

Istanbul Bilgi University

Institute of Social Sciences

Organizational Psychology Master's Degree Program

Psychological Capital and Contextual Ambidexterity:

The Role of Transformational Leadership as a Moderator

Elif Semra TULUM

116632006

Thesis Advisor: Assoc. Prof. Deniz KANTUR

Istanbul

2019

Istanbul Bilgi University

Institute of Social Sciences

Organizational Psychology Master's Degree Program

Psychological Capital and Contextual Ambidexterity:

The Role of Transformational Leadership as a Moderator

Elif Semra TULUM

116632006

Thesis Advisor: Assoc. Prof. Deniz KANTUR

Istanbul

2019

ACKNOWLEDGEMENTS

Thanks all the challenges I've faced in my entire life beyond this master thesis that made me more *resilient*. And thanks all the people I love and care about who make all the hardships alleviate and make life worthwhile.

TABLE OF CONTENTS

ACKNOWLEDGEMENTS	iii
LIST OF FIGURES.....	vi
LIST OF TABLES	vii
ABSTRACT	viii
ÖZET.....	ix
CHAPTER I	1
INTRODUCTION.....	1
CHAPTER II.....	4
LITERATURE REVIEW	4
2.1. AMBIDEXTERITY	4
2.1.1. Concept Definition of Ambidexterity	4
2.1.2. Types of Organizational Ambidexterity	6
2.1.2.1. Structural (Simultaneous) Ambidexterity	7
2.1.2.2. Sequential Ambidexterity	8
2.1.2.3. Contextual Ambidexterity.....	8
2.1.3. Antecedents of Organizational Ambidexterity	11
2.2. PSYCHOLOGICAL CAPITAL.....	14
2.2.1. Concept Definition of Psychological Capital	14
2.2.2. Dimensions of Psychological Capital.....	15
2.2.2.1. Self-efficacy	15
2.2.2.2. Hope.....	16
2.2.2.3. Optimism.....	17
2.2.2.4. Resilience	17
2.3. TRANSFORMATIONAL LEADERSHIP	18
2.3.1. Dimensions of Transformational Leadership	20
2.4. RELATIONSHIP BETWEEN CONTEXTUAL AMBIDEXTERITY, PSYCAP AND TRANSFORMATIONAL LEADERSHIP	21
2.4.1. Relationship between Psychological Capital and Contextual Ambidexterity	21
2.4.2. Relationship between Transformational Leadership and Contextual Ambidexterity	22
2.4.3. Relationship between Psychological Capital and Transformational Leadership	23
2.5. RESEARCH MODEL AND HYPOYHESES	24
CHAPTER III.....	32
METHOD.....	32
3.1. Sampling and Participants	32

3.2. Instruments	34
3.2.1. Contextual Ambidexterity Scale.....	34
3.2.2. Psychological Capital Scale.....	35
3.2.3. Transformational Leadership Scale	35
3.3. Procedure.....	36
3.3.1. Human Participant Research Ethic Committee Approval	36
3.3.2. Data Collection	36
3.3.3. Data Analysis.....	36
CHAPTER IV	38
RESULTS.....	38
4.1. Confirmatory Factor Analysis of the Scales	38
4.1.1. Factor Analysis of Contextual Ambidexterity Questionnaire	38
4.1.2. Factor Analysis of Transformational Leadership Questionnaire.....	40
4.1.3. Factor Analysis of Psychological Capital Questionnaire	43
4.2. Correlation Analyses	45
4.3. Results of Linear Regression Analysis.....	47
4.4. Results of Multiple Hierarchical Regression Analysis	47
CHAPTER V	53
DISCUSSION AND CONCLUSION	53
5.1. Summary of the Findings	55
5.2. Contributions of the Study	56
5.3. Limitations and Recommendations for Future Research	56
5.4. Managerial Implications.....	57
References	59
APPENDICES.....	68
APPENDIX 1	69
APPENDIX A	70
APPENDIX B	72
APPENDIX C	77
APPENDIX D	78
APPENDIX E TURKISH VERSION OF SCALES	80
APPENDIX F THE ETHICS COMMITTEE APPROVAL FORM.....	88

LIST OF FIGURES

Figure 2.1. Conceptual Model of the Research

24

LIST OF TABLES

Table 2.1. Different Definitions of “Exploration”, “Exploitation” and “Ambidexterity”	10
Table 3.1. Sectoral Distribution of the Participants	33
Table 3.2. Demographic Information of the Participants	34
Table 4.1. Factor Analysis of Contextual Ambidexterity (CA) Questionnaire	40
Table 4.2. Factor Analysis of Transformational Leadership (TL) Questionnaire	42
Table 4.3. Factor Analysis of Psychological Capital (PsyCap) Questionnaire	44
Table 4.4. The Correlation Analysis of the Continuous Variables in the Study (N=181)	46
Table 4.5. Regression Analysis of PsyCap, Self-efficacy, Hope, Resilience and Optimism as Independent Variables on Contextual Ambidexterity as Dependent Variable	47
Table 4.6. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Psychological Capital and Contextual Ambidexterity	48
Table 4.7. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Self-efficacy and Contextual Ambidexterity	49
Table 4.8. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Hope and Contextual Ambidexterity	50
Table 4.9. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Resilience and Contextual Ambidexterity	51
Table 4.10. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Optimism and Contextual Ambidexterity	52

ABSTRACT

To sustain organizational performance, achieving exploitation in the current operations with the use of already-existing resources and seeking new opportunities and craving for radical changes in a balanced manner is a prominent managerial challenge in today's competitive business world. Under these circumstances, it is mainly leaders' role to foster employees' psychological capital in gaining the autonomy to allocate their time between activities serving to either incremental or revolutionary change. In this sense, considering that contextual ambidexterity is underresearched among other types of organizational ambidexterity, this study contributes to the literature by focusing on psychological capital (PsyCap), of which four dimensions are self-efficacy, hope, resilience and optimism, as one of the antecedents of contextual ambidexterity with the moderation effect of transformational leadership.

Using a sample of 181 white-collar employees, upon analyzing the relationships between PsyCap, self-efficacy, hope, resilience and optimism as separate independent variables and contextual ambidexterity as the dependent variable, all of them had positive correlations with one another and regression analyses supported the hypotheses, in the scope of this study, the moderation effect of transformational leadership on these relationships was examined. Hypotheses suggesting that the effect of transformational leadership as a moderator on the relationship between PsyCap, self-efficacy, hope, resilience and hope as independent variables and contextual ambidexterity as the dependent variable in different models in a way that effect of increase in transformational leadership would be positive were not supported.

Keywords: contextual ambidexterity, psychological capital and transformational leadership

ÖZET

Örgütsel performansı sürdürmede, mevcut operasyonlarda hâlihazırda sahip olunan kaynaklardan faydalanırken yeni fırsatlar arama ve radikal değişiklik arzusunu sürdürmeyi dengeleme günümüz rekabetçi iş yaşamında önemli yönetimsel zorluklardan biridir. Bu koşullar altında, çalışanların vaktini mevcut işler ve yeni fırsatlar yakalama arasında dengeli bölmeleri için gerekli özerkliği kazanmasını sağlamak adına psikolojik sermayelerini güçlendirme sorumluluğu büyük oranda liderlerin görevidir. Bu kapsamda, bağlamsal çift yönlülüğün diğer örgütsel çift yönlülük türleri arasında en az araştırılan olduğu göz önünde bulundurularak, bu çalışma literatüre bağlamsal çift yönlülüğün öncüllerinden biri olarak öz yeterlilik, umut, dayanıklılık ve iyimserlik dört alt boyutu olan psikolojik sermayeye, dönüşümcü liderlik moderasyon etkisiyle odaklanarak katkı sağlamaktadır.

181 kişilik bir beyaz yaka örneklemini kullanarak psikolojik sermaye, öz yeterlilik, umut, iyimserlik ve dayanıklılığı bağımsız değişken ve bağlamsal çift yönlülüğü bağımlı değişken olarak inceleyip değişkenler arasında yüksek korelasyon bulduktan sonra; çalışma kapsamında, bu ilişkilere dönüşümcü liderliğin moderasyon etkisi incelenmektedir. Psikolojik sermaye, öz yeterlilik, dayanıklılık, umut ve iyimserliğin bağımsız değişken ve bağlamsal çift yönlülüğün bağımlı değişken olduğu farklı modellerde, moderatör değişken olarak dönüşümcü liderlikteki artışın modele pozitif etkisi olacağı araştırma hipotezleri bu çalışma kapsamında desteklenmemektedir.

Anahtar Kelimeler: bağlamsal çift yönlülük, psikolojik sermaye ve dönüşümcü liderlik

CHAPTER I

INTRODUCTION

Sensing the shifts in the technology, management and markets and configuring a successful strategy to adapt to the changes and seizing new opportunities while making profit in the short-run is one of the greatest challenges organizations face. Accordingly, organizations that have managed to reconcile alignment and adaptability activities, namely those that are ambidextrous, are more likely to survive than the ones lacking the capabilities or assets to orchestrate the exploitation and exploration. Hence, conceptually, the strategy to manage tangible or intangible resources of the organizations in a way that both short-term and long-term expectations of the companies are met; in that, priorities of the companies like financial security is addressed while innovative changes are fostered, is called ‘organizational ambidexterity.’

Being one of the forms of organizational ambidexterity, contextual ambidexterity, of which main focus is on the individual’s autonomy to balance alignment and adaptability by allocating their resources, accordingly in a supportive environment- which would contribute to the organization’s overall ambidexterity in the long-run- is the subject of this study.

Contextual ambidexterity, compared to structural and sequential ambidexterity, is less known and studied in the management field, and individuals as the originators of unit-level or firm-level analyses should particularly be focused on as units of analysis to further examine the ambidexterity construct (Raisch & Birkinshaw, 2008; Li, Lin, & Tier, 2015). In this context, this study also addresses the ‘psychological capital’ concept considering that employees’ level of psychological capital influence whether they behave ambidextrously as a performance indicator or success criterion. In achieving both exploration and exploitation in the organizations, O’Reilly and Tushman (2008) emphasize the vital role of leaders within the organizations in the use of the existing capabilities or ‘mature strategies’ of a firm while

simultaneously pursuing new opportunities in the changing markets. Furthermore, as Kauppila and Tempelaar (2016) suggest “leaders can facilitate their followers’ ambidextrous behavior by simultaneously focusing on the task and support aspects of leadership” (p. 1027). With reference to leadership theories, this research suggests that ‘transformational leadership’ as it is perceived by the followers, among others would have a moderating effect on the relationship between psychological capital and contextual ambidexterity; in that, with this leadership style subordinates are provided with the enough autonomy to shift from exploration to exploitation. As Li et al. (2015) assert “transformational leaders trigger followers to host contradictory activities and overcome role conflicts when multitasking” (p. 928). Therefore, while employees are shifting between two seemingly paradoxical activities called exploration and exploitation, their levels of psychological capital would have an important effect in this goal achievement; in that individuals with high levels of psychological capital would be able to alternate between alignment and adaptability requiring activities more competently. Furthermore, transformational leadership style as a trigger of ‘adaptive activity’ as required by the contextual ambidexterity would have a measurable impact on the given interaction level (Bass, 1985; Vera & Crossan, 2004).

To this end, firstly, this study will be able to contribute to the organizational ambidexterity literature with a specific focus on the contextual ambidexterity since this specific field still requires more research on the individual level (Gibson & Birkinshaw, 2004; Mom, Van Den Bosch, & Volberda, 2009). Furthermore, there is not any research in the literature examining the psychological capital with its four dimensions, self-efficacy, hope, resilience and optimism, as an antecedent of contextual ambidexterity. In Turkey, for instance, there are few studies putting the focus on the construct and the scale of the research has not been used before. Hence, secondly, this study aims at contributing to the contextual level ambidexterity research with the translation of the scale to Turkish. Thirdly, despite the relationship between psychological

capital and transformational leadership has been studied before, the effect of contextual ambidexterity has not been added to the research models of those studies. Therefore, this study will add to the understanding and literature of the contextual ambidexterity, psychological capital and transformational leadership with a unique research model designed for this research.

CHAPTER II

LITERATURE REVIEW

2.1. AMBIDEXTERITY

2.1.1. Concept Definition of Ambidexterity

Ambidexterity, meaning to be able to use both hands almost equally effectively, in management terms, with the impact of March's (1991) seminal work, has been used as a metaphor since its first use by Duncan in 1976. In the organizational context, Tushman and O'Reilly (1996) define ambidexterity as "the ability to simultaneously pursue both incremental and discontinuous innovation and change" (p. 24). In other words, according to Bařkarada, Watson and Cromarty (2016) ambidexterity means "delivering efficiency, control and incremental improvements, while embracing flexibility, autonomy and experimentation" (p. 778). According to March (1991), "learning through exploitative activities requires the performance of refinement choice, production, efficiency, selection, implementation and execution; whereas, learning through explorative activities implies search, variation, risk-taking, experimentation, flexibility, discovery and innovation" (p. 71). Hence, in this perspective, exploitation and exploration are evaluated as the two paradoxical approaches in teams and organizations, which are in the pursuit of limited sources or means (Lewis, 2000) and cannot allocate enough resources to both simultaneously.

Conversely, another approach to ambidexterity, suggests that exploration and exploitation can coexist together on both team and organization level (Tushman & O'Reilly III, 1996; Lewis, 2000). However, in deciding whether exploration and exploitation are complimentary or paradoxical; one should evaluate the presence of learning building on the seminal work of March (1991) rather than distinguishing the learning types (Gupta, Smith, & Shalley, 2006). Hence, studies by Baum, Li and Usher (2000), Benner and Tushman (2002) and He and Wong (2004) indicate that both exploitation and exploration involve innovation and learning to some

extent even though they differ in type (Gupta et al., 2006). For instance, He and Wong (2004) defined exploitative innovation as “technological innovation activities aimed at improving existing product-market domains” and exploratory innovation as “technological innovation aimed at entering new product-market domains” (483). In line with this body of work, this paper suggests that learning and development are involved in both exploitation and exploration (Gupta et al., 2006) and the two constructs are complimentary rather than paradoxical in nature.

In the meantime, balancing the exploitation and exploration in a given organization is a significant challenge considering that the resources are limited (March, 1991; Bařkarada et al., 2016). Furthermore, resulting from the fact that efficiency and innovation, which are interrelated with exploitation and exploration successively, are in competition with one another in reaching the organizational goals, exploration and exploitation are viewed as contradictory (Lewis, 2000; Nemanich & Vera, 2009). However, in today’s ever-changing business world, exploitation and exploration should be kept balanced and achieved together for the perpetuity purposes (Lewis, 2000; Nemanich & Vera, 2009). In this sense, organizations are supposed to make tradeoffs between what is practical and ideal for their survival. For instance, while focusing on making profit in the short-term, they also need to invest in high-technology (Gibson & Birkinshaw, 2004).

