

The Correlation between School Principals' Self-Efficacy Beliefs and Leadership Styles*

Research Article

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ABSTRACT

The aim of this research is to analyze the relationship between principals' self-efficacy and leadership style and to examine whether self-efficacy is an antecedent of leadership styles. The research sample consists of 176 principals who work in the central region of Turkey. Of the participants, 162 are males and 14 are females. Professional seniority range is 1-43 years (M=16,1) and management seniority range is 1-37 years (M=9,6). In the study, in order to determine leadership styles of principals, Multifactor Leadership Questionnaire which was developed by Bass and Avolio (2004) and adopted into Turkish by Cemaloğlu (2007) was used. In order to determine principal self-efficacy, Principal Sense of Efficacy Scale which was developed by Tschannen-Moran and Gareis (2004) and adopted into Turkish by Negiş-Işık and Derinbay (2015) was used. Research findings indicate that there is a significant positive relationship between self-efficacy and sub-scales of transformational leadership. There is also significant positive relationship between principals' self-efficacy and contingent rewards and the management by exception (active) and significant negative relationship between principals' self-efficacy and the management by exception (passive) and laissez-faire. Concurrently, it was found that self-efficacy is a significant antecedent of transformational leadership. Result of this research showed that principals whose judgement is positive about their management skills exhibit more transformational leadership.

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Keywords:

Leadership styles, self-efficacy, principals' self-efficacy, school principals

Introduction

In any organisation, leadership plays an important role for the design and success of an organisation. In this point, these questions arise: Which individuals are effective leaders or which characteristics make individuals effective leaders? Self-efficacy can be considered as one of these characteristics. According to

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Bandura and Adams (1977) perceived self-efficacy affects people's choice of activities and behavioral settings, how much effort they expend and how long they will persist in the face of obstacles and aversive experiences. The stronger the perceived self-efficacy, the more active the coping efforts. Considering the domain of leadership, leaders with higher self-efficacy to enact key leadership skills will engage those activities more often and with greater effectiveness than those lower in self-efficacy (Anderson, Krajewski, Goffin & Jackson, 2008). This study aims to analyse the relationship between school principals' self-efficacy and leadership styles and to determine whether self-efficacy is an antecedent of transformational leadership or not.

Leadership Styles

Since Bass (1985) developed leadership theory, research on leadership styles has gathered pace (Moors, 2012). Bass's multidimensional leadership theory, which reflects comprehensive leadership behaviours, has been cited most in articles on leadership studies. Bass (1990) argued that, there are two factors that characterize modern leadership. First, initiating and organising the work – focusing on accomplishing the current tasks. Second factor is tolerating employees – focusing on pursuing one's own interests. Bass discusses the difference between the transactional leadership model, which includes an emerging leader as a result of change and interaction between group members, and the transformational leadership model consisting of a supportive leader, who adapts to instable and changing conditions and motivates the followers in accordance with the necessary transformations (Ruggieri & Abbate, 2013).

Transformational leadership

Transformational leaders, who resemble charismatic leaders, are distinguished with their skills of change, innovation and entrepreneurship (Seltzer & Bass, 1990). Transformational leaders increase the consciousness about the significance of organisational goals, they motivate the followers, encourage going beyond their own interests for the sake of the organisation (Marks & Printy, 2003). They also increase the awareness of the followers for common interests and help the followers to reach extraordinary targets. Transformational leadership includes the following factors (Antonakis, Avolio & Sivasubramaniam, 2003; Bass, 1990; Stewart, 2006). *Idealised influence (attributed)* refers whether the leader is considered as self-confident and strong or not. *Idealised influence (behaviour)* refers to charismatic actions of a leader whose focus is on values, beliefs and missions. *Inspirational motivation* refers to methods that leaders use to motivate the followers. In these methods, the leader sees the future with optimism, emphasises assertive goals, designs an idealised vision and tells the followers that this vision can be reachable. *Intellectual stimulation* refers to the leader actions which pushes the followers to critical thinking and to find solutions to hard problems by addressing their logical features and analyses. *Individualised consideration* is the behaviour of a leader which includes advises and supports. The leader pays attention to the follower's individual needs and contributes to their satisfactions. Therefore, he/she helps their development and their self-fulfilment.

