealed that the obstacles between the sides are psychological, mental and sentimental, summed up as 'this is ours, not theirs':

*I think my point on that is, rather than be individual chapters, it is the overall outlook that we need to aim at to change. Because that's where the transformation is occurring, it's*

*not under the chapters that the transformation is occurring. It is occurring at the visionary level, at the preoccupation level. If you can move that, there is a need to cooperate, we cannot do this on our own. It cannot be done. It would lead to disaster....if our efforts are aimed at changing that, this is what I am saying theoretically, if our target is that it's going to have an impact...the problem is at the macro level and not at the micro level. The chapters are the micro. The psychological dimension of the problem is at the macro level....And if you can aim at impacting, influencing that macro level, it is going to sink down to the chapters.*

*... The obstacles are the psychological ones, I mean when I say psychological, I mean the sentimental as well. Naturally. I mean 'This is ours'. The perceptions that 'this is ours, not theirs'. This 'us and them' mentality. Not togetherness mentality.*

*We need to impress on the Greek Cypriot perception that it is not theirs only. It is ours - Turkish Cypriots and Greek Cypriots. And they have to work together. If we are going to turn this into an opportunity and blessing and not the curse, it is only then this will be possible. Therefore, we can create proposal aim at for example, if hydrocarbons is one of the key potential catalysts to transform, to facilitate settlement...aim at negotiating table today, forming a bi-communal committee on how hydrocarbons can be turned into a catalyst and how the two sides can work together on the hydrocarbons issue.*

*The historic perception of Cyprus, which is separate, different for the Greek Cypriots and for the Turkish Cypriots. We are talking about, we are at negotiating table, what are the things are, what are the patterns that are blocking development, I think that's one the historic perception... Interviewee 713\_0006*

Interviewee 713\_0049 acknowledged the fact that the political negotiations fall into the same pattern and become gridlocked:

*.... it was the same pattern that locks, and also the UN what they used, is kind of model where they go to the one side hear what they say, they go to the other, and then they develop the text that they hope represents both sides and both views and show it to them and then they start again changing and going back and forth etc., and then deadlock and then the one side comes and blames the other, so the blame game recycles itself you know, it wasn't us, it was they, it didn't accept this, they didn't bring the map, they didn't bring this, so people at the end lose faith, both in the process and in the actual exercise of negotiations.*

*Yes you have to revisit and see what has been going wrong from both, both UN and here, of course they changed it to 'Cypriot led, Cypriot owned' and Cypriot deciding and so on,*

*which I was glad when I first heard it, because I said to myself finally we are taking responsibility, that's how I viewed it, that we are not putting all the blame on the outside factors and on the mediators, but we are going to take mature and sit like adults and negotiate and you know how it all led..... Interviewee 713\_0049*

The notion of *blame and demonization* has penetrated the entire political and socio-economic culture of Cyprus and the system of negotiations on multiple levels. The signs of *blame* were seen as early as 1968/1969 in an intercommunal round of talks between Glafkos Clerides and Rauf Denktaş under the auspices of the UN Good Offices Mission (Diez & Tocci, 2009; Hadjidemetriou, 2007; Hakki, 2007; Mallinson, 2005; O'Malley & Craig, 2001; Varnava & Faustmann, 2009). After four extensive rounds of talks, mainly focusing on questions of a constitutional nature (Chapter 2) (the fourth held in 1969) (Varnava & Faustmann, 2009), the sides have achieved nothing. The UN Secretary General placed blame on both sides for the failure of the talks (Varnava & Faustmann, 2009).

Between the years 1974 to 1999 there 'were a series of failed UN initiatives' (SCR, 2008, p.7). 'Usually the parties blamed each other for the failure' (p.7). In 1991, the Greek and Turkish Prime Ministers failed to find common ground, despite the potential launch of an international conference announced by Perez de Cuellar. Later Perez de Cuellar 'blamed the failure on Denktaş's assertion that each side possessed sovereignty, which UN resolutions attribute solely to the Republic' (Migdalovitz, 2008).

In 1994, the Turkish Cypriot leader Denktaş agreed on confidence building measures (CBMs), although later put an argument forth that 'CBMs unbalanced their equities' (Migdalovitz, 2008). As a result, 'Boutros-Ghali blamed the Turkish Cypriots' lack of political will for the lack of agreement' (Migdalovitz, 2008, p.5). The notion of blame yet again reappeared when the Greek Cypriot voters rejected the Annan Plan in 2004 by 76% of the vote, while 65% of the Turkish Cypriot voters accepted the plan. Kofi Annan blamed the Greek Cypriot President Papadopoulos for the Greek Cypriot vote (Migdalovitz, 2008).

In 2006, during the Papadopoulos and Talat period, the UN Secretary-General's Special Envoy Gambari (on 8<sup>th</sup> July) prompted the sides to commence discussions on issues affecting the everyday life of the communities and discussions on the substantive issues. At the time, it was

emphasized that in order for the right atmosphere to emerge, the sides should stop the 'blame game' (Migdalovitz, 2008). In 2012 the UN sponsored talks were suspended, resulting the sides blaming one another for no progress (Morelli, 2014, p.9) (Chapter 2). In 2014 the sides blamed each other for their inability to recognize previous 'convergencies' that both sides had agreed on during the Christofias-Talat period (p.13) (Chapter 2). As it has been summarized by the International Crisis Group (2014) 'everybody shares blame for the lost momentum' (p. 4).

The notion of *blame* and *demonization* found in the political system of negotiations closely reinforces Senge's (2006) theoretical interpretations which highlight the significance of *blame* and *guilt*, which, according to the author, originate from a linear perception of the world (Chapter 3) (Senge, 2006). Senge points out that the conflicting sides often attempt to blame each other. Those who understand systems thinking also understand responsibility for a situation is shared, unlike the linear view of the system where a 'simple locus of responsibility' is applied (p.63). A 'simple locus of responsibility' rather singles out the other side to blame or guilt. Senge concludes that the relationships need to be seen in an interrelated manner and not through the 'linear cause-effect chains' (p.58).

Meadows (1999) shares Senge's interpretations of *blame*. According to Meadows (1997), Western societies perceive causes of the problem as something external 'out there' and not 'in here' (Meadows, 1999, p.4). Meadows explains that Western societies tend to put blame on the other side in order to shift responsibility away from themselves, and points out that as a result such societies often 'look for the control knob, the product, the pill, the technical fix that will make a problem go away' (p.4) (Chapter 3).

Turk (2009) argues that the notion of demonization 'is a process by which we define our enemies, through accusation of evil is... to create the self-permission, win the approval of outsiders, and establish the moral logic required to justify committing evil oneself' (Turk, 2009, p.348). The principal elements to demonization include:

- The other side intended to cause us harm.
- All ideas or statements made by the other side are either wrong or submitted for dishonest purposes.
- Everything negative is the fault of the other side.



- The other side wants to destroy our values and us so we need to destroy them first.
- Benefits to the other side will harm us, and harm to them will benefit us.
- Criticism of us or praise for the other side is an act of disloyalty and treason.
- Without exception, all on the other side are enemies.
- If you are not with us you are against us.
- We have nothing in common with the other side and it is dangerous to consider them human.
- It is impossible to conduct dialogue with the other side or negotiate or cooperate with them to resolve the conflicts we have with them.
- The evil represented by the other side gives us permission to act with hostility toward them, just as they feel and act toward us (Turk, 2009, pp.348-349).
- Given the historical discourse associated with colonialism, foreign military intervention, loss of lives, lands and houses, as well as displacement of people throughout the island (Turk, 2009, p.342), the element of demonization, which is defined as the other, has penetrated the system of political negotiations.

### **6.3.2 Distrust/mistrust**

The interview respondents commented on the issue of distrust as a recursive pattern embedded in the system of negotiations. Interviewee 713\_0029 explained that the gridlock in negotiations stems from repetitive patterns of thinking and continuous distrust of Turkey:

*...There are patterns of thinking that gridlock the whole process; it's the distrust of Turkey as I said earlier. So Turkey needs to think seriously whether they really want the solution or they are just trying to get excuses for another failure, I mean if they are serious about the solution, they need to think how Greek Cypriots would reach the solution, right. It has to be their concern, not my concern ...really yeah... I mean it's a major issue for them how Greek Cypriots will accept the solution. As it is for Greek Cypriots, how Turkish Cypriots will accept the solution. So everybody needs to think about the others.....there is always this distrust, do they really want the solution or they just using words but in reality they don't, that they prefer a two state solution for example. Interviewee 713\_0029*

Interviewee 713\_0039 inferred that the issues of mistrust and lack of confidence appear to be both at the intra-communal dimension and in negotiations. The interviewee acknowledged that the sides

attempted to build trust at the technical committee level as part of the confidence building measures (CBMs), as well as to build trust in the peace process in general:

*Well I mean the problem of course is the intra-communal dimension. In Cyprus we often talk about bicommunality and international community has spent time and money trying to build trust across the communities, but this lack of confidence within the communities is a big hindrance, it is under emphasized, so the difference is between what we may call vertical and horizontal gaps, so it seems that the dynamic plays a very important role. This mistrust. Mistrust of the negotiation process in general. So some of us.....we have been trying to discuss confidence building measures not only in the context of building trust between the communities, but more generally building trust in the peace process itself, so it stands to reason that an agreement of Varosha, which is one of the issues on the agenda, isn't simply designed to appease Greek Cypriot property on earth, but also to instil a certain degree of optimism and momentum such that people can conceive of a future which is more cooperative rather than conflictual, more positive sum rather than zero sum. I realize that all of these are the clichés, but nevertheless they are the essence of the European project, so to the extent that people have faith that the European Union and these other institutions of Cyprus be a part of constructive, helping Cypriot build trust, then by all means these are the projects that should be developed now rather than later, we need manifest experience of cooperative, collaborative projects that are mutually beneficial. Interviewee 713\_0039*

The comments of the interview participants revealed elements of *mistrust* embedded in the system of political negotiations in the form of recursive patterns. The findings complement the already established evidence of mistrust and anxiety in the context of the territorial division of the island since 1974, the political partition between the Greek and Turkish Cypriots and the continuous presence of the Turkish military since the Turkish intervention (Chapter 2) (Hakki, 2007; Michael, 2014). Michael (2014) notes that the divisiveness was perpetuated in the form of a 'repetitious cyclical pattern where disagreements on the substantial issues saw both sides retreat to their entrenched positions' (Michael, 2014, p.117) (Chapter 2).

Michael (2014) further notes that psychological hindrances, such as mistrust, are the core underlying obstacles preventing the sides from reaching a settlement (Michael, 2014, p.117) (Chapter 2). The historical experiences are intertwined with the Greek and Turkish Cypriot psyche in the form of self-similar fractal patterns mirrored in the system of political negotiations. Similar observations are also made in the context of intractable Israeli-Palestinian conflict and internal

conflict in Myanmar, where historically the element of mistrust is high (Ben-Meir, 2013; 2015; Bogais, 2015) followed by uncertainties and anxiety (Bogais, 2016).

Furthermore, Vallacher et al (2013) acknowledge the factors of 'fear, distrust, misunderstanding, and hostile interactions between disputants and between their respective communities as primary obstacles to constructive engagement'. These psychological factors shape perceptions, expectations and behavioural responses, which then influence the direction and the outcome of negotiations (Vallacher et al., 2013, p.28).

The self-similar scalable fractal like patterns found in political negotiations in Cyprus bear a strong resemblance to 'patterns of cognition, affect, and behaviour' (Vallacher et al., 2013, p.14). The authors argue that the traditional conflict resolution approaches are focused on distrust, prejudice and violence between the conflicting sides. However, from the dynamical point of view, the focus is on 'patterns of cognition, affect, and behaviour that lose their meaning if averaged over time and circumstances' (Vallacher et al., 2013, p.14).

Given the historical and political intricacies, Kuhn (2009) explains that fractals are associated with 'near the edge of chaos in a business'. Therefore Kuhn perceives fractals to be a set of continuing patterns of behaviour (Kuhn, 2009).

### **6.3.3 Fear, pain, anxiety**

Interviewee 713\_0038 explained that the production of a recursive pattern in negotiations represents a certain way of thinking which relates to the positional and maximalist bargaining approach. One habitual oversight during negotiations is that both sides fail to engage the civil society as part of their negotiations:

*...It's basically not thinking outside the box, but you get stuck to a certain way of thinking, it's the two sides start with what we call a positional bargaining, or maximalist bargaining approaches, and at some point you get stuck if you don't change the methodology, the way of thinking or you don't have the correct interventions or whatever.... What I don't see, what I have not seen in the previous negotiations is what I said to you just a couple of minutes ago the missing ingredient is the engagement of the real people and the civil society organization into the process. I think this is the biggest obstacle, because the more people are engaged in multi-track levels, the more complete the process is and you know at some point these people will have more and more opportunity to impact the first track. But if they are not engaged much then you know*

*what is the impact of people you know forcing or motivating the track I, the leadership, to do concessions. So that's the missing element, why the negotiations in the past have failed many times in my opinion because the negotiations were conducted by track I behind closed doors totally cut off from the realities of the island, where the hopes and the desires and the fears and the concerns of people are not really directly inputted into the process. So it becomes like a Track I process. What is missing is that this process should be seen on a broader sense as the peace process, not the negotiation process, so far since 1968 the year I was born, when the intercommunal negotiations started, it started as a Track I process totally cut off from the outer tracks. Interviewee 713\_0038*

Interviewee 713\_0049 acknowledged that the psychological dimension, coupled with mistrust and fear, alienates one ethnic group from the other, a division perpetually reinforced in the system of negotiations:

*The psychological misperceptions I think, mistrust, the fears and also alienation this distance, that we have been living and growing apart for so many decades. So this has created all these I think psychological obstacles, and throughout my work and other people's work, we find that really contact can make a difference and can eliminate a lot of all these misperceptions and humanize the other and try to see that we have common fears, common pain, and therefore anxieties that together we can acknowledge, we can help each other. Interviewee 713\_0049*

The same interviewee explained that the psychological dimension should be accounted for by embedding a psychological component in the system of negotiations to create agreements which would overcome the concerns of all the people:

*I think they should be at the table, the common fears. What are the fears of each side, what are the needs and the concerns of everybody. Because you cannot just, I mean negotiations and agreements are not just formalistic, legalistic documents, they have to do with real peoples' lives and concerns, and fears and so on. So unless you take that into account and then see what kind of agreements would address those fears... Interviewee 713\_0049*

#### **6.3.4 Behaviour and thinking mindset**

Interviewee 713\_0038 described recurrent fall back, as both sides constantly reverse agreements they have reached throughout the course of negotiations, which leads negotiations to be cyclical:

*That's a fall back, and we have seen this many times, we have seen this when we after the high level agreements for several years, ...the draft framework agreement not*

*nothing happened to it, this was in the 80's and then in 90-92' you have Ghali Set of Ideas- where are they now? And then the Annan Plan, and then today, where are we? Are we on one page? So you know, how different is this from the 77 and 79' High Level Agreements for example when you compare. Those were about one page, are we still there? Seems like. Maybe, ok, the UN uses the word yes there is a body of work on Cyprus, eehhh what's the fuck you are talking about, pardon my French. Eeeehm...yes there is a body of work that we the academics or some of the practitioners can talk about yeahhh bizonality, bicommunality and you know rotation and tadadada, but they are just some concepts hanging in the air. They are not really fully coded into a radian, accepted by the two sides and..., so when you think about that, then I can tell you that ok, we are many times fell back to the very beginning Interviewee 713\_0038*

The same interviewee indicated that the system of political negotiations was bound to fail because of a lack of engagement with more than the formal components of the negotiations:

*The system is not fully engaged...Look what the two sides are trying to solve is not the conflict, they are trying to solve part of the conflict, and part of the conflict is basically what the agreement is going to look like. But they are totally missing the other parts of the remaining of the conflict which is the sociological element of the conflict, which involves the two communities and their future relationship and what not. The two sides, instead, they focus on solving their formal part of the conflict within agreement. Yeah, but that is the legalistic sort of part of the conflict which involves mostly the first Track, but at the same time those people who will be living in that legal framework that you are trying to create and not engage in this process, so I think that's the main missing element, which made this negotiations sort of failing each time, so... Interviewee 713\_0038*

Interviewee 713\_0038 also explained that the continuous recursive behaviour of the two leadership groups led the system of negotiations into stalemate:

*I think you need to bring in some new elements that would make the two leaders or the two leadership to force them to adopt a different kind of behaviour in the negotiations because it's basically their behaviour which are getting the process to stuck, because they fall into this pattern of behaviour which is not helping. If the two leaders continue repeating the same things that they have been saying years and years and years, how they are going to bring change to the other, you know you need a new way of thinking, you need and based on that you need a new way of behaving. This I don't see in at least Turkish Cypriot leadership much, and I am not saying that the Greek Cypriot leadership is ready for a solution, but they are also very much adamant, but partly I see some bits and pieces of different discourse being used by a Greek Cypriot leader, but by and large*

*they are not so successful both leaders. Not so successful, because you need to see that they change their discourse as well as the way they behave and engage people and that's missing and I don't see that happening in Cyprus, because if you are really determined to go for the extra mile to take a solution, a comprehensive solution, and you know obviously, the common sense tells me that you need to start engaging people and that is not the case by and large happening in Cyprus, instead it is the external factors which are driving the process now in a nutshell. Interviewee 713\_0038*

Interviewee 713\_0052 noted that the repetitive behaviour of the political leadership on both sides was expressed in the old rhetoric nested in the old dilemmas and rivalry, and constituted a hindrance to negotiations. The interviewee indicated that there is a room for improvement in negotiations:

*It all depends on the political leadership there is always that danger, unless there is political leadership, the more things change the more they become the same.*

*I think there is a tendency to repeat yourself to retrack, to go back and find yourself in these old dilemmas, unless you are absolutely resolved to move forward and be a forward looking fresh approaches, yeah.*

*It is always down to political leaders you know, they have the strong will to bring peace and settlement to the island. They can rise above the difficulties, start acting like a team, not rivalries, and be an inspiration for the rest of the community. But if they don't do this, and they instead of becoming the leaders of future Cyprus, they become the leaders of their own community today, and we can find ourselves in such a situation whereby we are simply repeating old rhetoric, sticking to our guns and not moving forward.*

*...The fact that we don't have any progress at the negotiating table indicates that there is room for improvement. Interviewee 713\_0052*

Interviewee 713\_0048 indicated also the cyclical pattern of the negotiations, moving from hope to despair repeatedly. He felt that a lack of political vision led the sides to further entrenchment and stalemate:

*Well they do, for different reasons. But they just tend to do. But there are, I mean the bigger reason is what I told you in the course of our conversation, that it goes in cycles, each time there is hope, each time there are reasons to think that, ok, this time is working. In 2008 for example it was the meeting of Christofias and Talat the two communists as it were, that didn't work, I never believed it would, because that's not the kind of thing that*

*will help the two sides to bridge their deep differences. Now there is perhaps a chance with all this hydrocarbon thing and Turkey being keener perhaps again once more and Greek Cypriots being in the position where they might see a benefit in a solution sooner. Things like this. But it might be another deadlock, because they might not ultimately the political visions of what the solution should might triumph and then they might end up with nothing again. Because the point is that the positions are known, and as time goes on certain things change on the ground, things get more entrenched, so it becomes more difficult to change things. Interviewee 713\_0048*

Interviewee 713\_0063 accentuated differences between the Greek and Turkish Cypriot support for the creation of a bizonal, bicomunal federation. He compared negotiations to being on a treadmill, where agreement may be reached but the rubber mat moves around to the same spot repeatedly:

*...I mean the plan to create a Bi-Zonal, Bi-Communal Federation and there is not enough political support amongst the Greek Cypriots for that solution. There is amongst the Turkish Cypriots. But amongst the Greek Cypriots it's in the essence not sufficient. There isn't sufficient support for that. So the things that would make that happen, real Bi-Zonality, physical Bi-Zonality and Powersharing are just not, are just, they are just too hard to sell to the Greek Cypriots I think in the end, I just don't see them buying it. I just don't see them buying it. And I don't see them, so that means you just get into a treadmill, really, you are on the treadmill, it just keep coming, and the negotiations just keep going, and you just keep standing still, you know like agreement here and agreement there and its politically sold we are making steady progress, or we you know, we have taken steps forward all that sort of thing... Interviewee 713\_0063*

The comments of the interview participants reveal patterns of behaviour and mindsets that systematically recur in the system of political negotiations.

### **6.3.5 Discussion and findings in relation to psychological recursive patterns in the system of political negotiations in Cyprus**

The key findings of this section are that self-similar recursive psychological patterns resembling fractals are scalable across the island and embedded in the system of political negotiation, and to date there has been no research into understanding or dealing with this phenomenon when considering the failure of Cypriot negotiations. The concept of fractal theory, therefore, can be transferred to the patterns identified in the system of political negotiations in Cyprus. The patterns are as follows:

- blame, demonization and ‘them’ versus ‘us’ mentality
- distrust/mistrust
- fears, pain and anxiety
- behaviour and thinking mindset.

Marks-Tarlow (2008) applies fractal geometry in the context of the psyche and the emergence of identity. She implies that the notion of fractals assists in understanding the multidimensional emergence of the self across time. The fractal properties of self-similarity or power laws assist in formulating understanding in relation to the preservation of identity in neurobiological levels ranging from short lived interactions to ongoing or slow moving large-scale events (Marks-Tarlow, 2008). The author extends Mandelbrot’s fractal inquiry by saying that fractal geometry aspires to view beyond the isolation of the self from the other. Fractal edges are dynamic, encompassing inner and outer space (Marks-Tarlow, 2008).

Similar to other authors, Marks-Tarlow articulates permeability of the fractal boundaries, in the sense that there is a level of difficulty in separating ‘brain from the mind, mind from the body and body from the world’ (Marks-Tarlow, 2008, p.180). In emotional terms, these notions correspond to the:

*intersubjective capacity to experience the other as one’s self or to experience oneself as autonomously functioning, despite being embedded in the physical environment or even while resonating deeply implicitly, behaviourally, if not explicitly with another person. (Marks-Tarlow, 2008, p.180)*

Marks-Tarlow implies that the psychological boundaries are dynamic zones of transaction across various states, dimensions, and scales of existence.

*Fractals reside in the eyes of the beholder, being of variable length depending upon the resolution used. In this way, fractals can model vibrant relationships where there is always more to discover the closer one looks. (Marks-Tarlow, 2008, p.180)*

The notions of *blame, demonization, them versus us mentality, mistrust and distrust, hopes, desires and fears, pain and anxiety, behaviour and thinking mindset* among the Greek and Turkish Cypriot societies have been reinforced on multiple scales in the form of recursive patterns. The fact that the



patterns are scalable in nature means that the recursive patterns found in the system of negotiations appear multiple times across and throughout Cyprus, repeatedly penetrating the system of political negotiations in plural terms. Hence, the patterns found in the system of political negotiations are a replica of a larger whole which is embedded in the psyche of the Greek and Turkish Cypriot communities on both sides of the island. Similar to the Koch curve (Chapter 3) or the Sierpinski gasket (Chapter 3), the implicit recursive patterns found in the Cypriot negotiations exhibit fractal like properties. The psychological patterns are deep-rooted in the psyche (Marks-Tarlow, 2008, p.180) of the Greek and Turkish Cypriot sides and therefore further frame the dilemma of intractability of the conflict.

The psychological fractal dimension is manifested through deeply entrenched positions of the Greek and Turkish Cypriot sides and their resistance to adapting to the dynamics of negotiations, which further contributes to stalemate. This implies that the permeability between the entrenched positions of the sides manifested in the physical reality of the system of political negotiations, as opposed to the intangible and implicit psychological dimension, is difficult to distinguish, as articulated by Marks-Tarlow (2008) in the example of permeability of the boundaries between brain and mind.

The fractal psychological dimension can be also described as archetypal, in which the notion of archetypes refers to a pattern of unconscious thought or belief that influences behaviour (Senge, 2005). The concept of a 'system archetype' was coined by Peter Senge 'who identified a series of recurrent patterns in management contexts' (Körppen, Schmelzle, & Wils, 2008, p.30). The notion of system archetypes encompasses concepts such as 'limits to growth', 'shifting the burden' and the 'tragedy of the commons' (Senge, 2006). Furthermore, the notion of archetypes is referred in the context of psychoanalysis as resistance (Braun, 2002), preventing the sides from converging on key substantive issues and reaching the desired goal, which in the case of political negotiations is a comprehensive settlement (Körppen, Schmelzle, & Wils, 2008). In the context of psychoanalysis, the hidden dimensions reveal the irrational side of the players (Körppen, Schmelzle & Wils (Eds.), 2008). There is considerable resistance to the 'unintended consequences of actions', which emerges out of insufficient consideration of complexity factors (Braun, 2002) and the avoidance of making decisions or taking actions (Braun, 2002).

The findings are in line with Mandelbrot's fractal theory which highlights the fact that fractals are similar at all spatial scales, and continuously repeated self-similarity produces fractal objects (Mandelbrot, 2006; Yackinous, 2015). Interestingly, Mandelbrot (2006) implies that fractals could be of different shapes and 'the degree of their irregularity and/or fragmentation is identical at all scales' (Mandelbrot, 2006, p.15). Mandelbrot (2006) further notes is that if the system appears to be self-similar across different levels as in fractal geometry, the system then changes towards complexity (Young, 2011). Given this notion, it is therefore once more reinforced that the system of political negotiations in Cyprus is complex.

According to Yang-zhong (2005), the characteristics of fractals are 'self-similarity', 'iteration', 'self-organization', 'dynamic process', 'simple regularization in complexity' (Chapter 3). Hence 'self-similarity' and 'iteration' of recursive patterns found in negotiations are a subset, a miniature (fractured) copy of the whole reflected as a mirror image of the Cypriot intractable dilemma (Schroeder, 2012).

The fact that 'Patterns nesting in patterns' (Yang-zhong, 2005) suggests that the psychological nature of recursive patterns in the system of negotiations are nested within the complex multidimensional system of the Cypriot conflict. The self-similarity and self-copy of the psychological dimension produces self-organization of recursive patterns in the system of negotiations formed by the system of negotiations itself, even though the environment, in this case the context of the Cypriot conflict, provided some conditions for this development. The dynamic process reinforces the growth and evolution of the fractal-like properties of the negotiations.

The psychological dimension in complex intractable conflicts has been explored by Coleman (2011). The author states that complex conflicts are commonly associated with strong emotions of 'pain, misery, loss, loyalty, rage, frustration, fear, anxiety, and despair' (Coleman, 2011, p.21). Stroh (2011) explains that the historical discourse of oppression in the case of Cyprus contributed to 'losses of life, resources, respect and/or security on both sides' reinforces emotions of fear, anger and the feeling of victimhood felt by the both sides (Stroh, 2011). This in turn strengthens the entrenched positions of the sides as each of the sides aims at reinforcing the right to exist (existential purpose) (Stroh, 2011).

Ben-Meir (2013) notes that in an intractable conflict, such as Israeli-Palestinian conflict, the psychological dimension remains the major obstacle beyond political concessions, which affects every single issue in negotiations, contributing to more intractability and preventing the sides from achieving mutual coexistence, despite the fact that the only viable solution for the sides appears to be the two state solution. Ben-Meir (2013) also notes that the psychological dimension is fuelled by the incompatible historical narratives and ideologies of the sides, as well as religion, coupled with emotions of fear, distrust and insecurity, which result in mutual denial of the narrative, stalemate and polarization. The author highlights the need for a dialogue at the leadership level to resolve the issues of perceptions.

Ben-Meir (2013) and Marks-Tarlow (2008) assert that in intractable conflicts the collective resistance to change or converge by the conflicting sides is stimulated by the desire of each party to protect their vulnerable identity (Ben-Meir 2013, 2015; Marks-Tarlow, 2008). Ben-Meir claims that both the Israeli and Palestinian sides are vulnerable identities, which tend to be more defensive and resistant to change. Similar to the Palestinians and Israelis, the Greek and Turkish Cypriot sides seem to be in a state of vulnerability fuelled by psychological resistance which affects the political negotiating setting. The psychological dimension affects the perceptions (Ben-Meir, 2013; 2015) of the Greek and Turkish Cypriot sides which further translates into a them *vs* us or 'you versus me' mindset (Ben-Meir, 2013).

Ben-Meir (2013) further accentuates the unconscious resistance to change which connects to perceptions contributing to polarization of the conflict. The historical discourse shapes the perceptions of the sides involved in the intractable conflict (Ben-Meir, 2013). Even though the majority on both sides are interested in mutual coexistence and settlement and prepared for hard compromises, the psychological dimension, shaped by historical narratives and divergent perceptions and sheer resistance to change, prevents the sides from achieving the settlement. Alleviation of the psychological dimension is a prerequisite for moving the system of negotiations from stalemate into a state of motion which might assist the sides to reach a comprehensive settlement (Ben-Meir, 2013; 2015).

Despite evidence of a psychological dimension in the literature, Coleman (2011) notes that little attention is paid to the research in the context of social conflicts, with the attitude being that 'if you

become emotional during conflict, wait until it passes before you act' and/or 'rise above your emotions and try to get a rational perspective on the situation' (Coleman, 2011, pp.21-22). These techniques marginalize emotions. While this may be practical for some 'low level conflicts' (Coleman, 2011, p.22), emotions in complex conflicts cannot be marginalized and should be the epicentre and heart of conflict resolution. Coleman (2011) advises that emotion should be recognized as 'the energy behind the conflicts' (p.22) and concludes that 'emotions create the context through which we experience conflict' (p.22).

The findings of the research described in this thesis are in line with Coleman's conclusions in relation to the marginalization of emotions. The interviews revealed a strong psychological dimension as an implicit force, self-similarly and recursively embedded in the system of political negotiations (having emerged out of the colonized divisional attitudes). A sense of oneness and togetherness mentality has long been lost across the island, replaced by a feeling of them vs us. The findings reveal the marginalization of the psychological dimension at the negotiation level, when it may have been more useful to recognize it.

#### **6.4 Political fractal dimension**

As explained earlier the concept of fractals is a useful device for understanding implicit dimensions in several important ways. This particular fractal deals with political dimension.

##### **6.4.1 Elections**

Interviewee 713\_0031 observed that the one embedded pattern in the system of negotiations related to the cycles of Greek Cypriot presidential elections, nationalist sentiment and rhetoric. This meant that often when negotiations were about to reach fruition, the internal opposition from the government parties tended to inspire nationalist sentiment, leading to turbulence close to the time of elections for a presidency. The interviewee felt that something similar occurred on the Turkish Cypriot side, although it was a 'lower level version', with an additional layer of Turkish politics:

*I think yes they [negotiations] do fall into a pattern. I am not sure if that pattern is about the negotiations themselves, my hunch is that it's more about the consumption of these negotiations internally. So when one reviews, again focus on the Greek Cypriot side, the history of negotiations, one keeps seeing agreements that are close to being finalized, close to being brokered and then there is internal opposition from the parties who are not in government, there is fervent nationalist sentiment that's being wiped up and so on. The*

*negotiations...and this happens close to election time for the presidency I mean. Because the negotiations to a very large extent under the President mandate, rather than anybody else, so there is a sort of backing off from the finalization of where the agreement has got to. And there are elections; there is a new nationalist Politic and whatever. Then there is this sort of decision to see it at the table, after the couple of years, of sort of going over this nationalist rhetoric, so they sit at the table they again reach some other kind of agreement that's close to being signed and then again the same cycle. So I think yes, and I....ok in the North we haven't really had a change of Government in so start terms, in the long term as we have had in the South. I mean we have had Denktaş in the Power until 2003, but my feeling is that maybe a lower level version of this mechanics, might also be, of course in the North you also have the involvement of Turkey, the consideration of where Turkish Politics stand at each particular moment so it's a different set of questions that perhaps complicate this scenario, but there is, I think there is a relation to this cycle that I have described ... Interviewee 713\_0031*

Interviewee 713\_0051 perceived recurring elections as an impediment in the system of negotiations. Interestingly, the interviewee notes that all the previous negotiations feed into how the next set of negotiations is conducted:

*There is always some election around the corner. If you think the 3 Key Players are Greek Cypriots, Turkish Cypriots and Turkey, and they have Local Elections, and European Elections, and National Elections, and Presidential Elections, then there is always going to be an Election coming, so...'*

*I think it goes by this issue that UN needs to take hold and keep hold of the process. So one of the things that I found quite surprising and it was partly again, you know, all previous negotiations in a way feed into how the next one is conducted. So in the Annan Plan there is what the things that the Greek Cypriots didn't like at all, was at the very end of the process the UN filled in the Gaps and then it was put to Referendum without the two sides actually having endorsed it - should have had never held the referendum. ....So as the consequence of that we had this 'Cypriot led, Cypriot owned' process..., and that meant that we literally sit there, while they would argue with each other and we wouldn't intervene, which I think it's complete madness. So they would, they could argue for 3 hours and the UN wouldn't open up mouth you know, and that's a waste of everybody's time, because they will just argue forever. So I hope, I don't know if that's changed since, because I haven't been inside the negotiations, but I am worried that it hasn't changed enough. Interviewee 713\_0051*

Interviewee 713\_0032 observed that the pattern of negotiations mainly related to the politics of the leaders and their representatives and the framework of the negotiations. The interviewee also highlighted the fact that there was a need to change 'the way of thinking' of leaders and not the mechanism of the negotiations. His comment corroborated that of other interviewees that psychological aspects were a recursive pattern:

*Look of course, there is a lot of discussion about this issue, but this is theoretical discussion. The discussion, the only thing which was mentioned to change the patterns was that if what is agreed to be applied, and remain and continue discussion on the other issues which are under consideration or has not yet been solved or everything has to be agreed before it to be applied and so on. But now we are in this framework, and any change of the pattern I think is rather theoretical, but there are slight things can happen, what slight things, to broaden the field of the negotiations, something is happening with the Technical Committees. I think that now more Technical Committees will work and even with the Technical Committees you have the involvement of bigger number of people and decisions of Technical Committees can be applied and this facilitates the Trust, the Cooperation, the Negotiators so I think that if we can say about the pattern can be remade, the pattern is the same, but broaden....*

*...It's the same [refers to pattern of negotiations]. But what is happening the problem is not technical it is political. Now the political decisions how...and now for that reason we say that now, we have a chance because there is a change in the political situation, so is not a pattern. The pattern plays a role, is important of course. But we cannot put this possibility the pattern for not solving the problem, only, for the pattern for not solving the problem, but if this period of time there is fruitful ground, if we broaden this field of negotiations with other groups of people working on special issues, I think this will facilitate and this happening. Will be as I have been informed, it would be strengthened in a near future, more committees will work.*

*...It's the same thing, the leaders of the two communities coming together to discuss the issues, or the representatives, this is the same. The same pattern and the same framework. The leaders of representatives and everything is agreed before [refers to the notion of 'nothing is agreed, until everything is agreed']...this is the pattern.*

*...Look, I am thinking politically, I think that if the changes happening cannot influence the negotiations, I don't think that the pattern will play any role and that if we fail; it is something again is deterioration of the situation. Of course there are people who put a lot on pattern.....the solution can happen only when new political situation is appearing and when there is a major change. Interviewee 713\_0032*

Interviewee 713\_0049 agreed that the political negotiations fall into the same pattern and become gridlocked:

*I mean it was during Talat and Christofias period it was exactly that one, and I think also there was that apart from lack of information outside it was, they used that period I think to give a feeling that yes we have many convergencies, but on the other hand, there was a constraint within Christofias Government that he was putting more effort trying to save the coalition with DIKO than really negotiating with Talat, and travelling abroad and going to the different missions he had to go abroad, and then I think with the elections the fact that there wasn't any progress, it caused the downfall of Talat on the other side, and Eroğlu came in who was from the beginning for a two State solution, he didn't like the Bi-Communal Federation and so on. So we ended up again in the same pattern, for everytime there is a context is different but the result is the same. Interviewee 713\_0049*

It should be noted that the Republic of Cyprus's presidential elections are held every five years. The first presidential elections took place in 1959.

**Table 6.1** Winners of Republic of Cyprus's elections

President	Party	Period in office
Archbishop Makarios III		1960-1974
Nikos Sampson	Progressive Front	15 July 1974-23 July 1974
Glafcos Clerides	United Democratic Party	23 July 1974-7 December 1974
Archbishop Makarios III		7 December 1974-3 August 1977
Spyros Kyprianou	Democratic Party	3 August 1977-3 September 1977 and 3 September-28 February 1988)
George Vassiliou	independent candidate supported by the Progressive Party of Working People	28 February 1998-28 February 1993
Glafcos Clerides	Democratic Rally	1993-2003
Tassos Papadopoulos	Democratic Party	2003-2008
Demetris Christofias		(2008-2013
Nicos Anastasiades		2013 until now

In the Turkish north, presidential elections were initiated with the establishment of the Turkish Republic of Northern Cyprus and held every five years.

**Table 6.2** Winners of Turkish Republic of Northern Cyprus's elections

President	Party	Period in office
Rauf Denktaş	National Unity Party in	1983
Mehmet Ali Talat	Republican Turkish Party	2005-2010
Derviş Eroğlu	National Unity Party	2010-2015
Mustafa Akinci	Communal Democracy Party	2015

Between the years 2008 and 2014, the Greek Cypriot side held two presidential elections, as did the Turkish Cypriots. These elections could not be ignored in the context of the negotiations.