By underlying that for the survival of the organizations, the use of ambidexterity is crucial, the literature suggests various pathways to achieve this goal. Duncan (1976) claimed that for the tradeoffs to be managed, organizations have to create “dual structures” in such a way that while certain business functions focus on exploratory activities, others have to follow the rules of exploitation. This type of ambidexterity is called structural ambidexterity. However, considering the competitiveness in the business, scholars have placed great importance in achieving the balance between these seemingly different ventures rather than shifting from one to the other (Gibson & Birkinshaw, 2004). Simultaneously keeping up with both alignment and

adaptability activities is called contextual ambidexterity in the same business function (Gibson & Birkinshaw, 2004). Alignment means conducting the activities of a business unit in a coherent and systematic way, while adaptability refers to the exploring the ways for the change to accomplish the business goals (Mom et al., 2009). Hence, contextually, it's crucial to create the circumstances for the development of alignment and adaptability together to be able to contribute to the business performance (Gibson & Birkinshaw, 2004).

2.1.2. Types of Organizational Ambidexterity

In the organizational ambidexterity literature, sequential ambidexterity has been the most researched among others (Duncan, 1976), later simultaneous (structural) ambidexterity drew attention among the scholars such as Tushman and O'Reilly III (1996) and finally Gibson and Birkinshaw (2004)'s work focused on individual's autonomous behavior to choose when to concentrate on exploration and exploitation (Bařkarada et al., 2016).

To address the business tensions between alignment and adaptability creating different structural business units is one approach (Tushman & O'Reilly, 1996). This perspective suggests that creating independent business units will enable the employees to focus on certain business requirements. Second approach indicates that exploitation and exploration activities could be balanced and reconciled in a given department (Gibson & Birkinshaw, 2004). In manufacturing terms, to achieve this one group should follow organic structure rules, as opposed the other using mechanistic statures across the same business function (Raisch & Birkinshaw, 2008). Or "temporal separation" should be preferred and the groups should focus on one business function one day and the next day another function should be chosen (Gibson & Birkinshaw, 2004).

As explained, both approaches suggest adopting a structural mechanism to balance alignment and adaptability. However, Gibson and Birkinshaw (2004) building upon the academic work

by Adler, Goldoftas and Levine (1999) and Hedlund and Ridderstrale (1997) shift the focus from structural units to individuals in reconciliation of the tension between these two activities, by claiming that individuals should have the capability to balance the activities of exploitation and exploration in the same business department. Hence, contextual ambidexterity is defined as “an interplay of system capacities- for alignment and adaptability- that simultaneously permeate an entire business unit” (Gibson & Birkinshaw, 2004, p. 211). Gibson and Birkinshaw (2004) further claim that within a business unit putting the emphasis on exploration or exploitation for a while would create problems. This would stem from the uncertain command within a business unit: in that, focusing one side of the dual structure could lead to abolishment of the other side. Such a mixture of positive results for one activity and negative ones for the other would create a “strange loop” as Hofstadter (1979) claims. Hence, rather than viewing exploration and exploitation as opposite solutions, evaluating them as interdependent or complimentary would prevent the tension (Denison, Hooijberg, & Quinn, 1995; Gibson & Birkinshaw, 2004). March (1991) also supported this view for the success of the business units. Based on the above classifications, the following part briefly summarizes the types of organizational ambidexterity which are structural (simultaneous) ambidexterity, sequential ambidexterity and contextual ambidexterity.

2.1.2.1. Structural (Simultaneous) Ambidexterity

Structural or simultaneous ambidexterity refers to the balanced exploration and exploitation activities through the use of different subunits in an organization (O’Reilly & Tushman, 2013), which “entails not only separate structural units for exploration and exploitation but also different competencies, systems, incentives, processes, and cultures, each internally aligned” (O’Reilly & Tushman, 2008, p. 192). For instance, in the structural ambidexterity context, while production department is in charge of exploitation, marketing and HR units are in the pursuit

of exploration requiring activities. A set of shared values, a common strategy and an effective leadership style to bring these seemingly different activities together are required for this ambidexterity type to succeed (Simsek, 2009).

2.1.2.2. Sequential Ambidexterity

Sequential ambidexterity is more preferable for the slowly-changing markets like service industry or for the firms with limited resources (O'Reilly & Tushman, 2013). For such circumstances, upon finalizing the exploitation activities, organizations could attempt to explore new markets or products or try to learn new skillsets. According to Duncan (1976), this cycling between the activities of alignment and adaptability would lead to success as all of the organizational resources are allocated towards achieving only one goal.

2.1.2.3. Contextual Ambidexterity

There is a growing body of literature on individual level ambidexterity, which indicates that individuals “are a significant source of organizational ambidexterity” (Good & Michel, 2013, p. 436). For instance, Mom et al. (2009) focused on the managers’ ways of counterbalancing between exploitation and exploration. However, empirical studies mentioned do not put the focus on the individual differences of the managers or employees as in their characters or talents in their efforts to balance exploitative or explorative activities. Main reason of not putting the emphasis on the individual differences in the context of ambidexterity could result from the fact that structure rather than context is emphasized (Good & Michel, 2013). In this sense, examining individual level ambidexterity from a structural perspective differentiates and classifies employees mainly based on their jobs; for instance, job description of an R & D professional may require more exploration behavior than an accountant (Good & Michel, 2013). However, contextual ambidexterity includes individual’s balance of exploration and

exploitation by taking into consideration their individual differences such as their levels of psychological capital (Gibson & Birkinshaw, 2004).

2.1.2.3.1. Exploration in Contextual Ambidexterity

One dimension of ambidexterity, exploration is “the search for novelty in the organizational context” (Levinthal & March, 1993) and “experimentation with new alternatives” (March, 1991, p. 81). According to Good and Michel (2013), individuals who are good at exploratory activities could grasp novel notions and approaches effectively. Exploration is also viewed as a risk-involving duty that could yield high levels of individual performance, yet could be unclear in terms of task results (Hong, Yu, & Hyun, 2018). Based on the ambidexterity literature, some of the conceptualizations of the individual exploration are explained in detail in Table 2.1.

2.1.2.3.2. Exploitation in Contextual Ambidexterity

Individual level exploitation is about the creation of accuracy and consistency in the experiences (Levinthal & March, 1993; Good & Michel, 2013). An individual who is involved in exploitation is more likely to focus on the familiar information rather than seeking for novelty (Levinthal & March, 1993). Contrary to exploration, individual level exploitation includes series of tasks with more clear results, and resulting in low individual performance in return (Hong et al., 2018).

Exploitative innovation “reinforce current institutionalized learning and is intended to respond to current environmental conditions by adapting existing technologies and further meeting needs of existing customers” (Lubatkin, Simsek, Ling, & Veiga, 2006, p. 6). By repeating and replicating current activities, the competence of them in an organization could be increased notably (March, 1991; Jansen, Vera, & Crossan, 2009). In addition, some of the different definitions of the construct are presented in Table 2.1.

Table 2.1. Different Definitions of “Exploration”, “Exploitation” and “Ambidexterity”

<i>Construct</i>	<i>Study</i>	<i>Definition</i>
<i>Exploration</i>	Aston-Jones & Cohen, 2005, p. 420	“Seek new behaviors by continuing to sample the environment in search of novel and potentially more valuable opportunities than those already discovered”
	Cohen, McClure & Yu, 2007, p. 933	“Explore risky but potentially more profitable alternatives”
	Mom, Van Den Bosch & Volberda, 2009, p. 820	“Searching for new possibilities, evaluating diverse options, adaptability, new skills”
	Hills, Todd & Goldstein, 2010, p. 591	“The ability to detect the resource contingencies available in different environments”
<i>Exploitation</i>	March, 1991, p. 71	“Refinement, choice, production, efficiency, selection, implementation and execution”
	Aston-Jones & Cohen, 2005, p. 420	“Engaged in behaviors associated with the most valuable states that it has already discovered”
	Smith & Tushman, 2005, p. 522	“Rooted in variance-decreasing activities and discipline problem-solving”
	Mom, Van Den Bosch & Volberda, 2009, p. 820	“A lot of experience, routine, short-term goals, present knowledge”
<i>Ambidexterity</i>	McClure, Gilzenrat & Cohen, 2006, p. 1	“Determining how to adaptively move between exploitative and exploratory behaviors in changing environments”
	Gupta, Smith & Shalley, 2006, p. 693	“The synchronous pursuit of both exploration and exploitation”
	Hills, Todd & Goldstein, 2010, p. 593	“The ability to switch flexibly”
	Laureiro-Martinez, Brusoni & Zollo, 2010, p. 98	“Cognitive flexibility to recognize the advantages and the disadvantages of the two alternative allocations (exploration and exploitation)”
	Lavie, Stettner & Tushman, 2010, p. 129	“Ambidexterity resolves the tension between exploration and exploitation by suggesting these activities are maintained simultaneously”

Source: Good and Michel (2013, p. 439)

As the above table suggests, individual level ambidexterity is the concurrent seeking of both alignment and adaptability by the employees (Ajayi, Odusanya, & Morton, 2017). The individual level ambidexterity with comparison to structural and firm-level ambidexterity is rarely researched by the scholars (Raisch & Birkinshaw, 2008; Mom et al., 2009; Ajayi et al., 2017). Hence, further research is needed to understand the influence of the individual level ambidexterity's contribution on overall organizational level ambidexterity (Ajayi et al., 2017). It is claimed that every individual in an organization is capable of following the trends in the business environment while gaining advantage in the existing ones (Gibson & Birkinshaw, 2004). In addition, individual level ambidexterity will have an accumulated level effect on the overall organizational ambidexterity (Ajayi et al., 2017).

Consequently, ambidexterity literature puts the emphasis on organizational or unit level analysis in either sequential or simultaneous type. However, in spite of the academic acumen gathered through organizational level analysis, individual level differences and contributions are not taken into consideration in the balance of exploitation and exploration (Bonesso, Gerli, & Scapolan, 2014; Caniëls, Neghina, & Schaetsaert, 2017). Thus, as one of the main contributors of overall organizational level ambidexterity, individual level ambidexterity should be examined further with its antecedents and outcomes.

2.1.3. Antecedents of Organizational Ambidexterity

Mainly resulting from the positive association between organizational ambidexterity and firm performance, various outcomes of organizational ambidexterity have drawn great attention from the researchers; however, especially in the recent studies the antecedents, mediators and moderators of ambidexterity started to be more prominent. In this sense, worker training, common culture, supportive leaders, decentralized structures (Gibson & Birkinshaw, 2004) and contextual features such as 'discipline', 'stretch', 'trust' and 'support' (Ghoshal & Bartlett,

1994) are some of these antecedents as well as the moderators and mediators such as working context, environment or leadership. Based on the previous contextual ambidexterity literature, this study focuses on psychological capital, which is an under-researched individual characteristics in the ambidexterity context, as one of the antecedents of individual level ambidexterity, and in examining the relationship between these variables, claims that transformational leadership has a moderating effect.

O'Reilly (1996) finds a “decentralized structure”, “common culture and vision” “supportive leaders” and “flexible managers” as the most important antecedents of ambidexterity in the organizations. According to Gibson and Birkinshaw (2004), “creation of a particular type of organization context at the business unit level” is the prerequisite for the contextual ambidexterity (p. 212). Organization context includes the “structural context” and “culture and climate of a business unit” in addition to being viewed as a more prominent aspect of it (Gibson & Birkinshaw, 2004). In this sense, structural context refers to the executive and bureaucratic tools used in the organizations to enable employees to demonstrate certain behaviors such as reward mechanisms (Bower & Doz, 1979; Gibson & Birkinshaw, 2004). Organization culture, though, represents the elemental values and sets of beliefs adopted by the individuals in an organization (Schein, 1985; Denison, 1990; Gibson & Birkinshaw, 2004). Climate refers to the organizational catalysts and environment-related attributes influencing the employee behaviors in the organizations (Lewin, Lippitt, & White, 1939; Gibson & Birkinshaw, 2004). The definition of organizational context by Gibson and Birkinshaw (2004) is similar to Ghoshal and Bartlett’s view of the notion, which has four dimensions: discipline, stretch, support and trust (1994). Discipline means fulfillment of employee responsibilities willingly. Stretch refers to having ambitious employees who always seek to achieve more. Support is the shared culture of altruism and cooperation among the employees (Gibson & Birkinshaw, 2004). And trust is employee’s reliance on responsibility and promises of one another (Gibson & Birkinshaw,

2004). In this context, organizational context is the “yin and yang of continuous self-renewal” (Ghoshal & Bartlett, 1997, p. 151) and “a balance between a pair of hard elements (discipline and stretch) and a pair of soft elements (support and trust)” (Gibson & Birkinshaw, 2004, p. 213). In this sense, Gibson and Birkinshaw (2004) claim that in such an organizational context, employees will willingly do their best to accomplish tasks by balancing exploitation and exploration requiring duties.

O’Reilly and Tushman (2011) claim that managers have a vital role for organizations to balance adaptability and alignment. Firstly, they should “sense” the potential paradigm shifts and follow recent technologies closely (O’Reilly & Tushman, 2011). Secondly, managers should “seize” any business potential opportunities and be the pioneers in their fields (O’Reilly & Tushman, 2011). To this end, managers should follow the guidelines below to succeed in their pursuit of ambidextrous organizations:

1. A road map based on a compelling strategy suggesting that activities related to alignment and adaptability should be balanced,
2. Setting a clear vision and identifying the values about it to connect the alignment and adaptability functions,
3. In implementing the ambidexterity strategy, a well-thought reward mechanism should be adopted and followed closely by the senior team in charge of the task,
4. Coordinated and yet independent sets of organizational plans for exploration and exploitation with a goal of incorporation both strategically and practically in advancing organizational resources,
5. The senior leaders responsible for the ambidexterity strategy of the organization should be capable of handling the tension arising from two sets of tasks.

O'Reilly and Tushman (2011) assert that in pursuit of ambidextrous organizations above guidelines should be followed; otherwise, the tension between exploitation and exploration requiring activities will not be resolved. As points one and two suggest, without a strategy, vision and values the plan to achieve ambidexterity will fail in the long-run. As a solution to this, closely following up with the employees on their exploration and exploitation activities would create the opportunity to eliminate potential problems faced and accelerate the procedure. As the points four and five suggest, leaders should be able to overcome the difficulties resulting from the tension between exploration and exploitation and make sure that resources are allocated and used efficiently during the execution (O'Reilly & Tushman, 2011).

2.2. PSYCHOLOGICAL CAPITAL

2.2.1. Concept Definition of Psychological Capital

To maximize the individual and organization level performance, while attracting and keeping the 'talent', individual's level of happiness, engagement or commitment to the organization are drawing lots of attention from the managers and researchers in the fierce competition of today's business world. In this context, as an individual level, malleable construct, psychological capital as an important indicator of the job performance among other positive organizational outcomes of it, has started to become the center of such discussions.

In line with the positive organizational behavior literature, Luthans et al. (2007) introduced four dimensions that are self-efficacy, hope, resilience and optimism as positive psychological capital (PsyCap). Hence, the term could be defined as "an individual's positive psychological state of development and is characterized by: (1) having confidence (self-efficacy) to take on and put in the necessary effort to succeed at challenging tasks; (2) making a positive attribution (optimism) about succeeding now and in the future; (3) persevering toward goals and, when necessary, redirecting paths to goals (hope) in order to succeed; and (4) when beset by problems

and adversity, sustaining and bouncing back and even beyond (resilience) to attain success” (Luthans et al., 2007, p. 3). Furthermore, psychological capital is radically different than the social and human capital, which would subsequently entail “what you know” and “who you know” and puts the main emphasis on “who you are becoming” with a developmental approach (Luthans et al., 2007).