Transactional leadership

Transactional leadership involves a mutual exchange in which the leader gives something to the followers to get something he/she desires (Bughenhagen, 2006; Yukl, 1999). The leader makes a deal with the follower for a product or service. For one time, the interaction is complete and then they follow different paths (Bughenhagen, 2006). Transactional leadership represents a leadership which focuses on fulfilment of the goals and the control of the process and outputs (Bass, 1985). This leader's behaviours include interaction between individuals who depicts tasks, expectations and associated rewards. The purpose of the rewards and punishments is not to transform followers but to enable them to reach expected conclusions (Ruggieri & Abbate, 2013).

Bass's (1990) transactional leadership model consists of three dimensions. In *contingent rewards*, the leader commissions his followers and rewards them when they accomplish the tasks. *Management by*

expectation can be evaluated in two dimensions: active and passive. Active dimension includes observing the follower's performance and preventing his errors in this process; passive dimension involves intervention when the employee acts unusually or makes a mistake. *Laissez-faire leadership*: In fact, it includes avoidance of the leadership behaviours. Leadership behaviours are neglected and no interaction is made (Moors, 2012; Stewart, 2006). This type of leader does not support his followers or attempts to guide them. They are ineffective in terms of influencing their followers; they prefer not to take care of their needs (Deluga, 1990).

Principals' Self-efficacy

The concept of self-efficacy seems to become an important criterion in terms of human behaviours and in understanding and estimating predictable consequences of these behaviours (Nir & Kranot, 2006). The concept of self-efficacy, which is a component of social cognitive theory, is a structure consisting of the mutual relationship between individual's sense of competence, which depends on one's skills and experiences and task performed (Tschannen-Moran & Gareis, 2007). Bandura (1994) defines self-efficacy as "a person's belief in his or her ability to succeed in a particular situation". A point to be remembered concerning the concept of self-efficacy is that self-efficacy is "domain specific". Self-efficacy can be generalizable for similar situations but having high self-efficacy in a particular field does not guarantee high level of self-efficacy in other fields (Bandura, 1986). Therefore, in the literature, the concept of self-efficacy is studied separately in several different domains (teacher self-efficacy, research self-efficacy, etc). One of these is principals' self-efficacy. Principals' self-efficacy can be regarded as a type of leadership self-efficacy (Hannah, Avolio, Luthans & Harms, 2008).

Bandura (1997) indicated four sources of self-efficacy. These are mastery experiences, social modelling, social persuasion and emotional arousal. Mastery experiences, which include the individual's previous successful experiences with regard to the task, are the most determinant of all four sources (Tschannen-Moran & Hoy, 2007). Individuals, who have lived successful experiences about a particular field, have high self-efficacy on that field. Bandura (1993) explains this situation as:

"Those who have a high sense of efficacy visualize success scenarios that provide positive guides and supports for performance. Those who doubt their efficacy visualize failure scenarios and dwell on the many things that can go wrong. It is difficult to achieve much while fighting self-doubt." (p.118)

Social modelling appears through the individual's observation of successful experiences of the others. This observation, although not effective as mastery experiences, increases the belief towards completing a task with success. The observed model, just like in the process of coaching, provides the observer the steps and strategies for success. Social persuasion is the assessment of others on a person's skills. Emotional arousal is considered as the emotional responses of a person concerning the task. Feelings such as fear and anxiety prevent a person's attempts for accomplishing the task and distract him (Bandura, 1993). When individuals are not besieged with these intimidating emotions, their expectations about success will be higher.

Relationship between Self-Efficacy and Leadership

The principals' self-efficacy belief influences their level of willingness, their goals as a leader, their efforts and determination about completing a task (Tschannen-Moran & Gareis, 2007). According to Bandura (2000) when persons, who doubt about their skills, meet obstacles, misfortunes and failures, do less effort, stop doing the work or accept a bad result. However, persons who strongly believe their own skills, double their efforts in order to overcome difficulties (p.120). In the light of this theory of self-efficacy, it can be said that self-efficacy is an important factor for effective leadership (McCormick, 2001).

Leitwood and Jantzi (2008) stated that in a dynamic framework, leaders' belief towards their capacity to achieve their goals is the key component regulating leadership functions. Principals with high self-efficacy

are both stuck with their goals and more flexible to the changing conditions. They are also more eager to change their strategies according to these conditions. However, it is observed that individuals with low self-efficacy, when they encounter a problem, tend to pursue old regulations and accuse others for failure (Tschannen-Moran & Gareis, 2007).

