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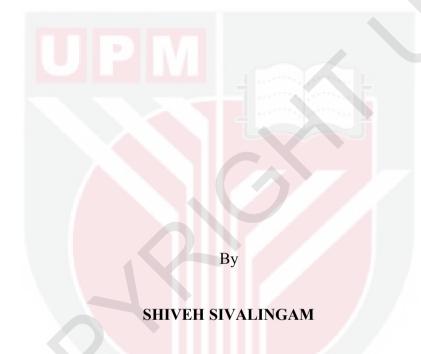
RELATIONSHIP BETWEEN SCHOOL CULTURE, SOURCES OF LEADERSHIP EFFICACY AND COLLECTIVE LEADERSHIP AMONG SECONDARY SCHOOL TEACHERS IN KUALA LUMPUR, MALAYSIA

**SHIVEH SIVALINGAM** 

FPP 2019 18



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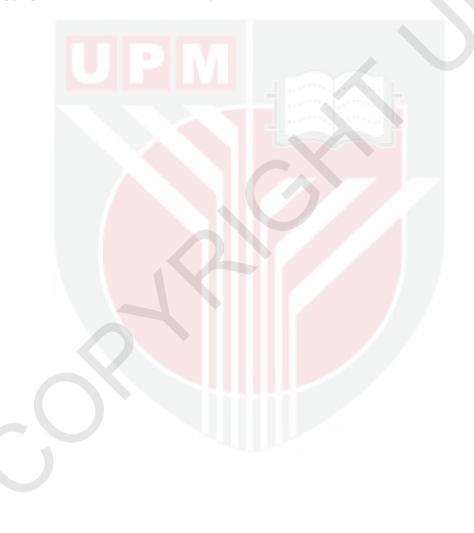


Thesis Submitted to the School of Graduate Studies, Universiti Putra Malaysia, in Fulfillment of the Requirements for the Degree of Master of Science

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# **DEDICATION**

This thesis is dedicated to my late mother – Mrs. Parameswary Canagaretnam nee Sivalingam, who is pivotal to my formative years in education and who always encouraged me to further my studies to the highest possible level. She would have been filled with celebratory pride.



Abstract of thesis presented to the Senate of Universiti Putra Malaysia in fulfilment of the requirement for the degree of Master of Science

# RELATIONSHIP BETWEEN SCHOOL CULTURE, SOURCES OF LEADERSHIP EFFICACY AND COLLECTIVE LEADERSHIP AMONG SECONDARY SCHOOL TEACHERS IN KUALA LUMPUR, MALAYSIA

By

#### SHIVEH SIVALINGAM

December 2018

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This study examined the relationship between school culture, sources of leadership efficacy and collective leadership among secondary school teachers in the Federal Territory of Kuala Lumpur. It is imperative to determine factors predicting collective leadership among secondary school teachers due to its implications on professionalism in the teaching community. Traditional models of leadership highlight skills and capabilities of an individual but to effectively address the challenges teachers face in schools, we need to move beyond focusing on the individual toward a collective. Studies on collective leadership in the Malaysian context is yet to be done and studying leadership in urban schools under high-accountability conditions measuring the teachers' ability to cope in extraordinary conditions, is a worthy effort. The theoretical underpinning of this study was established from Rowan's Conception of Organic Management, Bandura's Social Cognitive Theory and McClelland's Human Motivation Theory. This is a descriptive correlational study, conducted in the Federal Territory of Kuala Lumpur, covering districts of Bangsar/Pudu, Sentul and Keramat. The instrument for data collection was a survey in the form of a structured questionnaire, adapted from Leithwood (2012), Usher (2005) and Edward, Gruenert & Valentine (1998) from previously validated studies. A pilot study was conducted on a sample of 30 teachers where an average Cronbach Alpha reliability of 0.7 was obtained on the instrument. In the actual study conducted on 402 teachers, the reliability coefficient ranged from 0.81 to 0.94. The study was analyzed using SPSS version 23. Data was analyzed using descriptive and inferential statistics tabulating mean, standard deviation, percentage, frequencies and Pearson correlation analysis as well as multiple regression, accordingly.