Psychological capital could change under different circumstances as in a well-established organizational culture or with a good leader, individuals could exhibit different levels of it (Gooty, Gavin, Johnson, Frazier, & Snow, 2009). About PsyCap, it could be asserted that individuals with high levels of it would experience positive emotions, which has a positive link to performance and positive organizational citizenship behaviors (Gooty et al., 2009). For instance, in an empirical study involving a high technology environment, employees with higher levels of PsyCap tended to show less absenteeism (Avey, Patera, & West, 2006).

2.2.2. Dimensions of Psychological Capital

2.2.2.1. Self-efficacy

In Bandura’s terms, self-efficacy is “people’s beliefs about their capabilities to exercise control over their own level of functioning and over events that influence their lives” (1993, p. 117). In terms of management, employees having high levels of self-efficacy are more likely to become high achievers resulting from the belief that they possess the required skillset to overcome hardships and succeed under adverse circumstances (Kauppila & Tempelaar, 2016). In addition, in organizational terms, self-efficacy has a motivational effect especially on “three main domains in terms of goal-seeking (setting): goal choice, task persistence and effort level” (Kauppila & Tempelaar, 2016, p. 1024). Accordingly, employees with high self-efficacy would have the tendency to reconcile individual level exploitation and exploration activities rather than feeling obliged to value one over the other resulting mainly from the belief that both could be achieved simultaneously.

According to Luthans et al. (2007), following are the five key discoveries of self-efficacy: firstly, self-efficacy is “domain-specific” (p. 36), meaning as an adult you could be very confident about your job, yet you could suffer from lack of self-efficacy in your personal life since what is accumulated as self-efficacy in one part of the life cannot be transferable to other parts of the life. Secondly, self-efficacy is “based on practice and mastery” (p. 36) meaning as a state-like characteristic self-efficacy needs to be improved through experience in time. Thirdly, “there is always room for improvement in self-efficacy” (p. 36) indicating that even if you master a certain skill or task, you could still add more knowledge to the experience and make it better in time. Fourthly, “self-efficacy is influenced by others” referring to the fact that human-beings both influenced by the feedback of their peers and model people when they need to achieve a certain task. Therefore, the achievements, failures or feedback of the people around you could turn into your life guideline in time. Finally, “self-efficacy is variable” meaning even if you equip yourself with all the necessary skills and resources to succeed, you cannot control people around you or make a big change in your organization.

As a dimension of psychological capital, self-efficacy has a major positive relationship with motivation and performance (Luthans et al., 2007); hence, individuals with high self-efficacy are more likely to explore and exploit simultaneously.

2.2.2.2. Hope

As the second component of the psychological capital, hope is defined as “a cognitive set that is based on a reciprocally derived sense of successful (a) agency (goal-directed determination) and (b) pathways (planning of ways to meet goals)” (Snyder et al., 1991, p. 571). Hence, to be hopeful, one needs to have a sense of goal to achieve in life and the means to accomplish what is strived for.

In the organizational context, hope has been examined in relation with such constructs as work performance, physical health and psychological well-being (Luthans et al., 2007). The studies

mentioned has indicated that there is a positive relationship between hope and the given constructs. Similarly, Peterson and Luthans (2003) have shown that leaders with high levels of hope are more successful at their departmental profitability rates. To this end, high levels of hope could contribute to the contextual ambidexterity; in that, hopeful individuals being more ‘independent’ and ‘autonomous’ will be more expressive in the allocation of their time between exploration and exploitation (Luthans et al., 2007).

2.2.2.3. Optimism

As the third dimension of the psychological capital, based on Seligman (1998) conceptualization, optimism is mainly explaining the positive events with a personal and permanent approach while attributing the negative ones to the external forces by assuming that they are temporary (Luthans, Youssef, & Avolio, 2007). Hence, as being state-like, optimism could be developed and used effectively in the workplace for the motivational purposes to increase the performance by the leaders.

In the context of management, optimistic employees are more likely to succeed in today’s ever-changing and highly-competitive business world by not suffering from ‘self-blame’ or ‘insufficiency’ in the long run in case of facing adversities or failures. At this point, in organizational ambidexterity context, to be able to thrive as an optimist and act autonomously in dividing time between exploration and exploitation, one should also be realistic (Luthans et al., 2007); in that, irrational and unrealistic way of handling problems could result in failure.

2.2.2.4. Resilience

Resilience, as the fourth component of the psychological capital, is defined as “the developable capacity to rebound or bounce back from adversity, conflict, and failure or even positive events, progress and increased responsibility” (Luthans, 2002a, p. 702). Hence, with the learnt success and failure one would be capable enough to move on.

As for the optimism, resilience is one of the most important skills to develop in today's very competitive business world. Hence, there is a growing body of literature in both clinical and positive psychology with a specific focus on "the role of resiliency in enhancing various aspects of human-functioning, especially those related to posttraumatic coping and adaptation (Luthans et al., 2007, p. 122). In addition, the research also reveals that resilience is an important work performance indicator. Individuals having the 'bounce-back' tend to become more 'proactive' and take initiative when necessary (Luthans et al., 2007). This initiative-taking and proactive component of the construct could contribute to employee ambidexterity when presented with the choice between exploration and exploitation involving activities.

2.3. TRANSFORMATIONAL LEADERSHIP

The real test of leadership in this constantly changing business world is to be a 'juggler' in both handling the alignment of the company with its environment through the right choice of strategy, organizational culture and human resources while performing well and seeking new opportunities to excel in the long-run with the application of radical technologies (Tushman & O'Reilly, 1996). In this regard, it is leaders' dilemma to sustain the evolutionary change while grasping the necessity of destroying it for a radical one strategically. For leaders, it is also vital to be instrumental in creating a culture of support, constructive criticism, transparency and courage to foster employees in believing that they could overcome the hardships of change and have the self-efficacy to be ambidextrous. Such a notable attitude requires transformational leadership style in inspiring and mobilizing people for the long-term success of the firm. Overall, such efforts of the leaders for an ambidextrous organization require to encourage employees to behave in an autonomous and proactive way while embracing diversity in experimenting with the novel ideas (Tushman & O'Reilly, 1996). As Gibson and Birkinshaw (2004) claim "as key leaders in organizations, senior executives play a critical role- because

they put in place systems that allow supportive contexts to emerge- that in turn shape individual behaviors” (p. 223).

In this context, transformational leadership is defined as “moving the follower beyond immediate self-interests through idealized influence (charisma), inspiration, intellectual stimulation, or individualized consideration” (Bass, 1999, p. 11). In line with the given definition, transformational leadership has a positive effect on employees in terms of increasing motivation and paving the way for them to challenge the ‘status-quo’ (Rosing, Frese, & Bausch, 2011), which seem to have a positive link with individual-level ambidexterity in encouraging the employees to gain the autonomy for the reconciliation of the alignment and adaptability. Furthermore, “the organizational context in general and leadership in particular might play important enabling roles in the attainment of individual ambidexterity” (Kauppila & Tempelaar, 2016, p. 1027). Examining leadership in the context of ambidexterity and psychological capital literature is crucial; in that, usually the culture of a team and organization is mainly set by the leader, to be ultimately internalized by the followers (Lewis, 2000).

With the early work of Weber’s on the leadership types that are charismatic, legal/rational and traditional in the context of authority construct (1924, 1947), various classifications of leadership have been made in the literature. As a result of growing attention on the concept from different disciplines such as political science, management and social psychology, leadership has been the subject of many studies. In this context, transformational and transactional leadership style differentiation has gained popularity among scholars, as well.

In this sense, the literature of transformational leadership dates back to 1978 when Burns released its seminal work on the construct (Howell & Avolio, 1993). With the finalization of the Cold War, there has been drastic changes in the organizations such as flexibility of team structures and adoption of more flat organizational structures. With such a notable organizational and managerial shift, transformational leadership attributes such as

empowerment and autonomy of the employees became more relevant (Van Knippenberg & Sitkin, 2013). Usually compared with the transactional leadership- meaning “the exchange relationship between leader and follower to meet their own self-interests” (Bass, 1999, p. 10), transformational leadership has been an effective leadership type over the years.

To this end, according to Bass (1999), transformational leadership “elevates the follower’s level of maturity and ideals as well as concerns for achievement, self-actualization and well-being of others, the organization and society” (p. 11). The construct includes using vision-creation and inspiration towards a common goal for success (Nemanich & Vera, 2009).

2.3.1. Dimensions of Transformational Leadership

Transformational leadership as the most researched leadership type in literature, focuses on “follower motivation and inspiration” (Baškarada et al., 2016), and is defined by Bass (1985) with a focus on “intellectual stimulation”, “individualized consideration”, “idealized influence” and “inspirational motivation” (p. 10). However, since the empirical work conducted later on did not support the distinction of idealized influence which includes the charisma dimension, and inspirational motivation, the factor became charisma/inspirational (Avolio, Bass, & Jung, 1999). Thus, transformational leadership is measured in three dimensions based on this categorization in this study: charisma-inspirational, intellectual stimulation and individualized consideration.

Intellectual stimulation refers to the leaders’ attitude to encourage followers in the creation of new methods by examining the old approaches to be able to be more creative and innovative (Avolio et al., 1999; Jansen et al., 2009). Individualized consideration means leaders’ approach to evaluate their followers’ needs for the improvement on an individual base by using coaching or mentoring skills (Jansen et al., 2009). Idealized influence refers to the degree which the followers of a leader show admiration, reliability and respect for their leader; this dimension

also is related to the charismatic behavior that result in followers building connections with the leader (Jansen et al., 2009). Inspirational motivation means leaders' setting a vision hard to reach and using various motivational methods on their followers by adding meaning to the efforts (Bass et al., 2003; Jansen et al., 2009). Charisma/inspirational "provides followers with a clear sense of purpose that is energizing, is a role model for ethical conduct and builds identification with the leader and his or her articulated vision" (Avolio et al., p. 444).

2.4. RELATIONSHIP BETWEEN CONTEXTUAL AMBIDEXTERITY, PSYCAP AND TRANSFORMATIONAL LEADERSHIP

2.4.1. Relationship between Psychological Capital and Contextual Ambidexterity

This paper suggests that psychological capital including the components of self-efficacy, resilience, hope and optimism is an asset that could be developed through the accumulation of resources in time and all four of the components are studied as 'state-like' qualities in this study. In this sense, as an antecedent, PsyCap contributes to the individual level ambidexterity in a way that through self-efficacy it provides the individuals with the belief that they have enough psychological resources to achieve ambidexterity. Through optimism, individual level ambidexterity will be fostered in a way that in the face of mainly external hardships, employees will not lose their belief in themselves to reach the goal of ambidexterity and will know that future promises better opportunities to them. Through hope, as they have the goal part as the balance of exploration and exploitation, individuals are provided with the different ways and means to reach that goal. With resilience, individuals will make sure that even if hardships appear on their way, they will develop effective coping skills and manage the tension of balancing exploitation and exploration requiring activities.

To provide the employees with the assets to balance the alignment and adaptability activities simultaneously, along with the social capital or supportive context including effective leaders which would create the social support necessary for the success for them, psychological capital

has a crucial role in the equation (Luthans et al., 2007). As Luthans et al. (2007) suggest there is a positive correlation between employee psychological capital and job satisfaction or work performance.

2.4.2. Relationship between Transformational Leadership and Contextual Ambidexterity

In the context of organizational ambidexterity, it is claimed that transformational leadership is more compatible with an environment fostering exploratory innovation, on the other hand, exploitation is more likely to be in line with a transactional leadership style (Jansen et al., 2009; Baškarada et al., 2016). It is also suggested that organizations having a hierarchical structure with well-defined roles and responsibilities for the employees- organizations with “mechanistic management systems”- do well in more established contexts; on the other hand, organizations having more flexibility in terms of roles and hierarchical structure- “organic management systems”- become more productive in fast-changing and unstable circumstances (Baškarada et al., 2016). This is dependent on the fact that mechanistic systems foster exploitation and organic systems encourage exploration (March, 1991; Tushman & O’Reilly, 1996; Jansen et al., 2009; Baškarada et al., 2016). In terms of leadership literature, transformational leadership is linked to more unstable and changing environments and resulting from that relatively poor-performing organizations; whereas transactional leadership is attributed to the organizations with more maturity and good performance (Baškarada et al., 2016). Transformational leaders become instrumental in the creation of contexts where employees could develop novel ideas (Li et al., 2015), which could be a facilitator to exploration. In other words, transformational leaders who could take initiative and create novel ideas could be the catalyzers of exploratory learning and innovation. Through ‘idealized influence’ and ‘inspirational motivation’, transformational leadership provides ideological explanations that link individuals’ identity to the collective identity. By using ‘intellectual stimulation’, leaders encourage followers to think creatively and endorse novel ideas by exemplifying such behaviors themselves (Jansen et al., 2009).

In the context of exploration, transformational leaders using the dimensions of individualized consideration and intellectual stimulation stimulate individuals to declare their opinions and be expressive; through inspirational motivation and idealized influence support followers by celebrating their innovative behaviors (Li et al., 2015). On the other hand, contrary to popular belief, transformational leadership has a link to the exploitation as well as exploration as shown in Keller (2006)'s study indicating that transformational leadership has a positive influence on the performance of teams dealing with both exploitative and exploratory R&D projects (Lewis, 2000). Furthermore, inspirational motivation dimension supports followers' exploitation activities by linking their future, present and past aims to create a sense of 'self-consistency' (Van Knippenberg et al., 2004). Intellectual stimulation supports follower exploitative behaviors by encouraging them to acquire both newly acquired organizational expertise and the accumulated information (Nemanich & Vera, 2009; Li et al., 2015).