In the studies on leader self-efficacy, leaders with high self-efficacy are evaluated as better and more effective leaders (Anderson, et al., 2008; Chemers, Watson & May, 2000). Accordingly, these leaders determine higher goals and better task strategies (Kane, Zaccaro, Tremble & Masuda, 2002). At the same time, individuals with high self-efficacy are more effective leaders and consequently the group's performance is raised (Kane, et al, 2002; Wisner, 2011).

Two interesting studies about the topic was done by Leitwood and Jantzi (2008) and Paglis and Green (2002). In their study, Paglis and Green found positive relationship ($r=.21$, $p<.05$) between leader self-efficacy and leadership attempts such as pushing change, seeking continuous improvement, quickly changing work processes. Leitwood and Jantzi, in their 3-year period longitudinal study, explored influences of leader self-efficacy on leader behaviours and student success. They analysed leadership behaviour in four categories: setting direction (identifying and articulating a vision, fostering the acceptance of group goals, creating high performance expectations), developing people, redesigning the organisation and managing instructional program. As a result of these research they found positive relations between leadership self-efficacy and setting direction ($r=.40$), developing people ($r=.25$) redesigning people ($r=.31$) and managing instructional program. Similarly, they found that leadership self-efficacy explains 10% of the variance concerning leader behaviours.

Apart from that, self-efficacy is related with principals' use of power. Lyons and Murphy (1994) examined the relationship between principals' self-efficacy and the use of power. As a result of research they found positive moderate relationship between self-efficacy and expert and referent power; negative moderate relationship between self-efficacy and legitimate, coercive and reward power. The power used by the principals at the same time are connected to leadership styles. In this sense, it is observed that transactional leaders rather use coercive power whereas transformational leaders execute expert power (Tucker-Lodd, Merchnat & Thurston, 1992).

Based on research findings that leader's self-efficacy is related to leader's performance and behaviours, it can be thought that self-efficacy can be related to leadership styles as well. However, there are limited studies focusing on leader's self-efficacy and leadership styles (Daly, Der-Martirosian, Ong-Dean, Park & Wishard-Guerra, 2011; Fitzgerald & Schutte, 2010). Most of these studies analysed the relationship between general self-efficacy and leadership styles (Mesterova, Prochazka, Vaculik & Smuthy, 2015; Ramchunder & Martins, 2014). Based on the previous research on the relationship between self-efficacy and leadership styles, these research questions were generated:

- 1: Is there a relationship between self-efficacy and transformational leadership?
- 2: Is there a relationship between self-efficacy and transactional leadership?
- 3: Is principal self-efficacy an antecedent of transformational leadership?

Methodology

Research Model

This research is a correlational study, analysing the relationship between principals' self-efficacy beliefs and leadership styles. According to Fraenkel, Wallen and Hyun (2012) correlational studies investigate the possibility of relationships between only two variables, although investigations of more than two variables are common. Correlational research is also sometimes referred to as a form of descriptive research because it

describes an existing relationship between variables. In this study, because the study was conducted to investigate the relationship between school principals' self-efficacy beliefs and leadership styles, this research design was preferred to reveal the relationship between these two variables.

Sample

Convenience sampling method was used for selecting the research sample. Convenience sampling defines a process of data collection from the population that is close at hand and easily accessible to the researcher (Rahi, 2017). In order to collect data, the researchers participated in the meetings held by the district national education directorates at the beginning of the academic year and the scale questions were given to the voluntary school principals. A total of 176 principals participated to the research. Demographic data concerning principals were presented on Table 1.

Table 1. Demographical characteristics of respondents

| Variable | Category | <i>f</i> | % |
|------------------------------------|----------------------|-------------|--------------|
| Gender | Female | 14 | 8* |
| | Male | 162 | 92 |
| Level of employment | Principals | 109 | 62 |
| | Assistant principals | 67 | 38 |
| Did you take in-service training | Yes | 88 | 50 |
| | No | 88 | 50 |
| | | <i>Mean</i> | <i>Range</i> |
| Year of experience (as teacher) | | 16.1 | 1-43 years |
| Year of experience (as principals) | | 9.6 | 1-37 years |

* According to 2013 Ministry of Education statistics 8.7% of principals are women in Turkey

Of the 176 principals, 14 are female, 162 are male. The research sample mostly consists of principals (62%) however, assistant principals were also involved. The participants were also asked if they have joined in-service-training about school management. In Turkey, in-service-training or field-based training is not compulsory for principals. However, half of the participants said "yes" for this question. Participants were also asked their year of experiences as teachers and principals. Their average teaching seniority was 16.1 (range from 1 to 43) years and seniority as principals was 9.6 (range from 1 to 37) years.