#### **6.4.2 Elitist formula to negotiations**

Interviewee 713\_0045 pointed out several impediments recurring during negotiations that contributed to stalling. One particular issue, according to this interviewee, was the elitist formula of the discussions that did not consider the needs or opinions of the civil society as part of the negotiations:

*...You know there is a huge 'give and take' there, so it's, it is beginning to rethink the entire foundation stone that negotiations have been built upon over the past 40 or 50 years...*

*Now, what I will say is this, that I think one of the things that one of the reasons why the gridlock has always happened is because they had continued to use exactly the same formula every single time, which is a very elitist formula. And they haven't, in my opinion, attempted to try introduce some of these varying techniques to try and get beyond gridlocks. So to all.....civic forms of the civil society, the borders of the civil society has not been really utilized, now that is a good reason for that, which is civil society is extremely weak here in Cyprus, I mean this document that I just sent to you, also is a bit of an assessment of the civil society without being too critical but it's clear, civil society in Cyprus is not strong. Now that's also partly down to the political culture of the island as well, ok, which is so polarized as you probably know from your research. So that being the case, is no wonder that some of these varying techniques which have been used in other parts of the world to try and move forward peace processes and they have never really worked here. Maybe because it is such a small place, a small island, you know there is a certain mentality here on the island which you would not get in a large country like Columbia, perhaps, or like in Northern Ireland or South Africa. The degree of diversity is quite small as well. So maybe there are natural constraints to differing types of interventions, or differing types of leverage points that could be exerted. Because of the structural dimensions of Cyprus, population, society, culture, history, traditions, geography.*

*I think that the reason for gridlock has often been because they have basically been trying to do the same thing time and time and time again, and there has been a very little variety to the structure of the negotiations, including the way the things have been conducted up to now.*



*the elitist way that negotiations are been taken place, that is what we are saying in this article, this top down approach, this approach were basically the two leaders meet together with the negotiator, sorry, the UN are in the room, and they negotiate and they just go over the same old issues and they know exactly what each other's positions are, but there are no game changers, no game changers have ever been introduced, there are no internal game changers, there have been very few external game changers ok, and maybe now there are a couple of external game changes the natural gas could be one, the economic crisis could be another one. And I think what we are trying to do, we are trying to introduce internal game changers that might help them, might help to also diversify the dynamics of the negotiations too. This is the role that I think we can play in a very modest way. Interviewee 713\_0045*

The same interviewee explained that the entrenched positions of the sides with respect to their approach to Property issues, human rights and the legal ownership of the land were regularly repeated, followed by each side's accusations. The interviewee pointed out that the approach is outdated and needs to be changed:

*...repetitive patterns, for example, their approach to Property issue, it's again a repetition of the pattern which we used so far, the human rights, the individual human rights, the legal owner of the land has to be given the right to choose, this is repetition and the Turkish Cypriots with Denktaş, Denktaş wanted an ethnic cleansing complete, no property, no Greek Cypriots in the North, no Greek Cypriots in the South, completely cleansed, but the convergences reached with the Annan Plan left an opportunity for interaction because they safeguarded the two thirds for relation, the two thirds for property, this left enough room for mixing of population and interaction, but at the start of the talks, each side comes, approaches the negotiation by its entrenched positions. This is an old fashioned way of approaching negotiations in my opinion because they say, I asked for 5 take 2, the same approach for the other, but sometimes they once their positions become public, then they become ..(?) to those initial positions and they cannot make concessions and once they make concessions they are accused by their opponents of selling out, so this creates a serious problem to the negotiations, the way they come to this repetition of the pattern, they used before, they have to apply, or employ rather a different approach. Interviewee 713\_0045*

Interviewee 713\_0045 felt that the sides should take into account not only the sociological element, but also the concerns and the sensitivities of the other side:

*I mean approaching the talks by taking into the account NOT my community, if I was a negotiator, I would not go there ask representative of the Greek Cypriot community, but I would say I have to take into account the concerns of the other side as well, of the other community as well and their sensitivities, so make such proposals that would convince my negotiator that I take into account from the very start his own concerns and sensitivities as well. This would create what you call it, response by the other, the reciprocity yeah, and once you start with this kind of reciprocal approaching, the others sensitivities and concerns, then you find the way through quite easily, but if you start by this conventional repetition patterns, then you may of course under pressure make concessions, but there is always a risk of becoming captive to your own positions and then being unable to move aside from this.*

*...They may see and have them in their minds, but the way they construct their initial positions, I am afraid is the traditional one of entrenchment in their old positions... and waiting for making concessions by 'give and take'. I give one, they give me one...Interviewee 713\_0045*

Interviewee 713\_0041 stated that the political discourse remains the same in the negotiations, nevertheless there has been some shift in the participants' approach. (Although the focus of the study is on negotiations, there are elements which are beyond the context of the negotiating table that nevertheless directly impact the negotiations):

*What we have signs of, is that major power brokers, changing comes... the church for example, the Archbishop sounds much more moderate these days ok and the Church is in the serious financial trouble, ok, so yeah, and the church can be highly influential at the referendum, at the referendum, before the referendum, so this is the only tangible sign that we have so far that the Archbishop stopped sounding like a hardliner, and he is watering down his positions, he is supporting the President which will have been unprecedented I mean couple of years, this will have been unbelievable, but it's happened, so the discourse has not changed, the political discourse, but some people are changing camps. Interviewee 713\_0041*

The interviews reveal a recursive pattern with respect to an elitist political approach to negotiations. The approach is in line with Jarraud, Louise and Filippou (2013), Lordos (2009), Kaymak (2008), and Hadjipavlou (2004), who have concluded that the negotiation process is limited to political elites without the inclusion of the civil society. The interviews also reflect public opinion polls conducted by the *Cyprus 2015 project* in Cyprus revealing a need for the participation of the wider

population in the negotiations (Louise & Morgan (Eds.), 2013). According to Jarraud, Louise and Filippou (2013) neither side has included civil society in the process of the negotiations for last 40 years. The authors conclude that a paradigm shift is necessary and that the civil society role could support the process of negotiations. Furthermore, the United Nations has requested that the Greek and Turkish Cypriot sides directly involve civil society in the process of negotiations (UNSC, S/2011/498, p.4). [Similar debates are conducted in the context of Myanmar where the government is urged to ‘involve all of the country’s ethnic and religious elements’ to take into consideration the ‘national ownership and political inclusion’ which would be the key prerequisite for success (Bogais, 2016)].

## **6.5 Cyclical fractal dimension**

Interviewee 713\_0030 commented that negotiations were of a repetitive nature, where the sides would discuss the same issues, such as Governance, Powersharing, Property, Territory, Settlers, Guarantees, Withdraw of Arms for years:

*...This forty years we have been talking just about internal Governance, Powersharing, Property, Territory, Settlers, Guarantees, Withdraw of Arms. All of these things they were prohibited issues for the talks, because the Turkish Cypriots would say that Turkey has measure say here so once we find we reach an agreement on Powersharing which pertains the competence of the two communities, then we may have Turkey in or an international conference to discuss the other issues which touch upon international policy as well. This meant that we were asked only to give, because Powersharing, now the Greek Cypriot community has the upper hand, because we as Greek Cypriots have a monopolized an internationally recognized state and Turkish Cypriots having left the government during the 1963 intercommunal clashes out of the Government they have a state of their own but it is not internationally recognized. Interviewee 713\_0030*

Interviewee 713\_0037 exhibited frustration that negotiations start every time from the beginning:

*...I mean it would be ridiculous to go back to Perez De Galez methodology or even Boutros Boutros Ghali Set of Ideas, we have done so much work subsequently and it is known I mean perhaps the road could be, what upset you in the Annan Plan and what upset the other side in the Annan Plan. And now to start, every time we start from the beginning, from the beginning!... Interviewee 713\_0037*

The same interviewee added:

*The objective – that nothing is agreed until everything is agreed is also a safeguard, but it is not a safeguard in order to sabotage a possible solution. Interviewee 713\_0037*

Interviewee 713\_0042 validated and reinforced the point of the previous interviewee that the negotiations always start from the same point:

*...What I can find out regarding negotiations, for such a long time everytime they seem that they are saying something different, but at the same time, they converge at some point, like no matter what they agree like this Joint Communiqué document, but still as far as I understood both sides they are negotiating or even discussing or thinking about the same thing, when you talk about Property, or when you talk about Political Powersharing, all these things, whenever they start, they always start from the same point. But maybe the only difference, maybe through time and through the accumulated things they have discussed, but when you see the sides they always start almost from the same points, like one side argues that you know their basic arguments are this and that, whereas the other party would begin with the same way and I think this is one of the problems, especially in the negotiations, for the moment, because we have unfortunately no idea what they are preparing, because we have the joint documents, but still almost, except the negotiators and the teams but in general public we have no idea about what is going on. But as far as we got from the news, the newspapers, what we can feel is that they almost, they still at the same point to begin with, but where is it going to lead us for the moment we have no idea. Interviewee 713\_0042*

## **6.6 Contradictory perceptions**

Interviewee 713\_0040 made no reference to the elements of repetition in negotiations, and was equivocal in his views. The response was inconclusive:

*That's a bit difficult to say, because if you look at the history of the talks about the Cyprus problem they have become more and more sophisticated in terms of detail, what you have is a Declaration of Principle that gets worked out then transforms itself in the Gales Set of Ideas which was already relatively detailed and then transforms itself into a fully comprehensive proposal in 2004. So if you talk about regress and progress and moving back at the beginning it was, it took different shapes, it transformed itself and I am trying to think where you have a regress, you want an example for that, is in the current phase of negotiations when there were seem to be compromise deal on cross voting in exchange for rotating presidency, and then the Turkish Cypriot side took the rotating Presidency out, and then the Greek Cypriots took the cross voting out, and then the Greek Cypriots*

*took the rotating presidency out and then they went back to original examples, original positions, of not wanting this on non-agreement, so that would be an example where, because cross voting is the new thing, cross voting was introduced by the Christofias Government into to the concept of the solutions and ... Interviewee 713\_0040*

Interviewee 713\_0053 said the following that related to the repetitive patterns of negotiations:

*Everything changes, I mean the dynamics are changing, and even if the negotiations are going on the same but changed things, alright, I think. But negotiations themselves are changing just to give you several reasons which were changed, we changed the parties, we changed the strategies... Interviewee 713\_0053*

## **6.7 Summary of findings for RQ2**

Data reported in this chapter were analysed through the lens of the fractal theory (Mandelbrot, 1977). Briefly, fractal theory explains how irregular shapes found in nature form infinite self-similar patterns across different scales (Mandelbrot 1983; Zimmerman & Hurst, 1993). Since the patterns are scale invariant, irregularity is found in a recursive fashion across different scales (Zimmerman & Hurst, 1993). The patterns are referred to as fractals, and the self-similarity of fractal patterns seemingly preserves the order of irregularity (Zimmerman & Hurst 1993). Mandelbrot's theory states that the 'degree of irregularity and/or fragmentation is identical at all scales' (Mandelbrot, 1983, p.1), meaning that 'each piece of shape is geometrically similar to the whole' (Mandelbrot, 1983, p. 34).

Levick and Kuhn (2007) imply that the application of fractal theory to social situations, such as business organization, is a 'worthwhile tool in aiding understanding' (Levick & Kuhn, 2007, p.268). Therefore, by the same notion, the fractal theoretical perspective was deemed to be appropriate, as the objective of the research reported in this section was to understand to what extent recursive patterns contribute to periodical stalemate.

The findings for RQ2 reveal embedment of recursive patterns in the system of political negotiations. The perception of recursive patterns by the interviewees was heterogeneous and therefore no conclusive results have been reached due to the multi-dynamic and complex nature of the system of negotiations. The summary results of recursive patterns in the fractal dimension are as follows:

### ***Psychological and mental fractal dimension***

*Blame, demonization and 'them' versus 'us' mentality*

*Distrust/mistrust*

*Fears, pain and anxiety*

*Behaviour and thinking mindset*

### ***Political fractal dimension***

*Elections*

*Elitist formula to negotiations*

### ***Cyclical fractal dimension***

*Contradictory perceptions*

Exploration of fractal theory in the context of political negotiations in Cyprus provides complementary insights into the system of negotiations. The use of a fractal lens may enable the Greek and Turkish Cypriot sides to perceive the underlying structure and deeper layers of the complex political negotiating system in order to understand the causes behind the stalemate.

The findings exemplify the psychological and mental dimension to exhibit *blame, demonization, 'them' versus 'us' mentality, distrust/mistrust, fears, pain, anxiety, behaviour and the thinking mindset* as recursive patterns embedded in the system of political negotiations. The interviewees agreed that the patterns constitute psychological obstacles, hindrance, fall back and stalemate.

The system of negotiations also exhibits *elections* and an *elitist formula to negotiations* as a recursive pattern under the political fractal dimension. The non-inclusion of the civil society into the system of negotiations contributes to the formation of an elitist formula. The findings add to the established evidence emerging from the literature on non-participation of the civil society in negotiations (UNSC, S/2011/498, p.4; Hadjipavlou, 2004; Jarraud et al., 2013; Kaymak & Faustman, 2009; Lordos, Kaymak, & Tocci, 2008; Louise & Morgan, 2013). The findings reveal the elitist formula to be a pattern which was recursively adopted in negotiations which led the sides, as per interview commentaries, to further constraints, entrenchment and gridlock.

The fact that elections are held every few years on each side of the island has encouraged stalemate as the sides hold up the process of negotiations until the election outcome is known to the public.

Thus, although the elections could create momentum on one hand, they could also dampen it on other while people waited to see what the newly elected leader might bring to the table. It was emphasized throughout the interviews that more often than not the same cycle and rhetoric were repeated from election to election, that is, nationalist aspirations. Apart from presidential elections on both sides of the island, there are Turkish elections which need to be taken into consideration. In addition, there are local, European and national elections which put the system of negotiations into abeyance.

The findings related to the cyclical fractal dimension mainly reveal that the sides have been negotiating for many years over the same issues, such as Governance, Powersharing, Property, Territory, Settlers, Guarantees, Withdrawal of Arms. Often the issues discussed in the context of political negotiations were subject to Turkey's allowance or prohibitions. As has been indicated by the interviewee 713\_0030 the *Powersharing which pertains the competence of the two communities, then we may have Turkey in or an international conference to discuss the other issues which touch upon the international policy as well*. The findings reveal that the pattern of accommodating Turkey in the context of political negotiations is inevitable.

The contradictory perceptions demonstrate no clear indication of recursive patterns in the context of negotiations. The comments of the interviewees reveal that the dynamic on the island has changed and continues to change, and therefore the strategies and the approaches adopted by the sides in negotiation have changed accordingly. According to the interviewees, negotiations have become more sophisticated.

According to Mandelbrot, fractals are self-similar on all scales. To that end, patterns identified in the system of political negotiations are multidimensional reflections of self-similar dynamics found on the island across communities, issues and problems. Mandelbrot points out that self-similar configurations observed from varying distances generate imitations, but not duplicates, of themselves (Kenner, 1988). As an analogy to Mandelbrot's observation, one can assume that the recursive patterns found in the system of political negotiations are self-similar in nature and over time have been infinitely replicated and reproduced throughout the island.

The interview participants perceived recursive patterns in the system of negotiations between the years 2008-2014. Since fractals are scalable by nature, patterns found in the system of negotiations possess fractal-like properties which are self-similar and scalable across the island and penetrate the system of political negotiations. The interviewees' understood that the recursive patterns of a psychological, mental, political and cyclical nature constitute stumbling blocks, hindrances, deadlock, gridlock and a fall back in the system of political negotiations.

It should be noted that the system of political negotiations displays an interplay between the Socio-economic and Political chapters, while the common denominator could be an underlying psychological and mental fractal dimension manifested in the form of recursive patterns encompassing fractal properties. The fractal properties embedded in the system of political negotiations are of a psychological nature, and therefore could be considered to be an underlying dimension contributing to periodical stalemates of negotiations. The psychological (fractal) dimension is one of the core factors contributing to the stalemate in the system of political negotiations.

The findings described in this section of the thesis offer a significant contribution to the political negotiations in Cyprus, as well as to the field of fractal theory. The key findings explain the formation of recursive patterns and penetration into the system of political negotiations. The findings shed light on the system of political negotiations and provide a different perspective and explanation on how to view the system of negotiations and look for causes which may hinder and eventually lead the sides to periodical stalemate (Guastello, Koopmans, & Pincus, 2009).



## **Results: Findings and discussion for research question 3**

This chapter presents the results, findings and discussion related to the research question 3 (**RQ3**). The chapter begins by presenting and discussing themes identified in the course of the analysis related to the Cypriot political negotiations. After the presentation of the results and discussion, a summary of findings for **RQ3** is presented.

### **7.1 Research question 3**

#### **Leverage points in the system of political negotiations**

This section of the thesis addresses results, discussion and findings to the following question:

**RQ3** *To what extent ‘leverage points’ can assist the Greek and Turkish Cypriot sides to move a periodically stalemated system of political negotiations in Cyprus from the state of stalemate into a state of motion?*

The discussion with interviewees around RQ3 was conducted in an exploratory and open ended nature. The theme of ‘leverage points’ is of a crucial importance as it fundamentally attempts to address the issue of periodical stalemates in the system of political negotiations. Similar to previous findings to RQs 1 and 2, the qualitative data for RQ3 presented in the thesis is in the form of transcripts and excerpts from the transcribed interviews. This section presents thematic findings emerging out of the research question.

A thorough research data analysis revealed that the notion of leverage is applicable to the system of political negotiations in Cyprus. It should be noted that due to the limitations of the research, only the most significant leverage points have been presented in this section. The findings for the RQ3 are presented below.

The research question led to the exploration of diverse paradigms between the Greek and Turkish Cypriots in the context of political negotiations. The aim of this section is to understand the mindset of the conflicting sides for the purpose of proposing key leverage points as per Meadows’s (1999; 2008) ‘system thinking’ approach.

#### **7.1.1 Divergence in Greek and Turkish Cypriot paradigms**

Interviewee 713\_0006 explained that vagueness, lack of substance and different interpretations of what the notion of federation means are the fundamental differences which have steered and penetrated the system of political negotiations.

*...the positions are vague.....because they are like common places, they lack substance, so federation could mean different things to different people, and of course in the case of Cyprus it has been 'different things', which is precisely why when the Greek Cypriots were confronted with the particular blueprint of the Annan Plan, they objected fundamentally to various aspects of that Blueprint. Not just in terms of the issue of equity that is property and security, but constitutionally - Papadopoulos made a big shindig about the lack of legal hierarchy within the Federal System that was proposed. Because you probably know the Annan Plan was closer to Belgium setup with the Swiss Executive, that's how it characterized, and for number of reasons the Greek Cypriots objected to it strenuously, so strenuously in fact that people spent a lot of time post mortem, not in the formal, in the formal the Greek Cypriots do not talk about the Annan Plan, but at the secondary level, level of academia, sometimes they spent more time than necessary, talking about something they do not want to negotiate... Interviewee 713\_0006*

The same interviewee further explained peculiar differences underpinning the worldviews of the Greek and Turkish Cypriots. For the Greek Cypriots, the notion of federation is based on bi-zonality, bi-communality with power sharing majoritarian principles within the model of the European Union:

*...So what you have is a macro level agreement, yes, here will be a Federation, yes - be grudgingly from Greek Cypriot standpoint it will be bi-zonal, yes, be grudgingly a power there will be a Powersharing bi-communal, but there are certain provisos, right? and there you can see all these majoritarian principles, which they then conveniently refer to this 'functional' become highlighted, and then this then become juxtaposed against the power sharing consociation elements, such that they argue that the functional model must be a European model, a European model must be a majoritarian model - and to some extent the reification of West failing politics through the European intergovernmental model, rings true, because even though we have these other principles of solidarity and participation, but at the end of the day, States are represented and States must have executive authority, they must be able to make decisions, the one of the provisos.. What other things that the Annan Plan provided to the European Union was a common government. The reason why the EU was interested at any level in the Federation is that the Euro poll would someone to talk to, the Central Bank will have someone to talk to, at the end of the day authoritative decisions have to be made through the Federal Government which would represent all of Cyprus because we have One State. Interviewee 713\_0006*

Interviewee 713\_0006 further explained that the perception of Turkish Cypriots with regards to federation is based on political equality between the states in Cyprus. Although the sides agree on the main UN parameters of bi-zonal and bi-communal federation at the macro level, nevertheless fundamentally disagree in principle:

*Turkish side does not always understand it this way, because they are looking more at the level of the equality of the States within Cyprus, when they talk about the Federation. But of course there is also other overlaying common state, which is the Federal level of Governance and in there that's... So the sides are talking about different things at different times...*

*For the Turkish Cypriots they are talking about political equality within the institutions, the Greek Cypriots talking about how the State must be run on majoritarian principles in order for it to be ...So there it's not deadlocked. And we do not talk to each other much about this conundrum. In other words, for the Turkish standpoint I don't think that it much of a concern that the State will be deadlocked and for the Greek Cypriots the Turkish concern for political equality seems to be paid lip service. So what I meant by macro, at the macro level we agree on the UN parameters, if that's the right the word to use, bi-zonal bi-communal Federation, we reiterate this and we have most recently in 2008 when the current round of negotiation commenced, Talat and Christofias made a joint statement, reiterating that these are the basis of the ongoing negotiations, but as you can see when it comes to dealing with some of these other principles which are not really the UN's principles, but principles of the sides, which then the sides then try to impose on the UN or EU. The Greek Cypriots since the Annan Plan post mortem, have tried to renegotiate some of the parameters by denouncing denigrating the Annan Plan philosophically and they have been trying to do that with very little effect. They failed in fact to get the Europeans to sign with them against the UN or the Turkish positions on the compromise. So I think that with Papadopoulos we were especially deadlocked on that, which is why negotiations could not proceed. With Christofias there was this optimism that Talat could be induced to think differently, I think from his standpoint. Interviewee 713\_0006*

Interviewee 713\_0025 noted deeply entrenched and differing political attitudes and different, ambivalent goals of integration versus independence with respect to federation to be the core differences between the Greek and Turkish Cypriots:

*I just believe that the political attitudes of the two sides are very, very deeply entrenched. Or whether they want to live with each other or not or under what conditions...maybe the*

*two sides simply have different goals. Greek Cypriots want more reunification and Turkish Cypriots want more separation...*

*They have different goals which they want to achieve. Also maybe Greek Cypriots are somehow a bit, I don't know, if I would say confused, but ambivalent at the end of the day whether they do want more of a strong reunification, a strong federation. Because I think they are also very afraid of the other side have the political say in their own affairs. And the stronger this polity, the more centralized it will be, the more say each one will have in the others' lives. So I think it resorts to certain ambivalence in Greek Cypriots political goals. They want, they say that they want a strong federation, but they are also very, very afraid of Powersharing, which is what stronger federation will entail.*

*The two positions are the Greek Cypriots say we want the more integrated federation, the Turkish Cypriots say we want more independent policy. When the Greek Cypriot say we want a more integrated federation...at the same time they are afraid of Powersharing and mistrustful of Turkish Cypriots. And more integrated federation will mean that Turkish Cypriots will have a stronger say, bigger say in their life, which is what they afraid of in the first place. Interviewee 713\_0025*

Interviewee 713\_0026 noted that the perceptions of the Greek and Turkish Cypriots with relation to federation fundamentally differ from each other. The Greek Cypriots strive for single sovereignty with a focus on a unitary state, while the Turkish Cypriots focus on shared sovereignty with constituent states exercising retained powers:

*So what I am saying that this overall preoccupation and this overall perception of 'us' [refers to Greek Cypriots] being the boss around the island is preventing any constructive progress on each of the chapters that we are talking about, that there is no constructive engagement because of the hold of this perception that we are, you know, we can get the Turkish Cypriots eventually to accept what we want, they are under isolation, time is working for us, we are part of the European Union, we are now found energy it is under our control, eventually the Turkish Cypriots will give in and submit to our requests - is the perception on the Greek Cypriot side, therefore why engage in the chapters...*

*Federalism is based on shared sovereignty, where the Federation exercises certain power sovereignty plus the power assigned to it. And the constituent states exercise retained powers to them - sovereignty. Neither side get intervene in the exclusive powers of the constituent state or of the....I mean go to the States, there may be different laws, different regulations regarding alcohol and the Federation cannot intervene with the laws of the state. It is sovereign in those areas. Greek Cypriots come to the table and say they want*

*single, invisible sovereignty, is it federalism? How can you negotiate...tell me how you can negotiate Governance with that kind of approach. That is the approach that is the vision they have for Cyprus for federalism. That's not federalism, it's a unitary state. And it's not democratic. Because, even in democracy there is division of powers. Neither power has the ultimate authority to decide on behalf of the whole island. Simple, as simple as this, so you may come to the table but what you are trying to negotiate is not what the goal set for us is about. That's not engagement. Interviewee 713\_0026*

The same interviewee noted that rationalism between the Greek and Turkish Cypriots is superseded by sentiment and history. The system of education between the two sides differs, as the Greek Cypriot side is more influenced by the church, while the Turkish Cypriot side is essentially secular:

*Well unfortunately I have been in this thing for so many years now and I am so disolutioned, because there is so much in for Turkish Cypriots and Greek Cypriots, if you can rationally think. But unfortunately rationalism is superseded by sentiments, history, which I don't know how you can deal with it. How can you change, when you have the education system feeding these visions to people and you have the church... I mean we don't have the mosque in the North not strong, we have complete separation of Church, Mosque, we are totally secular country, different from all the states around us, even Turkey. I mean the Church can decide what the education is going to be, how can you change this in the country? ...Everybody fears the outcome, there are conflicting interests, and nobody wants to change the status quo. Interviewee 713\_0026*

Interviewee 713\_0006 noted that overall outlook and the divergence in the perceptions between the sides:

*The historic perception of Cyprus, which is separate, different for the Greek Cypriots and for the Turkish Cypriots. We are talking about, we are at negotiating table, what are the things are, what are the patterns that are blocking development, I think that's one the historic perception...*

*This is the usual their perception seeing Turkish Cypriots as a burden...as a burden, in fact not an asset but a burden, and that's a major perception. If you are working towards federalism, the Greek Cypriots need to see the Turkish Cypriots as an asset in the equation, and efforts aimed in that direction by the international ...I mean this asymmetry is not helping this is what I am saying, if there was level, yes they will not see us as a burden, because we are generating back. So it boils down to maybe the obstacles, which I have named just two, the historic and the burden side and the numerical superiority side, which we are facing over and over again each round of talks.*

*So federation could mean different things to different people, and of course in the case of Cyprus it has been different things... Interviewee 713\_0006*

Interviewee 713\_0027 highlighted the fact that the systems thinking on the part of the two parties in the Cyprus dispute have not changed in the last 50 years. Even though the two sides had some achievements to speak of, these were not in the substance of the issues:

*... It would be my assertion from the beginning that you know the position of the Turkish Cypriots and Turkey have not actually changed very much for 50 years, for the last 50 years. And any ...they try from time to time, trying to push the Greek Cypriot side to shift even more from its original positions or whatever positions they have. They put very accomplishments but not in the substance. And I think Turkish policy was established already in 1964 and it hasn't changed for 60 years. 64's is 50 years, 50 years. Before they had assessed the mistakes they made, and this is how they modified their positions in ...(?) 1964. What mistake with Turkey, they had very specific objectives in the negotiations of 1959-1960 most of them they achieved. And in effect they got the solution that was bi-communal. Bi-communal because mostly in the executive the President, the Vice-President had exactly the same rights, they only the ones stood in the protocol one meter before the Vice President, but you read their powers and functions that's the same. And there were the powers of veto in parliament, the house of representatives that the Greek Cypriot...what the Greek Cypriot side missed was that you don't veto some legislation that require separate majorities, on that subject you veto to extract concessions on something else. And this is what happened in the end. Interviewee 713\_0027*

Interviewee 713\_0029 commented that the perceptions of the two sides differed on many issues:

*There are many issues you know. I mean the perceptions of people as I said earlier the Cyprus issue, what they want and the Cyprus issue is to get land and resolve the refugee problem mainly. So this resolves a part of the problem, because people from Famagusta are significant number, but at the same time what was proposed says that it can be direct trade under UN supervision or EU supervision for Turkish Cypriots which something that they are demanding for many years to lift the embargoes. So and even I think Government in the South is ready to discuss the opening of the airport, under some kind of supervision by United Nations. Interviewee 713\_0029*

Interviewee 713\_0030 pointed out that the question of a trade-off of land from the Turkish Cypriots in exchange for powersharing from the Greek Cypriots occupies the minds of the Greek Cypriots who fear Turkey:

*So Powersharing means that the Greek Cypriots will give to the Turkish Cypriots a share in the Government of the State. But they cannot have, they cannot be sure that they will have something in return. I remember Rabin during the Oslo process how he used the argument Land for Peace. In our case is Powersharing, we give Powersharing, Turkey gives Land. The crux of the matter is here, but we couldn't have any Guarantee that we would have return, so being obsessed with complete absence of trust in Turkey and being under the fear of the powerful neighbour who in our minds had plans to occupy the whole of Cyprus. We tried all throughout the period not to allow the Republic of Cyprus, coming on an equal footing with the Turk Cypriot self-proclaimed state or having their state being recognized. Because this was our fear that through this talks Turkey would stabilize the fait accompli of the invasion of occupation and then with the time they might manage to have their state internationally recognized and then incorporate it, annex it into Turkish Territory. This is the Greek Concept of how things happen. Though I don't share it. But it is the mainstream political understanding of the Greek Cypriots. Interviewee 713\_0030*

Interviewee 713\_0031 noted that the spectrum of perceptions between the Greek and Turkish Cypriot sides were influenced also by foreign powers and interests, and were eventually reflected in the negotiations:

*...more about the perception. Cyprus is the place where a lot of the political analysis of the conflict has also gone down the road of conspiracy theory, ok, for good reason. I mean cold war and American-British interests, and that we all know the story, but that has made, the reason I say political analysis is because we also often see that reflected in experts' opinions, in expert analysis, of you know, Cypriots have suffered because, this is to put in very lay terms, and of course to simplify, but because you know the high powers have been playing games over the island... Interviewee 713\_0031*

Interviewee 713\_0035 commented on the fundamental divergence in the goals of the Greek and Turkish Cypriots, in that the Greek Cypriots focus on the transformation of the Republic of Cyprus into a federated state, whereas the Turkish Cypriots concentrate on the legitimization of an existing separate political entity (TRNC) to eventually achieve the form of a partnership:

*But, again as an issue which is linked to a number of things, is the issue of how the two sides see the new situation emerging, one side namely the Greek Cypriot side who is in charge of recognized state see this, all this effort as an exercise to transform the existing recognized Republic into a Federated, Federal State, Federated State. Whereas the Turkish Cypriots who are very keen about their separate political existence to keep this in*

*some form and also base it and also legitimize, to have legitimize all the laws and the practices and so on that the Turkish Cypriot Administration put in place and which will give them a new partnership role if you like, or kind of, what's the word, endorse, if you like it once more internationally as they see it their partnership role which existed in the constitution of the original Republic of Cyprus. So the Turkish Cypriots, but they want more now, what they want is, the Republic of Cyprus from their point of view collapsed in 1964, what existed was two communities who took bits of sovereignty of that existing state and carried on ruling their own separate affairs. So from their point of view the two existing administrations both get their legitimacy from being equal founders of the original Republic of Cyprus and what should, since they have been separate for so long, what should happen now is to Form a New State by Partnership of these two existing States, which means they will have all their past acts or all at least all those that can be legitimized basically.*

*Well I mean the Greek Cypriots often exaggerate it, they like to see that, and they exaggerate it, and in fact with some of the Greek Cypriots they like the Turkish Cypriots for that reason, they say that they are like us, they don't like Turkey, so it is kind of reason of them to trust the Turkish Cypriots. But in a kind of, sort of wider way a sentiment within the Greek Cypriot community traditionally, historically, etc., is that Turkish Cypriots are potentially a Trojan, and they have shown it to be potentially a Trojan horse for Turkey, so that sentiment also exists within the Greek Cypriot community. In fact that's why they, because they see Turkey the big enemy that must get rid of, and any agreement with Turkish Cypriots seem to imply that Turkey will be in the picture, that makes them wary of a settlement, I mean it sort of makes them to think perhaps we should just hang on to what we have got and not really change it very much, because you might end up with something worse. Interviewee 713\_0035*

Interviewee 713\_0038 noted that the shared vision between the Greek and Turkish Cypriot leadership is missing:

*I see a lack of common vision on the leadership level.*

*Probably, well maybe the vision of each leader for its own community is more complete, but the vision for a joint country is simply not there, yeah... Interviewee 713\_0038*

Interviewee 713\_0049 thought that the missing ingredient between the Greek and Turkish Cypriots is a shared culture, shared connection of the homeland, and psychological, emotional and historical ties:



*I think one of them that hasn't been spoken is the shared culture, the shared heritage you know that we I think all should appreciate that this island is much more..., and this will have I think an impact, this kind of shared connection and love to the homeland, to the place itself. And although it's more of the social and psychological significance, on the other hand it can have political implications, because you want to be enjoying the whole lot of these connections, of this character of, I mean the heritage but also the shared traditions, the shared memories that people you know still carry with them or they are transferred...*

*I hope they will start thinking like this. Because in the old model it was 'us' and 'them', each one is trying to get from the other as much as they could or not disclose what they really thought all the information to the other. So there was this kind of the problem that wasn't defined as a shared problem. Therefore we are in this together. So this was this adversarial kind of mode. So I think in this get, I mean if this cultural connection and what we just both emotional and psychological, but also historical which makes the people who have been living on this island are share, this might reinforce the will to really unite and to really find more... Interviewee 713\_0049*

Interviewee 713\_0039 commented that consensus could be reached through partnership, but that the mentality of the Turks and Turkish Cypriots has to change. The segregation during the Cold War contributed to mental blockages and a negative mindset:

*I would think how we can accommodate all sides' strategic interests in a way that makes the relationship more viable as a partnership in the future. Now for this to happen, Turkish mentality will have to change, Turkey for years of course has perceived a Cyprus as colonial territory rather than as a nation and for this disposition to change right, requires not only a mindset but leadership as well. It is not a huge hurdle, but it is a mental block, because what Turkey has done in recent years is to say I am too big and important for the Cyprus problem, I outgrown the Cyprus problem.*

*So there are many opportunities that have been unexplored because over the past 40 years retaining the Cold War and the segregation has been beneficial to one side or the other. Initially it was the Turkish side that preferred segregation because it was the side seeking the divorce, but since the change of heart about 10 years ago the Turkish side to engage, it's been the Greek Cypriot side that's been fearful of the implications of reengaging with dating if you will... Interviewee 713\_0039*

Interviewee 713\_0050 felt that the historical narrative with which each side grew up is quite different, leading to a gulf between the Greek and Turkish sides:

*...I mean from the very moment you are born as the Greek Cypriot you are absorbing this wrongness been done to us, so it's in their DNA almost, and that complicates the whole mission of course as well. I mean education is the first. There is first of all they don't learn each other's languages, in any other country with officially two languages, they will be learning each other's languages from the primary school and then they have completely different history. So the historical narrative of what happened is completely different. So all of that, so time works against the solution... Interviewee 713\_0050*

Interviewee 713\_0059 spoke of the different goals of the two sides with respect to governance and powersharing:

*I mean they even argue, so Greek Cypriots say 'the people of Cyprus', Turkish Cypriots say 'the peoples of Cyprus'. And the traditional line of Eroğlu has been distinctly seen as two states, two different states coming together for a new partnership, and the Greek Cypriots will say 'no there is the Republic of Cyprus, this is the continuation of the Republic of Cyprus just within a new constitution. Interviewee 713\_0059*

### **7.1.2 Identification of leverage (points) within the system of political negotiations**

Leverage points are an important concept when 'thinking in systems' (Meadows, 1999) since these points are the places in a system where intervention will have the greatest impact. Looking at the political negotiations in Cyprus, it would be useful to find aspects of the negotiations that provide places for intervention when the whole system is considered, rather than individual parts. [Places to intervene in a system, in increasing order of effectiveness (Meadows, 1999) (Chapter 3)].

The theory of systems thinking encompassing Meadows's (1999) notion of leverage points formed the basis for leverage (points) to be introduced to the system of political negotiations in Cyprus. It is important to emphasize that the leverage points would be selective and aligned with the findings of RQ2. The theoretical basis is deemed appropriate as it serves the objective of this section to introduce leverage for the purpose of moving periodically stalemated negotiations into motion.

Various *leverage points* have been identified by the interview participants to be the most significant in the context of the negotiations. It should be noted that the *leverage points* have not been introduced solely into the political dimension, due to the fact that the system of negotiations is multidimensional and therefore leverage points are heterogeneous in nature and, as per Meadows's (1999) suggestion, one may think about system change in broader sense.

Meadows (1999) introduced 12 leverage points (Chapter 3) and categorized them in order of importance. The most relevant leverage points to this research were as follows:

**Paradigms:** The mind-set out of which the system – its goals, structure, rules, delays, parameters – arises

**Transcending paradigms:** Leverage points at the level of the psychological dimension – repetitive patterns.

### 7.1.3 Paradigms

Although this section deals with RQ3 it is important to note the connection with a key aspect of RQ2, which focused on the idea of psychological recursive patterns. Synthesizing the findings from RQ2 with a theoretical perspective of systems thinking generated the basis for defining leverage points related to the psychological paradigm.

#### *The mindset paradigm*

The second highest leverage point is a *mindset paradigm* (Meadows, 1999). Meadows indicates that the mindset paradigm is vital as this is the paradigm out of which the mindset of the system emerges, and is very difficult to change. She rightly notes that a successful intervention at this level of paradigm ‘hits a leverage point that totally transforms systems’ (p.1). The intervention at this point is to constantly point out anomalies and failures of the old paradigm to open minded people, who are seeking active change, with such people implanted in places of visibility and power (Meadows, 1997, p.1).

Stroh (2015) states that leverage points offer the highest and most sustainable return on investment in the field of peace building resources, and points out that coordinated leverage may assist the system to change and improve (Stroh, 2015). In order to find useful leverage points, one must look for factors that are in the state of change, as these may supply the initial energy into the system (Ricigliano, 2015), but they may not be obvious (Harrison 2006). There is a need to be open to options and opportunities for leverage if one attempting to change the initial paradigm. It may be that there is change and uncertainty coalesced around a potential leverage point that can then be used for sustained paradigm change (Harrison, 2006). The task of recognizing uncertainties in the system and determining what effect leverage may have on the system is borne by the negotiators if we consider the situation in the Cypriot negotiations.

The psychological dimension can be viewed as an underlying, implicit platform embedded in the system of negotiations which contributed to periodical stalemates in the negotiations. The psychological dimension is therefore in line with Meadows's (1999) theoretical perspective (Chapter 4) of leverage points, which highlights the significance of the *mindset paradigm*. The concept of leverage points could be introduced into the context of political negotiations, whereby producing leverage of a *mindset paradigm* into the system of negotiations that may set the periodically stalled system of political negotiations into motion and change. It may also assist reframing the physical realms of the negotiations which embed the deeply entrenched recursive patterns of the Greek and Turkish Cypriot sides at the level of the psychological dimension. This would also be an attempt to rewire their existing psychological patterns for the purpose of synchronization of augmented perceptions of the Greek and Turkish Cypriot sides in order to effect change and movement in the system of political negotiations. An introduction of leverage points into the system of political negotiations, as a tool, may assist negotiators transform their mental paradigms and consequently the system of negotiations for positive change.

As Meadows & Wright (2008) argue, in order to shift paradigms there is a need to emphasize the anomalies and failures of the old paradigm. To this end, one of the anomalies in the system of Cypriot negotiations is the fact that the Greek and Turkish Cypriots lack a common vision for Cyprus, despite the fact that both sides strive for federation, which is fundamentally based on the concept of shared sovereignty. The lack of a shared vision is expressed through divergent perceptions, which are further transformed into deeply entrenched attitudes and positions, such as reunification for the Greek Cypriots in the form of the integrated federation, and separation for the Turkish Cypriots in the form of a loose federation.

Despite the convergence document Convergences 2008-2012 being issued by the Greek and Turkish Cypriot sides as part of negotiations, ultimately both sides have failed to converge, modify or adapt their views between the years 2008-2014, as both have been subject to self-similar recursive patterns in the psychological dimension. These patterns of behaviour and attitudes are scalable across the island and have been reinforced in both communities, who each accept divergent historical narrative fuelled by sentiments, and use different educational systems which continue to feed on and reinforce divergent visions of the sides in the system of negotiations. The

divergent rationales of the Greek and Turkish Cypriot sides contribute to a lack of a common psychological state and a shared vision in the system of political negotiations.

The application of leverage points (Meadows, 1999), combined with social influence dynamics focused on collective wellbeing (Guastello et al., 2011), may produce an enriched platform for change. Guastello et al (2011) explain that in order to experience a common shared psychological state the sides must create a platform for shared psychological action. According to these researchers, the process of social interaction provides the platform for exchange between the sides where ‘opinions, mood, or behaviour to achieve consensus and a shared reality’ (Guastello et al., 2011). This therefore may form the basis for emergent synchronization of the sides’ divergent paradigms.

To leverage the mindset paradigm is important. Harrison (2006) points out that the world of politics supersedes rational choice when it comes to policies and hence ‘policy circles make scholars complicit in the policies that form the reality of world politics’ (Smith, cited in Harrison, 2006, p.192). The author argues that the mindset paradigm controls political and economic goals and intellectual and moral discourse. He points out that ‘redirecting political trajectories requires change in both structures and ideas; in the language of complexity, it means reinforcing changes in both institutions and internal models’ (p.192). Although leverage points are neither obvious nor simple to use in complex systems, participants in a problem solving activity (like negotiations) should carefully search for them.