2.4.3. Relationship between Psychological Capital and Transformational Leadership

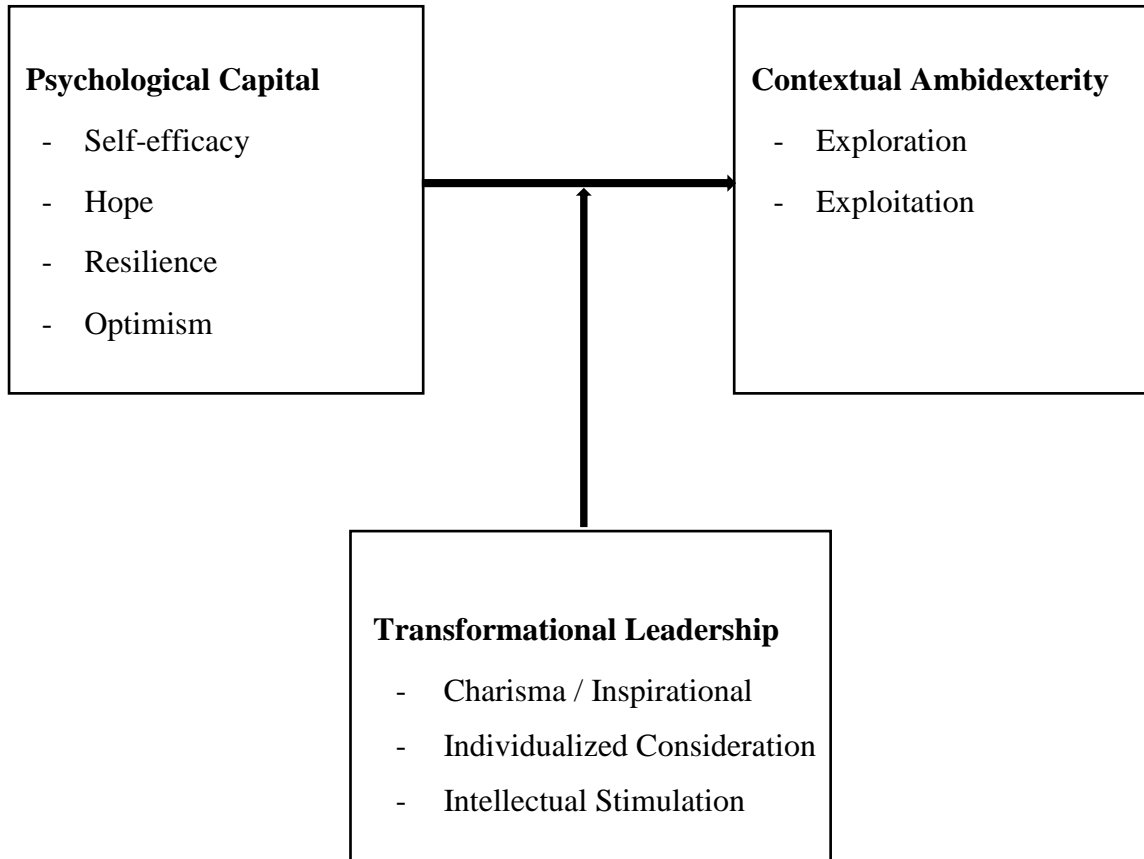
Transformational leaders are able to create such an atmosphere in the organizations that through inspiring and motivational speeches toward a shared goal and vision, followers feel very driven to accomplish their duties and go beyond (Gooty et al., 2009). Leaders who have transformational characteristics have the ability to assist their followers under adverse circumstances and 'mentor' and 'coach' them as part of their job (Bass, 1990). Given such attributes, transformational leaders are capable of creating the safe context for their subordinates to experiment and learn, which would in turn increase their PsyCap levels.

With a fostering leader, psychological capital would have a positive impact on the individual-level ambidexterity; in that, individuals with high levels of psychological capital including self-efficacy, hope, resilience and optimism would be more eligible in allocating the resources between alignment and adaptability.

2.5. RESEARCH MODEL AND HYPOYHESES

This research focuses on analyzing the relationship between psychological capital and contextual ambidexterity with the moderating effect of transformational leadership as the figure below suggests.

Figure 2.1. Conceptual Model of the Research



In psychological capital literature, many studies have focused on the organizational outcomes of the construct in relation with ‘job satisfaction’, ‘organizational commitment’, ‘turnover intention’ and ‘work performance’ (Luthans et al., 2007a; Avey et al., 2009; Wang et al, 2018). According to some of the research focusing on the positive outcomes, “employees with a high level of psychological capital can promote their own positive behavior and organizational development” (Hu et al., 2018). Based on Bandura’s social cognition (1986, 1997) and agentic theories (2008), employees’ agency, which is “exhibited through their intentions to deliberately

determine the nature and magnitude of their psychological resource investment to attain work goals” (Bandura, 2008; Peterson, Luthans, Avolio, Walumbwa, & Zhang, 2011) could be one of the explanations in understanding the effect of PsyCap on job performance. In addition, through conservation of resources (COR) theory (Hobfoll, 2002; Wright & Hobfoll, 2004), the relationship between PsyCap and work performance could be explained; in that, “an individual’s motivational striving and choices can be explained by psychological resources such as self-efficacy, hope, optimism, and resilience that create higher-order “resource caravans” (or in this case, the core construct of psychological capital), which in turn impact motivation and performance” (Hobfoll, 2002, p. 310). Thus, by considering ambidexterity as a performance indicator or goal achievement in balancing the shift from exploration to exploitation, individual’s level of motivation could have an important influence on their level of ambidexterity. Therefore, as a development area, employees’ ambidexterity behavior will be positively affected by the PsyCap; in that, individuals who have overall high levels of psychological capital will be able to take the initiative to channel their energy towards the balance of exploration and exploitation requiring activities. In other words, as white-collar employees will have the initiative to prioritize their daily responsibilities and duties to some extent, individuals who have high levels of psychological capital will be more motivated to contribute to both their job and organization in balancing their short-term tasks and long-term innovation goals.

Hypothesis 1: PsyCap is positively related to contextual ambidexterity.

Self-efficacy is one’s judgement of himself or herself in evaluating whether to accomplish a certain task (Roemer & Harris, 2018). The construct is viewed as one of the main triggers of professional or career success, because “individuals high-in self-efficacy feel energized and are

motivated to accomplish challenging tasks” (Luthans et al., 2015). Similarly, individuals who have high levels of self-efficacy tend to be more persistent and determined in case of facing challenges (Li, Liao, Tangirala, & Firth, 2017). That’s why, self-efficacy could pave the way for the employees to tackle the adversities faced in the balance of exploitation and exploration requiring activities.

In relation with the self-efficacy and ambidexterity relationship, self-determination theory, of which theorization dates back to mid-1980s (Deci & Ryan, 1985), as a macro theory of human motivation focuses on the psychological needs, life-goals and one’s personal growth (Deci & Ryan, 2008). The theory in dealing with the motivation puts the emphasis on the type of motivation rather than the total amount one has in explaining the link between job performance, well-being and engagement. Self-determination theory makes a distinction between autonomous and controlled types of motivation. The autonomous type includes both intrinsic motivation and extrinsic types of motivation, where they establish a connection with certain activities and find ways to endorse them personally. The controlled type of motivation, though, suggests that people direct their actions in the light of feedback gathered from external agencies such as reward and punishment or through “introjected regulation” the action regulation is linked to factors like “approval motive” and “contingent self-esteem” (Wilson, Mack, & Grattan, 2008). Furthermore, “both autonomous and controlled motivation energize and direct behavior, and they stand in contrast to amotivation, which refers to a lack of intention and motivation” (Deci & Ryan, 2008, p. 182). That’s why, considering that “ambidexterity studies suggest that individual level effects are the main antecedents of contextual ambidexterity” (Nemanich & Vera, 2009), the relationship between self-efficacy and contextual ambidexterity could be explained with the help of self-determination theory. Individuals who are motivated and feeling high levels of self-efficacy could have the personal assets to balance exploration

and exploitation activities. Thus, considering that, feeling of confidence of the employees will have a good impact on their performance in achieving ambidexterity.

Hypothesis 2: Self-efficacy is positively related to contextual ambidexterity.

PsyCap's hope component involves 'agency' and 'pathway' dimensions. While agency refers to the mental strength and belief that a certain goal could be achieved; pathway includes different means that could be taken during the 'goal-achievement' procedure (Roemer & Harris, 2018). Pathway component of hope also indicates that in case of being faced with adverse conditions, different tools need to be found to reach the goal. Thus, ambidexterity related dilemmas in decision-making process could be well-managed by hopeful employees since they have already acquired the required capabilities. With reference to the self-determination theory (Deci & Ryan, 1985), people try to achieve the personal growth and reach fulfillment; hence, at work as a performance indicator and worthy contribution to their organization, they try to orchestrate the activities of alignment and adaptability. That's why, as already motivated towards a goal either for internal or external reasons, hopeful individuals will become more inclined to behave ambidextrously as already having the 'goal' asset in their lives.

It is also suggested by the psychological capital research that "hopeful employees tend to become creative and resourceful even with tight budgets" (Luthans et al., 2007) and they will be able to create their own path to success in the shift between alignment and adaptability. Hence, it could be asserted that hopeful individuals who are goal driven and perseverant enough to succeed will be more likely to excel in behaving ambidextrously.

Hypothesis 3: Hope is positively related to contextual ambidexterity.

According to self-determination theory, “there exist various forms of motivation that can be aligned on a continuum of self-determination, or greater choice and self-endorsement of the behavior” (Levesque, Copeland, & Sutcliffe, 2008, p. 219). Hence, whether for intrinsic or extrinsic reasons, individuals who are motivated, will be able to reach a certain goal in life by using their inner strength. In the context of psychological capital, resilient employees could excel in tackling professional challenges as being already-equipped with the survival mechanisms gained as a result of navigating through rough circumstances. Hence, they will not evaluate exploration and exploitation as paradoxical terms or view ambidexterity as hard to achieve as a professional or career goal. Instead, they will use such a challenge as a superiority in competition with their colleagues and most probably be the frontrunner. Employees with high resilience levels will be able to resort to their inner strength in tackling the adversities of the workplace resulting from extreme competition and create the suitable environment for themselves to work ambidextrously.

Hypothesis 4: Resilience is positively related to contextual ambidexterity.

Optimistic individuals “are able to attribute positive events internally, permanently, generally and they are more likely to forgive the past, evaluate the present situation correctly and seek opportunities” (Wang & Xia, 2018, p. 74). That’s why, they are capable of coming up with novel ideas and overcoming adverse situations (Rogo et al., 2012). In addition, as Deci and Ryan (2008) suggest as people are already inclined to achieve personal growth and pursue connectedness, autonomy and competence, optimistic individuals without feeling the external pressure would be able to perform well at work. As a way of thriving at work, they would be able to ‘self-determined’ to balance both short-term and long-term goals of their organization. Thus, they will be able to contribute to the shared vision of the organization and perform well by balancing exploration and exploitation activities carefully. They will be able to produce

effective tactics on when to shift their focus from short-term goals of alignment to long-term gains of adaptability.

Hypothesis 5: Optimism is positively related to contextual ambidexterity.

This research suggests that employees with high levels of psychological capital will be able to manage ambidexterity; in that, they will have the resources to cope with the challenges of balance between exploitation and exploration. However, since individuals are susceptible to various external factors in the organizations such as leadership and organizational culture, their success in conducting exploratory and exploitative activities will be heavily influenced by them, as well. Hence, as a major instrument in the creation of the organization culture and employee performance, leadership style will have an impact on the aforementioned relationship between psychological capital and contextual ambidexterity (Peterson & Zhang, 2011).

In this sense, as transformational leaders will encourage their subordinates to take the initiative to better their jobs by providing them with occupational challenges (Song, He, Wu, & Zhai, 2018) such an interaction will have a positive impact on the relationship touched upon.

Hypothesis 6: Transformational leadership moderates the positive relationship between psychological capital (PsyCap) and contextual ambidexterity in such a way that as transformational leadership increases the positive relationship becomes stronger.

Employee's belief that they could achieve ambidexterity on an individual level will have a positive impact on their actions towards the shift from exploitation to exploration or vice versa. And as a crucial organizational mechanism, their leaders will have the resources to change that positively or negatively (Li et al., 2015; Vasilaki, Tarba, Ahammad, & Glaister, 2016).

In this context, when the leadership style is transformational, the connection between these two constructs will be positively influenced; in that, such a leader will provide the opportunities to the subordinate to exhibit self-efficacy in the shift between exploration and exploitation by providing them with the autonomy.

Hypothesis 6a: Transformational leadership moderates the positive relationship between self-efficacy and contextual ambidexterity in such a way that as transformational leadership increases the positive relationship becomes stronger.

In the context of hope, the will to achieve the balance between exploration and exploitation will be the goal part of the construct. For the other dimension of hope, which is the provision of different pathways to the individuals, leaders will be instrumental in the creation of a positive attitude (Gooty et al., 2009) by providing them access to various tools to behave ambidextrously.

In addition to that, when the organizational context, which is mainly shaped through the leadership behavior and attitude (Peterson & Zhang, 2011; Haar, Roche, & Luthans, 2014) encourage such an attitude, the interaction between individual's hope and ambidexterity will be reinforced. It is suggested by ambidexterity research that "individuals behave ambidextrously to the extent that their leaders exhibit a leadership style that is intended to facilitate both explorative and exploitative activities in their followers" (Rosing, Frese, & Bausch, 2011, p. 957).

Hypothesis 6b: Transformational leadership moderates the positive relationship between hope and contextual ambidexterity in such a way that as transformational leadership increases the positive relationship becomes stronger.

Resilience will provide the employees with the perspective that setbacks could be experienced on the way to the ambidexterity, yet individuals could still survive and reach their goals. Getting the support of a transformational leader in such a case will be a valuable asset to reach their goals and inspire change in the process of ambidexterity. Moreover, resilient employees, upon feeling the support of their leaders will be able to work more productively (Harland, Harrison, Jones, & Reiter-Palmon, 2005; Dartey-Baah, 2015) and be ready to contribute to both incremental and rapid changes.

Hypothesis 6c: Transformational leadership moderates the positive relationship between resilience and contextual ambidexterity in such a way that as transformational leadership increases the positive relationship becomes stronger.

Optimism is an important psychological resource to have in the balance of exploration and exploitation; in that, it creates a positive atmosphere and inner strength for the individuals to foster their capabilities (Peterson, Walumbwa, Byron, & Myrowitz, 2009) in the use of ambidexterity. In such a context, when provided with a visionary transformational leader, optimistic individuals could thrive in their work. By adding on to their optimistic nature through promise of change and success, employees will be motivated to contribute to the overall organizational achievement at maximum level with a transformational leader while managing their alignment and adaptability involving priorities.

Hypothesis 6d: Transformational leadership moderates the positive relationship between optimism and contextual ambidexterity in such a way that as transformational leadership increases the positive relationship becomes stronger.

CHAPTER III

METHOD

3.1. Sampling and Participants

To achieve economic growth, Turkey has put great emphasis on export especially in the recent years. As the 2023 strategy includes, Turkey needs to increase its export capabilities and foster certain sectors to reach that goal. With its 16.2 billion USD export volume in 2018 (Turkish Exporters' Assembly, 2019), chemicals sector has a valuable contribution to the overall export level of Turkey, coming after textile and automotive sectors. In this sense, as operating in a sector in fierce competition with the others such as textile, chemical firms need to formulate effective strategies to perform well. As part of good strategies, use of innovation and technology are crucial for chemicals companies. Hence, firms operating in chemicals sector, need to be very strategic to balance their short-term goals and long-term change objectives both at organizational and individual level. To this end, this sector is a good sampling area for the ambidexterity research.

In the scope of this research, 500 employees working in the 354 small and medium-sized companies of the chemicals sector in Turkey, which are members of Istanbul Chemicals' and Chemical Products Exporters' Association have been reached through e-mail for the research. The companies in question were chosen among those that attended an export-related seminar organized by the institution. As a result of second e-mailing, the number of responses were 305. Upon going through the responses, 181 out of 305 survey were used for the study as rest had lots of missing data.

Convenience sampling method for the accessibility of the participants to the researcher was used to identify the participants of this study. Subjects were asked to contribute to the study by filling in the online questionnaires for psychological capital, contextual ambidexterity and transformational leadership.

Table 3.1. Sectoral Distribution of the Participants

	<i>n</i>	<i>Percentage (%)</i>	<i>Cumulative (%)</i>
Packaging	10	5.5	5.5
Painting	3	1.7	7.2
Pharmaceuticals	64	35.4	42.5
Chemicals	43	23.8	66.3
Cosmetics	22	12.2	78.5
Medicals	32	17.7	96.1
Plastics	7	3.9	100.0
<i>Total</i>	<i>181</i>		<i>100.0</i>

As the above table shows, a total of seven different sectors were represented in the research, which are packaging, painting, pharmaceuticals, chemicals, cosmetics, medicals and plastics. In terms of firm sizes, 30.9% of the participants worked at a small-sized company (n= 56), 55.2% of the participants worked at a medium sized company and the rest (13.8%) identified their company size as large (n= 25). 38.1% of the participants (n= 69) were female and 61.9% of them (n = 112) were male. As the table below indicates, most of the participants' age was 26-35 (34.8%, n= 63). In terms of education, as the Table 3.2 shows majority of the participants were university graduates (58.6%, n= 106).