Data Collecting Tools

Principals Sense of Efficacy Scale (PSES)

In order to determine principal self-efficacy, Principals Sense of Efficacy Scale which was developed by Tschannen-Moran and Gareis (2004) and adopted into Turkish by Negiş-Işık and Derinbay (2015), was used. It is a 9 point likert type scale, (1-None- 9 Very much) consisting of 18 item. Cronbach Alpha consistency of the scale for this research is .95.

Multifactor Leadership Questionnaire (MLQ 5X):

Multifactor Leadership Questionnaire, which was developed by Bass and Avolio (2004) and adopted into Turkish by Cemaloğlu (2007), was used in this study. The scale has two dimensions: transformational leadership (20 articles) and transactional leadership (16 articles). It is a 5 point likert scale (1- never, 5- always). The transformational leadership sub-scale explains 42% of total variance; the transactional leadership sub-scale explains 11% of the total variance. Both dimensions of the scale explain 53% of the variance in total. Cronbach Alpha consistency found out in this research for the transformational subscale was .94 and transactional subscale was .70.

Data Analysis

Before the analysis of data, normality of the data was tested. In order to check this, the Kolmogorov-Smirnov test was used. After examination of the results (p- values range .063- .077) and histograms (Normal Q-Q plot), it was found that data fulfil the normality criterion. In analysing data, mean, standard deviation, Cronbach Alpha, Pearson correlation and simple linear regression analysis were used.

Results

In this section, firstly descriptive statistics concerning research variables (mean, standard deviation and Cronbach Alpha) are given on Table 2 and then findings with regard to research hypothesis are presented.

Table 2. Means, standard deviations and reliability estimates

| <i>Variables</i> | <i>M</i> | <i>sd</i> | <i>Alpha</i> |
|-----------------------------------|----------|-----------|--------------|
| PSES | 7.31 | .89 | .95 |
| Transactional leadership | 7.30 | 1.36 | .70 |
| Contingent reward | 3.49 | .42 | |
| Management by exception (active) | 2.19 | .73 | |
| Management by exception (passive) | .92 | .61 | |
| Laissez-faire | .69 | .65 | |
| Transformational leadership | 16.23 | 1.95 | .92 |
| Idealised influence (attributes) | 3.32 | .49 | |
| Idealised influence (behaviour) | 3.46 | .50 | |
| Inspirational motivation | 2.70 | .35 | |
| Intellectual stimulation | 3.36 | .46 | |
| Individualised consideration | 3.33 | .49 | |

When mean and standard deviation values are examined, in the contingent rewards and management by exception (active), principals' mean points are higher than their points in the management by exception (passive) and laissez- faire leadership. When the results of transformational leadership sub-dimensions are examined, it can be said that principals perform inspirational motivation behaviour less than other behaviours.

In order to reply first and second research questions of the research, relationships between the variables were determined through correlation analysis. The results are given on Table 3. The relationships between sub-dimensions of leadership styles can also be seen on Table 3.

Table 3. Pearson's Correlation Matrix for Self-Efficacy and MLQ (Leadership) Subscales

| | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 |
|--------------------------------------|--------|---------|--------|---------|---------|--------|--------|--------|---|
| 1.PSES | | | | | | | | | |
| 2.Contingent reward | .441** | | | | | | | | |
| 3.Management by exception (active) | .193** | .162* | | | | | | | |
| 4. Management by exception (passive) | -.182* | -.275** | .070 | | | | | | |
| 5. Laissez-faire | -.158* | -.283** | .053 | .505** | | | | | |
| 6.Idealised influence (attributes) | .397** | .489** | .259** | -.236** | -.244** | | | | |
| 7.Idealised influence (behaviour) | .526** | .645** | .213** | -.311** | -.251** | .586** | | | |
| 8. Inspirational motivation | .365** | .455** | .118 | .125 | .021 | .505** | .507** | | |
| 9. Intellectual stimulation | .536** | .607** | .239** | -.345** | -.242** | .663** | .762** | .480** | |

| | | | | | | | | | |
|----------------------------------|--------|--------|--------|---------|---------|--------|--------|--------|--------|
| 10. Individualised consideration | .381** | .586** | .220** | -.304** | -.249** | .583** | .637** | .465** | .704** |
|----------------------------------|--------|--------|--------|---------|---------|--------|--------|--------|--------|