Because institutions and social systems are influenced by human perceptions of the world and how it works, dethroning the rational choice paradigm is the best way for scholars to positively influence world politics. But policy under complexity opens many other avenues of research, and the benefits are likely to be great (Harrison, 2006).

### *Shared vision paradigm*

One of the leverage points might be the synchronization of the sides’ divergent visions into a shared one. This may be attempted through identification of future shared scenarios for the sides, thus allowing them to shift their mindset from dwelling on past experiences, recursively producing the same psychological patterns. Since it is possible, given the workings of the human mind, that people may not interpret what they see today in the same way tomorrow (Guastello et al., 2011),

the presentation of future, shared scenarios may produce a shift in a long-standing adversarial paradigm. The identification of the future shared scenarios for the sides may rewire their cause and effect relationships and may produce shifts in their psyche (Stroh, 2011).

Synchronization based on future shared scenarios might produce new interpretations and constructs to create novel meanings and an emergent paradigm adopted by both sides in the Cypriot negotiations (Guastello et al., 2011). The Greek and Turkish Cypriot sides may attempt to create future scenarios based on positive perceptions and shared value to overcome divergences to reach synchronization. The sides may equally develop new ways of thinking about the possible joint future for Cyprus in a larger regional context, given the fact that Cyprus is perceived as a place of stability in a tumultuous region, according to Interviewee 713\_0045. The shared vision paradigm may open the door to possible reinterpretation of negotiated chapters within the system of negotiations and lead to new approaches in spite of failures to fully converge between 2008 and 2014.

However, dynamic synchronization involves dependency between the states of individuals. Individuals rather display patterns of change than a set of states. The synchronization model therefore represents individuals as dynamic separate entities and not static or passive. Individuals adjust their behaviour according to who they interact with (Guastello et al., 2011). They modify their behaviour, thoughts, feelings and actions to promote coordination. In social interactions, the behaviour or a state of an individual induces similar behaviours in other individuals. Imitation and mimicry are the epicentre of synchronization (Guastello et al., 2011).

Due to the dynamic nature of individual and collective human behaviour, attaining an instantaneous *shared vision paradigm* between the Greek and Turkish Cypriots at the negotiating level could be challenging, given the historical and political discourse. However, it may be useful to initiate building the shared vision with groups of people who have levels of understanding and trust. It might be possible to attain the shared vision paradigm through sequencing, initially beginning with people who are predisposed to cooperation, although it must be acknowledged that it would be difficult for those people to persuade other people prior to other conditions changing. Sequencing would occur at various levels of the system of negotiations. The process would not be quick. There is a need to build experiences with successful interactions before people are prepared

to consider a shared vision. The sequencing of actions on a multidimensional level may eventually lead to the shared vision paradigm.

### ***Engagement, future partnership and empowerment paradigm***

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The findings reveal that the system of political negotiations reached periodical stalemate partly due to restricting negotiations to the Greek and Turkish Cypriot elitist formula, as commented upon by Interviewee 713\_0053. A modification of the formula was attempted by the UNDP in April 2014. The UNDP has suggested a civic forum or a platform so that the wider society can be engaged with the peace process. The UNDP and the UN in general believe that the idea may provide the sides with an opportunity for different representatives from various constituencies to come together to discuss issues critical to the peace process. It should be noted that the inclusion of civic society in the system of political negotiations is rather rare and therefore if it occurs, it would be structured in formalized consultative groups, or consultative multiparty platforms. This broadly would include political parties, trade unions, religious leaders, constituency based civil society organizations, and business associations.

The UNDP adopted the idea and attempted to organize workshops in 2014, different political parties together with representatives of trade unions and some other kinds of civil society-based organizations to actually think about the design of the civic forum, mainly what it should look like, how it should operate, and who should participate. The reason the UN attempted to do this was because the UNDP should not decide on how the workshops or multiparty platforms should be run. It was felt that the Greek and Turkish Cypriot sides should design the program themselves, as they were the ones to take ownership of the process, as noted by Interviewee 713\_0045.

Using a systems thinking approach, one must find leverage from within the system, mainly by exploring the system to locate where change is already emerging. The next stage would be looking for ways to reinforce an emerging process of change. Primarily, it would be beneficial to build on the UNDP initiative in order to increase the amount of interchange between certain levels of multiparty workshops. Therefore, the modification of the historic formula might be attained through a shared psychological state between the Greek and Turkish Cypriot sides as follows:

- The Greek and Turkish Cypriot sides to accommodate the strategic interests of all sides for the purpose of embracing a partnership for the future.

- accommodation of all sides’ strategic interests may generate more viable partnerships in the future.
  - engagement of both sides in a constructive dialogue would legitimize the negotiation package and the negotiating sides could move onto the technical discussion and deal with the inherent complexities and move on to the implementation strategy, timeframe and modalities.
- primarily for the Greek and Turkish Cypriot sides to embrace Turkey and Greece as future partners and allow for their direct input into the system of negotiations
  - allow Greek and Turkish Cypriot negotiators to (cross) visit Turkey and Greece. Turkey is, after all, considered to be a key strategic partner in the region, and the absence of Turkey’s direct contribution into the system of negotiations has generated fundamental disjuncture in the past. It is equally important to emphasize that the Turkish Cypriot side is bound by and dependent on Turkish decisions relating to some of the most pressing issues, such as Territory and Security. As Interviewee 713\_0053 remarked, the Turkish Cypriot side is not free to make all the decisions at the negotiating table.
  - engage and involve civil society in the system of political negotiations and create opportunities for different components of society representatives from various constituencies to merge together to discuss issues of the peace process as a complement to the existing system of negotiations, as commented on by Interviewee 713\_0045. Until now, according to Interviewee 713\_0029, however, the funding of the civil society organizations and the activities of the UNDP have not resulted in a wholly successful connection between the ideas of civil society and the negotiations because of a lack of proper communication and channels.
  - modify and change the system of political negotiations to make it more transparent; provide a greater degree of ownership to the broader public; inject hope into the general public; communicate it well enough to the public as this will help to inject hope into the larger society.
  - channels can be created where the hopes, the fears, the desires, and the demands of people are channelled into the negotiation process. Leadership is required to engage people outside negotiations, brief them, inform them, learn their fears and concerns. One way of learning people’s fears and concerns is by conducting public opinion polls, for example, as suggested by Interviewee 713\_0038.
  - implementation of policies to promote change, trust and prejudice for the purpose of preparing people to perceive things in a new perspective and overcome unproductive ways



of thinking; this in parallel to negotiations; the sides to emphasize different issues in order to move the whole process forward.

- accommodation of the joint work of all the Cypriot communities into the body of negotiations.

The societal level is the micro level for discussion, with which the decision making macro level must have a dialogue, along with the meso level representing trade unions and political parties. Interaction must be genuine so as to move the system towards the shared goal, part of which is to change the status quo and initiate a new state of affairs. Hence there is a need to build connectivities across all levels and dimensions.

Interviewee 713\_0019 pointed out that the negotiations had to be perceived on a human level, as people are the ones who create the system.

### *The cultural and multicultural paradigm*

Ottoman and British colonial rule contributed to divisiveness and disunity on the island, followed by segregation during the Cold War to benefit one side or the other. According to Interviewee 713\_0039, divisiveness between the Greek and Turkish Cypriots predisposed them to pessimism and paranoia, reinforced in the rhetoric of political negotiations, attitudes which hold them back all the time.

Nevertheless, modification of the elitist formula might be attained through the following:

- acknowledgment of the emotional, psychological, cultural and historical connections as this may reinforce the will to unite.

The shared culture and the heritage to be recognized and appreciated by the conflicting sides at the political level. The sides should enjoy the connections of shared heritage, traditions and shared memories. The connection and the love to the homeland are of a psychological significance and therefore have political implications (Interviewee 713\_0049).

- define a problem as a shared problem, reinforcing the fact that both sides in this problem together.

The system of political negotiations is based on '*us*' and '*them*' formula, where each side attempts to get from the other as much as they could without disclosing what they really thought to the other side. This has put the sides into adversarial mode (Interviewee 713\_0049).

- acknowledge multiculturalism

- encourage multicultural dialogue and cooperation at the grass roots by embracing all communities on the island (Interviewee 713\_0022)
- understand history and use history, not as a divisive but as a unifying force
- acknowledgement that the Cyprus of tomorrow is multicultural, tolerant of all religions and respectful of one another in spite of the historic differences between the Greek and Turkish Cypriots.

These elements include common country, common heritage and common future. The sides to acknowledge their multicultural society and that there is a need for a special measure to strengthen this approach. The aspects of common country, common heritage and the common future of all the people be merged together. Culture is a sticking point because it very personal and colours one's attitudes and behaviour. Developing a tolerance for difference while recognizing commonalities would be a significant paradigm shift that could move the negotiations forward (Interviewee 713\_0022).

The findings from the 'cultural and multicultural paradigm' are reinforced by Guastello et al (2011), who claim that even though there is strong divergence between the sides, nevertheless social interactions tend to sustain and therefore 'promote uniformity in opinions' (Guastello et al., 2011, p.387). The social interactions that promote group solidarity and uniformity of mind in positive ways can, of course, also promote mindless conformity to inaccurate interpretations of reality. Furthermore, an individual in a group who resists 'groupthink' is always under pressure to change their individual assessment and conform with the ideas of the group (p.388). The 'groupthink' promotes solidarity among individuals in the group and therefore achievement of the common psychological state. Contrary to the common psychological state, the individual opinion which might express contrary view, might be under pressure to conform to the 'groupthink' (p.388). This behaviour has significant implications during trial by jury, for example, and in any organization where people gather to air their opinions on events (Guastello, et al., 2011).

### *Courageous leadership paradigm*

Many of the interview participants commented on the need for good leadership, as reflected in the comments of Interviewee 713\_0040, who pointed out that the mentality on the island is embedded in the past, the feeling that outside powers messed with their faith, and are responsible for a lot of their miseries and form a part of the Cypriot discourse. Effective and responsible leadership is required. It is essential for the leader to take responsibility for the communities and assist people find new approaches to old problems, guide them into the future and make people on both sides of

the island understand that the future lies in a settlement and that people need to start to come into terms with that. It would also mean that the leadership will have to make hard compromises and difficult decisions. It is a leader's job to shift the paradigm through the leverage points if that is required.

No one has been courageous or perhaps innovative enough to challenge the existing status quo on the island. Nor has anyone been courageous enough to lead a new narrative of shared responsibility, history, goals and tolerance, due to the fear embedded in the psyche of the Cypriot people on both sides of the island and the dogma over the past 60 years and traditional nationalist narratives that have completely marginalized more all-encompassing and tolerant attitudes.

A point has arrived when both communities want to feel that they are part of the decision making process. The majority of Cypriots on both sides feel that their opinions have not been heard. Therefore, both sides have been wanting people to vote favourably for the plan, from which the people have been effectively excluded during the design process. That has not worked with Greek Cypriots as of 2004 (Interviewee 713\_0045).

Good leadership could translate the vision of Cyprus into concrete economic gains, through hard facts and numbers, for the purpose of both communities to understand the meaning of the settlement.

Leadership on both sides of the island is responsible for the system of negotiations and therefore should engage civil society in negotiations (Interviewee 713\_0038). (For example, Turkey for years perceived Cyprus to be a colonial territory rather than a nation and for this disposition to be altered requires a change of mindset that requires, in turn, a leader to encourage new perceptions. In the view of Interviewee 713\_0039 this does not constitute to a huge hurdle, but it is a mental block.

### *Education paradigm*

The absorption of a sense of injustice done to the sides occurs from the moment a baby is born as it is almost carried in the sides' DNA. The Greek and Turkish Cypriots do not learn each other's language, and are very different in terms of their religious devotion. While in the North of the island religion is a barely visible aspect of life, in the South, it is a political force, according to Interviewee 713\_0035. Moreover, the historical narrative of the sides is entirely different and hence

works against a solution (Interviewee 713\_0050). For the sides to rewire existing mental perceptions, there is a need to introduce new factors (Stroh, 2011). From the data provided by the interview participants, it was clear that some of those involved in attempts to improve the system of political negotiations for the purpose of reaching comprehensive settlement had ideas that might be tried. The sides might consider the following:

- *more balanced historical narratives in the educational systems and exposure to the point of view of the other side. (Interviewee 713\_0022)*
- *the introduction of the Greek and Turkish languages as the two official languages on the island could bring the people together, promote a better understanding of one another, improve communication, and bridge differences between the sides by sharing culture through language; this may provide the sides with a solid framework to work on and build it up. (Interviewee 713\_0022)*
- *unite suffering into a common Cypriot pain through learning the history of each other and hearing the history of each other (the need to consider not the Greek Cypriot pain nor the Turkish Cypriot pain, but the common pain for Cypriots; the Greek Cypriots have missing persons; so do the Turkish Cypriots; Greek Cypriot families suffered; so did the families of the Turkish Cypriots; strengthening the contacts between the people will create conditions in which members of the two sides will meet one another; these contacts should not be accidental, but something that will continue, since there is a need for time to make the other person to open their heart and speak his pain; recognition of common pain will create chances for contact between people) Let us create contacts between people, and let the people discover their own way. (Interviewee 713\_0022)*

Stroh (2011) implies that the process of rewiring occurs through the introduction of new factors, which may shift mental models governed by cause-effect relationships (Stroh, 2011). The author notes that in identity-based conflicts, in the leverage of conflicting goals could lie the solution of whether to satisfy the goals of both conflicting sides or ‘choose and align resources around one of the goals’ (p.179). If the goal of the two sides is a peaceful coexistence, then the leverage would lie in ‘aligning resources around the goal of peaceful co-existence’ (p.179).

In the case of the Cypriot conflict, each side blames the other for the failure to reach a comprehensive settlement, without considering their own contribution to the social and political instability. Stroh (2011) also argues that dialogue between the sides, as well as confidence building

measures, could provide leverage for both sides, however, this may provide only short term solutions or results (p.180).

The idea of Guastello, Koopmans, & Pincus (2009) based on dialectic and teleological strategies, where dialectics are focused on divergence and conflict resolution requires:

*the group to recognize that its current situation is not a static one but a slice of a drama that has been changing over time, perhaps not smoothly so. A collective understanding – mental model – of things evolves over time and helps matters greatly, although some individuals are substantially more skilled in this regard than others. (p.406)*

Capra (2002) argues that the introduction of leverage points into a system of political negotiations requires openness and the readiness of the system to be disturbed to set the process into motion. Additionally, there is a need for ‘an active network of communications with multiple feedback loops to amplify the triggering effect’ (Capra, 2002, p.117). Capra notes that the leverage points may trigger a state of instability and initiate emergence, manifested in the system in the form of chaos, tension, confusion, uncertainty, doubt or crisis. Capra points out, however, that the state of crisis may indicate a wide range of intensity. High levels of instability may either put the system into a state on the verge of collapse or the system may overcome difficulties to eventually reach a new state of order. A new, emerging state of order may feature novelty and creativity with old structures, behaviours and beliefs, shattering old and emerging with new forms of order. Capra (2002) notes the following:

*Living organisms need to be open to a constant flow of resources (energy and matter) to stay alive; human organizations need to be open to a flow of mental resources (information and ideas), as well as to the flows of energy and materials that are part of the production of goods or services. The openness of an organization to new concepts, new technologies and new knowledge is an indicator of its aliveness, flexibility, and learning capabilities. The experience of the critical instability that leads to emergence usually involves strong emotions-fear, confusion, self-doubt, or pain-and may even amount to an existential crisis. This was the experience of the small community of quantum physicists in the 1920s, when their exploration of the atomic and subatomic world brought them into contact with a strange and unexpected reality. In their struggle to comprehend this new reality, the physicists became painfully aware that their basic concepts, their language, and their whole way of thinking were inadequate for describing atomic phenomena. (pp.117-118)*

Harrison (2006) notes that interventions in complex systems require a solid understanding of uncertainties of a system and what effects uncertainty will have following the intervention (Harrison, 2006). He points out that the leverage points in the system are hidden and therefore they need to be found. It is worth noting that the leverage points found in the context of this study were not easy to find, nor were they obvious to the interviewees. However, what was obvious was the fact that the system of political negotiations was an autonomous independent system, and that the interviewees understood that the system of negotiations could not be isolated from the whole of the history or current conditions on the island, despite the fact that the negotiations were often treated and viewed by the Greek and Turkish Cypriot sides' elite as a solely political endeavour.

Harrison (2006) has also observed that intervention in a complex system should be open to all options. The author also suggests that it is better to choose 'something that is workable, rather than what's optimal' (Harrison, 2006, p.190). Given these explanations, the researcher adopted a rather broad view to finding leverage points and therefore explored places for intervention on the periphery and boundary of the system of political negotiations.

While striving for optimization means 'maximizing robustness, or survivability in the face of an ill-defined future' (Harrison, 2006, p.190), the formula for finding leverage lies in the awareness of the seeker of nonlinear relationships and causal pathways. Hence, a careful observation should take place with no expectations for 'circumstances to last' (Waldrop, cited in Harrison, 2006, pp.190-191). Introducing leverage points at the periphery of the political negotiations in Cyprus may not necessarily maximize robustness in the system of political negotiations, but instead strengthen nonlinear relationships and pathways in places where changes emerge. Harrison (2006) states that open-mindedness when attempting to find leverage points for intervention in complex systems is required, which is applicable in the context of Cypriot political negotiations.

#### **7.1.4 Transcending paradigm**

According to Meadows (1997) one of the most significant leverage points out of the 12 is the *transcending paradigm*. She writes that this particular paradigm shapes one's worldview and that one has to be flexible and willing to engage with the uncertainty of the world without assigning oneself to any particular paradigm in order to reach high levels of empowerment (Meadows, 1999).

But human beings may perceive the world through paradigm lenses that may augment the reality of what is perceived.

The research findings reveal divergent paradigms in the system of political negotiations between the Greek and Turkish Cypriot sides. The divergent worldviews emerge out of historical, colonial experiences and the two irredentist ethno-nationalist aspirations, with completely incompatible aims, which bred a protracted antagonism between the two communities that has lasted throughout the 20<sup>th</sup> and into the 21<sup>st</sup> century. After the establishment of the independent Republic of Cyprus (1960), both the Greek Cypriot and Turkish Cypriot elites continued to cherish their irredentist nationalist dreams. (The Turkish Cypriots demanded *taksim* in December 1956, and elites aligned themselves with the *taksim* policy). The responsibility for negotiation and the failure of negotiation rest mainly with the narrow-mindedness of the leaderships of both communities.

In 1963-64, the intercommunal tension created by the attempt of Archbishop Makarios to amend the constitution with a view to abolishing 'dysfunctional elements' (May-Dec 1963) led finally to widespread intercommunal clashes (Dec 1963-Jan 1964), following which the Turkish Cypriots withdrew from all the organs of the common state and massively moved from mixed or isolated villages to enclaves in a premeditated policy of partition.

In 1974, the Turkish invasion of Cyprus (20 July 1974) following a coup by Greek officers against Makarios marked the end of Greek Cypriot irredentism. The forced displacement of Greek Cypriots from the occupied areas in northern Cyprus and the transfer there of Turkish Cypriots from the South finalized a long process of both political and physical separation of the two communities.

However, Turkish Cypriot aspirations for a better life in the embrace of 'motherland' Turkey turned sour. The influx of thousands of mainland Turkish settlers, apart from other negative effects, helped Turkish Cypriots to become aware of a distinct identity. On the other hand, the harsh political and social conditions relating to complete dependence on Turkey turned many of them against tying their future with Turkey. Following the bank crisis (2000-2001), in particular, and the opening of the way, through the Helsinki EU summit decisions (Dec 1999), for Cyprus's EU accession, the vast majority of Turkish Cypriots started envisaging their future in a reunified Cyprus as a federal Republic member of the EU. So, when the Annan Plan was handed to the

parties involved, the Turkish Cypriots saw in it a unique opportunity to get rid of a repressive regime, to have an end to their isolation, to live in freedom, welfare and peace, in their words, to 'be liberated from their liberators'.

In 2002, one might expect that the two communities, having learned their lesson from their experience with their 'motherlands', would both take Annan's message on board and lead the protracted Cyprus conflict to a lasting settlement. However, the Greek Cypriots failed to grasp the significance of the historic juncture. Carried away by nationalist President Papadopoulos, the Greek Cypriots rejected the Annan Plan at the referendum of 24 April 2004. In fairness to the individuals providing leadership, it must be noted that, decisive as the leaders may have been, the historian has also to look into and try to understand the behavior of the people they led.

The Greek and Turkish Cypriot sides fell into a recursive cycle of Cypro-centric nationalism on the part of the Greek Cypriots. Monopolization of the state after 1964 led many Greek Cypriots to take it for granted. Added to outdated notions of majoritarian democracy, the monopoly of the state made many of them believe that any (solution) provisions for power sharing should in no way interfere with the right of majority rule. Their devotion to a general idea of a democratic concept blinded them to the merits of federation, particularly in multi-ethnic and multi-cultural societies. It also impeded their acknowledgement of the merits of post-modern consociational ideas on democratic rule, despite Cyprus's accession process to the European Union, in which consociational ideas have been guiding principles.

During 2008-2014, the Greek and Turkish Cypriot sides committed themselves to restart the process of negotiations. However, as in previous decades, the system of negotiations stumbled upon periodic stalemates. To transcend divergent paradigms, the Greek and Turkish Cypriot sides should strive for learning and understanding a systems thinking approach, which could provide the sides with the ability to perceive their own system of political negotiations from multidimensional perspectives.

It would be beneficial to the chances of resolving the Cypriot situation for the negotiating sides to understand that the structure and the system of behaviour at the level of political negotiations predominantly emerges out of reductionism and linearity (RQ1) and recursive patterns scalable



across the island that penetrate the system of political negotiations, forming a psychological paradigm (RQ2), leading the negotiations to periodically stall.

In order to maintain momentum in the negotiation process and avoid stalemates, the sides may need to adopt a *multidimensional complexity lens*, in order to re-examine their existing paradigms and worldviews shaped by past experiences. This will require for the sides to exhibit flexibility and adaptability and the acceptance of the reality that their efforts at negotiation have been shaped by a disastrous historical narrative and their individual experiences and emotions. An effort to detach themselves from the past could lead the sides toward liberation, empowerment and innovation.

The system of political negotiations in Cyprus must be seen as an interconnected complex system with nested autonomous independent systems (negotiated chapters). If the sides are to transcend their existing thinking, they must appreciate complexity theory and use it to identify leverage points where they might make positive changes and through which the negotiations might be kept in forward motion.

The Greek and Turkish Cypriot sides must remain alert to the fact, of course, that the leverage points are tentative in nature and can be flexible enough to be moved up or down as per the importance of the subject (Meadows, 1997, p.165). It is also wise to remember that the highest leverage point of a transcending paradigm is the most difficult to implement. However, once implemented, it may change the system of negotiations significantly, as long as the system remains adaptable and willing to change as and when required (p.165).

## **7.2 Summary of findings for RQ3**

The section presents results and findings for the following research question:

**RQ3** *To what extent can 'leverage points' assist the conflicting sides to move a periodically stalemated system of political negotiations in Cyprus from the state of stalemate into a state of motion?*

Political negotiation in Cyprus is a multidimensional system encompassing autonomous independent subsystems which dynamically interact with each other. Third party interventions intended to assist the negotiations are perceived by the Greek and Turkish Cypriots as elements of enforcement, and therefore the system of political negotiations is highly resistant to third party interventions.

In an attempt to overcome this attitude, political negotiations are based on the notion of ‘Cypriot led, Cypriot owned’. The behaviour of the system of political negotiations in Cyprus is in accordance to the behaviour of the conflicting sides in relation to interventions characterized and defined in other intractable conflicts (reinforced by Azar, 1990; Bar-Tal, 2007; Bennett, 1996; Bercovitch, 2005; Burton, 1987; Coleman, 2003; Goertz & Diehl, 1993; Kriesberg, 2005; Marshall & Gurr, 2005; Pearce & Littlejohn, cited in Vallacher et al., 2013, p.6).

Touval and Zartman (2008) argue that interventions are seen as ‘inducements’ or ‘punishment’ (Touval & Zartman, 2008). Leverage, on the contrary, is seen by Touval and Zartman as a ‘scarce resource which takes the form of effective persuasion’ (Touval & Zartman, 2008, p.1).

The notion of leverage points, as opposed to third party interventions, is representative of self-organized and emergent systems, which falls in line with the concept of ‘Cypriot led, Cypriot owned’. The leverage points in the system would be found and interventions designed and introduced by the Greek and Turkish Cypriot sides themselves, which would point out to self-emergence and self-navigation. Their main purpose would be the perturbation of existing patterns of behaviour and thought embedded in the system of political negotiations for the purpose of reinforcing motion through self-emergent mechanisms during periods of stalemate.

The findings reveal broad multidimensional levels of leverage within the system of political negotiations in Cyprus. The presented findings are consistent with systems thinking literature regarding leverage points. The findings indicate the following five broad leverage points in the system of political negotiations under *paradigm/s leverage (the mindset out of which the system – its goals, structure, rules, delays, parameters – arises)*:

- 1 *shared vision paradigm***
- 2 *engagement, future partnership and empowerment paradigm***
- 3 *cultural and multicultural paradigm***
- 4 *courageous leadership paradigm***
- 5 *education paradigm***

The identification of broad paradigms led to the identification of more particular leverage points. The formation of leverage points in the system of political negotiations in Cyprus mainly derived from careful listening to interviewees (listening to the system by proxy) as per a systems thinking approach. The system of political negotiations is comprised of dynamically interacting elements which constitute the 'whole' (Banathy, 1967, p.282). Given the notion of the 'whole' and the fact that the leverage points in complex systems are difficult to find (Harrison, 2006; Meadows, 1999), exploration and broad thinking were applied. For that reason, the identified leverage points are on the boundary of the system and could be considered as beyond the scope of the system of political negotiations. The presented leverage points sought to explore alternative ways in which the Greek and Turkish Cypriot sides may set the stalemated system into motion. The following leverage points are proposed by the researcher for implementation into the system of negotiations in Cyprus:

**1 *shared vision paradigm***

- synchronization of vision paradigms

**2 *engagement, future partnership and empowerment paradigm***

- accommodation of strategic interests of the all sides & engagement of all the sides in the constructive dialogue
- embracement of Turkey and Greece as future partners and allow for their direct input into the system of negotiations
- negotiators to cross visit Turkey and Greece;
- engage civic society into the system of negotiations
- transparency in the system of negotiations & greater degree of ownership
- leadership to engage people outside negotiations & creation of channels
- implementation of policies to promote change and trust
- accommodation of joint work of all the Cypriot community into the system of negotiations & build connectivities across all levels and dimensions
- perceive negotiations on a human level.

### **3 *cultural and multicultural paradigm***

- acknowledge emotional, psychological, cultural and historical
- define a problem as a shared problem, reinforcing the fact that both sides in this problem together
- acknowledge multiculturalism
- encourage multicultural dialogue and cooperation at the grass roots by embracing all communities on the island
- understand history and use of history not as the divisional but as a unified force
- the sides to acknowledge that the Cyprus of tomorrow is of multiculturalism, religious tolerance, mutual respect despite the differences between Greek and Turkish Cypriots; these elements should be merged to include the common country, common heritage and common future.

### **4 *courageous leadership paradigm***

- the two leadership to translate the vision of Cyprus into concrete economic gains
- the two leadership to engage civil society into negotiations.

### **5 *education paradigm***

- more balanced historical narratives in educational systems and exposure to the point of view of the other (713\_0022);
- Greek and Turkish languages to be the two official languages
- unite suffering into a common Cypriot pain through learning history of each other and hearing history of each other; the need to consider not the Greek Cypriot pain nor the Turkish Cypriot pain, but the common pain for Cypriots.

Based on the research data analysis, the findings reveal five broad multidimensional levels of leverage (multiple sub-leverages) under the *mindset paradigm*, for the Greek and Turkish Cypriot sides to achieve and sustain motion in the system of political negotiations. The findings also led the researcher to employ a transcending paradigm as a leverage.

Exploration of leverage points in the system of political negotiations may stimulate the Greek and Turkish Cypriot sides to form new ways of thinking. At the same time, introduction of leverage points by the Greek and Turkish Cypriot sides into the system of political negotiations may set the

periodically stalemated system of negotiations into motion and fluidity, and hence potentially influence the trajectory of the negotiating system. This therefore may also lead to a change in the dynamics of the system and therefore a paradigm shift in the discourse of negotiations, subject to the Greek and Turkish Cypriot sides' openness, adaptability and flexibility. However, for this to happen, the Greek and Turkish Cypriot sides are required to listen to the dynamicity of negotiations and see how the interdependencies and complexities of the internal and external dynamics shape the system of negotiations.

It is vital to acknowledge that even though exploration, identification and implementation of leverage points may provide the sides with high levels of benefits, it is however equally important to recognize obstacles and challenges the sides may face upon identification and implementation of these. Systems thinking encourages thinking through time and space, where time focuses what is being done 'in the short term within a clear long-term context – and *space* – engaging many diverse stakeholders as partners in a continuous learning process' (Stroh, 2009, p.121).

From the system boundary point of view, the boundary of the system of political negotiations should be enabling rather than confining, as per Cilliers (2001) on the system boundary. The subsystems of Territory, Property, Governance and Powersharing, Security and Guarantees, Economic Matters, EU Matters are interconnected and interpenetrated with other systems, and therefore the boundary of these systems should not be confining, nor should it be perceived as something that separates it from other systems. In addition, the system of negotiations interconnects with socio-economic and political, cultural and religious systems, and therefore the boundary of the system of negotiations should be in a constant revaluation, as the system of negotiations is a continuous interaction of the Greek and Turkish Cypriot socio-economic, political, cultural and religious environments.

Even though the system of negotiations is viewed by the agents of the system in a purely political and elitist form, the agents of the negotiating teams within the system should be aware of interdependencies and interactions with other systems and subsystems (Hendrick, 2009; Wils et al., 2006). At the same time, it should be noted that the demarcation of the boundary is equally crucial (Chapter 3). Wils (2006) points out that the meaning of interactions is important as they constitute the boundary of political negotiations in Cyprus (Wils et al., 2006).

The system of political negotiations contains a vast array of system agents interacting with each other in a nonlinear fashion. Interactions, however, are guided by specific rules and principles that the sides have adopted that are reinforced by the UN Secretary General Ban Ki-Moon such as *Cypriots for Cypriots* and *Cypriot led, Cypriot owned* (Faustmann & Kaymak, 2008) negotiations or 'Nothing is agreed until everything is agreed', or the fact that negotiations are conducted under the auspices of the United Nations encompassing six main chapters (subsystems) focusing on key substantive issues as part of the working groups supplemented by technical committees focusing on CBMs (UNSC, S/2009/610; Kaymak & Faustmann, 2009; Migdalovitz, 2008; Morelli, 2014; Napolitano, 2011). This suggests that the rules defined by the system of negotiations or by individual actions of system agents could predispose the sides to adaptation and modification of behaviour. It could also be the case where agents are passive, and without eager intentions to adapt (Holland, 2002).

As Cilliers (2001) notes, complex systems require an elastic structure for adaptation. The findings reveal that the system of political negotiations in Cyprus exhibits elements of rigidity, non-flexibility and non-adaptability, given the fact that the Greek and Turkish Cypriot sides at the level of political negotiations adopted a recursive pattern of elitist formula to negotiations (RQ2) without introducing variations for an attempt to overcome a stalemate. The literature review supports a similar view that the elitist political formula in negotiations is limited to political elite only and therefore serves as an impediment in the system of negotiations as it does not include the public opinion polls, suggesting inclusions of the civil society (Hadjipavlou, 2004; Jarraud et al., 2013; Kaymak & Faustmann, 2009; Lordos et al., 2008). The authors suggest a need for a paradigm shift.

It appears that the system of political negotiations in Cyprus resembles behaviour described by Guastello and Liebovitch (2011) where any attempts to change parts of the system do not usually succeed as the system defends itself from the 'intrusions of the outside tinkerer' (Guastello & Liebovitch, cited in Guastello et al., 2011, p.268). This may suggest that the introduction of any variation to the system from outside the system (e.g. public opinion polls suggesting to include the civil society into the system of negotiations) might be perceived by the negotiators as an intervention, and therefore the system would protect itself from this intervention, which seems to be what has been happening in the negotiations up to now.

The agents within the system of negotiations might need to perceive the system of negotiations as a dynamic network structure (Allen et al., 2011), interconnected with other socio-economic, cultural and religious systems to create a multidimensional network structure consisting of systems at different levels, whereas the dynamic force behind the whole is the shared vision with the hearts and minds of the people (Senge, 2006). Once a shared vision is established, adaptation will take place, shifting the mindset of the negotiating teams and encouraging them to develop novel ways of thinking aimed at improving the system of political negotiations, which acknowledge the uniqueness of complexity theory and encourage (some) form of leverage, while at the same time maintaining conformity to the fundamental functions of negotiations.

Due to the explorative and interpretative nature of this research, the introduced leverage points at the mindset paradigm and transcending paradigm are of a tentative nature only. Future research may seek validation of leverage points in the reality of the political context in Cyprus.

The next chapter focuses on the application of aspects of complexity theory in the context of the Cypriot political negotiations. The negotiations are viewed through the lens of complexity.

## **Application of aspects of complexity theory in the context of the Cypriot political negotiations**

The previous chapters 5, 6 and 7 presented results, findings and discussion for the three research questions. The current chapter therefore explores the application of aspects of complexity theory in the context of political negotiations. The aim of the research is to employ a complexity lens through which political negotiations could be viewed and understood. The exploration of political negotiations in Cyprus through the lens of complexity theory is one of the central aims of the thesis and an essential stage for the purpose of further enhancing and enriching the existing understanding of political negotiations in Cyprus. Therefore this chapter of the thesis focuses on exploring and amalgamating aspects of complexity theory in the context of political negotiations in Cyprus.

### **8.1 Cypriot political negotiations as a (multidimensional) complex system**

The definition of a *complex system* stresses the dynamic interaction of the elements and their interconnected and nonlinear nature (Richardson, 1984) (Chapter 3). The very same principle is applicable in the context of political negotiations in Cyprus, which fall into the category of a complex (multidimensional) system, consisting of a collection of multiple macro and micro autonomous independent systems and subsystems dynamically interacting (Cilliers, 1998).

The autonomous independent subsystems (negotiated chapters) of the system of negotiations dynamically connect and interconnect with a vast number of simple, complicated and complex systems, including political, economic, social, territorial, cultural, ethnic and religious (Cilliers, 1998). The establishment of negotiating chapters by the two sides on the key substantive issues of *Territory, Property, Securities and Guarantees, Governance and Powersharing, Economic Matters* and *EU Matters* (Morelli, 2014; Napolitano, 2011) as part of the framework to initiate negotiations for the purpose of reaching a comprehensive settlement can be viewed as autonomous independent subsystems. The composition of the system of political negotiations in Cyprus is multifaceted. The autonomous subsystems interpenetrate each other to reach external environments and various other systems (Cilliers, 2001; Kurtz & Snowden, 2003; Midgely & Pinzón, 2010).

The context of the negotiations over Cyprus (Chapter 3) consists of socio-economic, political, cultural, religious, historical, geographical, regional and international dimensions. The political

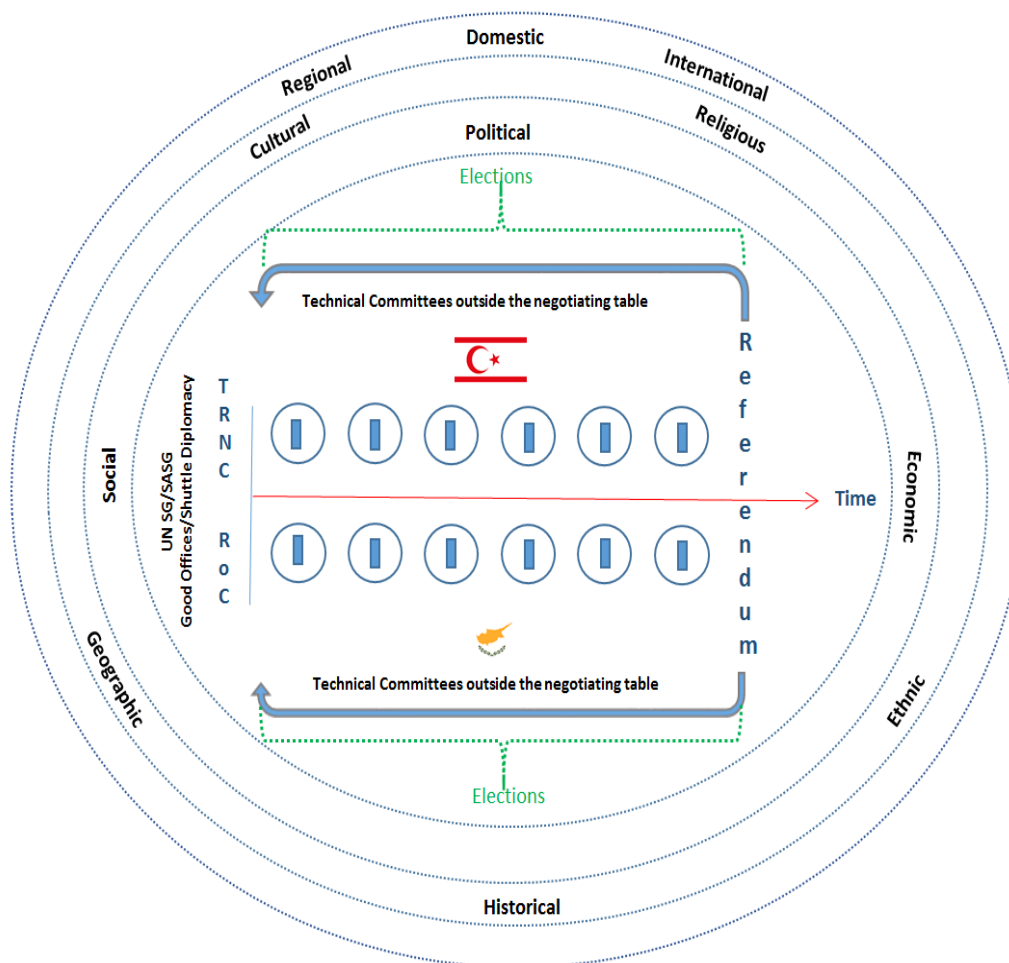


negotiations interact with the environment as a whole and therefore cannot be viewed in isolation nor marginalized or divorced from the above dimensions. The UN Secretary General Ban Ki-Moon has reinforced the fact that the political environment within which the sides negotiate has become difficult, as he outlined in his report to the UNSC, 12 March 2012:

*the negotiations on the 'core core' issues that remain to be agreed are close to deadlock. Despite the leaders' repeated commitments to intensify the negotiations and push for a conclusion as soon as possible, the fact that there has been such limited movement towards convergence on core issues in recent months is a matter of concern. [...] There is no doubt that the political environment in which the negotiations are currently taking place has become increasingly difficult. Nonetheless, it is incumbent upon the leaders to foster a more conducive atmosphere for the talks [...]. The time for an agreement is now. [...] The current window of opportunity is not limitless and there is little to suggest that the future will bring more propitious circumstances for a settlement. The United Nations remains convinced that if the necessary political will could be mustered on both sides, a durable settlement could be achieved in the interests of all Cypriots' (UNSC, S/2012/149)*

The system of political negotiations is supplemented by seven technical committees focusing on 'crime, economic and commercial matters, cultural heritage, crisis management, humanitarian matters, health and environment' (UNSC, S/2009/610; Kaymak & Faustmann, 2009; Migdalovitz, 2008; Morelli, 2014). The confidence building measures can be viewed as autonomous systems adjacent to the boundary of the system of negotiations. The negotiations are conducted under the auspices of the UN Good Offices Mission of the UN Secretary General Ban Ki-Moon. The system of political negotiations and systems of technical committees are nested within the larger whole. Figure 8.1 illustrates the complex system of political negotiations in Cyprus.