Table 3.2. Demographic Information of the Participants

	<i>Percentage (%)</i>
<i>Age</i>	
-25	5.0
26-35	34.8
36-45	33.7
46+	26.0
<i>Sex</i>	
Female	38.1
Male	61.9
<i>Education</i>	
Primary	0.6
High School	9.4
Bachelor	58.6
Master	29.8
PhD	1.7

3.2. Instruments

3.2.1. Contextual Ambidexterity Scale

Contextual ambidexterity scale of Mom et al. (2007) measuring exploration and exploitation with fourteen items was translated to Turkish via back-to-back translation method to measure the construct in question (Appendix A).

Participants were asked to rate the items on a scale of 6, ranging from “to a very small extent” to “to a very large extent”. As a result of the factor analysis, the scale had two dimensions as exploration and exploitation in line with the original version with a total of 8 items. In addition, the reliability of the scale was very high ($\alpha= 0.90$).

For the contextual ambidexterity calculation, in line with the Mom et al. (2009)'s method, the scores of the exploration and exploitation have been multiplied. Some of the research papers have used different techniques for this calculation such as addition or extraction of the scores. However, multiplication technique was preferred dominantly in the literature (Gibson & Birkinshaw, 2004; Lubatkin et al., 2006).

3.2.2. Psychological Capital Scale

The scale of Luthans, Youssef and Avolio (2007)'s measuring psychological capital on a six-point likert scale with 24 items was preferred to measure psychological capital (Appendix B). The scale has been translated to Turkish by Erkus and Afacan Findikli (2013) and within the scope of the research this version was used. Participants for this scale had a 6-point likert scale to rate the items from "strongly disagree" to "strongly agree."

Three of the items (13, 20 and 23) were reverse coded for this scale. The original and translated version of the scale had four dimensions and as a result of factor analysis, the research had supported the four factor structure.

After four of the items were eliminated because of loadings below 0.40, six items were used to measure self-efficacy, six items were used for hope, four items measured resilience and four items measured optimism. The reliability of the scale showing the internal consistency was very high ($\alpha= 0.95$).

3.2.3. Transformational Leadership Scale

The Turkish version of the transformational scale of 20 items measuring the construct on a five-point likert scale by Serinkan (2003) was used in this research (Avolio et al., 1999) (Appendix C).

The original scale had three dimensions as charisma/inspirational, individualized consideration and intellectual stimulation whereas the factor structure of this sample indicated one factor structure.

Out of 24 items, the participants were asked to rate the items on a 6-point likert scale from “strongly disagree” to “strongly agree.” The scale had a very high reliability value ($\alpha= 0.97$).

3.3. Procedure

3.3.1. Human Participant Research Ethic Committee Approval

Following the Istanbul Bilgi University Human Participant Research Ethic Committee approval (issued on 22.05.2018 with the 2018-20024-58 number), data collection started. The approval form in question was added in the Appendix E.

3.3.2. Data Collection

Data collection started with the approval of the Istanbul Bilgi University Human Participant Research Ethic Committee on 25th of May, 2018 and took around three months. The data for the research was collected via SurveyMonkey online data collection tool from the participants. Both the online invitations of the system and the e-mailing method were used to provide the participants with the questionnaire. The participants were notified that the participation to the survey was voluntary and they could stop answering the questions without finalizing it any time. The data was also coded anonymously, which was part of the briefing.

3.3.3. Data Analysis

Data of the research was analyzed by using the SPSS software version 23 to get the descriptive and inferential statistics of the results. Part of the initial data analysis was to detect the outliers and then descriptive statistics regarding the participants such as sector information and demographic information were reported.

For the factor analysis, Principal Components Analysis was used on SPSS and the reliability results of the scales for contextual ambidexterity, transformational leadership and PsyCap were checked using Cronbach Alpha values. The correlation results between the continuous variables were analyzed and reported. For the hypothesis testing regarding the relationship between dependent and independent variables, linear regression method was used. As for the hypothesis testing for the moderation, multiple hierarchical regression analysis was preferred.

CHAPTER IV

RESULTS

4.1. Confirmatory Factor Analysis of the Scales

In the scope of this study, 14 items of the Contextual Ambidexterity Scale, 20 items of the Transformational Leadership Scale and 24 items of the Psychological Capital Scale have been analyzed using principal components analysis (PCA) with direct oblimin rotation on SPSS version 23. Sampling adequacy and sphericity were tested for each scale: Kaiser-Mayer-Olkin (KMO) Sampling Adequacy and Bartlett Test for Sphericity were evaluated and reported, accordingly. Additionally, Cronbach Alpha values indicating the internal consistency of the scales were noted.

Factor loadings of each item were checked for each scale and the values above 0.40 were used for the analyses. In addition, factorial structure of the scales were compared with the original scales (for contextual ambidexterity scale, the criterion was the original English scale, yet for the transformational leadership and psychological capital Turkish ones that are translated by other researchers were taken into consideration) and similarities and differences in the structures were reported for each in line with the theoretical background.

4.1.1. Factor Analysis of Contextual Ambidexterity Questionnaire

The contextual ambidexterity scale has two sub-scales called exploration and exploitation, each having 7 items. The items 1, 2, 5, 6, 9, 10 and 13 are used to measure exploration dimension and the rest of the scale including the items 3, 4, 7, 8, 11, 12 and 14 aim at measuring the exploitation dimension of the contextual ambidexterity. The factor analysis for the scale has presented three dimensions: while items 1, 2, 5 and 6 were in the exploration dimension and 3, 4, 7, 8 were in the exploitation dimension, other items including 9, 10, 11, 12, 13 and 14 constituted another factor structure. Since the items mentioned belonged to both dimensions of

the original scale, another subscale or concept might have been emerged for this sample. However, for the purpose of the study, these items were removed from the analysis, total of 8 items for the contextual ambidexterity were included in the analysis.

For the 8 items mentioned, KMO value was 0.835, above the suggested value by Kaiser (1970, 1974) and Bartlett's Test of Sphericity (Bartlett, 1954) was significant ($\chi^2= 1036.277$, $df= 38$, $p=.000$) to support the factorial structure of the correlation matrix.

Principal component analysis resulted in two component for the contextual ambidexterity scale (of which eigenvalues are above 1). The two component structure of the scale explained a total of 73.4% of the variance. The factor structure of the scale is given on the table below with the components named according to the original scale as exploration and exploitation.

Table 4.1. Factor Analysis of Contextual Ambidexterity (CA) Questionnaire

	<i>Factor Loadings</i>	<i>Eigen Values</i>	<i>Total Variance Explained (%)</i>	<i>Cronbach Alpha</i>	<i>M</i>	<i>SD</i>
<i>Contextual Ambidexterity Total</i>			73.4	0.901	4.51	1.31
<i>Factor 1 = Exploration (4 items)</i>		4.840	60.5	0.896	4.72	1.31
CA1	0.986					
CA2	0.946					
CA6	0.653					
CA5	0.650					
<i>Factor 2 = Exploitation (4 items)</i>		1.033	12.9	0.833	4.31	1.38
CA8	0.904					
CA7	0.777					
CA3	0.706					
CA4	0.681					

4.1.2. Factor Analysis of Transformational Leadership Questionnaire

The transformational leadership scale has a total of 20 items and three dimensions: intellectual stimulation, individualized consideration and charisma/inspirational. The items 1, 2, 3, 5, 6, 7, 12, 13, 14, 15, 17 and 19 measure charisma/inspirational dimension, items 10, 11, 18 and 20 are for the intellectual stimulation component and items 4, 8, 9 and 16 measure individualized consideration. After the analysis conducted, the items 16 and 20 were removed as their loadings

were below 0.40. Rest of the items turned out to be only one factor instead of three as in the original scale.

For the 18 items of the scale, KMO value was 0.950, above the suggested value by Kaiser (1970, 1974) and Bartlett's Test of Sphericity (Bartlett, 1954) was significant ($\chi^2= 3331,831$, $df= 153$, $p=.000$). Emerging one component for the transformational leadership scale explained a total of 66.1% of the variance. The factor structure of the scale is shown on Table 4.2 with the component named as transformational leadership as one factor structure.

Table 4.2. Factor Analysis of Transformational Leadership (TL) Questionnaire

	<i>Factor Loadings</i>	<i>Eigen Values</i>	<i>Total Variance Explained (%)</i>	<i>Cronbach Alpha</i>	<i>M</i>	<i>SD</i>
<i>Transformational Leadership Total</i>			66.1	0.970	4.29	1.29
<i>Factor 1 = Transformational Leadership (18 items)</i>		11.889	66.1	0.970	4.29	1.29
TL9	0.895					
TL6	0.887					
TL5	0.887					
TL8	0.882					
TL11	0.873					
TL4	0.870					
TL10	0.853					
TL2	0.852					
TL12	0.831					
TL18	0.800					
TL1	0.799					
TL15	0.793					
TL3	0.789					
TL17	0.755					
TL13	0.740					
TL14	0.719					
TL7	0.686					
TL19	0.663					

4.1.3. Factor Analysis of Psychological Capital Questionnaire

Psychological capital scale consists of 24 items and four components: self-efficacy, hope, resilience and optimism. The items 1-6 measure self-efficacy, 7-12 are the items of hope, 13-18 measure resilience and items 19-24 are used to measure optimism. In addition, items 13, 20, 23 were reverse coded. The items 15, 16, 21 and 24 were removed from the scale since their factor loadings were below 0.40. Rest of the items generated a four component structure as the model suggests.

For the 18 items of the scale, KMO value was 0.954, above the suggested value by Kaiser (1970, 1974) and Bartlett's Test of Sphericity (Bartlett, 1954) was significant ($\chi^2= 4380,062$, $df= 276$, $p=.000$) to support the factorial structure.

Four components of the psychological capital scale explained a total of 71.835% of the variance. The factor structure of the scale is added on Table 4.3 with the components named as in the original scale.

Table 4.3. Factor Analysis of Psychological Capital (PsyCap) Questionnaire

	<i>Factor Loadings</i>	<i>Eigen Values</i>	<i>Total Var.Exp. (%)</i>	<i>Cronbach Alpha</i>	<i>M</i>	<i>SD</i>
<i>PsyCap Total</i>			71.8	0.958	4.4	1.4
<hr/>						
<i>Factor 1= Self-efficacy (6 items)</i>		13.665	53.9	0.971	3.60	1.30
PsyCap6	0.942					
PsyCap4	0.941					
PsyCap2	0.925					
PsyCap3	0.922					
PsyCap1	0.900					
PsyCap5	0.894					
<hr/>						
<i>Factor 2= Hope (6 items)</i>		2.380	9.9	0.930	3.60	1.29
PsyCap11	0.873					
PsyCap9	0.835					
PsyCap10	0.823					
PsyCap7	0.810					
PsyCap8	0.802					
PsyCap12	0.696					
<hr/>						
<i>Factor 3= Resilience (4 items)</i>		1.195	4.9	0.752	3.61	1.33
PsyCap14	0.889					
PsyCap17	0.869					
PsyCap18	0.828					
PsyCap13/r	0.827					
<hr/>						
<i>Factor 4= Optimism (4 items)</i>		1.012	3.0	0.760	3.62	1.22
PsyCap19	0.813					
PsyCap22	0.779					
PsyCap23/r	0.744					
PsyCap20/r	0.663					

**Original item number in the survey. "r" refers to the reverse-coded items.*

4.2. Correlation Analyses

Table 4.4 shows the descriptive values and Pearson correlation coefficient among variables of the study with the dimensions of the scales upon conducting the factor analysis for each.

In terms of interpretation of the table in question, Cohen's effect size classification regarding r values should be noted (1988). Accordingly, the effect size of the r values between .10 and .29 is small, .30 and .49 is medium, .50 and .69 is large and above .70 value is very large. Hence, the effect size of the given variable relationships vary from medium to very large and all of the correlations of the given variables are significant ($p < .001$). To this end, PsyCap, resilience, hope, self-efficacy and optimism had high correlations with contextual ambidexterity.

Table 4.4. The Correlation Analysis of the Continuous Variables in the Study (N=181)

		M	SD	Min	Max	1	2	3	4	5	6	7	8	9
1	Exploration	4.73	1.26	1.00	6.00	1.000								
2	Exploitation	4.31	1.22	1.00	6.00	.661 ¹	1.000							
3	Cont. Ambid. Mean	21.42	8.87	1.00	36.00	.863 ¹	.915 ¹	1.000						
4	Transf. Lead. Mean	4.27	1.20	1.20	6.00	.475 ¹	.335 ¹	.415 ¹	1.000					
5	PsyCap Mean	4.58	.92	1.63	5.83	.708 ¹	.562 ¹	.632 ¹	.555 ¹	1.000				
6	Optimism	4.32	.80	2.67	6.00	.530 ¹	.324 ¹	.433 ¹	.501 ¹	.788 ¹	1.000			
7	Resilience	4.51	.90	1.83	6.00	.596 ¹	.463 ¹	.515 ¹	.410 ¹	.881 ¹	.577 ¹	1.000		
8	Hope	4.52	1.14	1.00	6.00	.662 ¹	.580 ¹	.625 ¹	.563 ¹	.925 ¹	.646 ¹	.736 ¹	1.000	
9	Self-efficacy	4.99	1.27	1.00	6.00	.711 ¹	.589 ¹	.646 ¹	.501 ¹	.949 ¹	.656 ¹	.826 ¹	.860 ¹	1.000

¹p<.001

4.3. Results of Linear Regression Analysis

Prior to testing the hypotheses related to the moderation effect, the relationships between PsyCap, self-efficacy, hope, resilience and optimism as independent variables and contextual ambidexterity as dependent variable were analyzed. For each independent and dependent variable relationship different analysis was conducted. As the Table 4.5 shows, the analysis results for each was significant ($p = .000$). The predictive value for the independent variables seem high, also.

Table 4.5. Regression Analysis of PsyCap, Self-efficacy, Hope, Resilience and Optimism as Independent Variables on Contextual Ambidexterity as Dependent Variable

<i>IV</i>	β	<i>t</i>	<i>p</i>	<i>F</i>	R^2	R^2_{adj}
PsyCap	.618	10.506	.000	110.367	.381	.378
Self-efficacy	.645	11.302	.000	127.743	.416	.413
Hope	.608	10.254	.000	105.150	.370	.367
Resilience	.499	7.709	.000	59.433	.249	.245
Optimism	.424	6.270	.000	39.308	.180	.175

**Dependent Variable: Contextual Ambidexterity*

4.4. Results of Multiple Hierarchical Regression Analysis

Moderation effect related hypotheses of the paper (hypotheses 6-6d) have been analyzed using multiple hierarchical regression analysis. The dependent variable of the model is contextual ambidexterity, the moderator variable is transformational leadership and the independent

variables are PsyCap, self-efficacy, hope, resilience and optimism. Hierarchical multiple regression analysis method was chosen to exhibit the difference between the models, one of which includes moderator for each hypothesis. As the tables show, β , t , p , F , R^2 and ΔR^2 values were reported, yet despite a significant change with ΔR^2 for the resilience and optimism models, the hypotheses were not supported, resulting from negative β values.