This study discovered that the level of collective leadership (M=3.85, SD=0.38), sources of leadership efficacy (M=3.69, SD=0.45) and school culture (M=3.72, SD=0.46) in secondary schools in Kuala Lumpur is high. In addition, sources of leadership efficacy (r=0.517, p < .01) and school culture (r=0.538, p< .01) were positively significantly correlated with collective leadership. From the regression analysis, it is was found that both variables were significantly found to predict collective leadership. Since the two variables values are positive, this indicates that there are positive relationships between the variables and outcome,  $\hat{\mathbf{Y}} = 0.332 \, \mathrm{x}_1$ 

0.372 x 2 + 1.672. Results revealed that collective leadership reaffirms the idea that having the influence of many individuals, albeit with different strengths and expertise, will not in any way compromise the initiatives and accountability of teachers, but amplify them. In addition, collective and collaborative ways increased teacher motivation and enhanced job satisfaction which lead to the development of stronger beliefs in the teachers' own abilities. The findings of this study would inform transpiring policy and practice that inclusion of teachers in leadership roles is pertinent in the element of success in schools.

Abstrak tesis yang dikemukakan kepada Senat Universiti Putra Malaysia sebagai memenuhi keperluan untuk ijazah Master Sains

# HUBUNGAN ANTARA BUDAYA SEKOLAH, SUMBER KEBERKESANAN KEPEMIMPINAN DAN KEPIMPINAN KOLEKTIF DALAM KALANGAN GURU SEKOLAH MENENGAH DI KUALA LUMPUR, MALAYSIA

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Tujuan kajian ini adalah untuk mengkaji hubungan antara budaya sekolah, sumber keberkesanan kepimpinan dan kepimpinan kolektif dalam kalangan guru-guru sekolah menengah di kawasan Wilayah Persekutuan Kuala Lumpur. Kajian ini telah dijalankan berdasarkan Konsep Pengurusan Organik Rowan, Teori Sosial Kognitif Bandura dan Teori Motivasi Manusia McClelland. Kebanyakan model kepimpinan tradisional tertumpu kepada kemahiran dan keupayaan seseorang individu, malah untuk menangani cabaran-cabaran yang dihadapi oleh guru sekolah dengan lebih berkesan. Walaubagaimanapun, kita perlu beralih fokus ke arah kepimpinan kolektif dan tidak hanya tertumpu pada kepimpinan individu sahaja. Kajian dalam bidang kepimpinan kolektif dalam konteks Malaysia belum dijalankan dan mengkaji bidang kepimpinan guru di sekolah-sekolah bandar dalam situasi akauntabiliti yang tinggi, mengukur keupayaan guru untuk mengatasi keadaan yang sukar, adalah satu usaha yang layak diberi perhatian. Kajian ini menggunakan Konsep Pengurusan Organik Rowan, Teori Kognitif Sosial Bandura dan Teori Motivasi Manusia McClelland. Kajian ini turut menggunakan rekabentuk korelasional deskriptif yang telah dijalankan di Wilayah Persekutuan Kuala Lumpur yang merangkumi kawasan Bangsar/Pudu, Sentul dan Keramat. Instrumen pengumpulan data ialah soal selidik yang disesuaikan daripada kajian Leithwood (2012), Usher (2005) dan Edward, Gruenert & Valentine (1998) di mana kajian ini telah disahkan sebelum dijalankan. Kajian rintis telah dijalankan terhadap sampel 30 orang guru di mana kebolehpercayaan Alpha Cronbach sebanyak 0.7 telah diperolehi daripada instrument ini. Kajian sebenar telah dijalankan ke atas 402 orang guru di mana pekali kebolehpercayaan berada pada nilai antara 0.81 sehingga 0.94. Data kajian ini telah dianalisis dengan menggunakan SPPS versi 23. Data dianalisis menggunakan statistik perangkaan deskriptif, sisihan piawai, peratusan, frekuensi dan analisis korelasi Pearson serta analisis regresi berganda.