## Complex System of Political Negotiations



**Figure 8.1** The diagram represents the system of political negotiations in Cyprus between the years 2008-2014 operated under the auspices of the UN Good Offices Mission of the Secretary General Ban Ki-Moon. The centre of the diagram depicts the entrenched positions of the Greek and Turkish Cypriot sides on negotiated chapters of Property, Territory, Securities and Guarantees, Governance and Powersharing, Economic Matters and European Matters. (Source: B. Rapaport)

The role of the UN Good Offices Mission is shuttle diplomacy. The technical committees are focused on confidence building measures (CBMs) and are outside the negotiating table. Even though the system of negotiations operates with the guidance of the UN Council Security Resolutions, it is driven by the Greek and Turkish Cypriot negotiating teams and based on the notion of ‘nothing agreed until everything is agreed’ and ‘Cypriot owned, Cypriot led negotiations’.

Figure 8.1 depicts the system of negotiations on a timeline, meaning that if the sides at the political level (within the system of negotiations) reach agreement on all entrenched positions, both, the Greek and Turkish Cypriot leaderships need to put the agreement to the vote in both communities. The system of political negotiations is nested in political, historical, socio-economic, cultural, religious, economic, ethnic and geographical dimensions. Therefore, any emerging dynamics in the region affect the negotiations and contribute to the evolution of the system of political negotiations.

### **8.1.1 EU-Turkey dimension**

Relations between the EU and Turkey add an extra dimension to the complex equation of the negotiating system. The Europeanisation of the Cypriot conflict began with Cyprus's EU accession in 2004 (Michael, 2013). Many perceived Europeanisation as a catalyst for a solution and as an antidote to a federal model (Christou, 2010, cited in Michael, 2013). Europeanisation as a transformative tool for the Cypriot conflict was an innovative approach to finding a solution to the intractable dilemma of the long standing partitionist (division) or federalist (reunification) aspirations of the Greek and Turkish Cypriot sides (Michael, 2013; Ulusoy, 2008). Greek Cypriots reinforced the European solution by adopting the following principles

- the universal application of the democratic principle of one citizen, one vote, which notionally would advantage Greek Cypriot majority rule
- respect for human rights, which would ensure the full return of Greek Cypriot properties and refugees
- the full implementation of the EU's *acquis communautaire* without permanent derogations (Faustmann, 2010; Ker-Lindsay, cited in Michael, 2013, p.530).

Turkey's aspirations for EU membership in 1999 were dependent upon Cyprus's settlement, which was part of the EU condition. The EU accession process for Turkey accelerated in 2002 with the election of the AKP government, which ushered in an opportunity for regional rearrangements, democratization and change (Michael, 2013). Turkey's interest in the EU membership prompted an agreement with the EU on an additional protocol – EU-Turkey Association Agreement – under which Turkey was obliged to allow free movement of goods from Cyprus, as well as open its ports and airports to Cypriot traffic.

Turkey has failed to implement the protocol and therefore the negotiations in relation to Turkey's accession were stalled in 2012. The conundrum was that the EU regarded the additional protocol as

a legal obligation, while Turkey pressed the EU to allow direct trade with Northern Cyprus as ‘a step which Cyprus is blocking as tantamount to recognition of the TRNC’ (UNSC, S/2012/149).

In 2012, the EU Commission launched a ‘positive agenda’ to revive EU-Turkey relations. During 2013, the EU Commission issued its annual assessment on the progress of the potential candidates for the EU, including Turkey (Morelli, 2013). The assessment emphasized Turkey’s importance as a potential EU member state. The EU commission outlined its disappointment with ‘Turkey’s continued refusal to extend diplomatic recognition to EU member Cyprus, and Turkey’s position on the Cyprus EU presidency’ (Morelli, 2013, Summary). In 2013, negotiations were also predominantly stalled. The dynamics of Turkey’s domestic and regional political affairs in 2012 had a direct impact on negotiations in Cyprus (Morelli, 2014).

It should be noted that some scholars argue that the Europeanization process did not contribute to substantial changes to the issue of Cyprus. Even though the expected alterations to Turkish foreign policy to bring Turkey in line with European standards and principles in the area of democracy and human rights (Ulusoy, 2008), were not adopted, this fundamentally did not change the structure of the conflict as the structure preceded the changes and the regional balance preceded EU’s external power (Ulusoy, 2008).

### **8.1.2 Gas and oil dimension**

The discovery of gas reserves in the Eastern Mediterranean waters between Cyprus and Israel to some extent redraws the economic map of the Eastern Mediterranean and adds to the disharmony in the region. The Levant Basin is of great interest to Israel, Lebanon, Syria and Cyprus as it located in these countries’ waters and contains an estimated 122,000 billion cubic feet of natural gas. In 2011 US Noble Energy initiated drilling in Cyprus’s block 12 (Mullen et al., 2014). Cyprus and Israel have intensified their cooperation in relation to the gas, which has exacerbated tensions with Turkey, which does not recognize the Republic of Cyprus, and argues that the creation of an exclusive economic zone (EEZ) and any agreements and licenses and permits for gas and oil exploration should be subject to the comprehensive settlement of the Cypriot conflict. Turkey argues that any economic benefit from the gas should benefit both communities on the island (Larrabee, 2012).

Turkey's stance has increased tensions in the area, with Turkey being increasingly irritated by the current arrangements between the Republic of Cyprus and Israel (Morelli, 2013). For example, when Noble Energy began drilling for gas, Turkey claimed the drilling was illegal and that the behavior of the Republic would have a negative effect on Cypriot negotiations (Morelli, 2013). Turkey threatened to increase its naval presence in the area, with Turkish military vessels to observe Noble Energy activities (Mullen, 2014) 'and ratified a continental shelf delimitation agreement with northern Cyprus' (Larrabee, 2012, p.476).

In 2012 Cyprus launched a tender for the exploration of block 11 within its EEZ. Turkey strongly objected (*Hurriyet Daily News; Economic Review*, cited in Larrabee, 2012). Additional dynamics were that Greece, Cyprus and Israel entered into economic, political and defence cooperation pacts. Israel and Cyprus signed an agreement for defence cooperation, which provides Israel with Cypriot air space and territorial waters to protect offshore natural gas fields (Ogutcu, cited in Larrabee, 2012). Greece also cooperated with Israel to form a political and defence alliance (Larrabee, 2012). The Ministry of Foreign Affairs of the Republic expressed concerns over Greek Cypriot offshore drilling 'without taking into account the Turkish Cypriots and concrete cooperation proposals for a fair sharing' (Republic of Turkey, 2014).

What this shows is that the discovery and exploitation of oil and gas reserves in Cyprus could possibly become a game changer in the system of political negotiations.

### **8.1.3 The Russian dimension**

Russia has a strong economic stake in natural gas developments in the Eastern Mediterranean region. Supply of gas to Europe is perceived by Russia as serious competition to Russia's natural gas exports to Europe. Russia's interest lies in gaining control over the Cypriot and Israeli gas as it aims to resell it in the European market. The economic and political ties between Russia and Cyprus have intensified, and Cyprus has become a tax haven for money laundering and financial transactions for Russia's business elite. Russian elites have made large investments in Cyprus and then repatriated the profits back to Russia, which has become one of the largest investors in Cyprus worldwide (Larrabee, 2012). The increasing economic ties between Cyprus and Russia have raised concerns in the European Union since Russia's activity could give Moscow more leverage over

Cypriot policy, specifically regarding future contracts involving natural gas which is currently being sought off the Cypriot coast.

#### **8.1.4 Economic concerns and banking/fiscal crisis dimension**

There are economic problems in Cyprus, which is considered to have the 'second highest private indebtedness as a share of GDP in the Eurozone and the EU' (*The Economist* as cited in Larrabee, 2012, 476-477). Cyprus's economic situation in 2012 was fragile. The Cypriot banking system experienced difficulties as Greece underwent restructuring of its banking system in 2012. Cyprus was forced to ask the EU for a bailout (Larrabee, 2012). The economic difficulties converted into a banking and fiscal crisis in 2013. In 2012 Cyprus took the rotating presidency of the EU, whilst Cyprus was holding the presidency, Turkey suspended any interactions with the EU Council (Larrabee, 2012).

#### **8.1.5 Interpretations**

Theoretical advances imply that complex multidimensional nonlinear systems are difficult to define and characterize due to the high number of interactions, both internally and externally to the system. Moreover, complex systems exhibit elements of nonlinearity and unpredictability, while also exhibiting underlying patterns that are detectible (Litaker, Tomolo, Liberatore, Stange, & Aron, 2006).

Interactions within the system of political negotiations occur on multiple levels, therefore, whether these are at the level of Cypriot leadership, the Greek and Turkish Cypriot negotiating teams, the UN Good Offices Mission, the UN Special Advisor to the Secretary General on Cyprus, the UNDP, USAID, UNFICYP, the seven committees focusing on confidence building measures alongside the negotiated chapters or the UNSC. The degree of complexity in the system means that it operates far from equilibrium due to the continuous environmental dynamism and the interactions generated by the Greek and Turkish Cypriot negotiating teams and political leaders and associated individuals and groups. The dynamic interactions create patterns of communication and behaviour of the negotiating teams which continuously emerge and evolve alongside the dynamics of the environment (Cilliers, 2006). Not to be overlooked is the fact that patterns of communication and interaction between the sides could be also based on competing mandates and agendas not only against each other but also within their own political structure.

Any perturbations to the trajectory of the system of negotiations or any emerging dynamics would cause the system to further disintegrate or deviate from its initial state. For example, in 2008, President Christofias of the Republic of Cyprus avoided provisions outlined in the Annan Plan (Kaymak & Faustmann, 2009; Pericleous, 2012). The Turkish Cypriot leader Talat made hard proposals which created distortion (Cilliers, 1998) in the system of negotiations, causing uncertainty, ambiguity, distrust and further deepening the entrenched positions of the sides (Morelli, 2014).

Continuous disagreements and low levels of progress also arose between Eroğlu and Christofias in 2010, producing dissatisfaction between the sides and affecting the behaviour of the system of negotiations (Cilliers, 2006; Morelli, 2014). The distortion of the system of negotiations was also seen in the banking and fiscal crisis of the Republic of Cyprus in 2013 (Morelli, 2014) and the Presidential elections in Turkey with Erdogan being elected President in 2014.

The complex system of political negotiations is characterized by multiple equilibria and therefore may present itself with multiple solutions, whereas game theory is focused on a 'unique equilibrium' (Wierzbicki, in Avenhaus & Zartman (Eds.), 2007, p.69) The system of negotiations operates far from equilibrium (Cilliers, 2006) and therefore it contains multidimensional complexity and uncertainty, and the dynamic nature of domestic, regional socio-economic and political affairs further produces interactions and patterns of behaviour of the larger system within which the system of negotiations is nested.

Given the complexity of the system, it would be exceptionally difficult for the Greek and Turkish Cypriot sides to converge or to arrive at a 'unique equilibrium' (Wierzbicki, in Avenhaus & Zartman (Eds.), 2007, p.69) through which the sides could seek a comprehensive settlement. At the same time, it would be equally difficult for the sides to reach a package deal which can accommodate multiple equilibria or multiple solutions. Although the package deal might seem to be a reasonable approach, given the dynamicity of the system, it may also escalate or deepen the existing status quo due to the negotiators, from one side or the other, choosing a particular package that would be most attractive to them (Wierzbicki, in Avenhaus & Zartman (Eds.), 2007, p.69).

It should be noted that many of the negotiating teams and key political representatives may view their mission as a call to serve the public and their citizens' interests to the best of their ability

while striving to achieve a comprehensive settlement. On the other hand, some negotiation participants are merely seeking personal aggrandisement, either in their own state or the international community. These motivations and patterns create tensions by influencing the initial positions and subsequent behaviour of negotiators from the conflicting sides.

## **8.2 The boundary of the system of political negotiations**

Political negotiations relating to a settlement of the Cypriot situation take place between Greek and Cypriot negotiating teams attempting to reach a comprehensive settlement on key substantive issues represented in the six negotiated chapters. The comprehensive settlement is to be based on 'bizonal, bicomunal federation with political equality' (Migdalovitz, 2008, p.1) and 'single international personality' for the purpose of equalizing Greek and Turkish Cypriot constituent states (Morelli, 2014, p.4). The system is nested alongside the UN Good Offices Mission operating 'under the auspices of the United Nations of the United Nations Secretary General' (UNSC, S/2009/610; Kaymak & Faustmann, 2009; Napolitano, 2011).

The revival of negotiations in 2008 with Dimitris Christofias and Mehmet Ali Talat as leaders of the two communities, stimulated UNDP and USAID to initiate the Action for Cooperation and Trust (ACT) in 2009, which aimed to assist civil society's engagement with a peace process which would focus on supporting political negotiations and facilitating implementation of CBMs (Louise & Morgan, 2013).

The efforts of UNDP and USAID also promoted a societal climate for civil society which primarily aimed 'to feed citizen opinions into that process through formal and informal mechanisms' (Louise & Morgan, 2013, p.27). The promotion of 'policy dialogue', 'advocacy and the pursuit of good governance' (p.27) as part of the civil initiative was at the core. The efforts of UNDP, USAID and the Cypriot partners also aimed to strengthen the notion of 'Cypriot led, Cypriot owned negotiations' through attempts to establish a participatory framework which would reinforce 'ownership' of the civil society in the system of negotiations (Louise & Morgan, 2013, pp.27-28).

In 2009 UNDP-ACT created projects which aimed to bridge the gap between civil society and the political elite (Louise & Morgan, 2013). This was done through the Cyprus 2015 project which has measured public opinion towards the negotiating positions of the island. A brief entitled *Negotiating the Core Issues* was introduced to the leaders at the Greentree2 upon which the sides



conducted discussions. The brief was the only channel through which constituents could express their reactions in relation to the negotiating positions of the sides (Louise & Morgan, 2013).

In 2012 the ENGAGE, Do Your Part for Peace project focused on informing George Iacovou and Kudret Özersay as Representatives of the Leaders of the importance of the role the NGO played 'in informing public about various challenges and opportunities for a comprehensive settlement' (Louise & Morgan, 2013). The ENGAGE project also launched an Active Dialogue Network (ADNs) in 2011, aimed at bringing the reconciliation process to local communities across the island.

### **8.2.1 Diversifying input into the system of negotiations**

As noted in the complexity literature, the boundary of a complex system is open and therefore may not always be apparent nor obvious since complex systems contain various elements interacting dynamically, both internal and external to the system (Cilliers, 2001; Harrison, 2006). The study findings reveal that the sides adopted self-similar, recursive patterns based on an elitist formula which is deep-rootedly embedded in the system of negotiations, as part of the political fractal dimension. The formula for the negotiations emphasized the input of the negotiating teams and the leaders in the community, and represented linear thinking as it defined a top-down approach that, on the whole, marginalized the input of the civil society (Morelli, 2014).

That the negotiations were a closed system was evident from the fact that feeding the voices of the civil society into the system of negotiations in the context of 'flow of energy' (Cilliers, 2006) between the years 2008 and 2014, was not apparent (as per findings, results and discussion chapter), indicating that the system of political negotiations exhibits elements of a closed system, that is, a simple system (Harrison, 2006) (Chapter 3).

The exclusion of civil society from the system of negotiations produced linear thinking, marginalizing constituent interactions (Vos Fellman, Bar-Yam, & Minai 2015) and therefore preventing vertical integration of civil society's input into the system of negotiations. The exclusion of civil society voices was also evident in the results of the polling in 2011, which recorded pessimism, uncertainty and a tendency to vote 'no' (Morelli, 2014, p.8). Overall the system of negotiations between the years 2008-2014 exhibited elements of rigidity with a closed boundary, as described by complex systems theory.

The creation of the Action for Cooperation and Trust was initiated by UNDP and USAID in 2008 was an attempt at self-organization (Hebb 1949, cited in Cilliers, 1998, p. 17) on behalf of the civil society based on a bottom-up approach with the facilitation of the UN. However, the poor response from the established system of negotiations suggests that the elitist formula employed by the Greek and Turkish Cypriot sides dominated the negotiating system which was not self-organizing enough to connect with the civil society, leading any connection that was achieved to decay (Cilliers, 1998, p. 17).

The findings further reveal that even though there was some shift in the participant approach (e.g., UNDP<sup>2</sup> and USAID), the political discourse remained the same during the negotiations. The findings of the thesis record that the polling which was conducted through the Cyprus 2015 project confirmed the detachment of the civil society from the system of political negotiations. Both the Greek and the Turkish Cypriots believed that ‘the leaders ignored their opinions on the negotiation process, despite a widespread desire to be consulted on such major policy decisions’ (Louise & Morgan, 2013, p.47).

The conventional negotiations rarely changed and exhibited a well-defined, closed boundary, which might be considered to contradict the view of complexity theory and complex systems (Cilliers, 2001) (Chapter 4). The voices of the civil society were marginalized and alternative approaches to the negotiations ignored thus further cementing the boundary of the system. The result of the generally unimaginative negotiating process was recursively the same, failing each time it was attempted. Ignoring input from the civil society resulted in the stultification of the negotiations, when others, outside the elite negotiators, may have been able to contribute to a settlement (Wils et al., 2006, p.36). Cementing the boundary of the system of negotiations

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<sup>2</sup> It is important to note that the UNDP in Cyprus consisted of the UNDP-ACT program (ACT=Action for Cooperation and Trust) and the UNDP-PFF (PFF=Partnership for the Future). The UNDP-ACT program, funded by USAID, was closed in March 2016 due to the US pulling funding. The US also closed its USAID office, which housed in the US embassy. The UNDP-ACT aimed at supporting civil society projects, namely bicomunal cooperation across the island. The closure of the UNDP-ACT therefore may strongly indicate that the inclusion of the civil society voices in the context of the political negotiations has been further marginalized and ignored, as currently there is no formal mechanism to support the infrastructure of bicomunal input and/or cooperation. This fact reinforces the view that the negotiations have always been based on an elitist political formula.

On the other hand, the UNDP-PFF (Partnership for Peace) is funded by the EU, and mainly focuses on cultural heritage, such as the reconstruction of mosques and churches. It has also been involved in infrastructure in Limnitis, and the crossing still operates. It is worth noting that even though only UNDP-PFF currently operates, the UNDP website continues to be called UNDP Cyprus.

prevented engagement with an outside, multidimensional environment, which contributed to the unnecessary perpetuation and escalation of tensions, and the deepening of entrenched positions on both sides (Wils et al., 2006, p.36) (Chapter 4).

The boundary of the system of political negotiations is of a significant importance as it maintains its identity (Maturana & Varela, cited in Cilliers, 2001, pp.140-141). For the Greek and Turkish Cypriot sides to recognize the importance of regeneration, reproduction of the boundaries (Cilliers, 2001) through an ongoing re-evaluation process (Eppel, 2009) would be important, even though it could be challenging (Midgley, 1998). Maintaining identity of the boundary of the system of political negotiations along the lines of the 'boundary critique' (Midgley, 1998) and/or 'sense making framework' (Kurtz & Snowden, 2003) for the purpose of enabling (Cilliers, 2001) and reproducing (Varela, Maturana & Uribe, 1974) may seem to be a challenge for the Greek and Turkish Cypriot sides alike. For the boundary of the system of political negotiations to be enabling, which would encourage the input of the civil society (Cilliers, 2001) and which would accommodate perspectives of those actors who will be part of the comprehensive settlement and the solution.

At the same time, demarcation of the system boundary of political negotiations in the context of the Cypriot conflict is important, as it may prevent the Greek and Turkish Cypriot sides of falling into the trap that everything is connected to everything (Wils et al., 2006). Both parties may attribute overlapping structures into conflict analysis and for instance include immediate interests of third parties such as Turkey and the European Union.

However, Wils et al. (2006) extend further arguments for demarcation of the system boundary, as additional layers of interactions with the system boundary may either contribute to advancement of negotiations and/or resolution of the conflict or the perpetuation and further reproduction and escalation of the conflict, due to inclusion of additional extensive interactions between the negotiating system and the outside environment (Chapter 4).

On the other hand, it is important to understand that resistance to diversification of the elitist political formula in the system of the Cypriot negotiations stems from what is called 'the fear of losing the familiar' and the unknown factor (Wils et al., 2006, p.40). The resistance to diversification of the elitist formula on the part of the Greek and Turkish Cypriot sides indicates

fear of the unknown, which further cements the boundaries (Wils et al., 2006) of the system of negotiations and reinforces the notion of the closed system.

### **8.2.2 Boundary analysis**

The initial assessment of the boundary of the system of political negotiations as a whole poses challenges that may engender feelings of chaos. It is crucial, however, that key stakeholders are accommodated in order to make the boundary fluid. The boundary analysis should also encompass identification of the boundaries of autonomous independent subsystems (negotiated chapters) to see whether these boundaries are either too rigid or too inflexible and whether the connectivity between the negotiated chapters is appropriate. (Please note that negotiated chapters are viewed in this thesis as subsystems).

Interactions within the system of political negotiations are critical, as interactions constitute the boundary of the system. Some authors point out that interactions in the system may contribute to unpredictable outcomes, resulting in either conflict resolution or intensification of the problem, which may produce structure leading to further 'perpetuation and reproduction of patterns of conflict and violence' (Wils et al., 2006, p.36). These interpretations are further supported by literature on linear boundary divisions separating political entities in Cyprus (Schryver, in Zartman (Ed.), 2010, p.133).

The system boundary of political negotiations is a matter of perception by the Greek and Turkish Cypriot negotiating teams, and could generate difficulties for individuals within the system of negotiations. In 2008, the system of political negotiations was revived under the conditions of the boundaries of the negotiating chapters, conceived in this thesis as autonomous independent subsystems. The findings of this thesis indicate that the boundaries adopted in 2008 were rigid due to employment of an elitist formula and the reluctance on the part of those involved in the system of political negotiations to modify the formula.

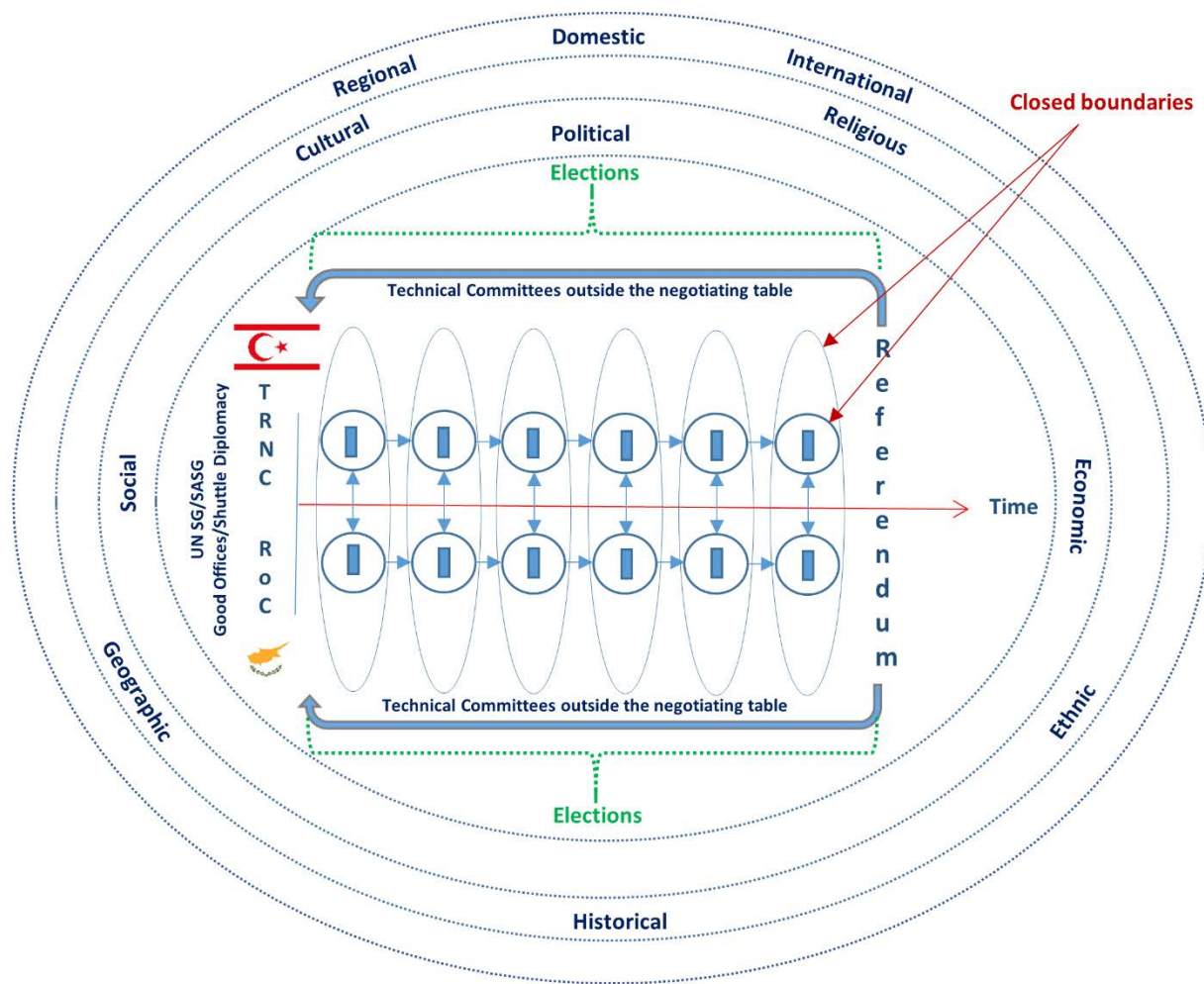
Analysis of the study data supports the observation that the system of political negotiations exhibited elements of a closed, as well as simple, system as supported by the literature. The elitist formula was perceived by the interviewees to be recursive, contributing to the system of negotiations to periodically stall. Psychologically, the 'resistance' (Wils et al., 2006) of the sides in the system of political negotiations to the modification of the elitist formula of the negotiations

indicates strong emotions in a deeply structured system conflict. By rejecting civil society voices, both the Greek and Turkish Cypriot participants in the system of political negotiations maintain a feeling of identity (Wils et al., 2006) (Chapter 6). Their resistance to novel actions appears to be encouraged by a fear of change, and their failure to act reinforces the boundaries of the system (Wils et al., 2006). The resistance to change and repeated reinforcement of the boundaries generates rigidity (Senge, 2004), stalemate, lack of dynamicity (Varela et al., 1974) and integrity (Senge, 2006).

The result is the internal disintegration (Senge, 2006) of the system of negotiations and the system within which the system of negotiations is nested. The findings revealed that the employment of an elitist formula in a recursive fashion produced to some extent rigid and closed boundaries around the system (exhibiting elements of a simple system) of negotiations, which contributed to periodic stalemates (in those years).

### **8.3 Reductionism, linearity and sequential approach to negotiations**

The findings for RQ1 (Chapter 4) reveal that the system of political negotiations between the years 2008-2014 exhibited elements of reductionism, linearity and sequential approaches to negotiations, which led the system of negotiations to periodically stall (Figure 8.2).



**Figure 8.2** The diagram illustrates the entrenched positions of the Republic of Cyprus (RoC) and the Turkish Republic of Northern Cyprus (TRNC). The system of political negotiations in Cyprus was characterized by linear, reductionist and sequential thinking between the years 2008-2014. (Source: B. Rapaport)

The centre of Figure 8.2 depicts the entrenched positions of the Greek and Turkish Cypriot sides on the negotiated chapters of Property, Territory, Securities and Guarantees, Governance and Powersharing, Economic Matters and European Matters, which represent the system of negotiations. The system of negotiations operates under the auspices of the UN Good Offices Mission of the UN Secretary General Ban Ki-Moon. The Technical Committees are outside the system of negotiations and are focused on confidence building measures (CBMs). Even though the system of negotiations operates upon the UN Council Security Resolutions, nevertheless the system is driven by the Greek and Turkish Cypriot negotiating teams and is based on the notion of ‘nothing agreed until everything is agreed’ and ‘Cypriot owned, Cypriot led negotiations’. The diagram depicts the system of negotiations on the timeline, meaning that if the sides at the political level (within the system of negotiations) reach consensus on all entrenched positions, both sides

need to put the agreement to both communities for a vote. The system of political negotiations is nested in the political, historical, socio-economic, cultural, religious, economic, ethnic and geographical contexts. It should be noted that the diagram represents reductionism, linearity and sequential approach to negotiations as depicted by arrows.

Individuals typically perceive the complex reality of the environment in a simplified manner (Aquilar & Galluccio, 2008). As noted by Gell-Mann (1997), this behavior directly corresponds to the division of complex problems into constituent states for the purpose of addressing elements separately before recombining them into the whole, which is an ineffective way to understand complex nonlinear systems (Gell-Mann, in Alberts & Czerwinski (Eds.), 1997, pp.8-9) (Chapter 4).

Therefore, intractable conflicts and political negotiations bear a strong resemblance to complex realities where qualities of uncertainty, unpredictability and dynamicity prevail. The political actors and leaders operating in such realities are the same individuals who may, by way of patterns rooted in the human psyche, simplify complexity, ambiguity and uncertainty and therefore introduce policies, undertake decisions or negotiate in a manner based on linearity and reductionism which originates from a simplified perception of the world (Aquilar & Galluccio, 2008).

Reductionism and linearity are rooted historically in Cyprus. It was noted in Chapter 2 that the partition and division of Cyprus as part of the solution to multiethnic problems emerged during the most recent period of colonial rule on the island. Coufoudakis (1976) argues that 'partition and/or political division have been applied as solutions to the problems of such multiethnic societies and states that give an element of uniqueness to the post-World War II period' (Coufoudakis, 1976, p.27).

Henderson (1974) further states that the 'division of a territory is seen as an artificial imposition by external sides...' (Henderson, 1974, p.434). It has been further argued that the division and the partition are a result of colonial collapse (Coufoudakis, 1976). Moreover, it has been strongly argued that British colonial rule had encouraged a 'static bicomunal system' due to colonialism and nationalist rhetoric (Michael, 2011, p.27). Pericleous (2009) points out that the British government was fully aware of partition ramifications, when it introduced the strategy of partition to the island in order to suppress the Greek Cypriot *enosis* (Pericleous, 2009). Similar measures of partition have been also introduced in Ireland, India and Palestine (Pericleous, 2009). Moreover,

the Ottoman empire ruling the Cypriot island for more than 300 years prior to British rule also contributed to the partition, as Ottoman rule also established bi-communalism and planted the seeds for the current conflict (Coufoudakis, 1976).

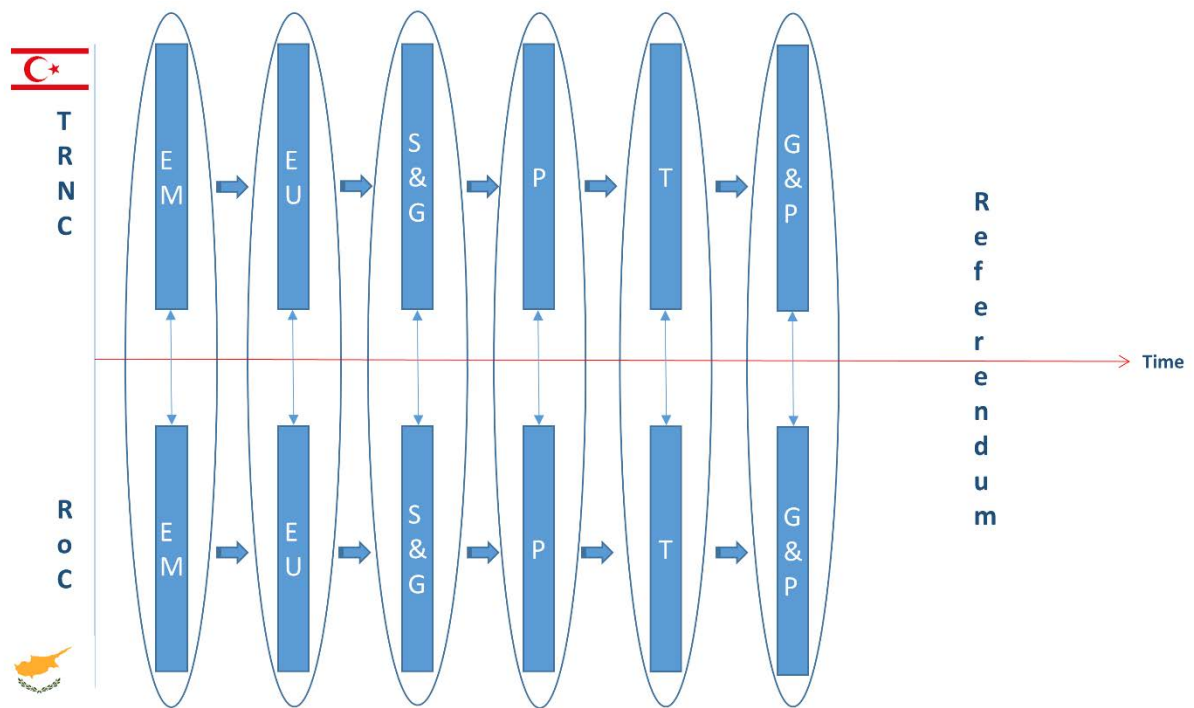
Supplementary to the British strategy of partition (Pericleous, 2009), the self-centred aspirations and self-determination based on the ethnic identities of the Greek and Turkish Cypriot sides perpetuated politicization of the conflict and further contributed to the fragmentation of the island (Joseph, 1997) (Chapter 3). These developments further promoted to intra-ethnic violence and the escalation of domestic tensions in the 1950s to crisis point and potentially war between Greece and Turkey, with the island's disunity becoming a 'symbol of Western disunity' (Joseph, 1997, p.58).

Before 1974, the United Nations attempted to resolve the conflict by establishing the United Nations Force in Cyprus (UNFICYP) and the United Nations Good Offices Mission in 1964. Nevertheless, and despite the efforts of the United States and other international state actors, including Greece and the NATO allies, Turkey exercised its unilateral right to intervene by invading Cyprus on 20 July 1974 (Diez & Tocci, 2009), which yielded a permanent division of the Cypriot island into South and North, by doing so creating a static status quo which persists to this day.

Strategies employed by political powers were largely dysfunctional due to conventional thinking interwoven with reductionist and linear interpretations that were insufficient for dealing with such a complex problem. Negotiations in these circumstances simply resulted in defiant intractability.

This investigation of the conundrum of reductionism and linearity demonstrated that both elements dominated the system of political negotiations in the period from 2008 to 2014, and were manifested in the division of the political negotiations into the six main chapters of Property, Territory, Governance and Powersharing, Securities and Guarantees, Economic Matters and European Union Matters. The elements of reductionism and linearity primarily manifested themselves through the unwillingness of the Greek and Turkish Cypriot sides to compromise. Neither the Greek and nor the Turkish Cypriot sides attempted to connect and interconnect between the substantive issues of the negotiated chapters. Figure 8.3 illustrates the system of political negotiations, encompassing elements of reductionism, linearity and the sequential manner of negotiations between the years 2008-2014:





**Figure 8.3** The diagram illustrates the entrenched positions of the Republic of Cyprus (RoC) and the Turkish Republic of Northern Cyprus (TRNC). (Source: B. Rapaport). The system of political negotiations in Cyprus was characterized by linear, reductionist and sequential thinking between the years 2008-2014 – a closed look up (Source: B. Rapaport)

Figure 8.3 illustrates reductionism, linearity and the sequential approach to political negotiations between the years 2008-2014, as the Greek and Turkish Cypriot sides predominantly focused on negotiating chapter by chapter. The figure depicts each chapter as a separate autonomous subsystem. The findings reveal that connectivity between the subsystems was marginalized (ignored) between the years 2008-2014.

### 8.3.1 Divergent paradigms to create disintegration of the system of political negotiations

Divergent paradigms, therefore, have shaped the form of the entrenched positions of the Greek and Turkish Cypriot sides on key issues and contributed to the disintegration of the system of political negotiations as a whole. The disintegration preserves the status quo of the negotiations, as well as the status quo on the island, despite the commitment of the Greek and Turkish Cypriot leadership to fully-fledged negotiations and the commitment of the both sides for a lighter federation (International Crisis Group, 2014). The ICG report emphasized the fact that ‘the whole current set-up is based on not solving the problem...’ (International Crisis Group, 2014, p.7). The report equally emphasized the problem of procrastination by each side during the years 2008-2012

(International Crisis Group, 2014). This to some extent suggests that the levels of interaction between the Greek and Turkish Cypriot sides and the system of negotiations with the outside environment was insufficient.

### **8.3.2 A more holistic system of political negotiations**

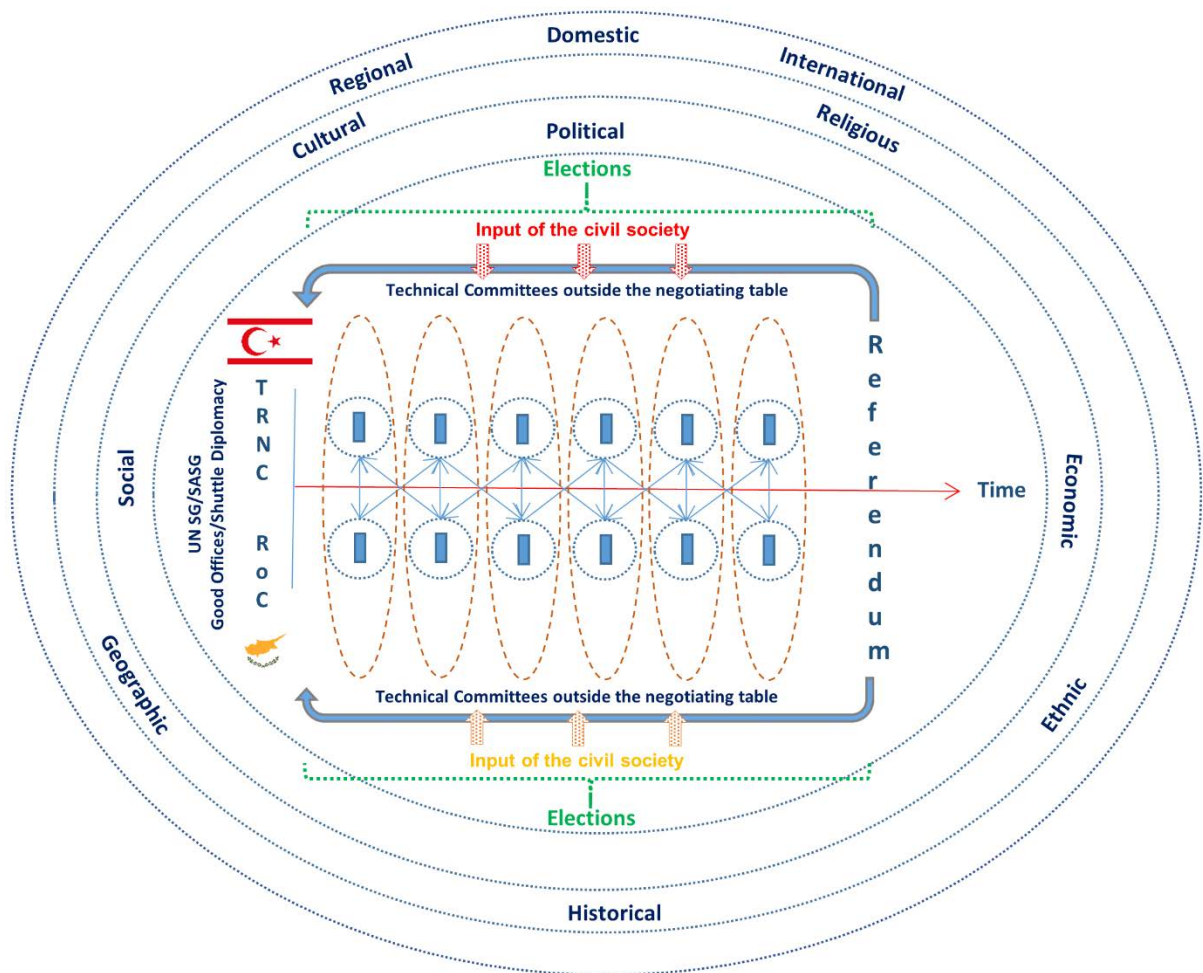
Low levels of interaction between the autonomous subsystems (negotiated chapters) yielded low levels of connectivity and therefore, by implication, contributed to disintegration. Poor interaction has contributed to signs of reductionism, linearity and a sequential approach in the system of negotiations. Complexity theory validates the fact that interactions stimulate creation of connectivity and interconnectivity in a system (and subsystems) and eventually generation of patterns to benefit the system as a whole through integration.