**p<.001

* p<.05

In accordance with the transformational leadership theory (Bass, 1999), and research findings (Buluç, 2009; Hardman, 2011; Lo, Ramayah, Min & Songan, 2010; Srinivos, Kumar & Vikramaditya 2006), as expected, positive correlation ($r=.46 - .76$) is observed between the sub-dimensions of transformational leadership. There is a positive correlation between the sub-dimensions of transformational leadership and inspirational motivation ($r=.45 - .64$) and management by exception (active) ($r=.11 - .26$). Similar studies also indicated this positive correlation between the sub-dimensions of transformational leadership and inspirational motivation and management by exception (active) (Buluç, 2009; Srinivos, Kumar & Vikramaditya 2006). As Bass (1999) stated, good leaders are both transactional and transformational leaders. In addition, inspirational motivation and management by exception (active) are regarded as active leadership dimensions of transactional leadership. The relationship between transformational and transactional leadership varies according to which dimensions of transactional leadership are included. In many studies, inspirational motivation and management by exception (active) are described as transactional leadership; management by exception (passive) and laissez faire leadership are defined as Passive/Avoidant Leadership (Bass & Avolio, 2004). In studies that include management by exception (passive) to transactional leadership (Lo, et al., 2010; Si & Wei, 2012), a negative correlation was observed between two leadership types. However, Jung and Avolio (2000) defined transactional leadership as setting goals and clearly presenting outputs after reaching these goals and they found positive correlation ($r=.33$) between transformational and transactional leadership styles. Management by exception (passive) and laissez- faire leadership were negatively associated with all leadership styles except inspirational motivation and management by exception (active). Various studies also reported that there is a negative correlation between these dimensions concerning passive or avoidant leadership and transformational leadership (Buluç, 2009; Cemaloğlu & Okçu, 2012; Srinivos, Kumar & Vikramaditya, 2006).

Research findings indicate that there is positive relationship between transformational leadership and principals' self-efficacy (PSES). As seen on Table 3, there is a moderate relationship between principals' self-efficacy and sub dimensions of transformational leadership: idealised influence (attributed) ($r=.397$, $p<.01$), idealised influence (behaviour) ($r=.526$, $p<.01$), inspirational motivation ($r=.365$, $p<.01$), intellectual stimulation ($r=.536$, $p<.01$) and individualised consideration ($r=.381$, $p<.01$). In the sub-dimension of transactional leadership and self-efficacy, it was observed that there is a moderate correlation for contingent rewards ($r=.441$, $p<.01$), weak correlation for management by exception (active) ($r=.193$, $p<.01$), negative, weak correlation for management by exception (passive) ($r=-.182$, $p<.01$) and laissez faire ($r=-.158$, $p<.05$). In the light of these results, it would be concluded that principals with high self-efficacy rather consider themselves as transformational leaders.

This research also tested the third research question that principals' self-efficacy is the antecedents of transformational leadership. In this point, the results of the simple linear regression analysis are presented on Table 4.

Table 4. Regression table

| | B | T | p |
|---------------------------------|------|-----|------|
| PSES | .560 | 8.9 | .000 |
| $R^2=.313$, $F=79.41$ $p=.000$ | | | |

As a result of regression analysis, principals' self-efficacy appears to be a significant antecedent of transformational leadership ($R = .615$, $R^2 = .379$, $F_{(1-195)} = 118,8$, $p < .001$). According to these results, it can be claimed that self-efficacy explains 31% of the total variance concerning transformational leadership.