Kajian ini membuktikan bahawa tahap kepemimpinan kolektif ( $M=3.85,\,SD=0.38$ ), sumber–sumber keberkesanan kepimpinan ( $M=3.69,\,SD=0.45$ ) dan budaya sekolah ( $M=3.72,\,SD=0.46$ ) di sekolah-sekolah menengah di Kuala Lumpur adalah tinggi. Di samping itu, sumber-sumber keberkesanan kepimpinan ( $r=0.517,\,p<.01$ ) dan kebudayaan sekolah ( $r=0.538,\,p<.01$ ) mempunyai hubungan positif dan berkolrelasi secara signifikan dengan kepimpinan kolektif. Dari analisis regresi, kajian ini mendapati kedua-dua pembolehubah adalah signifikan kepada kepimpinan kolektif. Oleh kerana kedua-dua nilai pembolehubah adalah positif, ini menunjukkan bahawa terdapat hubungan positif antara pembolehubah-pembolehubah dan dapatan kajian iaitu,  $\hat{Y}=0.332\,x+0.372\,x+1.672$ . Keputusan menunjukkan bahawa kepimpinan kolektif dapat menguatkan inisiatif dan akauntabiliti guru. Cara kolektif dan kolaboratif dapat meningkatkan motivasi dan kepuasan kerja guru yang dapat mempertingkatkan kepercayaan guru terhadap kebolehan masing-masing. Dapatan kajian ini turut membantu penyelidik dan pengamal pembangunan polisi pendidikan, bahawa peranan kepimpinan guru merupakan elemen penentu kejayaan sekolah.

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To my father, Mr. S. Sivalingam, I hope that I have done you proud, as there was nothing more that you and mummy wanted but to see me progress in academia. I will journey on with your support and blessings.

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This thesis was submitted to the Senate of the University Putra Malaysia and has been accepted as fulfillment of the requirement for the degree of Master of Science. The members of the Supervisory Committee were as follows:

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### **Declaration by graduate student**

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#### **CHAPTER 1**

#### INTRODUCTION

# 1.1 Background of Study

Education transformation is central in today's 21st century teaching and learning. The Malaysian Education Blueprint 2013-2025 (Ministry of Education, 2013) states that "top performing school systems are moving away from the idea of one 'heroic' leader to one of 'distributed leadership' where assistant principals and other members of middle management such as subject heads have a greater share in decision making in the school." This idea of shared leadership gives way to vibrant teaching capabilities that create better professionalism and quality education. Lambert (2003) indicates, "distributed leadership allows for the distribution of school leadership through socially constructed beliefs, values and assumptions among teachers". Hence, the creation of multiple leaders in an educational institution increases the delivery of high-quality contribution, structuring the bedrock of the system to become tight and eminent.

The ascendancy of collective leadership is revealed through research done by Leithwood and Louis (2012) who suggest that a strong influence exists between teachers and students who engage in learner centered practice with their students. To that effect, the capability of teachers in the classroom and the environment that the students are exposed to, engaged in the determinant of suppositions set upon them.

Researches from past studies have revealed the impact of sharing of responsibilities among organizational members and stakeholders. Leithwood and Mascall (2008) noted that collective leadership permits members to capitalize on the range of their individual strengths. Contractor et.al. (2012) related collective leadership to work being organized among teams, knowledge distributed up and down organizational hierarchies as workers become increasingly specialized, global(ized) and digit(ized).

To date, most studies on collective leadership is focused in the context outside Asia and its development in this region is fairly recent. Rahimah and Ghavifekr (2014) in their research, found that in the present period of time, leadership is all about enthusiasm, ability to deal with situations and evolving breakthroughs. Additionally, it is regarding merging, creative and distributive, sharing of power and expertise, to enhance the leadership ability of all adherents. This is clearly in line with Malaysian Education Blueprint 2013-2025 which encourages teamwork, thus paving the way for collective leadership which can enhance work effectively. Rabindarang, Khuan and Khoo (2015) in their study emphasized that good relationships among leaders and workers give postive impacts for the organization's effectiveness. Rosnarizah and Hussein (2015) quote Harris (2003) who stated, trends in educational leadership now no longer see the principal shoulder all responsibilities (as) it is more focused on how to create a culture of accountability and learning as well developing school leadership capabilities. This is in support of research carried out by Rosnarizah and Zulkifli

(2009) which found the collective leadership prevailed in high schools in Malaysia. Further, this finding was supported by other researchers in technical and vocational schools (Rabindarang, Khuan and Khoo, 2015) and primary schools (Jamalulail et.al., 2013). Thus, collective leadership creates collectivistic concepts about ability of followers.