The thesis findings reveal that the system of political negotiations marginalized connectivity and interconnectivity of the negotiated chapters (thus systems). Even though the Greek and Turkish Cypriot sides negotiated on the basis of ‘nothing is agreed, until everything is agreed’, the concept was not reflected in the negotiations, although the ‘linkage approach to negotiations has meant that there could be no settlement unless all aspects of the Cyprus problem were simultaneously agreed upon’ (Michael, 2011, p.205).

The interrelationships among political actors and the frequent emergence of new (external) dynamics in the dimensions of a nested negotiating system, contribute to the system of negotiations behaving at times in a non-predictable manner. The behaviour of the Greek and Turkish Cypriot leadership was shaped by external and internal factors, with each individual’s personal behavior contributing to the behavior of the various political constituencies as a whole.

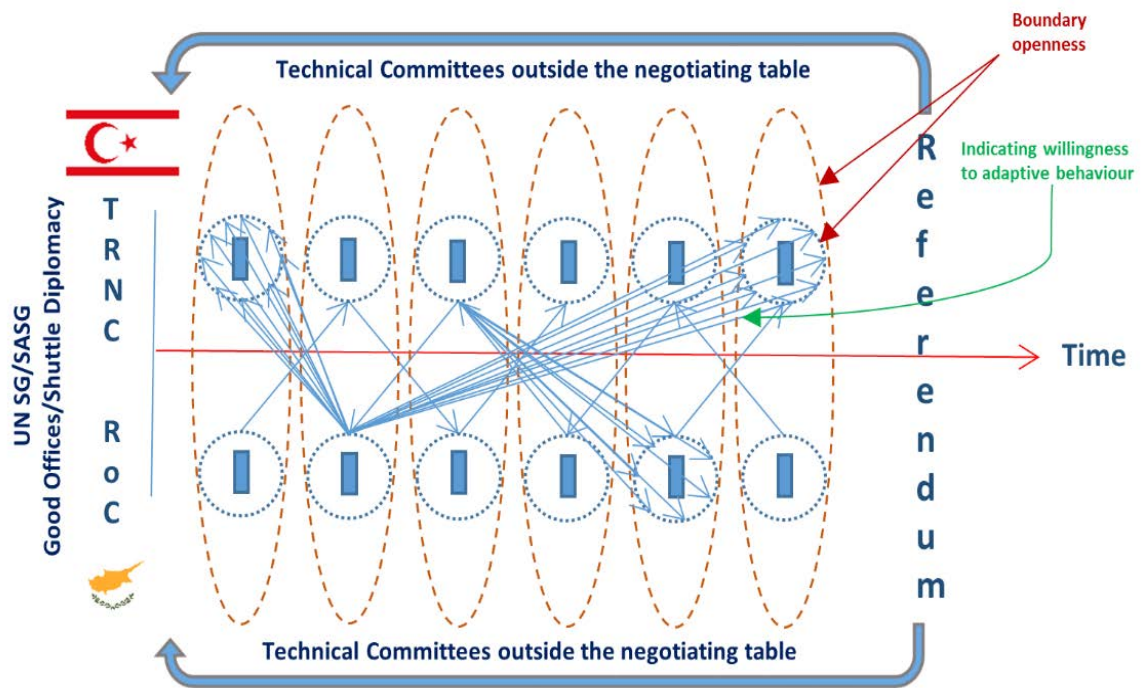
This fact has implications for change in systems. A specific feature of a system is influenced by both internal and external due to multiple connectivity within and between systems. Due to the tensions that exist between the status quo and the need to adapt swiftly to a changing socio-economic and political environment, the parties may experience stalemate.

To summarize, the system of political negotiations is multidimensional and complex, nonlinear, dynamic, uncertain and unpredictable. The ideal type of complex system of political negotiations is illustrated in Figure 8.4. It illustrates the integrated and holistic approach to political negotiations which could encourage the creation of interactions and patterns upon which the Greek and Turkish Cypriot sides could negotiate:



**Figure 8.4** The ideal type of Complex System of Political Negotiations. The diagram depicts the system of political negotiations in Cyprus to adopt a connected approach, linking chapters in a dynamic way, in order to make concessions with full awareness of the connections between the elements of the system. (Source: B. Rapaport)

Figure 8.5 depicts connectivity and interconnectivity between the autonomous independent subsystems (negotiated chapters) with other systems (and subsystems) to encourage the creation of interactions and patterns upon which the Greek and Turkish Cypriot sides could negotiate:



**Figure 8.5** The diagram depicts (detail from Figure 8.4) a system of political negotiations where negotiated chapters are represented as autonomous, independent subsystems to connect and interconnect with each other. (Source: B. Rapaport)

Figure 8.5 represents a system of negotiations based on the complexity approach, whereby the interconnectivity of issues is recognised and used to assist negotiations. The Greek and Turkish Cypriot sides may adopt a more holistic approach at the negotiating level during the give and take stage. Input from civil society would make the boundaries of the system enabling rather than confining, creating fluidity and motion in the system of negotiations.

#### **8.4 Self-organization and emergence in the system of political negotiations**

The system of political negotiations in Cyprus is multidimensional and complex. The dynamism on the island supplemented by the regional and international state of affairs contribute to emerging dynamics (emergence) of events on a frequent basis. Between the years 2008-2014 activity on Cyprus exhibited emerging dynamics with respect to presidential elections held on both sides of the island:

- In 2008 the Greek Cypriot Presidential elections brought about a newly elected President Demetris Christofias for the Republic of Cyprus.
- In 2010 the Turkish Cypriots elected President Derviş Eroğlu for the Turkish Republic of Northern Cyprus.

- In 2013 the Greek Cypriots elected Nicos Anastasiades as President for the Republic of Cyprus.

It is worth noting that external dynamics (emergence) perturbed the system of political negotiations in Cyprus. Furthermore, any self-organizing efforts by the Greek and Turkish Cypriot sides or external input (UN) aiming to direct the system of negotiations into an intended direction, might also perturb the system of negotiations, and impact the behaviour of the system in an unpredictable and non-deterministic manner.

For instance, presidential elections held on both sides of Cyprus (in 2008/2010/2013) created uncertainty around the negotiating climate between the Greek and Turkish Cypriot sides, thus perturbing, disintegrating and changing the structure of the system of negotiations, forcing the system to a position far from equilibrium (Capra, 1982; Gleick, 1988; Kauffman, 1996; Prigogine, 1987). The presidential election in the North in 2010 brought with it Eroğlu's hardline stance aimed at achieving a mono-ethnic state (Pericleous, 2012) (and 60 meetings held between the Greek and Turkish Cypriot sides since 2008 (Chapter 2) led the system of negotiations to stall (Morelli, 2014).

Subsequent efforts by the United Nations Secretary-General Ban Ki-moon and the Special Adviser to the Secretary General (Alexander Downer) to facilitate a convergence by the Greek and Turkish on 'property rights, security, mainland Turks, and citizenship' as part of the meeting in New York (Greentree2) resulted in stalemate in 2012. This was due to the continuous, unresolved issues between the sides, blame and distrust (Morelli, 2014), and partly due to anticipation of the Greek Cypriot elections in 2013.

However, the same year (2013), the Republic of Cyprus experienced a fiscal and budget crisis (Morelli, 2014, p.10) which overtook the South of the island, contributing significantly to the changing dynamics of the political negotiations landscape and more importantly, generating a stalemate in the system of negotiations. The UN Good Offices Mission and the United States successfully sought to assist the sides reach an agreement on restarting negotiations (Morelli, 2014), which were the 'sixth major attempt under UN sponsorship to find settlement on the basis of a bizonal, bicomunal federation since 1977 (International Crisis Group, 2014).

Nevertheless, during 2014 the island experienced (an emerging) dynamics related to gas and oil exploration in the Mediterranean Sea by the Greek Cypriots, which was followed by the

controversial move of the Turkish marine flotilla to oversee the site in mid-2014, thus contributing to another stalemate in negotiations after the Joint Declaration was signed in February 2014.

Given these and other emerging developments, the Turkish Cypriot leader Eroğlu emphasized ‘two states’, a ‘new dynamic’ and a ‘new negotiating table’ (Morelli, 2014, p.10). The sides have also argued about how to recommence negotiations given the period of stalemate in 2013. The new dynamism refers directly to the concept of *emergence* employed by complexity theory.

In 2008, the system of political negotiations self-organized itself through emergent principles of ‘talks by Cypriots for Cypriots’ and ‘Cypriot led, Cypriot owned’ negotiations (Faustmann & Kaymak, 2008; Michael, 2011). The elements of emergence were also seen with Greek Cypriot elections in 2008, which set a new momentum on the island. At the same time, presidential elections in 2008, 2010 and 2013 and the Greek Cypriot (Republic of Cyprus) financial crisis in 2013 unravelled new trajectories and patterns (Bogais, 2015).

The emergent developments on the island of socio-economic and political nature perturbed the system of negotiations and the existing trajectories of the system from their initial condition of fluidity and motion achieved with revival of negotiations in 2008, into stalemate in 2010. Subsequent motion and fluidity were restored in 2012, stalled in 2013, began again in 2014, and stalled again in July 2014. Given the developments of a socio-economic and political nature, the system of political negotiations was susceptible to environmental perturbations and nonlinear dynamics, which resulted in the system experiencing periods of stalemate complemented by unpredictability and uncertainty (Erçetin & Banerjee, 2015).

It appears that, although the Greek and Turkish Cypriot sides self-organized the system of negotiations through the establishment of negotiated chapters in 2008, nevertheless self-organization proved to be illusory, as the system of negotiations disintegrated at multiple levels between 2008 and 2014.

## **8.5 The fractal perspective on political negotiations in Cyprus**

The notion of fractals, from the perspective of chaos theory, refers to ‘an object whose parts resemble smaller copies of the whole, identified through closer examination’, such as ‘branching structure of blood vessels as an example’ (Litaker et al., 2006). The concept of fractals has been applied in the context of political negotiations. The findings from the data analysis (Chapter 5)

reveal that there are recursive self-similar patterns scalable across the island to embed in the system of political negotiations in Cyprus. The findings reveal patterns in the (1) psychological and mental fractal dimension; (2) the political fractal dimension; (3) the cyclical fractal dimension; and (4) the inconclusive fractal dimension that contribute the periodic stalling of the the system of political negotiations to stall periodically.

### **8.5.1 Psychological and mental fractal dimension**

The psychological and mental fractal dimension encompasses recursive patterns of:

- blame
- demonization
- them versus us mentality
- mistrust and distrust
- fears, pain and anxiety
- behaviour and thinking mindset.

which have been reinforced across multiple scales on the island. These patterns have penetrated the system of political negotiations in Cyprus.

According to Mandelbrot's fractal theory, fractals are similar at all spatial scales and continuously repeated self-similarity produces fractal objects (Mandelbrot, 1983; Yackinous, 2015). Hence, scalability is derived from the fractal geometry (Mandelbrot, 1983). The example of a cauliflower (Andriani & McKelvey) explains that if one were to 'cut off a floret, cut a smaller floret from the first floret, then a cut piece off the second, and so on' the result would be that the 'subcomponent of the floret is smaller than the former' (Andriani & McKelvey, 2009, p.1054), but essentially the same shape. Andriani and McKelvey (2009) note that the scalability of fractals in terms of appearance, shape and behaviour of each (subsequent) subcomponent is about the same (Andriani & McKelvey, 2009).

It should be noted that fractals are signified by power laws and frequency of distributions (Andriani & McKelvey, 2009). Given self-similarity and scalability, it is therefore possible to say that complex systems tend to be self-similar across different levels (West et al., cited in Andriani & McKelvey, 2009). 'The same dynamics drive order-creation behaviours at multiple levels (West et

al., cited in Andriani & McKelvey, 2009). The same dynamic is called *scaling laws* because the dynamic appears similar 'at many orders of magnitude (Zipf, cited in Andriani & McKelvey, 2009).

The scalability and scaling laws appear to also exist in the system of political negotiations in Cyprus. That is, the recursive patterns embedded in the system of negotiations are cross scalable across the island. The very same concept appears in the patterns of the system of political negotiations in Cyprus. The psychological fractal dimension encompasses the patterns of *blame, demonization, them versus us mentality, mistrust and distrust, fears, pain and anxiety, behaviour and thinking mindset* found in the system of political negotiations are a replica of a larger whole which is embedded in the psyche of the Greek and Turkish Cypriot communities on both sides of the island.

The recursive patterns found in the system of negotiations appear multiple times across and throughout Cyprus penetrating the system of negotiations in scalable and plural terms. Similar to the Koch curve (Chapter 3) and the Sierpinski gasket (Chapter 3), the recursive psychological dimension across the island resembles fractals (Andriani & McKelvey, 2009), which indicates permeability (Marks-Tarlow, 2008) between various dimensions and systems of socio-economic, political, ethnic, cultural, geographical nature to reach the system of negotiations. Interestingly, a system self-similar across different levels reinforces the fact that the system of political negotiations in Cyprus is complex.

Coleman (2011) infers that complex conflicts are commonly associated with strong emotions of 'pain, misery, loss, loyalty, rage, frustration, fear, anxiety, and despair' (Coleman, 2011, p.21). The author notes that the element of emotions in complex conflicts is being marginalized (Coleman, 2011). Coleman emphasizes the idea that emotions should be the epicentre of understanding the force behind a conflict (Coleman, 2011). The findings reveal that the psychological dimension constitutes the major stumbling block in the system of negotiations in Cyprus, along the lines of Coleman's interpretation of oversimplified coherence (Coleman, 2011), which in the case of the Cypriot context sees the two sides behaving recursively in a mental pattern of us versus them. Thus the sense of oneness and togetherness mentality has been lost in the system of political negotiations. There is no sense of a unified Cyprus, just repeating and persistent notions of *blame*



and *demonization* and *a feeling of them vs us*, indicating a very linear perception of the world (Senge, 2006), along with a failure to accept responsibility (Meadows, 1999).

Perceptually, *blame* is something that is 'out there' and not 'in here' (Meadows, 1999, p.4), while *demonization* is portraying someone or something as bad or evil (Turk, 2009). Blame and demonization result in or reinforce mistrust, which is an underlying obstacle in the Cypriot negotiations (Michael, 2014), followed by uncertainty and anxiety (Bogais, 2016). The psychological factors of *mistrust* shape perceptions and behaviours (Vallacher et al., 2013) to influence political negotiations.

*Fear, pain, anxiety & behaviour and thinking mindset* within the psychological dimension contribute further to obstacles coinciding with misery, loss, loyalty, rage, frustration and despair (Coleman, 2011), all of which stem from the historical discourse of colonialism, oppression and injustice (Stroh, 2011) and reinforce anger and a sense of victimhood (Stroh, 2011). The manifestation of recursion of psychological patterns represents a fractal dimension when applied to relations on the island, and is the single greatest obstacle to the solution of intractable conflicts (Ben-Meir, 2013), Cyprus included.

Conflicting sides are doomed to psychological resistance (Ben-Meir, 2013), specifically to change that attempts to overthrow mental maps and fundamental worldviews. The psychology of the two sides in a conflict impacts the system of negotiations and contributes to the polarization of the conflict (Ben-Meir, 2013). The psychological dimension prevents the sides to reach settlement (Ben-Meir, 2013). Marginalization of emotions as a strategy is unrealistic and has a negative impact on negotiations (Coleman, 2011). It was the marginalization of the psychological dimension at the political level of negotiations that stalled them periodically between the years 2008-2014.

### **8.5.2 The political fractal dimension**

The system of political negotiations exhibits *elections* and an *elitist formula to negotiations* as recursive patterns when considered in the light of the *political fractal dimension* (Chapter 5). The findings reveal that non-inclusion and non-participation of the civil society in political negotiations generated an elitist formula, which is line with the literature (UNSC, S/2011/498; Faustmann & Kaymak, 2008; Hadjipavlou, 2004; Jarraud et al., 2013; Lordos et al., 2008; Louise & Morgan, 2013). This *elitist formula to negotiations* led the system of negotiations on Cyprus to stall regularly between 2008 and 2014 (Chapter 5).

The fact that elections are held every few years on each side of the island has continually stalled the negotiation process, which is held in abeyance until the election outcome becomes known to the public. In 2005 Mehmet Ali Talat assumed the Turkish Cypriot Presidential office until 2010, followed by Derviş Eroğlu until 2015. The last election held in the Northern Cyprus was in 2015 with Mustafa Akinci winning the elections and becoming the President of the Republic of Northern Cyprus. The Greek Cypriot elections were held in 2008 with Demetris Christofias becoming the President of the Republic of Cyprus until 2013 when Nicos Anastasiades assumed the role.

With upcoming elections, the emergence of momentum creates prolongation of negotiations and at the same time anticipation as to the results of the election, as everyone awaits to see what a newly elected leader intends to bring to the negotiating table. This situation was noted as recursive in the Cypriot context, and more than often than not, the recursive cycle of elections created stalemate with nationalist rhetoric. Apart from Presidential elections on both sides of the island, there are Turkish elections which need to be taken into consideration, as well as local, European and national elections, all of which tend to stymie the system of negotiations (Chapter 5).

### **8.5.3 The cyclical fractal dimension**

The findings related to the *cyclical fractal dimension* mainly reveal that the sides have been negotiating for many years along the line of the same issues – Governance, Powersharing, Property, Territory, Settlers, Guarantees, Withdrawal of Arms. Often the issues discussed in the context of political negotiations were subject to Turkey's permissions or prohibitions. Difficulties were indicated by an interviewee who explained that:

*Powersharing which pertains the competence of the two communities, then we may have Turkey in or an international conference to discuss the other issues which touch upon the international policy as well.*

The findings also reveal that the pattern of accommodating Turkey when negotiating was inevitable.

### **8.5.4 Contradictory perceptions**

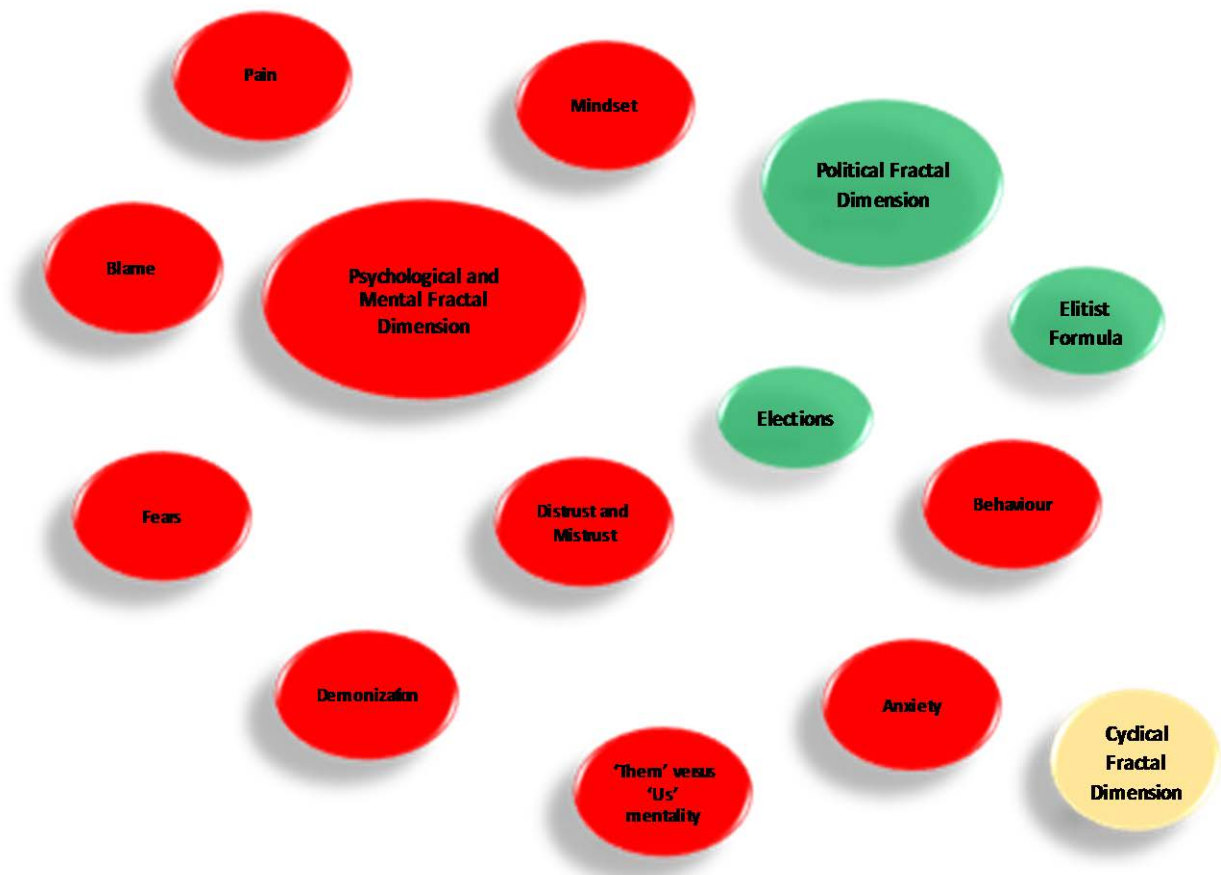
The results demonstrated no clear cut indication as to recursive patterns in the context of the negotiations. The interviews reveal that the dynamic on the island changed and continues to change and therefore strategies and the approaches adopted by the sides into negotiations change

accordingly. The interviews revealed that both the context and the negotiations were dynamic in Cyprus and changed persistently, while strategies used by both sides evolved accordingly. Interviewees perceived the negotiations as becoming more sophisticated, although never reaching an outcome.

Supplementary to reductionist, linear and sequential approaches, the system of political negotiations exhibited fractal dimensions on multiple levels expressed in the form of *psychological and mental fractal dimensions*, *political fractal dimension* and *cyclical fractal dimension* to penetrate the system of negotiations between the years 2008-2014.

### **8.5.5 Multiple fractal dimensions**

According to Mandelbrot, fractals are self-similar and recursive on all scales, to that end patterns identified in the system of political negotiations are multidimensional reflections of self-similar dynamics found on the island across communities, issues, problems and etc. Mandelbrot describes that self-similar configuration observed from varying distances generate imitations, but not duplicates, of themselves (Kenner, 1988). As an analogy to Mandelbrot's observation, one can make an assumptive observation in relation to recursive patterns in the system of political negotiations, which are self-similar and have been infinitely replicated and reproduced in the context of political negotiations. The interview participants/interviewees perceived patterns as self-similar recursive in the system of negotiations between the years 2008-2014. Since fractals are scalable by nature, hence patterns found in the system of negotiations possess fractal like properties which are self-similar and scalable across the island to penetrate the system of political negotiations. The interviewees' insights explicitly acknowledged that the recursive patterns of psychological/mental, political and cyclical nature constitute a stumbling block, hindrance, deadlock, gridlock and a fall back in the system of political negotiations.



**Figure 8.6** The diagram depicts the most prominent areas of fractal dimension. It is evident that the psychological fractal dimension, represented in red colour, is the strongest and the most explicit dimension followed by a political fractal dimension represented in green and further followed by cyclical fractal dimension represented in yellow (Source: B. Rapaport)

It is important to note that the system of political negotiations displays an interplay between socio-economic and political chapters, while the common denominator could be an underlying psychological and mental fractal dimension manifested in the form of repetitive patterns encompassing fractal properties. The fractal properties embedded in the system of political negotiations are of a psychological nature and therefore could be considered an implicit dimension contributing to (periodical) stalemates in negotiations. The psychological, fractal dimension is one of the core factors contributing to the stalemate in the system of political negotiations.

The findings of this section offer a significant contribution to understanding the political negotiations in Cyprus, as well as to the field of fractal theory in complexity research. The key

findings explain the formation of recursive patterns and their penetration into the system of political negotiations. The findings shed light on the system of political negotiations and provide a different perspective and explanation of how to view the system of negotiations and look for causes which may hinder and eventually lead the sides to periodical stalemate.

Understanding the notion of fractals in the context of the system of political negotiations may provide the Greek and Turkish Cypriot sides with a much richer picture and tool which may assist the sides to look at the problem from a different perspective wearing a fractal lens. The different perspective may not be immediately apparent. Therefore, inclusion of a fractal lens on an ongoing basis may provide the Greek and Turkish Cypriot sides with a tool which could assist the Greek and Turkish Cypriot sides to understand underlying layers of political negotiations in an innovative and holistic way.

## **8.6 Attractors in the system of political negotiations**

The negotiations in Cyprus are often in the state of an impermanence supplemented by the deep seated intractability and entrenched positions of the Greek and Turkish Cypriot sides. The impermanence is characterized by complex and chaotic behavioural patterns of systems in socio-economic and political affairs, while behavioural interactions between the political actors and the society collectively and separately on both sides of the island form multidimensional complex structure. This thus implies that the negotiated chapters in reality are fraught with multidimensional interactions.

### **8.6.1 The effects of attractors**

For instance, despite the fact that the Greek and Turkish Cypriot leadership committed themselves to full-fledged negotiations in September 2008, which can be seen as an emergent paradigm of self-organization (Alberts & Czerwinski, 1997), the signs of stalemate soon emerged (in the same year) due to fundamental disagreements about whether to adopt or not adopt the provisions of the Annan Plan, influenced also by upcoming elections in the North. This accords with Helbing and Lämmer (2008) who noted that minor changes to the trajectory of a chaotic system will result in unpredictability (Helbing & Lämmer, in Helbing (Ed.), 2008).

The patterns of behaviour of the Greek and Turkish Cypriot sides in these years are pertinent to the concept of an attractor which is the epicenter for 'cognition, affect and behaviour' (Vallacher et al.,

2013, p.14). The attempted revival of political negotiations in 2008 can be seen as perturbation of the trajectory of the system (Vallacher et al., 2010) intended to move the system of negotiations from a state of stalemate into a state of motion. Despite the emergent perturbation, the behaviour of the system of negotiations converged (Vallacher et al., 2010) yet again (and was attracted back) into stalemate in 2010.

Following the election of the TRNC leader Eroğlu in April 2010, the sides were keen to continue negotiations. However, non-progress resurfaced in 2010 as Eroğlu protested that the Greek Cypriots were treating the Turkish Cypriots' negotiating positions with disrespect. On the other hand, the Greek Cypriot side was concerned with Turkish regional turmoil. Reluctance to move forward saw little progress in 2011, and a meeting of the sides in the Greentree2 estate in New York yielded further frustration between the sides as they could not overcome challenges related to property, security, territory, mainland Turks and citizenship (Morelli, 2014).

By the end of the 2012 the system of negotiations was stalled once again. The view of Coleman (2010) in relation to the concept of attractors explains that the attractor 'refers to the states or patterns of change to which a system's behaviour converges over time' (Coleman, 2010, pp.264-265). The attractor in the system of political negotiations about Cyprus appears historically to be stalemate. Between the years 2008-2014, the system of negotiations proved resistant to any kind of perturbation, even though the perturbations (i.e. UN efforts) might have moved the system of negotiations into a different, perhaps more productive, state. The patterns of behaviour of the system of negotiations repeatedly converged to reach a state similar to that in which the side found themselves perpetually – stalemate – which continued between the years 2012 and 2014.

Interestingly, in psychological and social systems, attractors are seen as restrictions of the mental states of an individual or group (Vallacher et al., 2010). The Greek and Turkish Cypriot sides reached a collective state of mind predominantly driven by recursive psychological patterns (outlined in Chapter 4) which resists any new inputs out of fear of destabilization of the current state of mind (Vallacher et al., 2010), even though stasis might be detrimental to both sides. Analysis of the data collected during the research, therefore, strongly indicates that, even as the negotiations vacillate between happening and not happening (state of motionless), the sides equally resist change and the system of negotiations returns to its initial state of stalemate.

With the election of the Greek Cypriot President Nicos Anastasiades in 2013, the sides exhibited interest in resuming negotiations. However, the Turkish Cypriot leader Eroğlu emphasized ‘two states’, ‘new dynamics’ and ‘new negotiating tables’ (Morelli, 2014, p.10), while the Greek Cypriot leader Anastasiades resisted establishing timetables (Morelli, 2014). When the banking and financial crisis hit the South of the island in 2013, Anastasiades put his efforts into dealing with it. In late 2013 and early 2014 the sides focused on negotiating a joint declaration (Chapter 3, Part II).

Even though the agreement on the joint declaration in 2014 provided a new momentum for negotiations, the sides achieved no progress. Each blamed the other for non-ability to agree on the Convergencies of 2008-2012 from the previous round of negotiations. Negotiations stalled in September 2014 and were halted until the conclusion of the 2015 elections in the north of the island.

Vallacher et al (2010) explain the phenomena of an attractor through pendulum swings (Chapter 3). By analogy, it can be assumed that the system of political negotiations is a pendulum. Any disturbances to the system of negotiations will create trajectories which will eventually lead them to converge on a particular single state. Therefore, any disturbances to the swings of the system of political negotiations may have only a limited effect (Coleman, 2010). Given the fact that a system of political negotiations is complex, therefore, there are multidimensional interactions and interconnectivities of elements, systems and subsystems influencing each other, leading to multiple attractors creating patterns and states (Coleman, 2010). However, in psychological terms, once individual thoughts reach a collective mental state, then the collective system of thought is likely to resist subsequent inputs out of fear of destabilizing its current collective state (Coleman, 2010).

### **8.6.2 Civil society’s input**

The state of the system of political negotiations in Cyprus can be compared to the narrow attractor basin B (Chapter 3). This is a strong attractor, and, as is typical of intractable conflicts like Cyprus, is poorly configured to absorb a range of ideas or events (Coleman, 2010). Input from civil society on Cyprus would be wholly inconsistent with the Cypriot experience to date and would be a perturbation to the system of negotiations. Therefore, although the participation of civil society might appear a good idea or even a success initially, since the negotiations are analogous to attractor basin B, the system is more likely to eventually enter into an unstable regime.

Although the perturbation (of civil society input) might drive the system away from its stationary state (Helbing, 2008), a deviation from the existing status quo would only result in a transitional state that might momentarily positively influence the entrenched positions or divergent perceptions of the Greek and Turkish Cypriot sides. Ultimately, however, input from the civil society, as a new contribution, could be regarded as an intrusion and finally rejected (Guastello & Liebovitch, in Guastello, Koopmans, & Pincus (Eds.), 2011), given the strength of the dynamics in attractor basin B.

The 2014 joint declaration signed by the Greek and Turkish Cypriots provided momentum for the resumption of fully-fledged negotiations after a period of stalemate. Like the input from civil society, the joint declaration can be seen as an idea or event introduced into the system of political negotiations which initially sparked success. Very soon, however, the opposing sides were attracted back to the attractor basin and their initial state of entrenched positions and disagreements. It should be noted that attractors are oscillatory, and systems affected by them generally oscillate between their stationary state and transition (Helbing, 2008).

To transform the system of negotiations regarding Cyprus may require cognitive and social mechanisms through which positive information can be introduced to the system and stimulate permanent change (Coleman, 2010). That is, while some positive overture to the conflicting sides in Cyprus might initially spark a period of non-productivity between the sides, with time the Greek and Turkish Cypriots might reframe the negotiations if the evidence of positive outcomes were supported (Coleman, 2010).

The system of political negotiation in Cyprus is complex and characterized by high levels of uncertainty and unpredictability and therefore any perturbation, whether internal or external, may put the system into a state of chaos (Cilliers, 1998). While chaotic systems are characterized by 'strange attractors' (Helbing, 2008, p.2), any minor changes to the trajectory in such a system will lead the system behaving unpredictably (Helbing, 2008).

Therefore, the Greek and Turkish Cypriots should aim to balance the system of political negotiations in order to reach a state which would be somewhere between chaos and rigidity (Cilliers, 1998). If the system of negotiation in Cyprus persists in an extreme state – either chaotic or frozen (Cilliers, 1998) – nothing will ever be achieved for the island. Accordingly, in order to



change system's behaviour and trajectory, the application of strong perturbation to the system of negotiations is required.

A strongly perturbed system may react to leverage points introduced by the sides in a sluggish manner initially. However, it will eventually reach a critical point at which various states of subsystems (negotiating chapters) of the negotiation system will be optimized at the same time. If the system exceeds a critical point, chaos will result. Therefore, careful management is required. The self-organization in this case would be at the core, where 'the resources of a self-organizing system should be neither over-extended, nor under extended' as noted previously (Cilliers, p.98, 1998).

Unfortunately, 'catastrophe theory' (Helbing, 2008, p.4) states that, although negotiations might be shifted from its initial stationary state to the subsequent state, there is the possibility that the system of negotiations might be attracted back to its initial state. This could be due to continuous recursive psychological patterns forming a psychological dimension (in the form of fractal patterns) of the sides. Hence, the system of political negotiations may not necessarily adapt to the incoming information from the leverage points.

Another factor is the fact that the nature of the system of political negotiations is complex, nonlinear and dynamical, moreover uncertain and unpredictable. The psychological patterns embedded in the system of negotiations are a reflection of the reality of Cyprus. Therefore any perturbations made to the system of negotiations with an intention of changing the trajectory of the system for the purpose of reaching fluidity in the negotiations, may be met with resistance and maladaptive behaviour as the conflicting sides shift back to the unperturbed, although a different state.

The concept of attractors could shape the behaviour of the system of political negotiations as a whole. Given the current attractors of the system, its behavior is difficult to understand or predict, as different negotiated chapters (systems) respond to certain attractors differently. With the emergence a lot of new elements within the system as a whole, such as presidential elections, financial and fiscal crises, new ideas, and new policies around which individual elements of the

system organize themselves, the overall dynamics of the system become more complex, difficult to understand and could lead to periodical stalemates.

The Greek and Turkish Cypriot sides to aim for self-organization which can be in the form of multidimensional leverage points.

### **8.7 Leverage and adaptability in the system of political negotiations**

The exploration and introduction of selected leverage points into the system of political negotiations would be designed to move the periodically stalemated negotiations from a state of stalemate into a state of motion and fluidity.

The exploration and introduction of leverage points into the system of political negotiations would be at the level of (*mindset*) *paradigms* and *transcending paradigms* (Meadows, 1997) in an attempt to rewire and synchronize the augmented perceptions of the Greek and Turkish Cypriot sides, but might be faced with the adaptability or non-adaptability of the sides.

The Greek and Turkish Cypriot sides are the agents of a complex system of political negotiations, as per Holland's (2002) assertion, and interact in a nonlinear fashion (Holland, 2002, p.25). Ideally, agents of a system are predisposed to adapting, learning and modifying their rules and actions (p.25), which has not been the case with the Greek and Turkish Cypriot negotiators. However, if they were to introduce leverage points themselves into the system of negotiations, there may be substantial effects on the overall behaviour of the system of negotiations due to the sides' self-organization and emergence.

Were the Greek and Turkish Cypriot sides to self-organize and emerge with new forms of mental states and (cognitive) thinking, i.e., new leverage points, the system's behavior might change, although it must be acknowledged that leverage may still fail due to inability of the Greek and Turkish Cypriot sides to exhibit adaptation to leverage and due to the deeply entrenched positions of the sides stemming from contradictory psychological paradigms.

For the system of political negotiations to adopt leverage points, the system needs to exhibit the properties of a **complex adaptive system**, i.e., self-awareness, flexibility and perception of the system of negotiations through the prism of complexity (Allen et al., 2011). The thesis findings, however, reveal that the system of political negotiations exhibits to some extent a marked rigidity

and inflexibility characteristic of a closed system. *However, for the system to succeed in adaptation, it needs to match the complexity of the environment (Ashby, 1960).* Aiming for a shared vision by the Greek and Turkish Cypriot sides in the system of negotiations, would also mean that the sides would equally aim for learning and having a common goal for the future, which would encourage adaptation (Senge, 2006).

Given the fact that the system of political negotiations self-organized itself through principles of ‘talks by Cypriots for Cypriots’ and ‘Cypriot led, Cypriot owned’ negotiations (Faustmann & Kaymak, 2008; Michael, 2011), they should look for new forms of leverage to emerge by listening to the system (Meadows, 1999). The key is to be flexible and self-aware at all times (Maguire et al., 2011), and accept that if the system is on the edge between chaos and disorder, then creativity and adaptation may take place (Litaker et al., 2006). In these ways the system of political negotiations could transform from a **complex system** into a **complex adaptive system** of political negotiation.

The next chapter concludes the thesis.

## Conclusions

The chapter begins with a discussion of the rationale for the research, which is followed by a synthesis of the results, discussion and findings to research questions 1, 2 and 3. The contribution to complexity theory, political negotiations and practical application by practitioners is discussed. This is followed by identifying the limitations of the thesis, and a discussion of future direction for the research.

### 9.1 Rationale for the thesis

#### 9.1.1 The mes and questions

The objective of the research was to answer the following broad thematic questions:

- *How selected aspects of complexity theory could be applied into the context of political negotiations of the intractable conflict in Cyprus, aiming to understand the nature of the stalemate?*
- *How can aspects of complexity theory could improve and advance the domain of political negotiations in Cyprus?*

From the broad thematic questions, the following specific research questions were drawn:

- *To what extent have elements of reductionism, linearity, and a sequential approach in the system of Cypriot political negotiations between the years 2008-2014, either completely or partially contributed to periodic stalemate/s?*
- *To what extent did the conflicting sides adopt recursive approaches to political negotiation system in Cyprus, resulting in similar courses of action which contributed to periodic stalemate/s in the negotiations?*
- *To what extent 'leverage points' can assist the Greek and Turkish Cypriot sides to move a periodically stalemated system of political negotiations in Cyprus from the state of stalemate into a state of motion?*

The research questions were examined in relation to the system of political negotiations, the case study of Cyprus (2008-2014).