Table 4.6 exhibits the case where the moderating effect of transformational leadership on the relationship between PsyCap and contextual ambidexterity. As the values suggest, with the addition of product term to the model, there has not been a significant change on the ΔR^2 . That's why, considering the values given (β : -.046; $p > .05$; ΔR^2 : .001) hypothesis 6 was rejected.

Table 4.6. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Psychological Capital and Contextual Ambidexterity

	β	t	p	F	R^2	ΔR^2
<i>Model 1</i>				56.416	.388	
PsyCap	.563	7.985	.000			
Transf. Lead.	.097	1.381	.169			
<i>Model 2</i>				37.619	.389	.001
PsyCap	.534	6.316	.000			
Transf. Lead.	.104	1.453	.148			
Product term	-.046	-.635	.526			

**Dependent Variable: Contextual Ambidexterity*

As the hypothesis 6b of the research suggests, below values outline the moderating effect of transformational leadership on the relationship between self-efficacy and contextual

ambidexterity. With the addition of the product term, there has not been a significant change on the model (β : -.010; $p > .05$; ΔR^2 : .000); hence, hypothesis 6a was not supported.

Table 4.7. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Self-efficacy and Contextual Ambidexterity

	β	t	p	F	R^2	ΔR^2
<i>Model 1</i>				66.367	.429	
Self-efficacy	.585	8.913	.000			
Transf. Lead.	.122	1.852	.066			
<i>Model 2</i>				44.006	.429	.000
Self-efficacy	.578	7.009	.000			
Transf. Lead.	.123	1.849	.066			
Product term	-.010	-.136	.892			

**Dependent Variable: Contextual Ambidexterity*

Hypothesis 6b of the paper suggests that transformational leadership moderates the positive relationship between hope and contextual ambidexterity. However, upon adding the product term, the model has not been significant (β : .008; $p > .05$; ΔR^2 : .000). To this end, hypothesis 6b of the research was not supported.

Table 4.8. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Hope and Contextual Ambidexterity

	β	t	p	F	R^2	ΔR^2
<i>Model 1</i>				53.813	.377	
Hope	.552	7.709	.000			
Transf. Lead.	.100	1.389	.167			
<i>Model 2</i>				35.682	.377	.000
Hope	.557	6.827	.000			
Transf. Lead.	.098	1.359	.176			
Product term	.008	.120	.904			

**Dependent Variable: Contextual Ambidexterity*

As the below table suggests, hypothesis 6c of the study focuses on the relationship between resilience and contextual ambidexterity with the moderating effect of transformational leadership. Adding the product term to the model changed the values in the positive way, yet since the β value is negative hypothesis 6c of the study was not supported (β : -.200; $p < .05$; ΔR^2 : .029).

Table 4.9. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Resilience and Contextual Ambidexterity

	β	t	p	F	R^2	ΔR^2
<i>Model 1</i>				<i>38.071</i>	<i>.300</i>	
Resilience	.397	5.767	.000			
Transf. Lead.	.246	3.577	.000			
<i>Model 2</i>				<i>28.916</i>	<i>.329</i>	<i>.029</i>
Resilience	.293	3.795	.000			
Transf. Lead.	.249	3.688	.000			
Product term	-.200	-2.780	.006			

**Dependent Variable: Contextual Ambidexterity*

Hypothesis 6d of the paper indicates that the positive relationship between optimism and contextual ambidexterity is moderated by the transformational leadership. Given the table below, the values are in line with the proposition, yet since the value of β is negative hypothesis 6d of the paper was not supported (β : -.219; $p < .05$; ΔR^2 : .045).

Table 4.10. Multiple Regression Analysis for the Moderation Effect of Transformational Leadership on the Relationship between Optimism and Contextual Ambidexterity

	β	t	p	F	R^2	ΔR^2
<i>Model 1</i>				26.906	.232	
Optimism	.291	3.834	.000			
Transf. Lead.	.264	3.474	.001			
<i>Model 2</i>				22.619	.277	.045
Optimism	.273	3.679	.000			
Transf. Lead.	.222	2.953	.004			
Product term	-.219	-3.319	.001			

**Dependent Variable: Contextual Ambidexterity*

CHAPTER V

DISCUSSION AND CONCLUSION

Despite the volume of research examining organizational ambidexterity at group or firm level, the individual level ambidexterity has been rarely studied by the researchers (Gibson & Birkinshaw, 2004; Kauppila & Tempelaar, 2016). Mainly focusing on whether to orchestrate the balance of exploration and exploitation through structural or sequential ambidexterity at organizational level, researchers have missed the vitality of individual level ambidexterity and its contribution to overall ambidexterity level of a given organization or business unit. Hence, this research aimed at examining contextual ambidexterity in the organizations by delving into the psychological capital of the individuals; namely, hope, resilience, optimism and self-efficacy, with the moderating effect of transformational leadership. Though there is research focusing the relationship between organizational ambidexterity and transformational leadership despite few as Baškarada et al. (2016) suggest (Jansen et al., 2008; Nemanich & Vera, 2009; O'Reilly & Tushman, 2011) and psychological capital and transformational leadership (Hooja, 2013), there has not been a single study focusing on the interaction between psychological capital and contextual ambidexterity. Thus, to fill in this gap in the literature, psychological capital with its four dimensions as an antecedent of the contextual ambidexterity has been examined within the scope of this research. To further analyze the interaction between the given variables, the moderating effect of transformational leadership as an important contextual parameter was added to the research model in line with the recent studies focusing on this effect (Jansen et al., 2008; Li et al., 2017). Kauppila and Tempelaar (2016) suggest that “the leadership context in which individuals are embedded can play an important role in enabling and supporting organizational members’ ambidextrous behavior” (p. 20); that’s why transformational leadership variable addition to the model was noteworthy.

By building mainly on the research by Kauppila and Tempelaar (2016) indicating that individual level ambidexterity will be influenced by self-efficacy, the researcher hypothesized that other dimensions of the PsyCap would have an exploratory power on the construct, as well. Furthermore, in line with the research by Gibson and Birkinshaw (2004) and Simsek (2009) stating that the organizational context would have an effect on the relationship between PsyCap and contextual ambidexterity, transformational leadership was added to the research model since such a powerful leadership style would have a considerable effect on employee ambidexterity behavior.

In this context, the research hypotheses regarding the relationship between PsyCap and contextual ambidexterity, of which correlation values are high, have been supported through regression analyses. Hence, within the scope of this study, the predictive value of PsyCap, hope, resilience, self-efficacy and optimism on contextual ambidexterity have been tested and hypotheses 1-5 focusing on this interaction have been supported. This is an important contribution to the ambidexterity literature since there is still limited research on the antecedents of ambidexterity (Baškarada et al., 2016).

As for the moderation analyses, results show that the positive relationship between PsyCap, hope, resilience, optimism and self-efficacy and contextual ambidexterity are not moderated by the transformational leadership in a way that the increase in transformational leadership did not lead to a reinforcing effect between the independent and dependent variables (hypotheses 6-6d were not supported). However, for the optimism and resilience, negative β values (-.219 for optimism and -.200 for resilience) show that the increase in the transformational leadership leads to a less strong relationship between resilience and contextual ambidexterity and optimism and contextual ambidexterity relationships. Though transformational leadership, by emerging in more 'turbulent' circumstances and having a unifying effect through 'shared values' among individuals (Vasilaki, Tarba, Ahammad, & Glaister, 2016) did not seem to positively influence

the PsyCap with its four component and contextual ambidexterity relationships based in this study.

In terms of contextual ambidexterity literature, the results of this study support the approach that exploration and exploitation are complimentary (Cao et al., 2009) rather than paradoxical (Gupta et al., 2006); in that, there is a positive correlation between the two constructs. Hence, this research contributes to the literature of ambidexterity with this finding in terms of supporting that exploration and exploitation could be achieved together and are not necessarily contradictory.

5.1. Summary of the Findings

After the descriptive analysis, the interpretive statistics have been conducted within the context of this research. Confirmatory factor analysis of contextual ambidexterity scale that has been translated to Turkish by back-to-back method has indicated a two factor structure in line with the literature. A total of 8 items were used to measure the exploration and exploitation subscales. For the transformational leadership scale, the one dimension structure has been supported with the given sample. As for psychological capital, hope, resilience, self-efficacy and optimism dimensions of the scale have been used for the research as a result of factor analysis.

Correlation analyses of the continuous variables of research, which are PsyCap, self-efficacy, hope, resilience, optimism, transformational leadership, exploration, exploitation and contextual ambidexterity, have shown high levels of correlation. In addition, effect sizes vary from medium to very large. To evaluate the predictive value of independent variables of PsyCap, self-efficacy, hope, resilience and optimism on contextual ambidexterity as a dependent variable linear regression analyses have been conducted. And each model seems significant with a p value of .000. This analyses suggest that hypotheses 1-5 of the study have been supported.

For the analysis of hypotheses from 6 to 6d, hierarchical multiple regression analysis has been conducted to differentiate the effect of product terms on the models. According to these results, the moderation effect of increase in transformational leadership on reinforcing the PsyCap and contextual ambidexterity relationship has not been observed.

5.2. Contributions of the Study

This study has three main contributions to the literature. Firstly, among other types of organizational ambidexterity, contextual ambidexterity is the less studied one and the field requires more research (Gibson & Birkinshaw, 2004; Gupta et al, 2006; Raisch et al., 2009). Hence, in the context of a Turkish organizational structure, the construct has been analyzed and explained further. Secondly, previous studies hinted that ‘bureaucracy’ and ‘supportive context’ including leadership style were the possible antecedents to the contextual ambidexterity (Adler et al., 1999; Gibson & Birkinshaw, 2004; Mom et al., 2009); however, little attention has been paid to the psychological causes or antecedents. Thus, this study would have a contribution to the individual level ambidexterity through examining the effect of PsyCap with its four different dimensions. Finally, the research model is unique in a way that contextual ambidexterity, transformational leadership and PsyCap constructs have never been studied before with such a model. Hence, the research will contribute to the positive psychology and management literature with the analysis of the constructs in question within the context of white-collar employees working at the chemicals sector.

5.3. Limitations and Recommendations for Future Research

This study has a few limitations. First of all, as the research model is unique in a way that PsyCap has not been studied before as an antecedent of contextual ambidexterity or the moderation effect of transformational leadership has never been examined on this interaction,

the literature review procure has become challenging. With further research, the variable interactions could be explained in more detail.

Secondly, as contextual ambidexterity has been tested without taking into account the nature of the job; in the analysis, all job functions and sub-sectors of the participants were evaluated without considering the effect of these parameters. Furthermore, only the reports of the participants were used as part of the research, to get a better result, future research could use peer or managerial reviews mainly for the analysis of contextual ambidexterity (Kauppila & Tempelaar, 2016).

Finally, the research model could be further analyzed adding more parameters using the demographic information gathered such as age and gender. In addition, differences between the individuals working at different sub-sectors of chemicals could present different results.

5.4. Managerial Implications

Contextual ambidexterity could be evaluated as a performance indicator; in the sense that, it requires the balance of two seemingly different, yet intrinsically related activities called exploration and exploitation. Hence, it could be argued with relation to self-determination theory that in the relationship between psychological capital and contextual ambidexterity, internal and personal factors rather than external ones such as leadership has an exploratory power with regards to the moderation analyses. Transformational leadership, though, has a powerful impact on the subordinates in terms of inspiring their work and motivating them, has not shown to have a reinforcing effect on the positive relationship between psychological capital and contextual ambidexterity. Instead, based on this study, it could be asserted that psychological capital seems to be an important antecedent of contextual ambidexterity and this relationship could be further explained in relation with the motivation level of the individuals towards achieving the orchestration of exploration and exploitation. That's why, leaders in their relationship with the subordinates, not to negatively influence their job performance as in

contextual ambidexterity, should make sure that individuals are empowered to execute their own behaviors or prioritize the duties assigned.

References

- Adler, P. S., Goldoftas, B., & Levine, D. I. (1999). Flexibility versus efficiency? A case study of model changeovers in the Toyota production system. *Organization science*, 10(1), 43-68.
- Ajayi, O. M., Odusanya, K., & Morton, S. (2017). Stimulating employee ambidexterity and employee engagement in SMEs. *Management Decision*, 55(4), 662-680.
- Aston-Jones, G., & Cohen, J. D. (2005). An integrative theory of locus coeruleus-norepinephrine function: adaptive gain and optimal performance. *Annu. Rev. Neurosci.*, 28, 403-450.
- Avey, J. B., Patera, J. L., & West, B. J. (2006). Positive psychological capital: A new approach for understanding absenteeism. *Journal of Leadership and Organizational Studies*, 13(2), 42-60.
- Avolio, B. J., Bass, B. M., & Jung, D. I. (1999). Re-examining the components of transformational and transactional leadership using the Multifactor Leadership. *Journal of occupational and organizational psychology*, 72(4), 441-462.
- Bandura A. (1986). *Social foundations of thought and action: A social cognitive theory*. Englewood Cliffs , NJ : Prentice-Hall.
- Bandura, A. (1993). Perceived self-efficacy in cognitive development and functioning. *Educational psychologist*, 28(2), 117-148.
- Bandura A. (1997). *Self-efficacy: The exercise of control*. New York , NY : Freeman.
- Bandura A. (2008). An agentic perspective on positive psychology. In LopezSJ (ed.), *Positive psychology* (Vol. 1, pp. 167–196). Westport , CT : Greenwood.
- Bartlett, M. S. (1954). A note on the multiplying factors for various χ^2 approximations. *Journal of the Royal Statistical Society. Series B (Methodological)*, 296-298.
- Bass, B. M. (1985). *Leadership and performance beyond expectations*. Collier Macmillan.

- Bass, B. M. (1990). *Handbook of leadership* (3rd ed.). New York: Free Press.
- Bass, B. M. (1999). Two decades of research and development in transformational leadership. *European journal of work and organizational psychology*, 8(1), 9-32.
- Bass, B. M., Avolio, B. J., Jung, D. I., & Berson, Y. (2003). Predicting unit performance by assessing transformational and transactional leadership. *Journal of applied psychology*, 88(2), 207.
- Baškarada, S., Watson, J., & Cromarty, J. (2016). Leadership and organizational ambidexterity. *Journal of Management Development*, 35(6), 778-788.
- Benner, M. J., & Tushman, M. (2002). Process management and technological innovation: A longitudinal study of the photography and paint industries. *Administrative science quarterly*, 47(4), 676-707.
- Bonesso, S., Gerli, F., & Scapolan, A. (2014). The individual side of ambidexterity: do individuals' perceptions match actual behaviors in reconciling the exploration and exploitation trade-off?. *European Management Journal*, 32(3), 392-405.
- Bower, J. L., & Doz, Y. (1979). Strategy formulation: A social and political process. D. Schendel, C. Hofer, eds. *Strategic Management: A New View of Business Policy and Planning*.
- Caniëls, M. C., Neghina, C., & Schaetsaert, N. (2017). Ambidexterity of employees: the role of empowerment and knowledge sharing. *Journal of Knowledge Management*, 21(5), 1098-1119.
- Cao, Q., Gedajlovic, E., & Zhang, H. (2009). Unpacking organizational ambidexterity: Dimensions, contingencies, and synergistic effects. *Organization Science*, 20(4), 781-796.
- Cohen, J. (1988). *Statistical Power Analysis for the Behavioral Sciences* (2nd Ed.). Hillsdale, NJ: Erlbaum.