Discussion

This study assumes increase in principals' self-efficacy leads to more transformational leadership. This hypothesis was confirmed through correlation analysis. The analysis indicated that there is a positive moderate relationship between the sub-dimensions of transformational leadership and principals' self-efficacy. Similar to this study, Daly et al. (2011) analysed direct relationship between two concepts and found moderate relationship between the sub-dimensions of transformational leadership and principals' self-efficacy. Mesterova, Prochazka, Vaculik and Smuthy (2015) have studied the relationship between general self-efficacy and leadership effectiveness and explore the mediator role of transformational leadership in this relationship. However, they failed to find a significant relationship between self-efficacy and transformational leadership. According to the authors, their hypothesis failed because their sample consists of students, who participated in leadership training without real life experiences and they used general self-efficacy scale in order to determine self-efficacy. Similar to the Daly's work, Ramchunder and Martins (2014) investigated the relationship between self-efficacy and leadership skills but different from Daly, they worked on police officers who work as administrators. The authors found positive, moderate relationship between the sub-dimensions of transformational leadership and principals' self-efficacy. Fitzgerald and Schutte (2009) in their experimental study, claimed that expressive writing method can increase leaders' self-efficacy skills of transformational leadership. Accordingly, they assumed that principals with their self-efficacy skills increased, they perform transformational leadership behaviours more. In the end of the study, it was observed that self-efficacy and transformational leadership skills of the principals in the experimental group increased. In accordance with the results, they claim that self-efficacy can be a significant component of transformational leadership.

This study also assumed that principals with low self-efficacy would be more transactional leaders and this hypothesis is partially supported. The analyses revealed that principals' self-efficacy has moderate correlation between the contingent rewards and weak correlation between management by exception (active). Daly et al. (2011) found positive, moderate relationship between the contingent rewards and principals' self-efficacy; however, they failed to find any significant relation for the management by exception (active). Similarly, Ramchunder et al. (2014) found moderate relationship between the contingent rewards and principals' self-efficacy; but could not find any significant relation for the management by exception (active).

It is observed that there is weak and negative relationship between the management by exception (passive) and laissez faire. Similar to this study, Daly et al.'s (2011) and Ramchunder et al.'s (2014) research findings also reported that there is weak and negative relationship between the management by exception (passive) and laissez faire. Felfe and Schyns (2002) stated that the management by exception (passive) and laissez faire can be evaluated as ineffective leadership category of leadership styles. Recent studies emphasise the management by exception (passive) and laissez faire should be considered as a single dimension. These studies whether did not identify any relationship between the active and passive sub-dimensions of management by exception or found weak negative relationship. However, it is seen that there is a positive correlation between management by exception (passive) and laissez faire (Avolio, Bass & Jung, 1999).

The third question of the research assumes that principals' self-efficacy is an antecedent of transformational leadership. This assumption was confirmed through regression analysis. This result is not surprising when the results of studies (Leitwood & Jantzi, 2008; Paglis & Green, 2002) and the self-efficacy theory (Bandura, 1997) on the influence of self-efficacy on leadership behaviours are considered. However, more research findings are necessary concerning self-efficacy's influence on transformational leadership.

Conclusion

Transformational leadership's positive effect on schools and teachers are well known. However, there is little information about antecedents of leadership styles. In this research we aimed to investigate the relationship between principals' self- efficacy and leadership styles. Result of this research showed that principals whose judgement is positive about their management skills exhibit more transformational leadership.

Recommendation

Despite the literature on self-efficacy suggesting that it plays a critical role in how we think, feel, and behave, there is limited empirical study on the relationship between principals' efficacy and leadership styles. As we expected the current research showed that there is a link between self-efficacy and leadership styles but we need more research focusing on these links for a better understanding.

This study has several limitations. Firstly, research data depend on principals' own perceptions. Principals may have more positive perceptions towards their own leadership styles. Another limitation of this study is no other variable affecting transformational leadership, except self-efficacy is included. The influence of self-efficacy can be clearly presented if a control variable is added to the analysis.