### **9.1.2 A gap in the literature**

The research was based on a multidisciplinary literature review of concepts of complexity theory, which formed the conceptual framework for the research. The rationale for the study (Chapter 1) indicated the need to address reductionism, linearity and a sequential approach to negotiations. The all or nothing approach adopted during negotiations was counterproductive to the development of a positive feedback process, which is a core aspect of complex systems. Success in reaching agreement involving at least one goal would have given confidence to both the Greek and Turkish Cypriot sides, that success was possible.

The need for the research was justified by a comprehensive multidisciplinary literature review conducted by the researcher when a gap was identified. No research was reported in the literature to indicate that concepts of reductionism, linearity and a sequential manner to negotiations had ever been investigated in the context of the Cypriot political negotiations or any other negotiations. It was felt, therefore, that an investigation and exploration of complexity theory in the context of negotiations in Cyprus would contribute to the body of knowledge in the use of complexity theory in the social sciences.

## **9.2 Synthesis of findings for the research questions and overall conclusions**

The history of Cyprus is complex and multifaceted with critical events and turning points in the historical time-space dimensions of the 19<sup>th</sup>, 20<sup>th</sup> and 21<sup>st</sup> century (Hakki, 2007; Michael, 2009; Morgan, 2010; Papadakis et al., 2006; Vassiliou, 2010). The historical account of the Cypriot conflict has been studied for decades and analyzed from different viewpoints, and prior to the Turkish unilateral intervention in 1974 Cypriot history already contained socio-economic and political events which had emerged organically and contributed to the actions and motivations evident in 1974. The long and complicated history of Cyprus resulted in a de-facto division of the island, the consequences of which implied divisiveness between the Greek and Turkish Cypriot communities have continuously influenced the system of political negotiations.

The researcher observed periods of stalemate through a comprehensive literature review and also through her own experience of conducting research in Cyprus in 2013 and 2014. The periodic stalemates increased the researcher's curiosity of the phenomena of political negotiations and led to the questions for the research that is reported in this thesis.

### 9.2.1 Findings for the research questions

The findings related to the research questions can be summarized as follows:

**RQ1** *To what extent have elements of reductionism, linearity, and a sequential approach in the system of Cypriot political negotiations between the years 2008-2014, either completely or partially contributed to periodic stalemate/s?*

The findings for research question 1 (RQ1) reveal explicitly elements of reductionism, linearity and a sequential manner embedded in the system of negotiations, all of which partially contributed to the stalling of the negotiations periodically between the years 2008 and 2014.

Complexity theory opposes reductionism and linearity, arguing that the whole cannot be understood by reducing it into constituent parts. Reductionism, linearity and a sequential approach to negotiations resulted in periodic stalemates that may further exacerbate reductionism, contributing to the static nature of the system of political negotiations in Cyprus, further inhibiting the necessary dynamism and fluidity required to deal effectively with the multiple and dynamic interacting elements of the system.

**RQ2** *To what extent did the conflicting sides adopt recursive approaches to political negotiation system in Cyprus, resulting in similar courses of action which contributed to periodic stalemate/s in political negotiations?*

The recursive patterns embedded in the system of negotiations had persistently reappeared since the inception of negotiations in 1968. The initial context of the Greek and Turkish Cypriot negotiations maintained a historically disparate worldview and encouraged recursive patterns. The findings for research question 2 (RQ2) reveal that self-similarity, recursion and scalability of patterns across Cyprus are embedded in the system of political negotiations (Chapter 6).

Analysis of the data also revealed a strong psychological fractal dimension (Chapter 5) exists on both sides in the conflict that encourages *blame, demonization, 'them' versus 'us' mentality, distrust/mistrust, fears, pain, anxiety, behaviour and the thinking mindset*. This psychology influenced the approach that negotiators undertook during negotiations, and was a major obstacle to the sides reaching any meaningful settlement. Given that participants in the negotiations are unconsciously, uncritically, and strongly inclined to distrust and blame one another, the talks perpetually stalled due to each side's anxiety and fear of being treated unequally.

Viewed analytically, the history of negotiations demonstrates that *political elections* and an *elitist formula to negotiations* are responsible for a recursive pattern in the political (fractal) dimension. The non-inclusion of the civil society's input into the negotiations has contributed to the creation of an elitist formula and led negotiations to entrenched negative behaviours and attitudes, and gridlock. The fact that political elections are held every few years on each side of the island has produced stalemate as the sides delay negotiations until the election outcome is known to the public. As emphasized by the interviewees, this cycle and rhetoric is repeated and reinforced nationalist aspirations.

The cyclical (fractal) dimension reveals that the sides have been negotiating over extended periods over the same issues, such as Governance, Powersharing, Property, Territory, Settlers, Guarantees, Withdrawal of Arms (Chapter 5).

However, the self-similar, scalable and recursive patterns within the scope of the psychological, political and cyclical fractal dimensions identified in the system of political negotiations are multidimensional reflections of self-similar dynamics found on the island across the Greek and Turkish Cypriot communities. The fractal properties embedded in the system of political negotiations are predominantly of a psychological nature, and therefore could be considered to be an underlying dimension contributing to periodical stalemates of the negotiations. The psychological (i.e., mental) fractal dimension is one of the core (strongest) factors contributing to the stalemate of political negotiations. The findings for research questions 1 (RQ1) and 2 (RQ2) contribute to explaining the broad thematic question related to the nature of the persistent lack of permanent progress in negotiating a settlement.

The findings of RQ2 (Chapter 5) in relation to the psychological dimension align with Meadows's (1997) theoretical perspective highlighting the *mindset paradigm*. Therefore the findings of RQ2 have been synthesized with RQ3 in relation to leverage points (Chapter 5).

**RQ3** *To what extent 'leverage points' can assist the Greek and Turkish Cypriot sides to move a periodically stalemated system of political negotiations in Cyprus from the state of stalemate into a state of motion?*

The findings of RQ3 reveal five broad leverage paradigms from complexity systems theory in the system of political negotiations: *shared vision paradigm; engagement, future partnership and*

*empowerment paradigm; the cultural and multicultural paradigm; courageous leadership paradigm; education paradigm.* The identification of the broad paradigms led to the identification of particular leverage points (Chapter 5). Supplementary interpretations to the findings of RQ3 point out to the importance of **adaptation**, namely the awareness that the system of political negotiations must move from being a complex system into a **complex adaptive system**. The research findings indicate that currently Cypriot negotiations exhibit the elements of a closed system with largely inflexible and closed boundaries and based on elitist formula. The leverage points identified during the research are peripheral to the system of negotiations.

Synthesizing the findings of the three research questions formed the basis for understanding how the elements of reductionism, linearity, and a sequential approach to political negotiations (RQ1), combined with self-similar recursive patterns (RQ2), has contributed to the stalling of the system of political negotiations, and therefore how leverage points (RQ3) may move a periodically stalemated system of negotiations into a state of motion while at the same time attempting to reconcile the entrenched, divergent worldviews of the Greek and Turkish Cypriots at the negotiating level. These observations contributed to the understanding of the two broad thematic questions (Chapter 1 and Chapter 5 at the beginning). Exploration of the system of political negotiations through complexity theory's lens offers new insights and perspectives on how to view political negotiations, and introduces supplementary interpretations to conventional theories and understanding of political negotiations.

### **9.2.2 Interpretations**

The system of political negotiations in Cyprus is complex. Therefore non-linearity, unpredictability and uncertainty are the key characteristics to the behaviour of the system of negotiations. Due to the domestic and regional dynamics within which the system of political negotiations is nested, the system remains in a constant state of disequilibrium. As a result, linear (cause-effect), deterministic approaches seeking a comprehensive settlement by attempting to negotiate a single, optimal solution only led to periodical stalemates in the negotiation process in the system where complexity persists.

A more feasible approach, as opposed to reductionism, would be to understand the system of political negotiations as a **dynamic adaptive complex system** with multiple connectivities



between the autonomous (independent) systems and subsystems (negotiated chapters) and other systems outside the system of negotiations (e.g. socio-economic, political, religious, cultural and so forth). Dynamicity and adaptability should be accepted as key features of the negotiations by both the Greek and Turkish Cypriot sides; the boundary of the negotiations (system) should exhibit openness and flexibility in order to accommodate the perspectives of the all concerned parties, including civil society, meaning that the negotiating chapters (systems/subsystems) will be recognized as connecting and interconnecting (Chapter 4).

The findings of the thesis therefore reveal that the structuring of the political negotiations in a reductionist, linear and sequential fashion, effectively ignoring the connectivity and interconnectivity between the negotiated six chapters, contributed to the periodic stalling of the political negotiations (Chapter 5). The inescapable interconnectivity between the chapters being negotiated means that attempts to negotiate that involve rigidity and inflexibility were doomed from the beginning. Furthermore, the strong, underlying psychological (fractal) dimension gave shape to the pattern of the negotiations, with already existing divergent paradigms contributing to the repeated disintegration of the negotiations.

To achieve fluidity and motion in the system of negotiations, there is a need to shift existing psychological dimensions through self-organization and emergence with the assistance of leverage points from which would emerge new forms of thinking. The introduced leverage points would be of a broader context and be seen on the boundary of the system of negotiations, where their introduction may evoke changes in the peripheral environment which could potentially lead to internal changes within the system of negotiations. It must be remembered, however, that the environment within which the complex system of negotiations is nested should be regarded as part of the larger system, which (and) should be viewed as a whole.

Normative patterns for dealing with the situation on Cyprus have not been established on the island, as they would be in a country where peace and a collaborative system historically exist. Instead, the Cypriot system functions on the edge of equilibrium and disorder, where normative patterns that include openness and collaboration have not been established. Therefore, in spite of existent dynamics and emergent properties on the island, the dynamics of negotiated chapters (systems) are far from equilibrium, suggesting that there could be a new phenomenon brought to

the system of negotiations through self-organization and emergence. Therefore, there is space for the Greek and Turkish Cypriot sides to improve and change the system of political negotiations by employing aspects of complexity theory and systems thinking (creativity and adaptation).

It appears to be that even though the Greek and Turkish Cypriot sides self-organized the system of negotiations through the establishment of chapters in 2008, the self-organization was only at face value as the negotiations continued to disintegrate on multiple levels post 2008.

### **9.3 Contribution to the body of knowledge and practice**

The exploration of aspects of complexity theory and adoption of a complexity lens will add value and a supplementary dimension by expanding the boundaries of existing theories relating to political negotiation by emphasizing that negotiations like those conducted to settle the dispute on Cyprus are complex. They consist of systems and subsystems which dynamically interact with each other creating connections and interconnections to form emerging properties, nesting in multidimensional reality. While it may be tempting to try to analyse such a system by examining the constituent parts individually before uniting them into an apparently analyzed whole, understanding requires viewing the system and all its parts holistically, without isolating any of the interconnected elements from the whole. The connectivity between the interacting systems and subsystems of the complex system of political negotiations should not be marginalized or ignored, even though it may seem that only one aspect is being negotiated or only one part of the whole is being analyzed. The notions of wholeness and connectivity, if embraced by the Greek and Turkish Cypriot sides in the system of negotiations, would provide a point of leverage to change the current system. Wholeness is at heart of complexity theory.

The results of the thesis advance the body of knowledge not only of the Cypriot negotiations, but also negotiations conducted in intractable conflicts more widely, and expand the current understanding of the applications of complexity theory. The research reported in this thesis explored reductionism, linearity, sequential approaches, self-similar recursive patterns and leverage points in the system of political negotiations in the context of an intractable conflict in Cyprus. The findings advance our understanding of the reasons for the periodic stalemates common in the system of political negotiations in Cyprus.

An examination of the negotiations in Cyprus provides a deeper understanding of complexity phenomena, contributing to the existing knowledge in the field of fractal theory by introducing qualitative interpretations of recursive approaches. The research advances theoretical and practical interpretations and contributes to the general understanding of leverage from a systems thinking point of view. It also advances our knowledge of how negotiating sides within a system of political negotiations (in this instance the Greek and Turkish Cypriots) could pursue novel ways of thinking that would promote more insightful and integrative approach to negotiations in an intractable conflict. A shift in the system could occur through leverage points, which may move a stalemated system of negotiations into motion and fluidity, and assist the negotiating sides to synchronize their divergent paradigms.

Moreover the complex adaptive system of negotiations would prompt to achieve integration of the system of negotiations in which the boundaries of the negotiated sides are respected and the individual qualities of the Greek and Turkish Cypriots are preserved. There would be no need to disturb the negotiated chapters; the need is to appreciate the interconnectivity of the elements of the negotiating system, generate a paradigm shift through leverage in order to generate fluidity in the system and prevent stalemate. The current study can be perceived as an innovation and the prototype for political negotiations in intractable conflicts.

#### **9.4 Contribution to theory**

In summary, the research makes three major contributions to the field of negotiations. Firstly, it advances the knowledge of complexity theory in the context of political negotiations, using the case study of the intractable conflict in Cyprus. Secondly, knowledge related to complexity theory and negotiation in the context of political negotiations in intractable conflicts will be available to practitioners and academics worldwide. The third contribution of the thesis is to build the knowledge from the research into the context of bilateral and multilateral negotiations worldwide (such as, political and economic nature, economic trade negotiations, negotiating with terrorist factions, humanitarian negotiations).

#### **9.5 Limitations of the research**

The academic framework of the thesis has not allowed the researcher to fully explore all aspects of leverage points, as the researcher was also obliged to comply with the strictures of an academic

framework, which limited the length of the thesis and the depth to which some points could be investigated. There are several interesting aspects of negotiation and complexity theory which have not been explored, but reserved for future research.

## **9.6 Directions for future research**

The current study offers a number of avenues for future research.

Given the fact that the current research was qualitative, it naturally offers a future direction for potential mixed (semi) qualitative and quantitative research in the field of political negotiations in Cyprus. Quantification of negotiated chapters, levels of connectivity and strength of the connectivities and interconnectivities between the negotiated chapters within the system of political negotiations could further supplement existing insights into Cypriot negotiations and generally enrich negotiation (complexity) theory and practice. Furthermore, the research offers an additional avenue for the quantification of variables in the psychological fractal dimension, as well as quantification of multidimensional reflections in the psychological, political and cyclical fractal dimensions.

Future research could also utilize the concepts and findings of study and extend them to the field of negotiations by translating these into the contexts of other political negotiations of intractable conflicts across the world. Moreover, this research study provides a solid and useful framework for future studies to investigate bilateral and multilateral negotiations, trade negotiations, or negotiations focused on disarmament and security worldwide. A variety of aspects of complexity could be further explored in these contexts.

The continuous development of leverage points in the system of negotiations may advance understanding and reconcile both sides' entrenched positions and bridge their divergent worldviews for the purpose of changing the system of negotiations in order to reach comprehensive settlement. The researcher believes that the knowledge gained from the research, by exploring and adopting aspects of complexity theory, may offer the Greek and Turkish Cypriot sides at the negotiation level a means by which to advance their current understanding and adopt novel perspectives which may assist the sides to reach a full and comprehensive settlement, which would benefit the whole population of Cyprus.

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## Appendices

Appendix A:	Participant Information Sheet	2
Appendix B:	Ethics Approval 1	5
Appendix C:	Ethics Approval 2	8
Appendix D:	Contacts for Information on Project and Independent Complaints Procedure	10
Appendix E:	Interview Questions	13
Appendix F:	The Cyprus conflict and political negotiations Chapter 3, Part 1 (in full)	15
	3.1 <i>Geographic location and strategic significance</i>	17
	3.2 <i>Cyprus as a contested island (the period 1828-1959)</i>	18
	3.3 <i>Emergence of nationalism</i>	20
	3.4 <i>Separation of ethnic groups to solve complex problems</i>	23
	3.5 <i>End of British Colonial Rule</i>	26
	3.6 <i>Attempting to solve the intractable conflict of Cyprus</i>	27
	3.7 <i>The Annan Plan</i>	41
	3.8 <i>Regional and international dimension of the Cyprus problem</i>	48
	3.9 <i>Summary</i>	51

## **Appendix A**

### **Participant Information Sheet**



**The exploration of complexity theory, including systems thinking and system dynamics, to address complex international negotiation processes and conflicts between traditionally warring States**

## ***Participant Information Sheet***

### **RESEARCH PROJECT CARRIED OUT BY:**

The University of Adelaide, Australia

### **INFORMATION FOR PROJECT PARTICIPANTS**

I wish to recognize and validate complexity theory as a new agenda for solving complex international conflicts in inflicted regions across the globe and at the same time facilitate political leaders and key decision makers during negotiations, from the standpoint of achieving a more sustainable outcome.

### **HOW WILL THIS PROJECT WORK?**

In order to gain insight into how complexity theory may create value for complex international negotiation processes, I am observing and interviewing various key stakeholders as well as those who are directly or indirectly involved in conflict resolution and negotiations.

In addition to my observations, I would also like to have about an hour of your time to interview you. The interview will be conducted at your workplace. I would like to ask you some questions about complexities, obstacles and problems you are experiencing during negotiations and how do you think it can be improved. I would like to audio-record or take notes during the interview. Interview recordings and transcripts will only be available to the research team.

### **CONFIDENTIALITY OF DATA WILL BE RESPECTED**

The researcher will take every care to remove any identifying material from responses as early as possible. Likewise the data will be used for academic papers and conference presentations and individuals' responses will be kept confidential by the researcher and not be identified. The data will be retained for five years within the Entrepreneurship, Commercialisation and Innovation Centre (ECIC), University of Adelaide. We are more than happy to discuss any specific requirement you have regarding this matter.

### **How will this information be used?**

The researchers will also use the data for academic papers and conference presentations.

### **Will your name become public?**

We would like to ask for your permission to use your organisation's name in reports and publications arising from this research. However, unless specifically requested, quotes taken from interviews provided will remain anonymous and will not be attributed to any specific organisation.

### **IF YOU WISH TO TAKE PART IN THIS PROJECT**

Your participation in this project is voluntary, and you are free to withdraw at any stage without affecting your status now or in the future. There is no risk to you in being involved in this project. On the other hand, your participation will be critical to the study to improve conflict resolution methodologies and negotiation processes.

Please contact the research team if you have any questions.

This project has ethics approval from the University of Adelaide. Please see the attached independent complaints form if you have any concerns regarding the ethics of this research, or would like to speak to someone independent of the project.

Yours sincerely,

Dr. Barry Elsey, Senior Lecturer/PhD advisor, University of Adelaide  
Barbara Rapaport, University of Adelaide  
Researchers

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## **Appendix B**

### **Ethics Approval 1**



RESEARCH BRANCH  
OFFICE OF RESEARCH ETHICS, COMPLIANCE AND  
INTEGRITY

SABINE SCHREIBER  
SECRETARY  
HUMAN RESEARCH ETHICS COMMITTEE  
THE UNIVERSITY OF ADELAIDE  
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CRICOS Provider Number 00123M

21 March 2013

Dr B Elsey  
ECIC

Dear Dr Elsey

**PROJECT NO: H-2013-031**

***The exploration of complexity theory, including systems thinking and system dynamics, to address complex international processes and conflicts between traditionally warring States***

I write to advise you that on behalf of the Human Research Ethics Committee I have approved the above project. Please refer to the enclosed endorsement sheet for further details and conditions that may be applicable to this approval. Ethics approval is granted for a period of three years subject to satisfactory annual progress reporting. Ethics approval may be extended subject to submission of a satisfactory ethics renewal report prior to expiry.

**The ethics expiry date for this project is: 31 March 2016**

Where possible, participants taking part in the study should be given a copy of the Information Sheet and the signed Consent Form to retain.

Please note that any changes to the project which might affect its continued ethical acceptability will invalidate the project's approval. In such cases an amended protocol must be submitted to the Committee for further approval. It is a condition of approval that you immediately report anything which might warrant review of ethical approval including (a) serious or unexpected adverse effects on participants (b) proposed changes in the protocol; and (c) unforeseen events that might affect continued ethical acceptability of the project. It is also a condition of approval that you inform the Committee, giving reasons, if the project is discontinued before the expected date of completion.

A reporting form for the annual progress report, project completion and ethics renewal report is available from the website at <http://www.adelaide.edu.au/ethics/human/guidelines/reporting/>

Yours sincerely

**Dr John Semmler**  
Convenor  
**Human Research Ethics Committee**



RESEARCH BRANCH  
OFFICE OF RESEARCH ETHICS, COMPLIANCE AND  
INTEGRITY

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email: sabine.schreiber@adelaide.edu.au  
CRICOS Provider Number 00123M

Applicant: Dr B Elsey

School: ECIC

Project Title: *The exploration of complexity theory, including systems thinking and system dynamics, to address complex international processes and conflicts between traditionally warring States*

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THE UNIVERSITY OF ADELAIDE HUMAN RESEARCH ETHICS COMMITTEE

**Project No:**

**H-2013-031**

RM No: 0000016162

APPROVED for the period until: **31 March 2016**

It is noted that this study will involve Barbara Rapaport PhD candidate,

Refer also to the accompanying letter setting out requirements applying to approval.

Dr John Semmler  
Convenor  
Human Research Ethics Committee

Date: 21.3.13

## **Appendix C**

### **Ethics Approval 2**





RESEARCH BRANCH  
OFFICE OF RESEARCH ETHICS, COMPLIANCE  
AND INTEGRITY  
THE UNIVERSITY OF ADELAIDE

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CRICOS Provider Number 03123M

10 August 2016

Dr B Elsey  
ECIC

Dear Dr Elsey

**ETHICS APPROVAL No:** H-2013-031

**PROJECT TITLE:** The exploration of complexity theory, including systems thinking and system dynamics, to address complex international processes and conflicts between traditionally warring States

Thank you for the Annual Report on the Project Status submitted on 30 March 2016 by PhD candidate Barbara Rapaport. It is noted that data collection for the project has been completed and the final writing up stage of the project is continuing. The change to the title of the project was also noted.

An extension request to cover the writing up stage has been reviewed by the Office of Research Ethics, Compliance and Integrity and is deemed to meet the requirements of the *National Statement on Ethical Conduct in Human Research (2007)* involving no more than low risk for research participants.

The ethics expiry date for this project is: **31 March 2019**.

Ethics approval is granted for three years and is subject to satisfactory annual reporting. The form titled *Annual Report on Project Status* is to be used when reporting annual progress and project completion and can be downloaded at <http://www.adelaide.edu.au/ethics/human/guidelines/reporting>. Prior to expiry, ethics approval may be extended for a further period.

Participants in the study are to be given a copy of the Information Sheet and the signed Consent Form to retain. It is also a condition of approval that you **immediately report** anything which might warrant review of ethical approval including:

- serious or unexpected adverse effects on participants,
- previously unforeseen events which might affect continued ethical acceptability of the project,
- proposed changes to the protocol; and
- the project is discontinued before the expected date of completion.

Yours sincerely

**Sabine Schreiber**  
Secretary, Human Research Ethics Committee  
Office of Research Ethics, Compliance and Integrity

## **Appendix D**

### **Contacts for Information on Project and Independent Complaints Procedure**

**The University of Adelaide**

**Human Research Ethics Committee (HREC)**

*This document is for people who are participants in a research project.*

**CONTACTS FOR INFORMATION ON PROJECT AND INDEPENDENT COMPLAINTS  
PROCEDURE**

The following study has been reviewed and approved by the University of Adelaide Human Research Ethics Committee:

<b>Project Title:</b>	<b>The exploration of complexity theory, including systems thinking and system dynamics, to address complex international negotiation processes and conflicts between traditionally warring States</b>
<b>Approval Number:</b>	<b>H-XXX-XXXX. This number is given once the project has been approved.</b>

The Human Research Ethics Committee monitors all the research projects which it has approved. The committee considers it important that people participating in approved projects have an independent and confidential reporting mechanism which they can use if they have any worries or complaints about that research.

This research project will be conducted according to the NHMRC National Statement on Ethical Conduct in Human Research (see

<http://www.nhmrc.gov.au/publications/synopses/e72syn.htm>)

1. If you have questions or problems associated with the practical aspects of your participation in the project, or wish to raise a concern or complaint about the project, then you should consult the project co-ordinator:

<b>Name:</b>	<b>Dr Barry Elsey</b>
<b>Phone:</b>	<b>(+61) 83037422</b>

2. If you wish to discuss with an independent person matters related to:

- making a complaint, or
- raising concerns on the conduct of the project, or
- the University policy on research involving human participants, or
- your rights as a participant,

contact the Human Research Ethics Committee's Secretariat on phone (08) 8313 6028 or by email to [hrec@adelaide.edu.au](mailto:hrec@adelaide.edu.au)

## **Appendix E**

### **Interview Questions**

The researcher has undertaken the semi structured approach to interviews, these are the main interview questions. The spirit and the form of the meetings with the respondents to the research was closer to an informed conversation rather than a structured interview. What follows below are the thematic talking points that gave focus to these conversations. Altogether about 4 to 5 questions were asked for each of the various themes that comprise the substance of these conversations.

### **Interview Questions for Stage 1 Visit (2013)**

- 1) Background context of the Cyprus conflict
- 2) Political negotiations as a process and methodology and limitations
- 3) The role of the UN in the peace process as a whole and political negotiations specifically
- 4) The feasibility of adopting complex systems thinking as a different approach to political negotiations

### **Interview Questions for Stage 2 Visit (2014)**

Digging deeper into the application of complex systems thinking ideas in political negotiations, the following thematic questions emerged:

- 1) Questions in relation to:
  - Connectivity
  - Patterns
  - Leverage
  - Flexibility and adaptation
- 2) Questions in relation to the role of the UN in political negotiations with special reference to the impact of intervention
- 3) Questions about the ‘intangibles’ that forms the bed rock of the mindset of the various parties that influenced the system of political negotiations

## **Appendix F**

### **Chapter 3, Part 1 (in full)**

#### **The Cyprus conflict and political negotiations**

Appendix F offers a more comprehensive explanation of the background of the current diplomatic and local impasse on the island of Cyprus by expanding on the information provided in Chapter 3, Part 1.

## **Chapter 3, Part 1 (in full): The Cyprus conflict and political negotiations**

The historical background of the current Cypriot conflict can be traced back to 1828, and the Cypriot history discussed in this chapter outlines the turning points and critical events, which over these decades shaped the system of political negotiations that took place between the years 2008-2014. This brief outline of the history provides a picture of the context of the Cypriot conflict, and is essential to the understanding of this thesis and the underlying assumption of the research that the uncertainty, unpredictability and multidimensional dynamics of current domestic and regional affairs and past experiences embedded in the historical trajectory of the conflict cannot be ignored when attempting to understand why political negotiations have periodically stalled.

### **3.1 Geographic location and strategic significance**

Geographically, Cyprus occupies a strategic position in the region. It lies in the Eastern Mediterranean Sea and is located 40 miles south of Turkey, 60 miles west of Syria and Lebanon, northwest of Israel, 240 miles north of Egypt and 575 miles east of Greece. The geographic location of the island connects the West with the East (Joseph, 1997) since Cyprus is the 'only island in the utmost eastern corner of the Mediterranean basin' (pp.58-59). Due to its location, the island is a geostrategic point for the region in terms of 'large scale land, sea and air operations in the Middle East' (pp.58-59), such as the attack on the Suez in 1956 by joint British and French forces.

On the other hand, the island is also strategically a neutral point in the Mediterranean basin, and has never been involved in 'Arab nationalism, intra-Islamic rivalries, and Arab-Israeli confrontation' (Joseph, 1997), and can 'be seen as a secure neutral ground with regard to the polemics scourging the major oil-producing region of the world' (p.58). The geographic position of the island emphasises its geostrategic significance and has often been a location of concern to Greece and Turkey.

Even though Cyprus is a relatively small island, it is the third largest and most populous island in the Mediterranean, with a total area of 9,251 square kilometers. According to 2011 estimates, the population of the island stood at 1,117,000 (which includes the Turkish Republic of Northern Cyprus and areas of the United Nations buffer zone, as well as the Akrotiri and Dhekelia) (International Business Publications, 2013). The inhabitants of the island at the time of the island's independence in 1960 consisted of a majority of Greek Cypriots (80%), while Turkish Cypriots made up 18% of the total population (Hannay, 2005). The remaining 2% of the population are Maronites, Armenians and Latins.

The structure of the population in the south of the island (the current Republic of Cyprus) has changed dramatically throughout the years to encompass diversity and multiculturalism, and thus



create a new and intermixed society. Changes in the composition and behaviour of the population were the result of Greek Cypriot accession to the European Union, which allows free movement of people within the Union (Vassiliou, 2010). On the other hand, the north of the island (currently the Turkish Republic of Northern Cyprus, TRNC) has also experienced population changes, largely due to settlements of Turkish citizens. Cyprus currently encompasses diverse ethnic groups and nationalities, forming a multicultural society where the dominance of the initial duo-ethnicity is being distorted (Spilling & Spilling, 2000).

The Cypriot conflict has a long and complex history marked by critical events and turning points in the 19<sup>th</sup>, 20<sup>th</sup> and 21<sup>st</sup> centuries (Hakki, 2007; Michael, 2011; Morgan, 2010; Papadakis et al., 2006; Vassiliou, 2010). The conflict is an example of a long-standing socio-economic and politically intertwined discourse, which has been nurtured and externally shaped by great powers in the region and internationally (Hadjidemetriou, 2008). The past memories and experiences of the Cypriots are perpetually intertwined with contemporary socio-economic and political intricacies characteristic of the conflict (Papadakis et al., 2006), contributing inevitably to its intractability.

The Cypriot conflict as a subject of study, alongside conflict resolution, has historically received a large amount of attention in the mainstream literature from scholars across the world, covering socio-economic and political, philosophical and psychological perspectives. In the literature search at least 26 major studies were identified each covering the same broad ground, but with different points of focus and emphasis. These authors are cited in the reference list.

### **3.2 Cyprus as a contested island (the period 1828-1959)**

The small eastern Mediterranean island of Cyprus is rich in history, politics and culture. However, the politico-historical-cultural timeline, from the ancient past to the present, exhibits distortion, volatility, and turmoil on the island and in the region. The island and its people, for extensive periods of time, have been under the rule or influence of Mycenaeans, Phoenicians, Assyrians, Egyptians, Persians, Macedonians, Romans, Byzantines, Franco English, Franks, Venetians, Ottomans and the British Empire (Dodd, 2010; Hannay, 2005; Mallinson, 2005; Michael, 2011; Morgan, 2010; Papadakis et al., 2006). In the current era, the Ottoman Empire established colonial rule on the island in 1571 and ruled for the next 300 years until the island was put into British administration in 1878 and formally annexed by Britain in 1914 (Aksu, 2003).

Being subject to the control of other countries or being fought over for extended periods of time throughout history has had a deep impact on the psyche of the population on Cyprus. When conducting research, therefore, one must be careful not to ignore or negate the bitter traces of the island's past, nor undermine the sequence of emerging and evolving historical, cultural, socio-

economic and political events (Lacher & Kaymak, 2006), which shape the conflict and consequently the discourse of the system of political negotiation.

The fortunes of the island rose and fell with the fortunes of the Byzantine Empire and the Crusaders, and before the island's absorption by the Ottoman Empire, it was for a brief period an independent Kingdom of Cyprus and then a possession of Venice. By the 20<sup>th</sup> century, this history had resulted in the people of Cyprus feeling that they were the rightful and the original rulers of the island. Even during the rule of the Ottomans, the Greek Cypriots were a 'partly self-ruling majority' and pursued Hellenism from the nineteenth century (Dodd, 2010, p.2).

### **3.2.1 The Ottoman Empire**

For the purposes of the current research, the most recent history of the occupation of Cyprus was the period of greatest interest, with the last two powers to exercise control of the island being the Ottoman Empire between 1571 and 1878, followed by Great Britain until 1960. During Ottoman colonial rule, the Greek and Turkish Cypriot communities co-existed peacefully over extended periods of time. The Ottomans exhibited a reasonable level of tolerance towards non-Islamic religions and cultures (Babaoglu, 2015; Pericleous, 2009). They replaced the existing system of serfdom with a system by which peasants could actually purchase land, and instituted the millet system. The millet system allowed religious authorities to govern their own non-Muslim minorities, which reinforced the position of the Orthodox Church and the cohesion of the ethnic Greek population.

Although the system of social organisation appeared to be cooperative and the communities tolerated one another, both of the major Cypriot populations maintained distinctive characteristics which meant that ethnic communities tended to remain separated throughout the Ottoman period in spite of their mutual rebelliousness directed toward the Ottoman rulers (Hadjidemetriou, 2007; Pericleous, 2009). Although the two major communities socially and commercially were tolerant of religious differences, they nevertheless never constituted a unified 'Cypriot people' (Dodd, 2010, p.2). In the last years of the Ottoman rule, religious distinctions became more acute between the Muslim Turks and Christian Greeks and progressively transmuted into political differences (Hadjidemetriou, 2007; Pericleous, 2009).

### **3.2.2 British rule**

Cyprus fell under British control in 1878 following the Russo-Turkish War, during which the British occupied the island, taking advantage of the Ottoman Empire's actions throughout the war. Then in 1914, Cyprus was proclaimed a British protectorate and integrated into the British Empire when the Ottomans joined the Central Powers and entered World War I. The colony of British Cyprus was proclaimed a decade later, in 1925 (Dodd, 1993). The period of British control of Cyprus coincided with a period of conflict (both World Wars) in Europe and the rise of anti-colonialism worldwide.

### 3.3 Emergence of nationalism

#### 3.3.1 The Greek Cypriot *enosis* (union)

The emerging nationalism on the island stemmed from the Greek Cypriots' perception of themselves as the island's natural rulers, which they had begun to believe during Byzantine times. During the period of Ottoman rule, they had been allowed to act as a 'partly self-ruling majority' (Dodd, 2010, p.2), and such an extended historical perception had led the Greek Cypriots to strive for Hellenism in the 19<sup>th</sup> century (Dodd, 2010).

Extended Ottoman and then British colonial rule of the island resulted in a Greek Cypriot desire for liberty and self-determination, coinciding with an ethnic national awakening on the mainland and the establishment of an independent Greek state in 1828 (Dodd, 2010; Mallinson, 2005; O'Malley & Craig, 2001; Papadakis et al., 2006; Pericleous, 2009). This was followed by an increased number of union movements across territories in the Ottoman Empire, specifically in the areas with Greek inhabitants (Pericleous, 2009), strengthening the idea of irredentism and *enosis* with Greece (Kitromilides, 1990; Pericleous, 2009).

The concept of irredentism produced among the Greeks the *Megali Idea*, that is, the goal of establishing a Greek state that would encompass all ethnic Greek-inhabited areas, including the large Greek populations which remained in the Ottoman Empire following the Greek War of Independence (1830). The Greek Cypriot populace of the Cypriot island strongly identified with the idea of freedom and therefore strongly aspired for liberation from the long-standing colonial rule. Moreover, they perceived themselves to be part of the Hellenic movement and therefore strove for union (*enosis*) with Greece.

In parallel, the idea of liberation and Hellenism was mutually supported by Greece's ideology and policies which were pursued in the ensuing years of the 1840s in the form of irredentism and/or the *Megali Idea*. The prime aim was to integrate 'the unredeemed parts of the Greek nation into the Greek state' (Hadjidemetriou, 2008; Joseph, 1997; Michael, 2011; Papadakis et al., 2006; Pericleous, 2009), an idea further reinforced with the union of the Ionian Islands and Thessaly with Greece in 1864 and 1881 respectively (Pericleous, 2009).

Hellenism and the *Megali Idea* in Cyprus were promoted through church education, which played a significant role in the lives of the Greek Cypriot community, as it enjoyed wealth and the privilege of ethnarchy, and therefore had a substantial weight in the politics of the island (Dodd, 2010; Joseph, 1997; Pericleous, 2009). Education gradually merged with indoctrination, promoting indivisibility and attachment to the mainland (Joseph, 1997).

An additional critical development which substantially reinforced the desire of the Greek Cypriots for *enosis* was the fact that in 1915 the British government offered Greece the opportunity to form a union with Cyprus as a trade-off in exchange for Greece's support of

British participation in the First World War (Hadjidemetriou, 2008; O'Malley, & Craig, 2001). Even though the offer became null and void upon rejection by the Greek government, the Greek Cypriot community did not abandon the idea of *enosis* (Hadjidemetriou, 2008).

As a British colony from 1925 until 1960, they agitated for independence, persistently inspired by the *Megali Idea*, which promoted unity for all Greeks, nationalism and a return to past Greek glory. Nationalist aspirations persisted until the end of the Second World War, and when the British colonial government presented constitutional proposals to the Greek Cypriots to form an independent nation. These were met with strong rejections, reinforced by slogans for union: 'no to the Constitution' and 'no to self-government' (Hadjidemetriou, 2008, pp.27-28, 2008). The struggle for *enosis* continued throughout the 1950s. Archbishop Makarios, one of the prominent leaders of the Greek Cypriot community and the leader of the Greek Orthodox Church, continued the agenda for *enosis* with the support of most Greek Cypriots (Hadjidemetriou, 2008).

In 1948, Greece, which had fought and won a war of independence against the Ottoman Empire between 1821 and 1832, petitioned the United Nations for *enosis* with Cyprus, and British control of the island became an international issue. When the British refused to acknowledge the UN's position that Cyprus should be granted independence from Britain, a group of Greek Cypriots took up arms (the EOKA), and between 1955 and 1959 fought the British and any British-associated persons or organisations for independence, and *enosis*. In the same years, some Turkish Cypriots (armed and organised as the TMT) began to agitate against the union of Cyprus with Greece, calling instead for the partition of the island into Greek and Turkish regions, or *taksim*.

Between 1956 and 1958, the Greek government came to the realization that the situation for the Greek Cypriots was a difficult one since the Turkish government and the Turkish Cypriots refused to allow the island to be recognised as independent. Therefore, Greek nationalist aspirations for *enosis* were suspended, and the focus became independence from the British (Hannay, 2005; Papadakis et al., 2006; Pericleous, 2009).

The Macmillan Plan was devised in 1958 as an attempt to satisfy both the Turkish and the Greek Cypriots, who were to share government. Both *taksim* and *enosis* were prohibited (Dodd, 2010). This was the first time that the two sides had been in a position to compromise and work toward independence since the emotive concepts of *enosis* and *taksim* had to be abandoned (Dodd, 2010). The talks between Greece, Turkey and Zurich in 1959 produced an agreement supporting independence, although there is some evidence that Archbishop Makarios was reluctant to proceed (Hakki, 2007; Mallinson, 2005; Pericleous, 2009).

The history of colonialism had contributed to the emergence of radical nationalism on both sides of the island, however (Papadakis et al., 2006). EOKA and TMT were not disbanded, but remained ready for conflict with each other when either felt provoked (Papadakis et al., 2006;

Pericleous, 2009). Consistent asymmetry in the objectives of the Greek and Turkish Cypriots soon led to violent ethnic clashes (Papadakis et al., 2006).

### **3.3.2 The Turkish Cypriot *taksim* (partition)**

The establishment of the British administration on the island had triggered the emergence of nationalism among the Greek Cypriot community, while the Muslim Turkish community was first and foremost highly concerned about losing face and the privileged political position of being a dominant power in the region which they had acquired during the Ottoman epoch; nor did they wish to see Cyprus, as a redeemed territory, being enveloped by Greece (Fouskas & Tackie, 2009; Pericleous, 2009).