- Cohen, J. D., McClure, S. M., & Yu, A. J. (2007). Should I stay or should I go? How the human brain manages the trade-off between exploitation and exploration. *Philosophical Transactions of the Royal Society B: Biological Sciences*, 362(1481), 933-942.
- Dartey-Baah, K. (2015). Resilient leadership: A transformational-transactional leadership mix. *Journal of Global Responsibility*, 6(1), 99-112.
- Deci, E. L., & Ryan, R. M. (1985). 1985: Intrinsic motivation and self-determination in human behaviour. New York: Plenum.
- Deci, E. L., & Ryan, R. M. (2008). Self-determination theory: A macrotheory of human motivation, development, and health. *Canadian psychology/Psychologie canadienne*, 49(3), 182.
- Duncan, R. B. (1976). The ambidextrous organization: Designing dual structures for innovation. *The management of organization*, 1(1), 167-188.
- Denison, D. R. (1990). *Corporate culture and organizational effectiveness*. New York: Wiley.
- Denison, D. R., Hooijberg, R., & Quinn, R. E. (1995). Paradox and performance: Toward a theory of behavioral complexity in managerial leadership. *Organization Science*, 6(5), 524-540.
- Erkus, A., & Findikli, M. A. (2013). A research on the impact of psychological capital to job satisfaction, job performance and intention to quit. *Istanbul Üniversitesi İktisadi İdari Fakültesi Dergisi*, 42(2), 302.
- Ghoshal, S., & Bartlett, C. A. (1994). Linking organizational context and managerial action: The dimensions of quality of management. *Strategic management journal*, 15(S2), 91-112.
- Ghoshal, S., Bartlett, C. A., & Kovner, P. C. (1997). *The individualized corporation*. New York: Harper Collins.
- Gibson, C. B., & Birkinshaw, J. (2004). The antecedents, consequences, and mediating role of

- organizational ambidexterity. *Academy of management Journal*, 47(2), 209-226.
- Good, D., & Michel, E. J. (2013). Individual ambidexterity: Exploring and exploiting in dynamic contexts. *The Journal of psychology*, 147(5), 435-453.
- Gooty, J., Gavin, M., Johnson, P. D., Frazier, M. L., & Snow, D. B. (2009). In the eyes of the beholder: Transformational leadership, positive psychological capital, and performance. *Journal of Leadership & Organizational Studies*, 15(4), 353-367.
- Gupta, A. K., Smith, K. G., & Shalley, C. E. (2006). The interplay between exploration and exploitation. *Academy of management journal*, 49(4), 693-706.
- Haar, J. M., Roche, M., & Luthans, F. (2014). Do leaders' psychological capital and engagement influence follower teams or vice versa?. In *Academy of Management Proceedings* (Vol. 2014, No. 1, p. 11058). Briarcliff Manor, NY 10510: Academy of Management.
- Harland, L., Harrison, W., Jones, J. R., & Reiter-Palmon, R. (2005). Leadership behaviors and subordinate resilience. *Journal of Leadership & Organizational Studies*, 11(2), 2-14.
- He, Z. L., & Wong, P. K. (2004). Exploration vs. exploitation: An empirical test of the ambidexterity hypothesis. *Organization science*, 15(4), 481-494.
- Hedlund, G., & Ridderstrale, J. (1997). Toward a theory of the self-renewing MNC. *International business: An emerging vision*, 329, 353.
- Hills, T. T., Todd, P. M., & Goldstone, R. L. (2010). The central executive as a search process: Priming exploration and exploitation across domains. *Journal of Experimental Psychology: General*, 139(4), 590.
- Hobfoll S. (2002). Social and psychological resources and adaptation. *Review of General Psychology*, 6, 307-324.
- Hong, K., Yu, G. J., & Hyun, E. (2018). Understanding ambidexterity at the individual level: task assignment perspective. *Computational and Mathematical Organization Theory*,

24(1), 34-50.

Hooja, H. R. (2013). Psychological capital and transformational leadership in relation to work-life balance: a study on police personnel.

Hu, Y., Wu, X., Zong, Z., Xiao, Y., Maguire, P., Qu, F., ... & Wang, D. (2018). Authentic leadership and proactive behavior: the role of psychological capital and compassion at work. *Frontiers in psychology*, 9.

Jansen, J. J., Vera, D., & Crossan, M. (2009). Strategic leadership for exploration and exploitation: The moderating role of environmental dynamism. *The Leadership Quarterly*, 20(1), 5-18.

Kaiser, H. F. (1970). A second generation little jiffy. *Psychometrika*, 35(4), 401-415.

Kaiser, H. F. (1974). An index of factorial simplicity. *Psychometrika*, 39(1), 31-36.

Kauppila, O. P., & Tempelaar, M. P. (2016). The Social-Cognitive Underpinnings of Employees' Ambidextrous Behavior and the Supportive Role of Group Managers' Leadership. *Journal of Management Studies*, 53(6), 1019-1044.

Keller, R. T. (2006). Transformational leadership, initiating structure, and substitutes for leadership: a longitudinal study of research and development project team performance. *Journal of applied psychology*, 91(1), 202.

Laureiro-Martínez, D., Brusoni, S., & Zollo, M. (2010). The neuroscientific foundations of the exploration– exploitation dilemma. *Journal of Neuroscience, Psychology, and Economics*, 3(2), 95.

Lavie, D., Stettner, U., & Tushman, M. L. (2010). Exploration and exploitation within and across organizations. *The Academy of Management Annals*, 4(1), 109-155.

Levesque, C., Copeland, K. J., & Sutcliffe, R. A. (2008). Conscious and nonconscious processes: Implications for self-determination theory. *Canadian Psychology/Psychologie canadienne*, 49(3), 218.

- Levinthal, D. A., & March, J. G. (1993). The myopia of learning. *Strategic management journal*, 14(S2), 95-112.
- Lewin, K., Lippitt, R., & White, R. K. (1939). Patterns of aggressive behavior in experimentally created “social climates”. *The Journal of social psychology*, 10(2), 269-299.
- Lewis, M. W. (2000). Exploring paradox: Toward a more comprehensive guide. *Academy of Management review*, 25(4), 760-776.
- Li, C. R., Lin, C. J., & Tien, Y. H. (2015). CEO transformational leadership and top manager ambidexterity: an empirical study in Taiwan SMEs. *Leadership & Organization Development Journal*, 36(8), 927-954.
- Li, A. N., Liao, H., Tangirala, S., & Firth, B. M. (2017). The content of the message matters: The differential effects of promotive and prohibitive team voice on team productivity and safety performance gains. *Journal of Applied Psychology*, 102(8), 1259.
- Lubatkin, M. H., Simsek, Z., Ling, Y., & Veiga, J. F. (2006). Ambidexterity and performance in small-to medium-sized firms: The pivotal role of top management team behavioral integration. *Journal of management*, 32(5), 646-672.
- Luthans, F. (2002a). The need for and meaning of positive organizational behavior. *Journal of Organizational Behavior*, 23, 695–706.
- Luthans, F., Youssef, C. M., & Avolio, B. J. (2007). Psychological capital: Developing the human competitive edge (p. 3). Oxford: Oxford University Press.
- Luthans, F., Avolio, B. J., Avey, J. B. ve Norman, S. M. (2007a). Positive Psychological Capital: Measurement and Relationship with Performance and Satisfaction. *Personal Psychology*. 60: 541–572.
- Luthans, F., Youssef, C. M., ve Avolio, B. J. (2007b). *Psychological Capital: Developing the Human Competitive Edge*. New York: Oxford University Press.
- Luthans, F., Youssef, C. M., & Avolio, B. J. (2015). Psychological capital and beyond. Oxford

University Press, USA.

- March, J. G. (1991). Exploration and exploitation in organizational learning. *Organization science*, 2(1), 71-87.
- McClure, S. M., Gilzenrat, M. S., & Cohen, J. D. (2006). An exploration-exploitation model based on norepinephrine and dopamine activity. In *Advances in neural information processing systems* (pp. 867-874).
- Mom, T. J., Van Den Bosch, F. A., & Volberda, H. W. (2007). Investigating managers' exploration, and exploitation activities: The influence of top-down, bottom-up, and horizontal knowledge inflows. *Journal of management studies*, 44(6), 910-931.
- Mom, T. J., Van Den Bosch, F. A., & Volberda, H. W. (2009). Understanding variation in managers' ambidexterity: Investigating direct and interaction effects of formal structural and personal coordination mechanisms. *Organization Science*, 20(4), 812-828.
- Nemanich, L. A., & Vera, D. (2009). Transformational leadership and ambidexterity in the context of an acquisition. *The Leadership Quarterly*, 20(1), 19-33.
- O'Reilly, C. A., & Tushman, M. L. (2008). Ambidexterity as a dynamic capability: Resolving the innovator's dilemma. *Research in organizational behavior*, 28, 185-206.
- O'Reilly III, C. A., & Tushman, M. L. (2011). Organizational ambidexterity in action: How managers explore and exploit. *California management review*, 53(4), 5-22.
- O'Reilly, C. A., & Tushman, M. L. (2013). Organizational ambidexterity: Past, present, and future. *The Academy of Management Perspectives*, 27(4), 324-338.
- Peterson, S. J., & Luthans, F. (2003). The positive impact and development of hopeful leaders. *Leadership & Organization Development Journal*, 24(1), 26-31.
- Peterson, S. J., Walumbwa, F. O., Byron, K., & Myrowitz, J. (2009). CEO positive psychological traits, transformational leadership, and firm performance in high-technology start-up and established firms. *Journal of management*, 35(2), 348-368.

- Peterson, S. J., & Zhang, Z. (2011). Examining the relationships between top management team psychological characteristics, transformational leadership, and business unit performance. *Handbook of top management research*, 127-149.
- Peterson, S. J., Luthans, F., Avolio, B. J., Walumbwa, F. O., & Zhang, Z. (2011). Psychological capital and employee performance: A latent growth modeling approach. *Personnel Psychology*, 64(2), 427-450.
- Raisch, S., & Birkinshaw, J. (2008). Organizational ambidexterity: Antecedents, outcomes, and moderators. *Journal of management*, 34(3), 375-409.
- Raisch, S., Birkinshaw, J., Probst, G., & Tushman, M. L. (2009). Organizational ambidexterity: Balancing exploitation and exploration for sustained performance. *Organization science*, 20(4), 685-695.
- Roemer, A., & Harris, C. (2018). Perceived organisational support and well-being: The role of psychological capital as a mediator. *SA Journal of Industrial Psychology*, 44(1), 1-11.
- Rosing, K., Frese, M., & Bausch, A. (2011). Explaining the heterogeneity of the leadership-innovation relationship: Ambidextrous leadership. *The leadership quarterly*, 22(5), 956-974.
- Serinkan, C. (2003). Toplam Kalite Yönetimi ile Dönüşümcü Liderlik İlişkisi ve Denizli Yöresinde Yapılan Bir Araştırma. Unpublished Phd Thesis, İstanbul University Institute of Social Sciences, 1-225.
- Schein, E. H. (2010). *Organizational culture and leadership*. San Francisco: Jossey-Bass.
- Simsek, Z. (2009). Organizational ambidexterity: Towards a multilevel understanding. *Journal of management studies*, 46(4), 597-624.
- Simsek, Z., Heavey, C., Veiga, J. F., & Souder, D. (2009). A typology for aligning organizational ambidexterity's conceptualizations, antecedents, and outcomes. *Journal of Management Studies*, 46(5), 864-894.

- Smith, W. K., & Tushman, M. L. (2005). Managing strategic contradictions: A top management model for managing innovation streams. *Organization science*, 16(5), 522-536.
- Snyder, C. R., Harris, C., Anderson, J. R., Holleran, S. A., Irving, L. M., Sigmon, S. T., ... & Harney, P. (1991). The will and the ways: Development and validation of an individual-differences measure of hope. *Journal of personality and social psychology*, 60(4), 570.
- Song, J., He, C., Wu, W., & Zhai, X. (2018). Roles of self-efficacy and transformational leadership in explaining voice-job satisfaction relationship. *Current Psychology*, 1-12.
- Turkish Exporters' Assembly. (2019). Yearly Export Report of Turkey.
- Tushman, M. L., & O'Reilly III, C. A. (1996). Ambidextrous organizations: Managing evolutionary and revolutionary change. *California management review*, 38(4), 8-29.
- Van Knippenberg, D., & Sitkin, S. B. (2013). A critical assessment of charismatic-transformational leadership research: Back to the drawing board?. *The Academy of Management Annals*, 7(1), 1-60.
- Vasilaki, A., Tarba, S., Ahammad, M. F., & Glaister, A. J. (2016). The moderating role of transformational leadership on HR practices in M&A integration. *The International Journal of Human Resource Management*, 27(20), 2488-2504.
- Vera, D., & Crossan, M. (2004). Strategic leadership and organizational learning. *Academy of management review*, 29(2), 222-240.
- Wang, D., Wang, X., & Xia, N. (2018). How safety-related stress affects workers' safety behavior: The moderating role of psychological capital. *Safety science*, 103, 247-259.
- Weber, M. (1947). *The theory of social and economic organization* (A. M. Henderson & T. Parsons, Trans.) New York: Oxford University Press. (Original work published 1924).
- Wilson, P. M., Mack, D. E., & Grattan, K. P. (2008). Understanding motivation for exercise: a self-determination theory perspective. *Canadian Psychology/Psychologie canadienne*, 49(3), 250.

APPENDICES

APPENDIX 1

Dear Participant,

This study is conducted by Istanbul Bilgi University Organizational Psychology M.A. Program student Elif Semra Tulum to examine the relationship between psychological capital and contextual ambidexterity in relation with the transformational leadership.

The data gathered through the questionnaires will not be evaluated on a single basis and the analysis that will be carried out using the findings accumulated will solely be used for scientific purposes. It is not foreseen that the questions in the survey will have a negative impact on the participants and the participation to the survey that lasts around ten minutes on volunteering basis.

Elif Semra TULUM

Istanbul Bilgi University Organizational Psychology M.A. Program

1. I have read and understood the information that explains the purpose of the research in question and to participate in the research:

I accept ()

I do not accept ()

2. Working status:

Yes, I do ()

No, I do not ()

APPENDIX A

To what extent did you, last year, engage in work related activities that can be characterized as follows:	1 (To a very small extent)	2	3	4	5	6	7 (To a very large extent)
1. Searching for new possibilities with respect to products/services, processes, or markets.							
2. Evaluating diverse options with respect to products/services, processes, or markets.							
3. Focusing on strong renewal of products/services or processes.							
4. Activities of which the associated yields or costs are currently unclear.							
5. Activities requiring quite some adaptability of you.							
6. Activities requiring you to learn new skills or knowledge.							
7. Activities that are not (yet) clearly existing company policy.							
8. Activities of which a lot of experience has been accumulated by yourself.							
9. Activities which you carry out as if it were routine.							
10. Activities which serve existing (internal) customers with existing services/products.							
11. Activities of which it is clear to you how to conduct them.							
12. Activities primarily focused on achieving short-term goals.							