References

- Anderson, D.W., Krajewski, H.T., Goffin, R.D. & Jackson, D.N. (2008). A leadership self-efficacy taxonomy and its relation to effective leadership. *The Leadership Quarterly*, 19, 595-608.
- Antonakis, J., Avolio, B.J. & Sivasubramaniam, N. (2003). Context and leadership: An examination of the nine-factor full-range leadership theory using the Multifactor Leadership Questionnaire. *The Leadership Quarterly*, 14, 261-295.
- Avolio, B.J., Bass, B.M. & Jung, D.I. (1999). Re-examining the components of transformational and transactional leadership using the Multifactor Leadership Questionnaire. *Journal of Occupational and Organizational Psychology*, 72, 441-462.
- Bandura, A. (1986). *Social Foundation 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, 117-148.
- Bandura, A. (1994). *Self-efficacy*. In V.S. Ramachoudran (Ed.). *Encyclopedia Of Human Behavior* (pp. 71-81), New York: Academic Press,.
- Bandura, A. (1997). *Self- Efficacy: The Exercise of Control*. New York: Freeman.
- Bandura, A. (2000). Exercise of human agency through collective efficacy. *Current Direction in Psychological Science*, 9, 75-78.
- Bandura, A., & Adams, N. E. (1977). Analysis of self-efficacy theory of behavioral change. *Cognitive therapy and research*, 1(4), 287-310.
- Bass, B.M. & Avolio, B.J. (2004). *Multifactor leadership questionnaire (third edition) manual and sample set*. Mind Garden.
- Bass, B.M. (1985). *Leadership and Performance Beyond Expectations*. New York, NY: Free Press.
- Bass, B.M. (1990). From transactional to transformational leadership learning to share the vision. *Organizational Dynamics*, 19, 19-31.
- Bass, B.M. (1999). Two decades of research and development in transformational leadership. *European Journal of Work and Organizational Psychology*, 8, 9-32
- Bugenhagen, M.J. (2006). *Antecedents of transactional, transformational, and servant leadership: a constructive-development theory approach*. Ph.D. Thesis, Unpublished. Nebraska: The University of Nebraska
- Buluç, B. (2009). Sınıf öğretmenlerinin algılarına göre okul müdürlerinin liderlik stilleri ile örgütsel bağlılık arasındaki ilişki. *Educational Administration: Theory and Practice*, 15, 5-34.
- Cemaloğlu, N. (2007). Okul yöneticilerinin liderlik stillerinin farklı değişkenler açısından incelenmesi. *Türk Eğitim Bilimleri Dergisi*, 5, 73-112.
- Cemaloğlu, N. & Okçu, V. (2012). İlköğretim okulu yöneticilerinin liderlik stilleri ile öğretmenlerin yıldırma yaşama düzeyleri arasındaki ilişki. *Uşak Üniversitesi Sosyal Bilimler Dergisi*, 5, 214-239.
- Chemers, M.M., Watson, C.B. & May, S.T. (2000). Dispositional affect and leadership effectiveness: A comparison of self-esteem, optimism, and efficacy. *Personality and Social Psychology Bulletin*, 26, 267-277.

- Daly, A.J., Der-Martirosian, C., Ong-Dean, C., Park, V. & Wishard-Guerra, A. (2011). Leading under sanction: principals' perceptions of threat rigidity, efficacy, and leadership in underperforming schools. *Leadership and Policy in Schools, 10*, 171-206.
- Deluga, R.J., (1990). The effects of transformational transactional and laissez faire leadership characteristics on subordinate influencing behavior. *Basic and Applied Social Psychology, 11*, 191-203.
- Felfe, J. & Schyns, B. (2002). The relationship between employees' occupational self-efficacy and perceived transformational leadership-replication and extension of recent results. *Current Research in Social Psychology, 7*, 137-162.
- Fitzgerald, S. & Schutte, N.S. (2010). Increasing transformational leadership through enhancing self-efficacy. *Journal of Management Development, 29*, 495-505.
- Fraenkel, J. R., Wallen, N. E., & Hyun, H. H. (2012). *How to Design and Evaluate Research in Education*. New York: McGraw Hall.
- Hannah, S.T., Avolio, B.J., Luthans, F. & Harms, P.D. (2008). Leadership efficacy: Review and future directions. *The Leadership Quarterly, 19*, 669-692.
- Hardman, B.K. (2011). *Teacher's perception of their principal's leadership style and the effects on student achievement in improving and non-improving schools*. Ph.D. Thesis, Unpublished. Florida: University of South Florida.
- Jung, D.I., & Avolio, B.J. (2000). Opening the black box: an experimental investigation of the mediating effects of trust and value congruence on transformational and transactional leadership. *Journal of Organizational Behaviour, 21*, 949-964.
- Kane, T.D., Zaccaro, S.J., Tremble, T.R. & Masuda, A.D. (2002). An examination of the leaders regulation of groups. *Small Group Research, 33*, 65-120.
- Leithwood, K., & Jantzi, D. (2008). Linking leadership to student learning: The contributions of leader efficacy. *Educational Administration Quarterly, 44*, 496-528.
- Lo, M., Ramayah, T., Min, H.W., & Songan, P. (2010). The relationship between leadership styles and organizational commitment in Malaysia: Role of leader-member exchange. *Asia Pacific Business Review, 16*, 79-103.
- Lyons, C.A., & Murphy, M.J. (1994). Principals self-efficacy and the use of power. *Paper presented at the annual meeting of the American Educational Research Association in New Orleans, April 4 to 8, 1994*.
- Marks, H.M., & Printy, S.M. (2003). Principal leadership and school performance. An integration of transformational and instructional leadership. *Educational Administration Quarterly, 39*, 370-397.
- McCormick, M.J. (2001). Self-efficacy and leadership effectiveness: Applying social cognitive theory to leadership. *Journal of Leadership Studies, 8*, 22-33.
- Mesterova, J., Prochazka, J., Vaculik, M., & Smuthy, P. (2015). Relationship between self-efficacy, transformational leadership and leader effectiveness. *Journal of Advanced Management Science, 3*, 109-122.
- Moors, G. (2012). The effect of response style bias on the measurement of transformational, transactional and laissez-faire leadership. *European Journal of Work and Organizational Psychology, 21*, 271-298.
- Negiş-Işık A. & Derinbay, D. (2015). Turkish version of the principals' sense of efficacy scale: Validity and reliability study. *Eurasian Journal of Educational Research, 60*, 1-16.
- Nir, A.E. & Kranot, N. (2006). School principal's leadership style and teachers' self-efficacy. *Planning and Changing, 37*, 205-218.