The emerging of irredentism and Hellenic aspirations in the region contributed to a feeling of danger and insecurity among the Turkish community, which inspired Turkish nationalism in the Muslim Turkish community in Cyprus (Fouskas & Tackie, 2009; Joseph, 1997; Pericleous, 2009).

The rise of Turkish nationalism was a counter narrative to Greek nationalist aspirations and the *enosis* movement (Dodd, 2010; Papadakis et al., 2006; Pericleous, 2009). Nationalism was initially spread through the Ottoman Club which had been established in the 1880s in Nicosia. The Club focused on such activities as public reading and political discussions and subsequently launched a journal *Kirati Zaman* and later the *Umid* and *Saded* papers (Pericleous, 2009, p.133). With the passage of time, the political message for the Turks to struggle against *enosis* spread through the schools and the community by way of education, publications in journals, and through the ideas of the Young Turk nationalist movement (Dodd, 2010; Joseph 1997; Pericleous, 2009).

During 19<sup>th</sup> and 20<sup>th</sup> centuries, the idea of a national identity intensified and Turkish nationalism, Ottomanism and Islamism merged. Gradually, the promotion of nationalism carried slogans using words like ‘nation’, ‘motherland’ and ‘Turkism’, ‘Turks’, ‘Ottomanism’ and ‘patriotism’ (Pericleous, 2009, p.134). The Turkish Cypriots became receptive to the concept of nationalism as a saviour power, which would set them free from the *enosis* aspirations and British colonial rule (Pericleous, 2009). While being unenthusiastic about the British authorities, the Turkish Cypriots nevertheless trusted the British to resist Greek Cypriot aspirations for *enosis*, threats, harassment and attacks (Hannay, 2005).

However, inadequate management of the island by British authorities resulted in the Turkish Cypriot community relying upon the Turkish government (Hannay, 2005), while British geostrategic interests prevailed over the interests of both Greek and Turkish Cypriots. The British focused on establishing sovereign base areas and did little about the problems between the two

ethnic groups, ultimately leaving the Cyprus problem for Turkey and Greece to resolve (Hannay, 2005; Papadakis et al., 2006).

The island of Crete faced a situation very similar to Cyprus with an Ottoman connection, a position of strategic importance, a bi-communal population, and the involvement of great powers in its history. Both the Greek and Turkish Cypriots identified themselves with Crete. The Greek Cypriots identified with the oppression and persecution of Cretan Greeks and believed that Cyprus might suffer a similar fate if Turkish rule returned. One of the main reasons for the Greek-Turkish war in 1897 had been Crete (Pericleous, 2009).

Continuous campaigns for *enosis* with Greece in territories under Ottoman rule, such as Crete, led to increased levels of fear among Turkish Cypriots that Turkish power would be diminished. This fear led the Turkish Cypriots to strongly relate to the Ottoman Empire and demand the withdrawal of the British from Cyprus and the island's repatriation to the Ottoman Empire (Pericleous, 2009). The Venizelos-Ataturk Friendship Pact of 1930 created new emergent dynamics between the two communities on the island (Pericleous, 2009).

### **3.4 Separation of ethnic groups to solve complex problems**

The partition of Cyprus as part of the solution to multiethnic societal problems emerged out of the rise and fall of colonial rule throughout the history of the island. The situation is an example of the attempt to use

*the circumstances under which, partition and/or political division have been applied as solutions to the problems of such multiethnic societies and states that give an element of uniqueness to the post-World War II period. (Coufoudakis, 1976, p.27)*

Thus, regardless of the generally negative ramifications, ethnic groups often prefer partition and political division as a solution to the complex problems of 'multiethnic societies and states' (Coufoudakis, 1976). The Cypriot conflict has come to be known to the world for its division, partition, perpetuation, intractability and the flailing system of political negotiation attempting to reach a comprehensive settlement. As of the year 2014 the system of political negotiation continues to stumble.

The subject of partition and political division has been investigated by several authors (Coufoudakis, 1976; Hachey, 1972; Henderson, Lebow, & Stoessinger, 1974). According to Henderson and Lebow, the division of the territory can be seen as an artificial imposition by external sides trying to repair

*... divisions resulting from internal causes; by reason of ethnic, linguistic, or religious conflict between or among groups formerly residing within one political unit.... (Henderson & Lebow, cited in Lebow, 2007, p.48)*

Furthermore, Hachey and Henderson perceive divisions and partitions as a consequence of the colonial collapse (Coufoudakis, 1976), and Johnston (1975) argues that the political partition and division stems from the

*division of formerly unified political units into new entities based on ethnic, cultural, and national identity...*

and

*...occurs through the imposition of territorial boundaries of people and resources into separate politically sovereign entities. Such imposition may occur by external powers or result from conflict and bargaining among powers party to the division. (Coufoudakis, 1976, p.29)*

According to Pericleous (2009), the British government was well aware of the fact that the imposed partition of Cyprus in order to suppress Greek Cypriot *enosis* was not favoured by the British population and also damaged the Britain's international image and reputation since Britain had exercised similar measures in Ireland, India and Palestine (Pericleous, 2009).

The concepts of division and political partition are directly transferable to the Cypriot conflict and therefore set the ground for a further analytical framework of the system of political negotiations within the context of complexity theory.

Cyprus has been bound up in the historical timeline of rising and falling colonial powers. Despite conquests, the island has maintained elements of 'Greek personality' (Coufoudakis, 1976). Ottoman rule, however, introduced an element of a different culture, ethnicity, language and religion and therefore changed the demography of the island (Coufoudakis, 1976). This contributed to the consolidation of the Greek Cypriot population and revitalized the Orthodox Church of Cyprus. In this way Ottoman rule became responsible for the bi-communalism that would result in the Cyprus problem (Coufoudakis, 1976).

The Orthodox Church of Cyprus became not only a religious centre, but a political, educational and social centre for the Greek Cypriot community. By the mid-19<sup>th</sup> century, the Church had become the leader for spreading the message for *enosis* as part of the nationalist Greek Cypriot agenda. It should be noted that the awakening of Greek nationalism on the island emerged with the 1821 Greek War of Independence, while the Turks in 1878 began to find their identity when the British took over the administration of the island in 1878 (Coufoudakis, 1976).

Further to these events, with the emergence of the world economic crisis in 1930s, the economic conditions on the island deteriorated, severely affecting both communities on the island. The unfavourable economic situation provided the sides with an opportunity for a possible way out of the protracted deadlock by potentially merging their asymmetrical positions. This would have served the common purpose and interests of the Cypriot community as a whole while improving

the livelihoods of Greek and Turkish Cypriots. However, Greek Cypriot extremism prevented the sides from exercising a common purpose and the struggle for *enosis* continued until the 1931 uprising (Pericleous, 2009).

The constant pursuit of union with Greece gradually led to the ethnic-based polarization of the population of the island (Joseph, 1997; Pericleous, 2009). The ethnic-based groups and movements were transformed over time into political groups, each with a strong desire for self-determination, contributing to further fragmentation of the disparate groups on the island (Joseph, 1997).

Since the 1950s, Cyprus has repeatedly experienced intra-ethnic domestic tensions, violence and frictions between the Greek and Turkish Cypriot communities and accordingly between the three NATO members – Britain, Greece and Turkey – associated with the island (Joseph, 1997). Violence soon escalated to crisis and threatened to escalate into conflict and war between Greece and Turkey, ‘made the island a symbol of Western disunity rather than a stronghold of Western defence’ (Joseph, 1997, p.58).

While the USA attempted to contain the conflict, the Soviet Union attempted to influence Cypriot politics in order to prevent Cyprus’s ‘NATOization’ (Joseph, 1997, p.58). The machinations of the Soviet Union demonstrate how complicated the situation is in Cyprus. The interaction and the rivalry between the superpower politics of the USA and the Soviet Union are reflected in the Cypriot conflict and the island is part of the East-West balance of power in the region (Joseph, 1997).

The plebiscite for *enosis* on 15 January 1950 and the armed *enosis* struggle on 1 April 1955 created a mechanism for the political separation of both communities. Archbishop Makarios attempted to create a reaction in Greece by noting the country’s subservience to the West, hoping that this would increase Greek determination to unite with Cyprus. On the Turkish Cypriot side, Rauf Denktaş had assumed leadership and encouraged the Turkish Cypriot community to strive for colonial government (Pericleous, 2009).

In 1956, the British Secretary of State for the Colonies, Alan Lennox-Boyd, (Pericleous, 2009, p.146) presented Radcliffe’s constitutional proposal to the House of Commons (p.146), stating that the British government was prepared to accept the principle of self-determination in Cyprus. He also added that the ‘exercise of the right to self-determination in a mixed population should include partition among alternative solutions’ (p.146). The statement by the British Secretary was an important remark which was taken further by the Turkish Prime Minister Adnan Menderes the next day, who stated that ‘within the framework of Lennox-Boyd’s statement, Turkey accepted Radcliffe’s constitution as ‘a reasonable basis for negotiations’ (Pericleous, 2009, p.147). These statements were further reinforced by the Prime Minister who expressed his view



during his speech in the Grand National Assembly, stating that partition was seen by Turkey as a sacrifice and that Turkey would not bear a greater sacrifice than that (Pericleous, 2009).

Interestingly, the idea of partition was coined for the first time in the letter to *The Times* of London in July 1956 by a Conservative MP who suggested that Lord Radcliffe explore the notion of partition as an alternative in the constitution. Partition was the second best solution for Turkey since it could not repossess the island through the political means (Pericleous, 2009).

The attempts to unite the island ended in bloodshed in the 1950s and 1960s (1963). Various interpretations of the situation suggest that the Cypriot conflict emerged in 1950s with the aspirations for *enosis*, uniting Cyprus with Greece (Sözen, 2007, p.iii). While the Greek Cypriot community aspired for enosis with Greece, the Turkish Cypriot community aspired for *taksim* (partition) of the island.

Ultimately, colonialism, nationalistic aspirations, the agendas of the great powers and their geopolitical strategic and vested interests, in addition to the domestic situation on the island, have all contributed to intractability of the conflict in Cyprus and the difficulties preventing its resolution.

### **3.5 End of British Colonial Rule**

In 1960, the end of British colonial rule was achieved in Cyprus after 82 years (Coufoudakis, 2008; Diez & Tocci, 2009; Hadjidemetriou, 2008; Hannay, 2005; Morelli, 2014; Papadakis et al., 2006; Pericleous, 2009; Vassiliou, 2010). In an attempt to establish a bipartisan government on the island, negotiators based the government of the Republic of Cyprus on a presidential regime, which specifically established a Greek Cypriot Presidency and a Turkish Cypriot Vice-Presidency (Diez & Tocci, 2009; Hakki, 2007). It was intended that these leaders be elected by 'by universal suffrage' by both the Greek and Turkish Cypriot communities on the island (Hakki 2007).

The constitutional arrangement aimed to create communal balance in line with the ethnic percentages in the community. The Greek Cypriot community was the largest ethnic group at 78% of the population, while the Turkish Cypriot community only formed 18% of the island's population of 600,000 (Colman, 2010; Diez & Tocci, 2009; Hakki, 2007). The remaining 4% of the population were Mironites, Armenian and Latins (Diez & Tocci, 2009; Hakki, 2007; Papadakis et al., 2006). This powersharing arrangement meant a ratio of 70:30 Greek to Turkish Cypriots in government. The security arrangement stood at a 60:40 percentage ratio (Diez & Tocci, 2009).

The establishment of this legally shared Republic of Cyprus in 1960 could theoretically have been a turning point in Greek Cypriot – Turkish Cypriot relationships. The two communities could have chosen to rise above their differences, putting aside, on the one hand, their traditional

irredentist ethno-nationalist aspirations, and, on the other, mono-ethnic state notions, and endorse the – quite novel for that time – notion of a civic state. However, this did not happen, and the responsibility rested mainly with the narrow-mindedness of the leaderships of both communities.

While the numbers appeared to work on paper, the leaders of the communities argued about contentious issues related to the ‘Cypriot Army, quotas for the public service, tax legislation, separate municipalities and communal chambers’, all of which resulted in operational gridlock (Michael, 2009, p.27).

Some researchers believe that British colonial rule had birthed a ‘static bi-communal system’, because the British had thought and governed with the typical self-absorption of an empire (although a failing one) that viewed a colony as a resource and ethnicity as irrelevant or simply irritating. Interethnic conflict, therefore, took root and grew with each confrontation (Michael, 2011).

Basically, once the British decided to give up their colony, their lasting legacy was only an unworkable constitution that institutionalized ethno-communalism, because it failed to take into account ‘the psychological and sociological fact that the power-protection system’ increased ‘suspicion, antagonism and conflict between the communities because of the discriminations and uncertainties involved. The sectarian and divisive provisions of the 1960 arrangement constituted the seeds that led to its collapse three years later (Michael, 2011).

Ethnic violence soon escalated to crisis and threatened the possibility of war between Greece and Turkey, making the island ‘a symbol of Western disunity rather than a stronghold of Western defence’ (Joseph, 1997, p.58). While the USA attempted to contain the conflict, the Soviet Union attempted to extend her influence in order to prevent Cyprus from falling under the influence of the NATO powers (Joseph, 1997). As of 2014, Cyprus was the only EU member state that was not part of NATO’s Partnership for Peace Programme. However, this outcome was largely due to intransigence on the part of Turkey, which has been reluctant for Cyprus to join NATO’s Partnership for Peace Programme without the Cypriot problem first being resolved.

### **3.6 Attempting to solve the intractable conflict of Cyprus**

#### **3.6.1 Tri-partite Zurich and London Agreements**

In 1959, the governments of Turkey, Greece and Great Britain negotiated the tri-partite Zurich and London Agreements, where the same three governments became guarantor powers for a newly formed presidential Republic of Cyprus (Diez and Tocci, 2009; Hannay, 2005; Kyriakides 2009; Papadakis et al., 2006). The guarantor powers were tasked with consulting one another for the purposes of preserving territorial and constitutional order (Hannay, 2005) within the republic, ensuring ‘independence, territorial integrity, security and respect for its Constitution’ (Michael, 2011, p.26).

Furthermore, the tripartite agreements specified prohibition with respect to any attempts by the sides to call for either union or a partition of the island (Hakki 2007; Hannay, 2005; Michael, 2011), thus constraining both sides to exercise sovereignty (Hannay, 2005). Furthermore, Article IV of the treaty provides:

*In so far as common or concerted action may prove impossible, each of the three guaranteeing Powers reserves the right to take action with the sole aim of re-establishing the state of affairs (i.e. bi-communal consociational state) established by the present Treaty.*

This treaty can be found in the United Nations Treaty Series, Vol. 382, p10 (I No. 5476). Through this article, the guarantor powers were provided with the power to unilaterally take action to re-establish 'the state of affairs established by the present Treaty' if the arrangement in Cyprus faltered in some way (Michael, 2011, p.26).

Great Britain safeguarded her strategic objectives by maintaining two sovereign bases in the areas of Akrotiri and Dhekelia occupying 99 square miles (Coufoudakis, 2008; Michael, 2011), which amounted to 2.7% of the total sovereign base areas of the whole island (Coufoudakis, 2008). Greece and Turkey reserved the right to station 950 and 650 troops respectively on the island (Diez & Tocci, 2009).

**Failure.** Intercommunal conflict persisted on the island, and the British continued to be harassed by both sides as a colonial authority. A new constitutional arrangement attempted to create communal balance in an independent state, the Republic of Cyprus, with the Greek Cypriot community forming 78% of the population, while the Turkish Cypriot community was in a minority, representing only 18% of the total population of 600,000 living on the island (Diez & Tocci, 2009; Hakki 2007; Colman, 2010). The remaining 4% of the population were Maronites, Armenians and Latins (Diez & Tocci, 2009; Hakki 2007; Papadakis et al., 2006).

Accordingly, the new arrangements of the Republic of Cyprus assigned government powersharing between the Greek and Turkish Cypriot communities at the ratio of 70:30 to reflect the sizes of the ethnic populations. The security arrangement was established at a 60:40 ratio (Diez & Tocci, 2009). In spite of the effort at fairness, both sides found it difficult to effectively function within the new constitutional arrangement. As a consequence, both sides persisted in challenging all arrangements that dealt with the 'Cypriot Army, quotas for the public service, tax legislation, separate municipalities and communal chambers', meaning that the new government was gridlocked (Michael, 2011, p.27).

It is largely agreed that British colonial rule had encouraged a 'static bi-communal system' through 'colonial practices' and 'nationalist rationales' (Michael, 2011, p.27). For this reason, the foundations of 'interethnic conflict' had their roots in colonial rule. The new administrative agreement encountered a legacy that included an unworkable constitution that institutionalized

ethno-communalism, and failed to take into account ‘the psychological and sociological fact that the power-protection system’ increased ‘suspicion, antagonism and conflict between the communities because of the discriminations and uncertainties involved’ (Michael, 2011, p.27). ‘The sectarian and divisive provisions of the 1960 arrangement constituted the seeds that led to its collapse three years later’ (Michael, 2011, p.27).

The establishment of the Republic of Cyprus in 1960 might have been a turning point in Greek Cypriot – Turkish Cypriot antagonism had the two communities worked to overcome their traditional irredentist ethno-nationalist aspirations, and embraced the notion of a unified state and endorsed the – quite novel for that time – notion of a civic state. However, this did not happen, and the responsibility rests mainly with the narrow-mindedness of the leaderships of both communities.

As the new epoch unfolded with the tri-partite Zurich and London Agreements, and despite the end of colonial rule, conflict erupted between the Greek and Turkish Cypriots (Dodd, 2010; Hannay, 2005). Although there were few casualties, bitterness among the ethnic groups on the island persisted (Hannay, 2005). The Greek Cypriots were disappointed that the newly formed constitution prevented them from aspiring for *enosis* with Greece (Diez & Tocci, 2009). The Turkish Cypriot community were disappointed because the island could not be partitioned or united with Turkey (Hadjidemetriou, 2008).

Prohibiting *enosis* and *taksim* clearly had not discouraged activists desiring them among both ethnic groups. Both sides were dissatisfied with the outcome and therefore wholeheartedly pursued their own goals (Papadakis et al., 2006). Taxation immediately became an issue between the two communities, along with the creation of separate municipalities. Because of the legislative veto system, government processes sputtered and stalled.

The essence of independence and sovereignty, in addition to a tangible constitutional structure, was a symbolic attempt to reconcile a Cypriot mentality imprinted with colonial attitudes deeply embedded in the psyche, where ‘Cypriot independence still remains a by-product of its postcolonial constellation’ (Michael, 2011, p.26). Despite the establishment of independence and sovereignty from colonial rule, their different outlooks constrained both communities to further seek self-determination that would result in either *enosis* for the Greek Cypriot community or a *taksim* for Turkish Cypriot community (Constantinou, 2007; Michael, 2011).

Although the Turkish Cypriots were given a voice within the newly created governmental structure, it was not great enough for powersharing or unity to find favour with the Turkish Cypriot community. As a consequence, extreme nationalism persisted within the Turkish Cypriot community which strongly ought for *taksim* (Diez & Tocci, 2009).

In order to establish a working government, the Greek Cypriot President Archbishop Makarios proposed constitutional amendments with a view to abolishing ‘dysfunctional elements’ (May-

Dec 1963) in the constitution, including the presidential and vice presidential vetoes, as well as the notion of minority status for the Turkish Cypriot community (Diez & Tocci, 2009). Constitutional amendments were introduced in the form of a 13 point proposal aimed at amending the constitution (to favour majority Greek Cypriot decision making) (Aksu, 2003). As could be predicted, these amendments were met with rejection by the Turkish Cypriot leadership and consequently Turkey (Diez & Tocci, 2009).

The disagreements between the sides continued to deepen, leading to widespread intercommunal clashes by the end of 1963 and beginning 1964 (Dec 1963-Jan1964) (Hannay, 2005). In 1963 the Turkish Cypriots withdrew from all governmental organs of the common state, initially arguing that fiscal matters were the problem. At the same time, numbers of Turkish Cypriots moved from mixed or isolated villages to Turkish enclaves in what appeared to be a premeditated policy of partition (Aksu, 2003; Diez & Tocci, 2009; Hadjidemetriou, 2008; Hannay, 2005; Michael, 2011; Papadakis et al., 2006).

The Turkish Cypriots refused to participate in the government (Diez & Tocci, 2009). Pursuit of asymmetric goals, driven by fear, led to ethnic violence in 1963, which persisted until 1967 (Papadakis et al., 2006), meaning that the tri-partite arrangement for island government only lasted between 1960 and 1963 (Diez & Tocci, 2009; International Crisis Group, 2014). On 1 January 1964, Makarios announced that the 'Treaties were abrogated' (Dodd, 2010, p.55).

The Republic of Cyprus was thereafter solely governed by the Greek Cypriot leadership. Although official spaces for the Turks remained in the government, the Turkish Cypriots withdrew and refused to return to governmental structures and effectively abandoned 'its institutions and obligations' (Hadjidemetriou, 2008, p.34). These events marked socio-political and demographic separation (Michael, 2011), with people being displaced throughout the island (Papadakis et al., 2006).

### **3.6.2 A decade of peacemaking efforts**

The **United Nations Peacekeeping Force in Cyprus (UNFICYP)**. A period of instability followed during which disputes could not be resolved and intercommunal conflict increased, most notably skirmishes at the beginning of Christmas week 1963 between Cypriot Turks and Greek Cypriots that saw over 500 people dead. The collapse of power sharing and the withdrawal of the Turkish Cypriot leadership from government operations resulted in the United Nations Peacekeeping Force in Cyprus (UNFICYP) being placed in Cyprus in March 1964 (Mallinson, 2005) in order to de-escalate the ethnic tensions and forestall a military intervention on the part of Turkey (Diez & Tocci, 2009).

The mandate of UNFICYP was originally defined in the following terms:

*...in the interest of preserving international peace and security, to use its best efforts to prevent a recurrence of fighting and, as necessary, to contribute to the maintenance and restoration of law and order and a return to normal conditions. Security Council Resolution 186, 1964*

Initially, both the UN and the United States separately attempted to resolve the conflict after the establishment of the peacekeeping force in 1964. Both the UN and the US either favoured or would not have been bothered by the *enosis* of the island with Greece, and these attitudes were reflected in their negotiation stances. With or without *enosis*, it was recognised by the negotiating teams that the minority Turkish Cypriot population would have to be assured that their rights were going to be protected.

However, both the Greek and Turkish Cypriot leadership refused to accept any of the terms suggested by UN or US representatives. Furthermore, any agreement did not just depend on Cypriot cooperation, but on the relationships between Greece, Turkey and Britain.

During this period, tension between the two ethnic populations continued to fester, and what became an unstoppable process of separation and segregation of the groups began, with Turkey becoming involved in protecting the Turkish population via their airforce from attacks by the Greek Cypriots as required (according to Turkey). In 1964, the conflict resulted in a high number of internally displaced Cypriot Turks, who were encouraged by their leaders to live together in enclaves that could be protected from Greek Cypriot incursions.

After the traumatic year of 1964, conflict on the island eased somewhat, but to an objective observer, it was clear that the communities were self-segregating and disinclined to cooperate in the management of the island as a whole.

Following intercommunal clashes and Turkish Cypriot withdrawal from the governmental structure of the Republic of Cyprus, the United Nations Force (UNFICYP) was placed in Cyprus on March 1964 (Mallinson, 2005) for the purpose of monitoring a possible escalation of a military threat from Turkey (Diez & Tocci, 2009). The same year, the United Nations offered the Good Offices mission, which provided an intermediary mechanism for solving the Cypriot conflict (Diez & Tocci, 2009). The UN appointed a new mediator, Sakari Tuomioja, who perceived the Cypriot conflict to have an international dimension (Diez & Tocci, 2009). Subsequently, the Security Council approved actions taken by Secretary General U Thant to attempt to resolve a newly erupted conflict between the Greek and Turkish Cypriot communities.

In 1965, the UN General Assembly adopted a resolution which specifically guaranteed the independence and sovereignty of Cyprus, while at the same time ruling out 'interference or intervention' by third parties (Mallinson, 2005).

In 1964, as the Cypriot conflict continued to fester, Turkey was prompted to exercise its unilateral intervention granted by the Treaty of Guarantee (Dodd, 2010). Article III of the Treaty of

Guarantee banned a guarantor power from invading without prior consultation with other guarantor powers, and initially the United States was able to persuade Turkey to abide by the Treaty. Article II of the Treaty prohibited *enosis* or *taksim*, ultimately, however, Turkey chose to ignore Article II and Article III of the Treaty, justifying its actions with reference to the Declaration of Kutchuk, which specifically referred to the partition of the island (Mallinson, 2005).

Given these developments, the British government considered various options with respect to a solution to the Cypriot problem. *Enosis* with Greece was preferred, followed by the notion of a unitary state (Mallinson, 2005). The following options were outlined as possibilities (Mallinson, 2005; Joseph, 1997):

- *enosis* with Greece
- two-way *enosis* (partitioning Cyprus with one part being unified with Greece, the other unified with Turkey)
- condominium between Greece and Turkey
- trusteeship
- population exchange (removal of Turks from Cyprus and replacement by Greeks from Turkey)
- status quo
- unitary state
- separation of the two communities (partition/federation/fragmentation into cantons)

**Acheson Plan.** During 1964, the United States attempted to break the deadlock of the conflict by introducing the Acheson Plan (partition of the island between the two NATO allies Greece and Turkey (Colman, 2010; Fouskas & Tackie, 2009), proposed by the former Secretary of State Dean Acheson (Colman, 2010; Diez & Tocci, 2009; O'Malley & Craig, 2001). The proposal was based on Cyprus's *enosis* with Greece, allowing for a Turkish military presence on the island in the form of 'a sovereign military base' (Colman, 2010; Diez & Tocci, 2009; Hakki, 2007; Joseph, 1997; Mallinson, 2005; O'Malley & Craig, 2001), 'with full rights to deploy ground, air and naval forces' (Hakki, 2007, p.129). The purpose of the establishment of the military base on the island was to address Turkey's security concerns with respect to potential hostile operations which could be mounted on the island against Turkey. It would also keep open access to the Turkish Ports Mersin and Iskenderun (Joseph, 1997; O'Malley & Craig, 2001).

The Archbishop Makarios rejected the plan, stating that full *enosis* could not be executed with a Turkish military presence on the island, because that would provide Turkey with excessive powers to influence the state of affairs in Cyprus (Diez & Tocci, 2009; Hadjidemetriou, 2007; Joseph, 1997). Following the rejection of the first plan, a second plan was suggested with some slight variations. Turkey would no longer have a permanent sovereign military presence on the island, but would instead have a 50 year lease from the Greek government, while the Turkish Cypriots would have had been granted minority rights monitored by an 'international commissioner' (Diez & Tocci, 2009; O'Malley & Craig, 2001; Mallison, 2005). The Greek and

Turkish Cypriots both rejected the proposal, and no solution was reached (Diez & Tocci 2009; O'Malley & Craig, 2001; Colman, 2010).

Following this failure of negotiations, Turkey began to establish a closer relationship with the Soviet Union, which was keen strategically to drive a wedge between Greece and Turkey and split NATO (O'Malley & Craig, 2001).

**Galo Plaza Lasso.** A newly appointed UN mediator, Galo Plaza Lasso (Ecuadorian politician) perceived the conflict not to have an international, but rather, a communal dimension (Diez & Tocci, 2009; Fouskas & Tackie 2009; Joseph, 1997; Mallinson, 2011; Varnava & Faustmann, 2009), contrary to previous approaches. Lasso produced a 66 page report emphasizing the UN Charter and principles. The report heavily criticized both sides for their inability to reach a settlement (Diez & Tocci, 2009; Fouskas & Tackie, 2009; Joseph, 1997; Mallinson, 2011; Varnava & Faustmann 2009) and focused on establishing a unitary state, proposing that the government be left with the ethnic majority, while the minority would be guaranteed proportional rights.

The report correspondingly also addressed the issue of guarantor powers, suggesting the abolition of the 1960 Treaty. It fundamentally recognized Greek Cypriot aspirations for *enosis*, even though Plaza observed attempts at *enosis* had been wound back (Diez & Tocci, 2009). The report clearly called for Turkish Cypriot autonomy within the Republic of Cyprus (Mallinson, 2005), and rejected the idea of a solution that involved Turkish influence (Diez & Tocci, 2009; Hadjidemetriou, 2007). To the Turks, the Plaza report appeared biased toward Greece and was not regarded favourably by either Turkey or the Turkish Cypriots, who rejected it immediately. They accused Galo Plaza of exceeding his UN mandate as the mediator since he had proposed solutions rather than brokering a deal. Furthermore, the Turkish Cypriots feared that the promises made to them in the 1960 Agreements might not be honoured (Diez & Tocci, 2009; Fouskas & Tackie, 2009; Joseph, 1997; Mallinson, 2011; Varnava & Faustmann, 2009). They demanded Plaza's resignation (Diez & Tocci, 2009).

For their part, the Greek Cypriots promised to refuse any new appointment to replace Plaza, so yet another stalemate was reached (Diez and Tocci, 2009). Fundamentally the Plaza report ruled out both *enosis* and *partition* (Mallinson, 2005), and he 'agreed that the abrogation of the core constitutional treaties by the Greek Cypriots should be recognized' (Diez & Tocci, 2009, p.152).

**U Thant.** In 1966, the UN Secretary General U Thant attempted to implement another new approach, in order to reconcile political differences between the conflicting sides, which was based on direct dialogue and not on proposal development. However, no direct dialogue was forthcoming in 18 months, and U Thant had no choice but to abandon the mediation effort (Diez & Tocci, 2009; Varnava & Faustmann, 2009).



### 3.6.3 Invasion by Turkey (period 1967-1974)

The United States failed to find a solution to the Cypriot problem. Any attempts to bring the two sides to the negotiating table ended up in ashes. Turkey made efforts to form a bond with the Soviet Union in order to increase pressure on the United States for a federated state solution (Hadjidemetriou, 2007; O'Malley & Craig, 2001). The United States perceived Turkey to be a crucial strategic ally due to its geographical location linking Europe and Asia. The country also served as a barrier to the Soviet Union and a bridge to the Mediterranean and the Middle East (O'Malley & Craig, 2001). At the same time, the US perceived Greece as important enough in the region to covertly involve itself in the Greek government's affairs (Mallinson, 2005; O'Malley & Craig, 2001).

Cyprus was considered to be vital to the West's circle of containment around the Eastern Bloc, and one of the largest armed forces in NATO was maintained on the island. But between 1964 and 1967, relations between Washington and all three NATO allies interested in Cyprus were thrown into turmoil, and trouble continued to brew on the island (O'Malley & Craig, 2001).

Furthermore, developments beyond the island contributed to serious political turmoil in the region. Firstly, the Greek government collapsed in 1965 (Hadjidemetriou, 2007; Mallinson, 2005), leaving the UN to continue to validate the Greek Cypriot government, which did not please Turkey (Mallinson, 2005; O'Malley & Craig, 2001). The political situation in Greece deteriorated further following a military coup on 21 April 1967 which established a military dictatorship (Hadjidemetriou, 2007; Joseph, 1997; Mallinson 2005). The political instability nearly led to war between Greece and Turkey in November 1967, and regional turmoil increased when the six-day Arab-Israeli war ignited. The regional ructions significantly diminished international attention and support for a solution to problems in Cyprus (Hadjidemetriou, 2007; Mallinson, 2005).

Just months later, Greek Cypriot police and the Greek Cypriot National Guard carried out a major attack on Turkish Cypriot villages in the south of the island, which left 27 dead. Responding to calls for aid by the Turkish Cypriots, Turkey bombed the Greek Cypriot forces and appeared to be preparing for an intervention. Greece and the Greek Cypriots, however, backed down in response to international pressure, and Greece agreed to recall the Commander of the Greek Cypriot National Guard and reduce its forces on the island.

In 1967 a meeting was held between Greek and Turkish foreign ministers, where Turkey again declined Greek's proposal for *enosis* (Diez & Tocci, 2009). The same year, Cyprus experienced increased intercommunal clashes to which Turkey responded with a threat of military invasion. Following these developments, the Turkish Cypriots aimed for political autonomy and declared a 'provisional administration'. The move was not seen favourably by Archbishop Makarios. The Greek Cypriots failed to appreciate the fact that *enosis* with Greece was not a realistic objective

given domestic and regional dynamics, then the emergence of a Greek military junta disrupted negotiations in 1967 (Diez & Tocci, 2009).

An intercommunal round of talks began in the spring of 1968 between Clerides and Denktas̄ under the auspices of the UN Good Offices Mission. In the first round of talks, the Turkish Cypriots aimed to achieve autonomy and partition which would lead to self-rule and eventually statehood (Diez & Tocci, 2009; Hadjidemetriou, 2007; Hakki, 2007; Mallinson 2005; O'Malley & Craig, 2001; Varnava & Faustmann, 2009). This was not a position with which the Greek Cypriots could agree, in spite of the Turkish Cypriots being prepared to make constitutional concessions (Varnava & Faustmann, 2009). In subsequent rounds of talks the sides focused on constitutional issues. However, no substantial achievements were made, with the UN Secretary General blaming both sides for the failure.

**EOKA-B and the Greek Cypriot coup.** Although intercommunal hostilities lessened after the crisis of 1967, the Greek Cypriots continued to aspire for *enosis*, and at the beginning of the 1970s, the paramilitary organisation EOKA-B emerged in the Greek Cypriot community and agitated for union (Diez & Tocci, 2009). The president of Cyprus, Archbishop Makarios III, feared that the right wing Greek government would provide military support to EOKA-B as most of the Greek National Guard on the island were mainland Greeks.

Makarios was seen to be an impediment to union and the Greek Cypriot pro-union factions and mainland Greek junta eventually organised a *coup d'état* on 15 July 1974 against Makarios's government. The Greek government overthrew Makarios (Diez & Tocci, 2009; Joseph, 1997; Papadakis et al., 2006). After the *coup d'état*, Nicos Sampson was appointed to be the President of Cyprus, and continued to support the *enosis* cause (Diez & Tocci, 2009). It remains unclear how much danger Turkish Cypriots were in as Sampson turned on Makarios supporters and infighting among the Greeks resulted in Greek and Greek Cypriot deaths.

Nevertheless, Turkey, keenly uncomfortable with the situation and the possibility of the Greeks achieving *enosis*, exercised its unilateral right to intervene according to the 1960 Treaty of Guarantee by invading Cyprus on 20 July 1974 (Diez & Tocci, 2009).

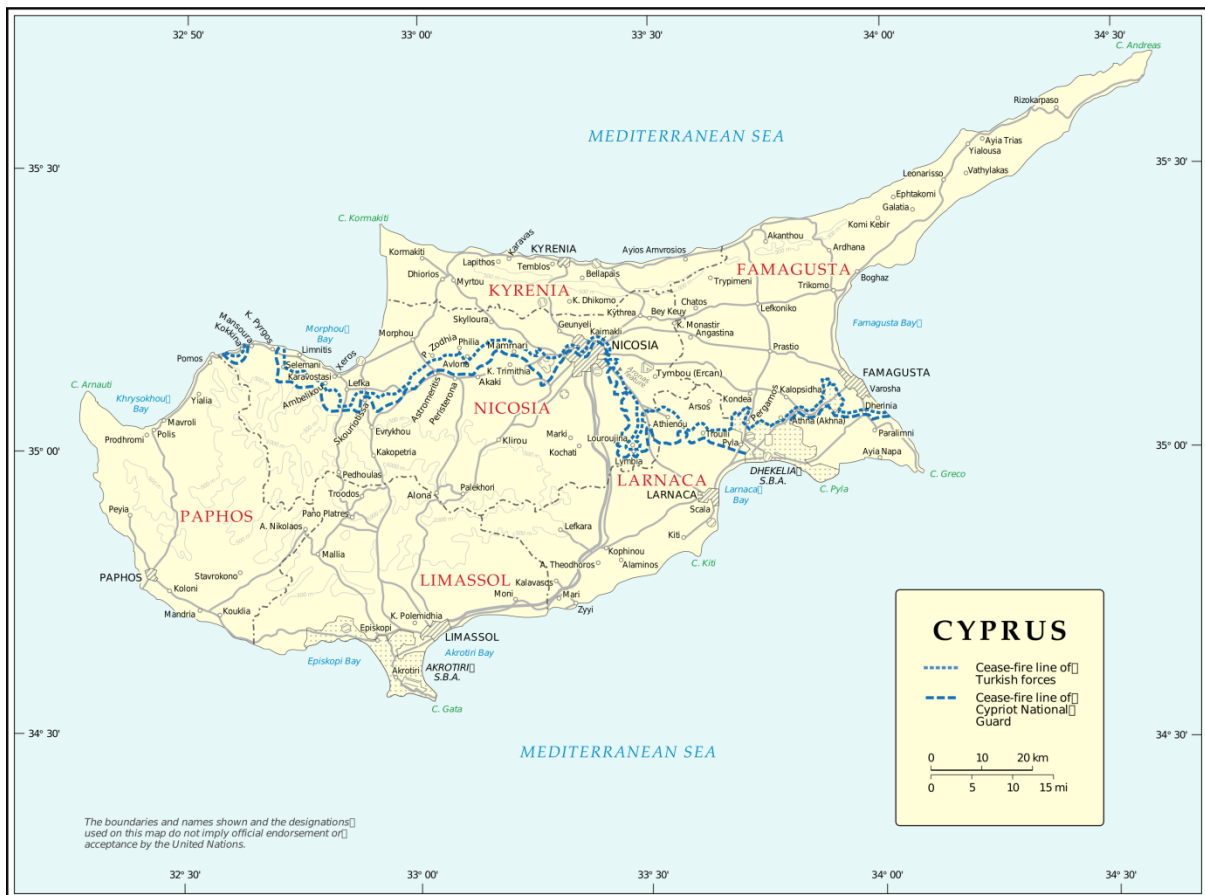
This is the juncture at which an intense interest in political negotiation and the methodologies used gives focus to the thesis.

#### **3.6.4 Immediate aftermath of the Turkish invasion**

Following the Turkish intervention, the Greek Cypriots fled en masse from the north to the south, while Turkish Cypriots fled from the south to the north (Fouskas & Tackie, 2009; Joseph, 1997; Mallinson, 2005; O'Malley & Craig, 2001; Varnava & Faustmann, 2009). Both Greek and Turkish Cypriots became refugees on their own land (Varnava & Faustmann, 2009; Hakki, 2007; Pericleous, 2009; Fouskas & Tackie, 2009; O'Malley & Craig, 2001). The Turkish military

occupied 37% of the island, while at the same time turning 160,000 Greek Cypriots and 40,000 Turkish Cypriots into refugees (Fouskas & Tackie, 2009; O'Malley & Craig, 2001; Varnava & Faustmann, 2009).

Ultimately, Turkish intervention led to the de facto division of Cyprus, creating two separate, distinct geographical, political, ethnic and religious zones, confirming the initial partition of the island in 1963-1964 (Fouskas & Tackie, 2009; Varnava & Faustmann, 2009; Vassiliou, 2010). A map of Cyprus after partition is included below. The events of 1974, therefore, further deepened the Cyprus problem, enlarging in scope and complexity the domestic and foreign state of affairs (Hadjidemetriou, 2007; Mallinson 2005; Varnava & Faustmann, 2009).