13. Activities which you can properly conduct by using your present knowledge.							
14. Activities which clearly fit into existing company policy.							

APPENDIX B

<p>Below are statements that describe how you may think about yourself right now. Use the following scales to indicate your level of agreement or disagreement with each statement.</p>	<p>1 (Strongly disagree)</p>	<p>2 (Disagree)</p>	<p>3 (Somewhat disagree)</p>	<p>4 (Somewhat agree)</p>	<p>5 (Agree)</p>	<p>6 (Strongly agree)</p>
<p>1. I feel confident analyzing a long-term problem to find a solution.</p>						
<p>2. I feel confident in representing my work area in meetings with management.</p>						
<p>3. I feel confident contributing to discussions about the company's strategy.</p>						
<p>4. I feel confident helping to set targets/goals</p>						

in my work area.						
5. I feel confident contacting people outside the company (e.g. suppliers, customers) to discuss problems.						
6. I feel confident presenting information to a group of colleagues.						
7. If I should find myself in a jam at work, I could think of many ways to get out of it.						
8. At the present time, I am energetically pursuing my work goals.						
9. There are lots of ways around any problem.						
10. Right now I see myself as being pretty successful at work.						

11. I can think of many ways to reach my current work goals.						
12. At this time, I am meeting the work goals that I have set for myself.						
13. When I have a setback at work, I have trouble recovering from it, moving on (R).						
14. I usually manage difficulties one way or another at work.						
15. I can be “on my own,” so to speak, at work if I have to.						
16. I usually take stressful things at work in stride.						
17. I can get through difficult times at work because I’ve experienced						

difficulty before.						
18. I feel I can handle many things at a time at this job.						
19. When things are uncertain for me at work, I usually expect the best.						
20. If something can go wrong for me work-wise, it will (R).						
21. I always look on the bright side of things regarding my job.						
22. I'm optimistic about what will happen to me in the future as it pertains to work.						
23. In this job, things never work out the way I want them to (R).						
24. I approach this job as if						

“every cloud has a silver lining.”						
--	--	--	--	--	--	--

APPENDIX C

Below are the statements regarding your immediate manager/leader, please fill in the form using the given scale, according to you level of agreement or disagreement.		1 (To a small extent)	2	3	4	5	6 (To a large extent)
1	My leader emphasizes the collective mission.						
2	My leader considers the moral/ethical.						
3	My leader talks enthusiastically.						
4	My leader teaches and coaches us.						
5	My leaders expresses confidence.						
6	My leader models ethical standards.						
7	My leader is proud of himself/herself.						
8	My leader differentiates among us.						
9	My leader focuses your strengths.						
10	My leader re-examines assumptions.						
11	My leader suggests new ways.						
12	My leader arouses awareness about important issues.						
13	My leader talks of values.						
14	My leader has my respect.						
15	My leader talks optimistically.						
16	My leader individualizes attention.						
17	My leader displays power and confidence.						
18	My leader suggests different angles.						
19	My leader goes beyond self-interest.						
20	My leader seeks different views.						

APPENDIX D

1. Company Title:

2. Sector of the Company:

3. Total Number of Employees:

4. The Company's Scale in terms of its Number of Employees and Endorsement:

Small-Sized

Medium-Sized

Large-Sized

5. Number of Years the Company You're Working at Operating:

6. Department:

7. Number of Years You're Working at Your Current Workplace:

5 Years and Below

6-10 Years

11-15 Years

16 Years and Above

8. Title:

9. Age:

25 Years and Below

26-35 Years

36-45 Years

46 Years and Above

10. Gender:

Female

Male

11. Level of Education:

- Primary Education
- High School
- Undergraduate
- Master
- PhD
- Other (Please, identify)

TURKISH VERSION OF SCALES

EK 1

Değerli Katılımcı,

Bu çalışma, İstanbul Bilgi Üniversitesi Örgütsel Psikoloji Tezli Yüksek Lisans Programı öğrencisi Elif Semra Tulum tarafından "çalışanların psikolojik sermayeleri ve bireysel çift yönlülük (yararlanıcı ve keşfedici stratejilerin birlikte kullanımı) ilişkisini dönüşümcü liderlik etkisiyle incelemek amacıyla" yürütülmektedir.

Anketler aracılığıyla elde edilen veriler tekil olarak değerlendirilmeyecek ve toplanan bulguların bir araya getirilmesiyle gerçekleştirilecek analizler sadece bilimsel amaçla kullanılacaktır. Çalışmada yer alan soruların araştırma katılımcıları açısından herhangi bir olumsuz etki yaratması ön görülmemekte olup uygulanması ortalama on dakika süren ankete katılım tamamen gönüllülük esasına dayanmaktadır.

Çalışmayla ilgili soru ve önerileriniz için semra.tulum@bilgiedu.net ile iletişime geçebilirsiniz.

Elif Semra TULUM

İstanbul Bilgi Üniversitesi Örgütsel Psikoloji Tezli Yüksek Lisans Programı

1. Söz konusu araştırmanın amacını anlatan bilgilendirmeyi okudum, anladım ve araştırmaya katılmayı:

Kabul ediyorum ()

Kabul etmiyorum ()

2. Aktif olarak çalışma durumunuz:

Evet, çalışıyorum ()

Hayır, çalışmıyorum ()

EK A

Lütfen **mevcut işiniz kapsamında yürüttüğünüz faaliyetleri göz önünde bulundurarak** aşağıdaki ifadelere ne derece katıldığınızı, **1 (Kesinlikle katılmıyorum)** ile **6 (Kesinlikle katılıyorum)** arasındaki seçeneklerden size en uygun olanı işaretleyerek belirtiniz.

		1 (Kesinlikle katılmıyorum)	2	3	4	5	6 (Kesinlikle katılıyorum)
1	Ürünler/hizmetler, süreçler veya pazarlarla ilgili yeni imkanları araştırmayı içerir.						
2	Ürünler/hizmetler, süreçler veya pazarlarla ilgili çeşitli seçenekleri değerlendirmeyi içerir.						
3	Çok fazla deneyimli olduğum aktivitelerdir.						
4	Rutin olarak yürüttüğüm faaliyetlerdir.						
5	Adaptasyon gerektiren aktivitelerdir.						
6	Yeni beceriler veya bilgi edinmeyi gerektiren aktivitelerdir.						
7	Mevcut hizmetlerle/ürünlerle mevcut (iç) müşterilere hizmet veren faaliyetlerdir.						
8	Aşına olduğum/deneyimli olduğum aktivitelerdir.						
9	Ürünlerin/hizmetlerin veya süreçlerin güçlü bir biçimde yenilenmesine odaklanmayı içerir.						
10	Getiri ve maliyetleri hala belirsiz olan aktivitelerdir.						
11	Mevcut şirket politikasına uygun faaliyetlerdir.						
12	Öncelikli olarak kısa vadeli hedeflere ulaşmaya odaklı aktivitelerdir.						
13	Henüz şirket politikası haline gelmemiş aktivitelerdir.						
14	Mevcut bilgilerimi kullanarak düzgün bir şekilde yürütebildiğim aktivitelerdir.						

EK B

Lütfen **iş verindeki psikolojik durumunuzla ilgili** aşağıda yer alan ifadelere ne derece katıldığınızı, **1 (Kesinlikle katılmıyorum)** ile **6 (Kesinlikle katılıyorum)** arasındaki seçeneklerden size en uygun olanı işaretleyerek belirtiniz.

		1 (Kesinlikle katılmıyorum)	2	3	4	5	6 (Kesinlikle katılıyorum)
1	Uzun dönemli bir soruna çözüm bulabilmek için analiz yaparken kendime güvenirim.						
2	Üst yönetimle veya amirlerimle yaptığım toplantılarda işimle (uzmanlık alanımla) ilgili konularda kendime güvenirim.						
3	Çalıştığım kurumun stratejisi ve amaçları hakkındaki fikir tartışmalarına katkı sağlarken kendime güvenirim.						
4	Çalışma alanımla ilgili hedef ve amaçların belirlenmesine yardım ederken kendime güvenirim.						
5	Kurum dışında temas kurduğum insanlarla çeşitli sorunları tartışırken kendime güvenirim.						
6	Çalışma arkadaşlarıma bilgi aktarırken kendime güvenirim.						
7	Kendimi işler arasında sıkışmış bir halde bulursam, bu karışıklıktan kurtulmanın pek çok yolu olduğunu bilirim.						
8	İşimle ilgili amaçlarımı şu anda enerjik olarak takip edebiliyorum.						
9	Bir problemin pek çok çözüm yolu vardır.						
10	Şu anda kendimi işimle ilgili oldukça başarılı görüyorum.						
11	Şu anda yaptığım işle ilgili amaçlarıma ulaşabilmenin pek çok yolunu bulabilirim.						
12	İşimle ilgili koymuş olduğum amaçlarımı şu ana kadar gerçekleştirdiğimi düşünüyorum.						
13	İşimle ilgili bir engelle karşılaştığımda, bundan kurtulmak konusunda sorunlar yaşıyorum.						
14	İşimle ilgili ortaya çıkan güçlüklerle genellikle öyle ya da böyle başa çıkabilirim.						
15	Mecbur kalırsam işimde “kendi başıma” da çalışabilirim.						
16	İş yerinde bana sıkıntı veren şeylerden uzak durmaya çalışırım.						

17	Daha önceden edindiğim tecrübeler sayesinde iş yerimdeki zorlukların üstesinden gelebilirim.						
18	Bu iş konusunda birden fazla şeyi bir arada yapabileceğimi hissediyorum.						
19	İşimle ilgili konular bana belirsiz ve karmaşık geldiğinde, genellikle en iyisini yapacağımı ümit ederim.						
20	İşimle ilgili bazı şeylerin ters gitme ihtimali varsa gidecektir.						
21	İşimle ilgili bardağın hep dolu tarafını görmeye çalışırım.						
22	İşim söz konusu olduğunda gelecekte yaşayacaklarım konusunda iyimserim.						
23	İşimle ilgili hiçbir şey istediğim şekilde gitmez.						
24	İşime her zaman “her zorluğun sonunda bir hayır vardır” diye yaklaşırım.						

EK C

Lütfen **bir üst yöneticinizle alakalı** aşağıdaki ifadelere ne derece katıldığınızı, **1 (Kesinlikle katılmıyorum)** ile **6 (Kesinlikle katılıyorum)** arasındaki seçeneklerden size en uygun olanı işaretleyerek belirtiniz.

		1 (Kesinlikle katılmıyorum)	2	3	4	5	6 (Kesinlikle katılıyorum)
1	Çalışanlar tarafından benimsenmiş ortak misyonu vurgular.						
2	Ahlaki değerlere özen gösterir.						
3	Genellikle hevesli ve coşkulu konuşur.						
4	İş görenleri geliştirmek için eğitir ve bizlere yol-yöntem gösterir.						
5	Çalışanlarına sürekli güven telkin eder.						
6	Ahlaki standartlar açısından model olur.						
7	Yönetici olarak yaptıklarıyla gurur duyar.						
8	Çalışanların sahip oldukları yeteneklerin ortaya çıkmasına yardımcı olur.						
9	Çalıştığı kişilerin güçlü taraflarına odaklanarak onların kendilerini daha da geliştirmelerine yardımcı olur.						
10	Problemleri çözerken tüm varsayımları tekrar tekrar gözden geçirerek hareket eder.						
11	Çalışanlarına işlerini daha iyi yapmaları için yeni yollar önerir.						
12	İşletmedeki sorunların önemli olduğunun bilincindedir.						
13	İnsanlarla konuşurken işletme değerlerinden söz eder.						
14	İş yerinde çalışanları tarafından saygı duyulan biri olduğuna inanır.						
15	Genellikle olumlu ve iyimser konuşur.						
16	İşletmeler için bireyler önem taşıdığından dikkatini onlara verir.						
17	Çalışanlarına güç ve güven telkin eder.						
18	İş yerinde çalışan astlarına işlerin yapılması ile ilgili farklı bakış açıları getirir.						
19	Kendi ilgi alanının ötesine geçerek başkalarının da ilgi alanlarını takip eder.						
20	İnsanların farklı görüşlerini ortaya çıkarmaya çalışır.						

EK D

1. Çalıştığınız Firmanın Unvanı:

2. Çalıştığınız Firmanın Faaliyet Gösterdiği Sektör:

3. Çalıştığınız Firmanın Toplam Personel Sayısı:

4. Çalıştığınız Firmanın Ciro ve Çalışan Sayısı Açısından Ölçeği:

() Küçük Ölçekli

() Orta Ölçekli

() Büyük Ölçekli

5. Çalıştığınız Firmanın Kaç Yıldır Faaliyet Gösterdiği:

6. Çalıştığınız Departman:

7. Kaç yıldır mevcut kurumda çalıştığınız:

() 5 yıl ve altı

() 6-10 yıl

() 11-15 yıl

() 16 ve üstü

8. Unvanınız:

9. Yaşınız:

() 25 ve altı

() 26-35

() 36-45

() 46 ve üstü

10. Cinsiyetiniz:

() Kadın

() Erkek

11. Eğitim Durumunuz:

- İlköğretim
- Lise
- Lisans
- Yüksek Lisans
- Doktora
- Diğer (lütfen belirtin)

APPENDIX F

ETİK KURUL DEĞERLENDİRME SONUCU/RESULT OF EVALUATION BY THE ETHICS COMMITTEE

(Bu bölüm İstanbul Bilgi Üniversitesi İnsan Araştırmaları Etik Kurul tarafından doldurulacaktır /This section to be completed by the Committee on Ethics in research on Humans)

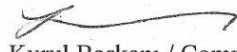
Başvuru Sahibi / Applicant: Elif Semra Tulum

Proje Başlığı / Project Title: A Study on Contextual (Individual-Level) Ambidexterity and Psychological Capital with the Moderating Effect of Transformational Leadership

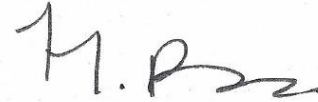
Proje No. / Project Number: 2018-20024-58

1.	Herhangi bir değişikliğe gerek yoktur / There is no need for revision	XX
2.	Ret/ Application Rejected Reddin gerekçesi / Reason for Rejection	

Değerlendirme Tarihi / Date of Evaluation: 22 Mayıs 2018


Kurul Başkanı / Committee Chair

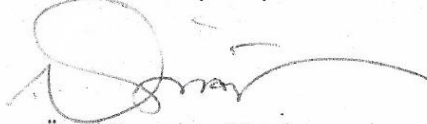
Doç. Dr. İtir Erhart


Üye / Committee Member

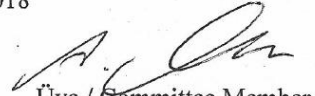
Prof. Dr. Hale Bolak


Üye / Committee Member

Prof. Dr. Koray Akay


Üye / Committee Member

Doç Dr. Ayhan Özgür Toy


Üye / Committee Member

Prof. Dr. Aslı Tunç


Üye / Committee Member

Prof. Dr. Turgut Tarhanlı


Üye / Committee Member

Prof. Dr. Ali Demirci