- Paglis, L.L. & Green, S.G. (2002). Leadership self-efficacy and managers' motivation for leading change. *Journal of Organizational Behavior*, 23, 215-235.
- Rahi, S. (2017). Research design and methods: a systematic review of research paradigms, sampling issues and instruments development. *International Journal of Economics & Management Sciences*, 6(2), 1-5. doi:10.4172/2162-6359.1000403
- Ramchunder, Y., & Martins, N. (2014). The role of self-efficacy, emotional intelligence and leadership style as attributes of leadership effectiveness. *SA Journal of Industrial Psychology*, 40, 1-11.
- Ruggieri, S., & Abbate, C.S. (2013). Leadership style, self-sacrifice, and team identification. *Social Behavior and Personality*, 41, 1171-1178.
- Seltzer, J. & Bass, M.B. (1990). Transformational leadership: Beyond initiation and consideration. *Journal of Management*, 16, 693-703.
- Si, S., & Wei, F. (2012). Transformational and transactional leaderships, empowerment climate, and innovation performance: A multilevel analysis in the Chinese context. *European Journal of Work and Organizational Psychology*, 21, 299-320.
- Srinivos, E.S., Kumar, G.A., & Vikramaditya, E. (2006). An examination of transformational and transactional leadership: A study of dimensions and outcomes in Indian context. *Management and Labour Studies*, 31, 208-227
- Stewart, J. (2006). Transformational leadership: An evolving concept examined through the works of Burns, Bass, Avolio, and Leithwood. *Canadian Journal of Educational Administration and Policy*, 4, 1-29.
- Tschannen-Moran, M., & Gareis, C.R. (2004). Principals' sense of efficacy. Assessing a promising construct. *Journal of Educational Administration*, 42, 573-585.
- Tschannen-Moran, M., & Gareis, C.R. (2007). Cultivating principals' self-efficacy: Supports that matter. *Journal of School Leadership*, 17, 9-114.
- Tschannen-Moran, M., & Woolfolk, H. A. (2007). The differential antecedents of self-efficacy beliefs of novice and experienced teachers. *Teaching and Teacher Education*, 17, 33-45.
- Tucker-Ladd, P., Merchant, B. & Thurston, P. (1992). School leadership: encouraging leads for change. *Educational Administration Quarterly*, 28, 397-409.
- Wisner, M.D. (2011). Psychological strengths as predictors of effective student leadership. *Christian Higher Education*, 10, 353-375.
- Yukl, G. (1999). An evaluation of conceptual weaknesses in transformational and charismatic leadership theories. *Leadership Quarterly*, 10, 285-305.