**Map of Cyprus illustrating the current geographical positions of the negotiating parties. (This map is in the public domain, and can be found at <https://upload.wikimedia.org/wikipedia/commons/e/ee/Un-cyprus.png>)**

As a result of the division of the island, the original status of the Republic of Cyprus, which initially was based on a bicomunal state, changed demographically to incorporate Greek Cypriots only. Since 1968, therefore, both communities have been negotiating under the United Nations auspices for the purpose of attaining a comprehensive solution to the conflict unleashed by ethnic tension and the end of colonial rule. It has been said that although both communities have been separately governed, a permanent settlement for the island requires from both sides a degree of cooperation, integration, and power sharing (Diez & Tocci, 2009; Fouskas & Tackie,

2009; Hakki, 2007; O'Malley & Craig, 2001; Pericleous, 2009; Sözen, 2007a & b; Varnava & Faustmann, 2009).

Despite the disastrous events of 1974, with the Greek junta's intervention, a coup d'état and the division of the island, the Greek Cypriots continued to receive a good amount of political support from Greece. On the other side, the Turkish Cypriots, even though they had been pleased for the Turks to stabilise conditions on the island, very soon realised the level of political and military control that was going to be imposed by Turkey upon them, while settlers from Turkey began to settle in the north of the island (Papadakis et al., 2006).

A separate north was never given international recognition and was solely supported by Turkey. In 1983, the Turkish-held part of the island established itself as the Turkish Republic of Northern Cyprus (TRNC), still unacknowledged by the international community. On the other hand, the Republic of Cyprus has been recognised internationally as a state (Diez & Tocci, 2009; Fouskas & Tackie, 2009; Hakki, 2007; O'Malley & Craig, 2001; Papadakis et al., 2006; Pericleous, 2009; Sözen, 2007a & b; Varnava & Faustmann).

At this point, the two sides of the Cyprus conflict began several decades of negotiations in an effort to resolve a problem made increasingly difficult by the relationships and politics of their respective 'mother' nations – Greece and Turkey – as well as events in other nations and with other alliances, such as the old Eastern Bloc and NATO.

### **3.6.5 Negotiations from 1974 to 2015**

In spite of an unfavourable political climate in the 1970s, talks to determine the future of Cyprus continued after the Turkish invasion. In 1974, in spite of some successful negotiation, the issue of local government and its function stopped progress, although at one point UN Secretary General Kurt Waldheim reported to the United Nations Security Council (UNSC) that a powersharing package had been proposed that granted the Turkish Cypriots the degree of local governance they wanted in exchange for the renunciation of the rights that had been included in the 1960 constitution (Michael, 2011).

Nothing came of this proposal, however, and in 1975, the Turkish Cypriots declared the establishment of the Turkish Federated State of Northern Cyprus, which was immediately condemned by the United Nations (Fouskas & Tackie, 2009; Hakki, 2007; Joseph, 1997; Mallinson, 2011; Michael, 2011; Mirbagheri, 2009; Varnava & Faustmann, 2009).

**The Vienna Talks 1975.** The Vienna talks were launched in 1975 by the UN Secretary General Kurt Waldheim to deal with humanitarian issues on Cyprus, ignoring important and protracted political issues, such as powersharing and territorial claims governance (Hadjidemetriou, 2007). The series of talks was based on UNSC Resolution 367 (Michael, 2011), with the first series for negotiated settlement taking place in Vienna in 1975, followed by sequentially organized talks between April 1975 and February 1976, amounting to five rounds in total (Mirbagheri, 2009).

**Round 1.** The first round of talks (28 April – 3 May 1975) primarily focused on issues of ‘powers and functions of central government’ (Michael, 2011), territorial and refugee issues, including the issue of missing persons. The talks outlined the reopening of Nicosia International Airport (Michael, 2011). Despite a number of meetings, it was clear that the sides were widely divided over what kind of federation and under what governmental structure they wanted these issues to be resolved (Michael, 2011).

**Round 2.** The second round of the Vienna talks (5-7 June 1975) primarily focused on the composition and powers of the proposed federal government for the island. After 11 days, the Turkish Cypriots proposed a transitional federal government, arguing that it would encourage trust and cooperation between the sides. This was rejected by the Greek Cypriots, who argued that a transitional government of the type described would undermine the legitimacy of the internationally recognized government of the existing Republic of Cyprus (Michael, 2011).

**Round 3.** The third round of talks (31 July- 2 August 1975) led to an agreement on the Voluntary Regrouping of Populations (Michael, 2011), to which there was little adherence by either side.

**Round 4.** The fourth round of talks (8-10 September 1975) produced no result as Denktaş was reluctant to explore territorial proposals due to the midterm Turkish senate elections which hardened the Turkish stance at the talks. The Turkish Cypriots discussed generalities instead (Michael, 2011).

**Round 5.** The fifth round of talks (17-21 February 1976) saw the Greek Cypriots attempt to organise a central government structure, while the Turkish Cypriots were advocating only for a weak federation of states (Mirbagheri, 2009), and failed in February 1976 (Hadjidemetriou, 2007). In that same year, Rauf Denktaş was elected President of the unrecognized (except by Turkey) Turkish Federated State of Cyprus (Mirbagheri, 2009).

**Round 6.** In 1977 Rauf Denktaş and Archbishop Makarios agreed that the Cyprus problem would be viewed through the lens of federation, along the lines of a two state solution (bi-zonal) (Diez & Tocci, 2009; Mirbagheri, 2009). The Greek Cypriots now understood that the notion of federation would become central to the negotiation process and that they would have to accept the fact that the Turkish Cypriots would control the Turkish Cypriot enclave in the north.

With this understanding, aspirations for *enosis* vanished since half an island could not realistically be united with Greece. Nor could the Turkish Cypriots expect the island to be partitioned, given the international political positions on the issue (Diez & Tocci, 2009). Moreover, in spite of the fact that the two factions had come to an agreement on four points of contention, when discussions concluded, turmoil ensued and the talks ultimately failed as the negotiators continued to argue over territory and the governance of the island since the disagreement over the nature of federation or central control had never been resolved (Diez & Tocci, 2009). In August of 1977 Archbishop Makarios passed away (Mirbagheri, 2009).

### **3.6.6 The period 1979-2002**

**The Kyprianou- Denktas High Level Agreement 1979.** In 1979, Kyprianou, who had replaced Makarios, and Denktas agreed that bi-zonality and bi-communality should remain the basis for further negotiations during the presidency of Kyprianou (1977-88). This agreement continued through the presidencies of George Vassiliou (1988-93) and Glafcos Clerides (1993-), and appeared to be an acceptable framework for negotiations up until 1996 (Joseph, 1997).

In May 1979 a further 'ten point set of proposals' came from both sides with the assistance of Waldheim. The new proposals complemented the 1977 agreement with new provisions related to demilitarization 'and a commitment to refrain from destabilising activities and actions' (Diez & Tocci, 2009, p.154).

Territorial and constitutional issues were supplemented by the issue of Varosha City, which was also put on the negotiating table. On this point, the Greek Cypriots declined to accept 'bi-communality' for the city, while the Turkish Cypriots were reluctant to even negotiate. Negotiations therefore failed (Diez & Tocci, 2009; Joseph, 1997).

#### **Attempts at agreements during the 1980s.**

**1980.** In 1980 Waldheim attempted to revive talks by proposing an interim agreement, prompting a more positive approach and the return of the issue of Varosha to the table, along with the lifting of the economic embargoes imposed on Turkish Cypriots, as well as opening of the Nicosia International Airport (Diez & Tocci, 2009).

On 9 August, the negotiations restarted, led by Hugo Gobbi, the Secretary General's Special Representative. The focus was on four areas:

- improving levels of good will between the two sides
- the return and resettlement of Greek Cypriot refugees in Varosha
- constitutional matters
- territorial issues (Diez & Tocci, 2009, p.154).

The major stumbling block between the sides was the issue of bi-zonality. The Turkish Cypriots interpreted the concept as a form of confederation and emphasised the sovereignty of each state,

while the Greek Cypriots viewed bi-zonality as a recognition of different states, but under a single central government (Diez & Tocci, 2009).

**1983 *The Turkish Republic of Northern Cyprus.*** In November 1983, the Turkish Cypriots declared independence unilaterally to create the Turkish Republic of Northern Cyprus. The move was condemned by the UNSC, which would not recognize the newly proclaimed Republic. Turkey continues to be the only country to officially recognize the TRNC (Diez & Tocci, 2009).

**1984/1985.** In 1984 Javier Perez de Cuellar (who was previously appointed as Special Representative to Cyprus by the UN Secretary General between the years 1975-1977), presented five points for the sides to consider, which were based on confidence building measures. Both sides agreed for Cyprus to be a 'bi-zonal, bi-communal and non-aligned federation' (Diez & Tocci, 2009, p.155). It was agreed that the Turkish Cypriots would retain 29% of the island, and that Turkish troops would leave. In 1985 Kyprianou and Denktas met to conclude the final settlement; however Kyprianou insisted on introducing additional points for negotiation, which derailed the agreement already achieved (Diez & Tocci, 2009).

**1986.** In 1986 de Cuellar presented the sides with a Draft Framework Agreement based on an 'independent, non-aligned, bi-communal, bi-zonal state in Cyprus' (Diez & Tocci, 2009, p.155). The Greek Cypriots pointed out that the issue of the removal of Turkish troops remained unaddressed; nor had the issue of the Turkish settlers' repatriation been considered. In addition, the issue of guarantees for three freedoms – the freedom of movement, the freedom of settlement and the right to own property – was not addressed. The Greek Cypriots also thought that the proposal presented a rather 'confederal nature' as a structure for Cyprus (Diez & Tocci, 2009, p.155). De Cuellar's proposal failed. The 'Greek-Turkish tension in the Aegean reduced hopes for a solution' (Diez & Tocci, 2009, p.155).

**1988/89 *The Set of Ideas.*** In 1988 George Vassiliou won presidential elections in Cyprus. De Cuellar suggested a series of meetings in Geneva, where the two leaders decided to move away from 1986 Draft Framework Agreement and focus on the provisions of the 1979 High Level Agreements. In 1989 the Set of Ideas was presented to the sides. The Turkish Cypriot side rejected it, pointing out that the Secretary General was not in the position to propose plans (Diez & Tocci, 2009).

#### **Attempts at agreements during the 1990s.**

**1990-1993.** In 1990 the sides met with each other in New York under the auspices of the UN. Denktas's goal was that the Greek Cypriots would agree that the Turkish Cypriots had a right to self-determination. Later in the year, the Greek Cypriots applied for EU accession, which in turn made compromise between the sides more difficult. As a result, Denktas withdrew from the talks with UN officials. De Cuellar unsuccessfully attempted to renew the talks, but Denktas's demand

that the two communities have equal sovereignty and the right to secede ended them (Diez & Tocci, 2009).

In 1992 Boutros Boutros-Ghali was appointed by the UN to the position of Secretary General, and continued to promote and work on the Set of Ideas, and the UNSC was presented with an outline of a bi-zonal, bi-communal federation. Any form of union, partition or secession was forbidden. The Greek Cypriots accepted the outline, but Denktaş would not agree to it, nor would he proceed to discussions on other issues (Diez & Tocci, 2009).

When the Turkish Cypriots suggested the talks proceed without the UN, the Greek Cypriots would not agree, and Denktaş returned to continue the negotiations, but since he was still unwilling to discuss anything substantive, the talks ground to a halt. Boutros-Ghali reported that it was the lack of political will and the failure of third party leverage that stopped the negotiations, and not a lack of techniques for negotiating a settlement.

In 1993, a new Greek Cypriot government led by Clerides marginalized the Set of Ideas, yet the Greek Cypriots remained committed to bi-zonality and bi-communal federation. For his part, Denktaş wanted a loose confederation, emphasizing two separate sovereignties (Diez & Tocci, 2009).

***1998 Cyprus and the European Union.*** In 1998, Cyprus's negotiations with the European Union on EU accession started. Turkey's position towards Cyprus's EU bid was hostile, and the Turks threatened to annexe the Turkish Republic of Northern Cyprus if Cyprus became an EU member (Diez & Tocci, 2009).

### **3.7 The Annan Plan**

By 1998, Turkish Cypriot aspirations for a better life in the embrace of 'motherland' Turkey had soured. The influx of thousands of mainland Turkish settlers, apart from other negative effects, helped Turkish Cypriots to become aware of their distinct identity. On the other hand, the harsh political and social conditions relating to complete dependence of Turkey turned many of them against tying their future with Turkey. Following the bank crisis of 2000-2001, in particular, and the opening of the way, through the Helsinki EU summit decisions (Dec. 1999) for Cyprus's EU accession, the vast majority of Turkish Cypriots started envisaging their future in a reunified Cyprus under a federal Republic member of the EU. So, when the Annan Plan was handed to the parties involved, the Turkish Cypriots saw in it a unique opportunity to get rid of a repressive regime, to have an end to their isolation, to live in freedom, welfare and peace, in their words, to 'be liberated from their liberators'!



### **3.7.1 Emergence of the Annan Plan (Jan2002- March 2003)**

Due to the Europe's enlargement to encompass prospective member states into the circle of the European Union, in 2002 the EU pushed the United Nations to generate a comprehensive plan for the Cypriot conflict resolution (Hadjidemetriou, 2008; Ker-Lindsay, 2011; Michael, 2011; Sözen, 2007a & b). The so-called Annan Plan was the most comprehensive and detailed plan designed by the United Nations (Hannay, 2005; Pericleous, 2009; Sözen, 2007a & b), calling for the reunification of the island and formation of the United Cyprus Republic (UCR) as a 'bizonal federal structure comprised of two constituent states, the Greek Cypriot State and the Turkish Cypriot State' (Sözen, 2007a, iii). The Annan Plan was inspired by the evolution of the long negotiations and incorporated principles, proposals and agreements of the two sides over the many years (Hannay, 2005; Sözen, 2007a & b).

The backbone of the Annan Plan were the 1977 and 1979 high level summits, Guellar's draft framework, and Ghali's Set of Ideas (Sözen, 2007a). It was comprehensive and provided all of the instruments of a federal republic with constituent states. Furthermore, the Plan was ready to put into action as soon as the foundation agreement came into force, whereas previous plans had merely been statements of the principles and the framework in which negotiations would take place (Pericleous, 2009).

The Annan Plan addressed the core issues of territory, security, property and membership of the EU, as well as more technical matters (Hannay, 2005). The plan was based on constitutional arrangements and suggested a bi-zonal loose federation that integrated the states of the Greek and Turkish Cypriots (Hannay, 2005; Sözen, 2007). Various sections of the plan could be implemented separately, and it had been designed to enable Cyprus, reunited, to sign a Treaty of Accession to the European Union as soon as possible (Hannay, 2005).

The purpose of the Annan Plan was to bridge the gap on all the irreconcilable issues between the two sides. It was a workable and pragmatic plan, without trying to encompass all the demands presented by the two sides (Sözen, 2007a).

The talks resumed in January 2002 at the request of the Turkish Cypriots. It was believed at the time that this was triggered by Cyprus's EU accession, which later proved to be true (Diez & Tocci, 2009). Despite Kofi Annan's intervention, progress was close to nil. It has been understood that Denktaş was 'receiving support from the nationalist administration in Turkey' (Diez & Tocci, 2009).

Soon the first draft of the Annan Plan was available for discussion in advance of the European Council in Copenhagen in December 2002. However, due to the Turkish Cypriots' refusal to negotiate, no negotiation took place (Diez & Tocci, 2009).

The TRNC's parliamentary elections in December 2003 revealed that the Turkish Cypriots demanded from the leadership to undertake a careful approach to negotiations before Cyprus became an EU member (Sözen, 2007a). Given Turkish Cypriot demands, Turkey, which also wanted to secure its access to the EU, made moves to solve the Cypriot problem and their diplomatic efforts with the UN, EU and US convinced the UN Secretary General that the Turkish side had the necessary political will to resume the Cyprus negotiations and finalize them by 1 May 2004 (Sözen, 2007a).

In January and February of 2003 discussion between the Greek and Turkish Cypriots continued in an attempt to meet a 28 February deadline set by the Annan Plan to reach a settlement, but Denktaş remained uncompromising (Diez & Tocci, 2009). Tassos Papadopoulos was elected as Greek Cypriot President, but the sides could not bridge the differences before the deadline despite the visit of the Kofi Annan to the island.

Neither side would compromise, and the Turkish Cypriot authority was officially criticized. Turkey was informed that the behaviour of the Turkish Cypriot leadership was putting Turkey's goal of EU accession at risk. The sides were asked to put the Annan Plan to two separate referenda; Papadopoulos unwillingly accepted the idea, while Denktaş rejected it (Diez & Tocci, 2009). The Turkish Cypriot authority was criticized again and the negative impact of Turkey's EU accession was emphasised. Due to this, in April 2003, the Turkish Cypriots decided to open up a crossing (Diez & Tocci, 2009).

Denktaş's consistent hard line position frustrated Turkey, a frustration that only increased when pro-solution representatives failed to win in the Turkish Cypriot elections in December of 2003. The Republican Turkish Party (CTP) with Mehmet Ali Talat as leader formed a coalition with the Democratic Party (DP), led by Serdar Denktaş's son (Diez & Tocci, 2009).

On 24 January 2004 the Turkish Prime Minister Recep Tayyip Erdoğan met with Kofi Annan in the World Economic Forum, which led Annan to organize a meeting in New York for Papadopoulos and Denktaş, where the two sides agreed to renew talks (Diez & Tocci, 2009).

Although in February 2004 the Greek and Turkish Cypriot sides, as well as Greece and Turkey, were invited to New York to finalize Annan's conditions for resumption of negotiations, progress was not made on substantive issues (Diez & Tocci, 2009). However, under immense international pressure, the Greek and Turkish Cypriot sides reluctantly agreed to the UN Secretary General's conditions (Ker-Lindsay, 2011; Sözen, 2007a).

It was agreed that the Greek and Turkish Cypriots would negotiate under the auspices of the UN until the 21<sup>st</sup> of March. If there was no meaningful agreement by then, Greece and Turkey would assist so that a resolution could be reached between the 22-29 March. The UN would then decide on any unresolved matters and the agreement would be put to a referendum on 24 April 2004 (Sözen, 2007a).

The Greek and Turkish Cypriot sides failed to reach consensus during the Nicosia negotiations in February and March 2004 and Greece and Turkey joined the Greek and Turkish Cypriots in their negotiations in Burgenstock, Switzerland in late March 2004 (Diez & Tocci, 2009; Sözen, 2007a). The Burgenstock negotiations produced the fifth and final version of the Annan Plan which was put to the Greek and Turkish Cypriots on separate referenda on 31 March to vote on 24 April 2004 (Diez & Tocci, 2009; Ker-Lindsay, 2011; Sözen, 2007a).

### **3.7.2 The key principles adopted in the Annan Plan**

The following section introduces the main themes from the final revisited version (5<sup>th</sup>) of the Annan Plan.

- political system
- territory
- property
- historical and cultural heritage
- security and guarantees
- settlers.

The notion of federation for the island was an underlying principle in Cuellar's Set of Ideas in 1989 and in the UN documents in 1984, 1985 and 1986. This notion of a federal partnership was adopted in the Annan Plan, but discussed as 'a new state of affairs' and outlined a complex political process (Pericleous, 2009).

The notion of bi-zonal and bi-communal federation permeated the Annan Plan (Ker-Lindsay, 2011; Pericleous, 2009). This idea therefore remained in the 1977 and 1979 high-level agreements and was also supported by the UNSC Resolutions 649 of 1990, 716 of 1991, 750, of 1992 (Pericleous, 2009). The provision related to the return of the displaced persons was also covered in the Plan (Pericleous, 2009).

The political equality introduced in the Cuellar Plan of 1984 was mentioned in 1986 and 1989 in the Set of Ideas (Pericleous, 2009). The concept of political equality was introduced and reformulated in the Annan Plan and permeates all the constitutional provisions related to communities' participation in federal organs (Pericleous, 2009).

Similar to the original arrangements proposed in 1963 by Archbishop Makarios, the President and the Vice President of the government would be elected by the members of the House of Representatives for Cyprus from a common roll (Pericleous, 2009). Indivisible sovereignty was to be settled equally on the Greek and Turkish Cypriot communities, which would be one territory composed of two politically equal federated states that shared a single citizenship and international personality. The communities would each be governed by the same federal law allocated to the powers and functions of the federal government.

**Political system.** The new state would have a parliament made up of two houses – the Senate and the Chamber of Deputies – both of which would have 48 members. In the Senate, the two component states would be politically equal at all times and would have 24 members each. The relative numbers of seats in the Chamber of Deputies would be determined according to the proportionate population of the two component states, with neither state having less than 25% of the seats. Any decisions by the parliament would require a simple majority vote of both houses to pass. There would also be separate legislatures in the two component states and Greek Cypriots and Turkish Cypriots living in the component state of the other community would have the right to be represented in the component state legislature.

As for the executive, power would be vested in a six-member presidential council, members of which would be elected by both houses of the parliament from a single list. The offices of president and vice-president would rotate among members of the presidential council every ten months. Neither component state (in other words, the Greek and Cypriot communities) would be able to hold the presidency for more than two consecutive terms. However, for the first three years the two current leaders – Papadopoulos and Denktas – would serve as co-presidents. Lastly, a supreme court would also be established that would be made up of nine judges – three Greek Cypriots, three Turkish Cypriots, and three non-Cypriots (Ker-Lindsay, 2011).

**Territory.** The issue of territory has become one of the central areas of disagreement in the Annan Plan. A substantial return of territory to the Greek Cypriots is suggested in the Plan, namely the return of displaced persons and reinstatement of the Greek Cypriot properties which remained under the Turkish Cypriot administration (Hannay, 2005; Mullen, Apostolides, & Besim, 2014; Pericleous, 2009). The basis for territorial adjustment was Boutros-Ghali's map from 1992 (Hannay, 2005). The options to adjust boundary lines were considerable, providing the sides the flexibility to manoeuvre.

Secretary General Kofi Annan had noted in his report to the UNSC in April of 2003, that the issue of displaced persons and property were highly contentious. The Greek Cypriots had fled to the north, leaving their property to be forcibly taken over by the Turks and Turkish Cypriots, while the Turkish Cypriots had been displaced from the south because of the ethnic conflicts. In spite of the deeply held grievances caused by this situation, Annan made it clear that, with restrictions, the arrangements to resettle displaced persons and reinstate property should remain as part of the negotiations (Pericleous, 2009).

However, the Turkish Cypriot zone, was always going to be 28% of the territory, while the Greek Cypriot zone was going to be 72% (International Crisis Group, 2014; Hannay, 2005). In response, Denktas rejected any discussions on territorial adjustments and ruled out of the question any 'return and resettlement of displaced persons and reinstatement of their properties in the Turkish Cypriot constituent state' (Pericleous, 2009, p.200).

Under the Annan Plan, the return of the territory would have taken effect in six transitional phases during the 42 months between the years 2004 and 2007 (Michael, 2011; Pericleous, 2009). The uninhabited areas along the buffer zone were to be returned in the first and second phases. Relocation of the population would take effect from the third to the sixth phase (Pericleous, 2009). Had it gone ahead, the territorial readjustment would have seen 84,000 Greek Cypriot refugees return to their homelands and the repopulation of the ghost cities of Varosha and Morphou (Michael, 2011).

**Property.** The property issue was clearly connected with the issue of territorial control and involved the rights of the ‘dispossessed owners’ and the ‘current users’ of the affected properties, both of which had to be respected, while ‘the principle of bi-zonality’ had to be preserved (Michael, 2011; Pericleous, 2009). The reinstatement of properties and the conditions for reinstatement were complex, extensive and detailed. A Property Board would assess the claims for reinstatement, and determine the circumstances of evacuation and the means and methods of property transfer and compensation (Michael, 2011; Pericleous, 2009). The decisions of the Board would be binding on all parties (Pericleous, 2011, p.205), and any disputes outside the official territorial adjustment would still be resolved by reinstatement or compensation (Michael, 2011).

Unlike previous UN proposals, the Annan Plan was comprehensive and the arrangements for the resolution of the territorial issue, displaced persons and properties, and the outcomes would have equal force to the Foundation Agreement, while being regulated by the Property Board through the Claims Bureau, the Housing Bureau and the Compensation Bureau (later Compensation Fund) (Pericleous, 2009). Territorial adjustments for the Greek Cypriots would be substantial. Claimants would not, however, be automatically entitled to return to their homes since the Annan Plan largely unlinked residency rights from the issue of property reinstatement (Pericleous, 2009). If returning home were not a possibility, compensation for the loss of the property would be based on the market value, adjusted for inflation, at the time the property was lost (Ker-Lindsay, 2011).

**Historical and cultural heritage.** Historical and cultural heritage was also addressed in the Annan Plan. Based on the Set of Ideas, the management of religious and ancient monuments was assigned to the federated states (Pericleous, 2009). According to Pericleous (2009), reconnection with the historical and cultural environment could be at core of a Cypriot solution. The reconnection of the Greek Cypriot community, the return to the Church of all churches, monasteries, chapels, burial places and generally all religious sites, would bind the

*cut veins of people to their memories, would have joined fellow villagers, both returnees and non-returnees, at the churchyard of their patron saint, would have restored a social network and would have revived in the souls of people the feeling of community. (Pericleous, 2009, p.207)*

**Security and guarantees.** Security, the withdrawal of troops and guarantees were central to the Annan Plan. The Turkish Cypriot fears of diminishing rights and their status as a minority had to be balanced with a Greek Cypriot obsession for majority rule, which could perpetuate the desire for *enosis* (Pericleous, 2009). On the other hand, the Greek Cypriots also felt threatened, and strongly desired to protect their ethnic and cultural entity against Turkish threats to invade Cyprus; a feeling ‘fed by the fate of the Greeks of Istanbul’ (Pericleous, 2009, pp.210-211).

The Cuellar Set of Ideas from 1989 dealt with the issues of security and guarantee, and had been included in the Ghali Set of Ideas in 1992. Security arrangements applied to the Republic of Cyprus and the federated states, as well as a demilitarization to reduce troop numbers and achieve a numerical balance between Greek and Turkish Cypriot forces to be stationed in their respective states. Forces other than those would only be allowed as provided under the Treaty of Alliance, which meant that 950 and 650 soldiers from Greece and Turkey respectively could be stationed on the island (Michael, 2011; Pericleous, 2009) after the drawdown of troop numbers following the implementation of the Plan. The intention was that Turkish troop withdrawal would be in phases until 2018 or until Turkey entered the EU, at which point the United Cyprus Republic (UCR) would be permanently demilitarized, except for an extended UN peacekeeping mission (Michael, 2011; Pericleous, 2009).

The 1960 treaties, the Treaty of Establishment, the Treaty of Guarantee, and the Treaty of Alliance were maintained alongside new treaties with Greece, Turkey and Britain. Cyprus was prohibited from union with any other country, but as Cyprus seemed certain to join the EU, it was constitutionally bound to support Turkish EU accession (Ker-Lindsay, 2011).

**Settlers.** Although the colonization of Cyprus violated Article 49(6) of the international law of the Fourth Geneva Convention, Turkey from the outset pursued colonization and the Turkification of the occupied territory to improve (from their point of view) the demographic ratio between Greek and Turkish settlers (Pericleous, 2009). Furthermore, through the appropriate manipulation, leadership among the Turkish Cypriots could be influenced to serve Turkish objectives on the island (Pericleous, 2009).

In earlier agreements, the issue of settlers had never been explicitly addressed. Provisions in the Annan Plan aimed to preserve the demographic ratio between the Greek and Turkish Cypriots on the island. Under the Plan, settlers living in Cyprus when the plan went into effect had to meet clearly defined criteria to be entitled to citizenship based on the Foundation Agreement (Pericleous, 2009). Settlers who met the criteria could stay, while others would be required to leave the island, and would be compensated upon their resettlement in their country of origin (Pericleous, 2009).

On the whole, the Annan Plan dealt with settlers scrupulously and in detail. It was clear at the time, however, that as time passed, more settlers who either met the criteria or were supported by the argument for basic human rights would settle permanently on the island (Pericleous, 2009).

### **3.7.3 The period of the post Annan Plan 2004-2008**

The Annan Plan was introduced on 24 April 2004 as a separate referendum to both communities and failed to get the support of both ethnic groups. The main Turkish Cypriot parties were pro solution and endorsed it despite Denktaş's reluctance to accept the plan (Diez & Tocci, 2009). The Greek Cypriot side was not in favour of the Annan Plan, specifically when Papadopoulos called for the people to reject it (Diez and Tocci, 2009). As a result, 65% of Turkish Cypriots voted in favour of the plan, while 76% of Greek Cypriots rejected it (Diez & Tocci, 2009; Sözen, 2008). In 1 May 2004 Cyprus joined the EU (Diez & Tocci, 2009). Thereafter, political negotiations stalled for four years (Cyprus Profile – Timeline, online).

The reason behind the Greek Cypriot rejection was explained by the Turkish Cypriot community as a calculated strategy to use its European Union membership as a means to put pressure on the Turkish Cypriots and Turkey to accept the solution on Greek Cypriot terms. According to the Turkish Cypriots, the aim of the Greek Cypriot community was to unite the island into a unitary state with Greek Cypriots as the ruling community (Sözen, 2008). The low level of trust between the ethnic communities increased with the rejection of the Annan Plan (Sözen, 2008). And the response to the referendum was an indication of the divergent and asymmetric objectives of the Greek and Turkish Cypriots and the deep mistrust between them.

## **3.8 Regional and international dimension of the Cyprus problem**

### **3.8.1 The position of the US and its allies**

The year 1964 marked an important year for the US, as both NATO members Greece and Turkey could have ended up fighting over events in an ethnically divided Cyprus (Colman, 2010).

In the 1960s, the US was attempting to maintain regional stability and security in the Middle East, which included minimizing the influence of the Soviet Union and maintaining oil flow to the West. In addition, the US sought to maintain friendly relations with Middle Eastern nations while continuing to support Israel (Colman, 2010). Relations between Turkey and Greece were extremely tense, however, with the Soviet Union providing covert backing for the Greek Cypriots, and Turkey responding belligerently to the truculence of Greece and the Greek Cypriots.

From the outset, the United States did not want to be involved in the conflict and did not wish for NATO to be involved or be seen as involved (Ker-Lindsay, 2004). The Americans would have preferred that the British solve the Cyprus problem, given Britain's ties with the island, but

Britain felt compromised by their relationship with Greece and asked the US to help them (Colman, 2010; Ker-Lindsay, 2004). Ultimately a Turkish threat to invade and partition the island led the United States to intervene decisively, including President Johnson insisting that Turkey refrain from invading because if they did, the US would not support them in any subsequent conflict Turkey might have with Greece (Colman, 2010; Ker-Lindsay, 2004).

It was in the geostrategic interest of the US that the Cypriot crisis be solved within the NATO framework since not only did Greece and Turkey remain guarantor powers in accordance with the 1959 agreements, but their conflict weakened a NATO barrier to the extension of Soviet power. Since they were both members of NATO, the danger was that open conflict between the Greeks and Turks over Cyprus would fracture the NATO alliance and contribute to open civil war on the island (Aksu, 2003; Colman, 2010; Hakki, 2008; Ker-Lindsay, 2004). The weakening of Turkey and Greece because of Cyprus would weaken NATO, and could have caused the withdrawal of foreign troops and bases on the island, compromising both the US and Britain's intelligence capabilities (Colman, 2010).

The Soviets persisted in sowing ill will among NATO members with anti-western and anti-colonial rhetoric, and the US was not in a position to 'permit Turkey or Britain to be labelled aggressors' (Aksu, 2003, p.133). Historically, Greece shared cultural and historical links with Russia, including a common Orthodox heritage, and a view of the Ottoman Empire as a common enemy (Aksu, 2003). The American backed Greek junta of 1967 had not yet been installed in Athens (Aksu, 2003), and Greece was in the throes of a strong social movement.

For Britain, Cyprus was 'the principal base for the British striking airforce' (Aksu, 2003, p.134), and the British were concerned about losing influence to the Americans. It was Britain that brought to the attention of the UNSC the deteriorating situation in Cyprus when they realised they could no longer control the escalating situation. Britain's and Cyprus's requests to the UNSC about the situation in Cyprus formed 'the agenda for the subsequent discussions of the Cyprus question at the Council' (Aksu, 2003, p.134).

### **3.8.2 The involvement of the United Nations**

When the attempts to resolve the Cyprus crisis within the boundaries of NATO failed, the United Nations was brought onto the scene (Aksu, 2003; Ker-Lindsay, 2004), but neither Britain nor the United States could risk leaving the matter entirely in the hands of the General Assembly, where the majority of states were suspicious of possible western neo-colonialist intentions. The General Assembly was therefore virtually sidestepped quite early in the process, all the more easily as it was not in session at the time. The General Assembly's formal contribution to the orientation of UNFICYP remained limited (Aksu, 2003).



The two communities which were disputing the island presented two completely different versions of the conflict, confounding the UN. Furthermore, while the UN saw its intervention in Cyprus in terms of efforts to secure peace, security and sovereignty, the members of the UNSC focused on unity, territorial integrity and political independence with little reference to human rights or socio-economic development, issues that greatly concerned the Cypriots on both sides (Aksu, 2003).

On the UNSC, the Soviets argued that the new Republic of Cyprus should be protected against external aggression, with an eye on Turkey, which was claiming the right to intervene unilaterally to protect the Turkish Cypriot community. Their overarching concern, and that of the NATO powers, was that the conflict in Cyprus should not escalate and cause the Eastern Mediterranean, a sensitive region in the Cold War, to become unstable (Aksu, 2003).

The situation on the island was complex and therefore it was very difficult or even impossible to determine whether the root cause of conflict was intra-state or inter-state (Aksu, 2003, p.136). The non-permanent members of the UNSC decided that there was little to be gained from further efforts to establish the causes of the conflict, externally or internally. Instead, they acknowledged the complexity, but focussed on the danger of the situation for regional stability. The non-aligned countries in the UN did not find the causes nor the interplay of external forces in Cyprus to be nearly as important as the implications of the situation for them in the Cold War environment (Aksu, 2003).

The external tensions between Greece and Turkey, along with the persistent rhetoric of the Soviets in the UN itself, and the internal tensions between the Greek and Turkish Cypriots, meant that the UN peace keeping force was charged with maintaining international peace and security (Aksu, 2003).

In the early stages of UNSC deliberations, discussion was dominated by notions of sovereignty. All members, regardless of their political stance on the issue of Cyprus, repeatedly referred to concepts such as sovereignty, territorial integrity, political independence and non-intervention. Human rights and socio-economic development were not considered (Aksu, 2003).

### **3.8.3 Ideas of non-intervention**

Britain was content to intervene in the Cyprus crisis by pointing out that the 'Greek held government in Cyprus was under obligation to maintain security within its territory and to observe the constitution under which it was created and which authorized its representatives to speak on behalf of the Republic' (Aksu, 2003, p.146).

The Soviet view was that no third parties should be allowed to intervene in the domestic affairs of the new Republic, including the UN (Aksu, 2003; Ker-Lindsay, 2004). The deployment of the UN forces on the island, therefore, was perceived by the Soviets and their allies as being a form

of intervention (Aksu, 2003, p.139), the non-interventionist stance, with which France, from the Western Bloc agreed.

From the very beginning Turkey had 'demanded intervention to deal with the internal conflict in Cyprus' (Aksu, 2003, p.140), while Greece perceived external forces to be a threat. Eventually, however, Greece became convinced that a UN force would be needed on the island to keep peace between Greek and Turkish Cypriots and maintain internal law and order. Ultimately at the request of the Cypriot government, the Soviet Union tolerated the UN deployment of forces (Aksu, 2003; Hakki, 2007). The peace keepers were accompanied by a UN mediator appointed by the UNSC (Resolution 186) with the aim of 'promoting a peaceful solution and an agreed settlement of the problem confronting Cyprus' (Aksu, 2003, p.140). In these circumstances, Gyani became UNFICYP commander and Sakari Tuomioja (Finland) became a UN Mediator (Aksu, 2003).

Peace and security were the core of the UN's peacekeeping mission, which focused on prevention of violence. The UN Mediator focused on providing the sides with a favourable environment for negotiations which would lead to the conflict resolution. UNFICYP had a limited scope, therefore, and a very limited impact on the political situation in Cyprus (Aksu, 2003).

### **3.9 Summary**

Since 1964 the United Nations has played a vital role in conflict resolution in Cyprus, putting in a substantial amount of collective effort by introducing various forms of mediation. However every attempt has resulted in failure.

The UN and the UNFICYP (United Nations Force in Cyprus) have, however, established a 'negotiating culture' (Pericleous, 2009, p.172) and prevented the outbreak of war on the island. Thus, after over four decades, the status quo prevails, which the two sides seem to find comforting. The Turkish Cypriots have accepted the stalemate as a consolidation of the original invasion by Turkey, and perceived their direct contact with UN officials on an equal footing with the Greek Cypriot side as a form of legitimisation of the regime established in the occupied area of Cyprus (Pericleous, 2009).

The Greek Cypriots, on the other hand, perceive the status quo to be the second best option to the resolution of the conflict which might produce an end outcome of a federated solution which would provide the Turkish Cypriots 20% and Greek Cypriots 80% of the management of the island, and have appreciated the prevention of violence between the two ethnic groups.

The Greek Cypriots have also found the UN intervention useful since it has prevented further violence between the communities. Nevertheless, none of the UN's fundamental principles has

been realised. Foreign troops remain as part of a long intervention and refugees from either side are unable to return to their homes.

The zero game sum of the two sides and the limited UN mandate ‘to enforce compliance’ (Pericleous, 2009, p.173) and/or decisions, ‘have ultimately led to institutionalization of the peacemaking process and the approach to each round of talks as ‘a never-ending ritual’ (Pericleous, 2009, p.173). Due to such a complex conundrum, domestic, regional and international sides have started to perceive the Cyprus problem as ‘a situation to be managed rather than solved’ (Pericleous, 2009, p.173).

In 2004 (the period of the Annan Plan) the United Nations adopted a different perspective on mediation; this included two phases, where the first phase involved communication between the two Cypriot communities, while the second phase involved leadership from both communities. It has been assumed if a new adopted framework would have failed, then the UN Secretary General would construct a final settlement, which would be based on the discussion of the two communities and leadership, and eventually a final settlement would have to be introduced to both sides in the form of separate referenda (Diez & Tocci, 2009). At that time, this was a new approach which went beyond the Good Offices mandate and therefore was labelled as ‘arbitrated mediation’ (Diez & Tocci, 2009, p.147). Despite the United Nation’s good will and a serious attempt to break the deadlock, the sides did not reach a final settlement (Diez & Tocci, 2009).

It has been put forward by the previous United Nation’s representative to Cyprus Alvaro De Soto that the Greek Cypriots have no incentive to seek a comprehensive solution due to their European Union membership and viable economic position (Sözen, 2007a). The Turkish Cypriot community, on the other hand, has continued to emphasise its delineation and isolation from the international community which has been reflected on all levels with restrictions imposed upon them, thus leaving no choice to the Turkish Cypriots but to adhere and be dependent on the Turkish economy.

In the wider context, the Cypriot solution provided the stability in the East Mediterranean region that the Western powers sought, especially contact with energy sources, pipelines and sea lane transport; and the Cypriot conflict gained the US a sphere of influence in a relatively ‘neutral’ zone (Aksu, 2003). UNFICYP’s mandate was to remain neutral, and the peace keeping force has never favoured one intra-state at the expense of the other, nor taken sides in global (United States vs. Soviet Union) conflict (Aksu, 2003).