To illuminate on the feature of leadership in Malaysia, it is common for the practice of time-based methods. Potential leaders in the teaching fraternity are promoted from the usual teaching position they hold, to helming administrative positions following a general pathway. It starts from the Head of Subject Panel, the Head of Department, Afternoon Supervisor, Senior Assistant for Co-curriculum Affairs, Senior Assistant for Students' Affairs, Senior Assistant for Academic Affairs before assuming the position of Principal of the school. This pathway follows the Civil Servants Legislation where government officers are promoted according to their seniority - Cabinet Committee Report 1979 as cited in Ng (2016).

However, with the changing of times and added responsibilities, it was noted that the burden for Principals in the 21<sup>st</sup> century was a lot more, and it was then seen fit that potential leaders in school be given training before acknowledging their ability to become leaders in a school. To that effect, the National Educational Management and Leadership Institution or Institut Aminuddin Baki – the nation's esteemed training and development centre which is the equivalent to the National College for Teaching and Leadership in England, took on the responsibility for training these potential leaders as their challenges go beyond the scope of administration and management demands.

The recognition of responsibilities that demand more than administration and management is reasonable, as the Malaysian education system has undergone reconstruction. With the advent of the National Education Blueprint (2013-2025), teacher empowerment now is integral to ease the burden of principals. Teacher empowerment results in better and more appropriate decisions, increased commitment and enhanced teacher performance and increased in willingness for teachers to assume responsibility (Ministry of Education, 1992).

As per the Malaysian Education Blueprint 2013-2025 (Ministry of Education, 2013) "top performing school systems are moving away from the idea of one 'heroic' leader to one of 'distributed leadership'", as mentioned in the beginning of this chapter, the idea of teacher empowerment is akin to distributed leadership as this form of leadership is at best a device to share leadership and management activities (Harris, 2013; Hartley, 2010; Fitzgerald & Gunter, 2006). Hence, to conceptualize leadership in Malaysia, it is one that is moving from singular leadership authority, to one that is more distributed, shared or collective.

Leadership theory implies influencing change in the conduct of people (Nash, 1929 as cited in Bass, 1990). This change suggests that leadership is not an inborn trait. People become leaders in large part as a result of experiences that help them learn how to be

a leader (Gentry, Deal, Stawiski & Ruderman, 2012). The study of collective leadership here wants to address factors that can influence teacher collective leadership. Leadership develops from a number of confluencing aspects such as context, task and personal qualities of leader and followers, changing demographic patterns, new technologies and rapidly developing fields of knowledge (Lord & Brown, 2004). Some other factors are coordination, control and measurement, which are also contributors to leadership (Holsapple & Joshi, 2000). These factors can be internal and external. Because today's leaders struggle to adapt to change, internally and externally (Avolio & Bass, 2004; Lord & Hall, 2005 as cited in Hannah et. al.. 2008), sources of leadership efficacy is relevant to be studied as a variable to collective leadership because it provides the internal guidance and drive to perform demanding tasks and possibilities successfully (Lord & Brown, 2004; Carver & Scheier, 1998; Mischel & Shoda, 1998; Cropanzano et. al., 1993; Shamir et. al., 1993 as cited in Hannah et. al., 2008). Researchers have also demonstrated that school culture in addition to efficacy is related independently (McLeod, 2012) and both together have a positive influence on leadership (Carpenter, 2015). Therefore, the variables to study in this research is sources of leadership efficacy and school culture and its relationship to collective leadership.

Collective leadership refers to the extent of influence that organizational members and stakeholders exert on decision in their schools. Stemming from Rowan's conception of "organic" management, it is about a pattern of control where employees are involved in decision-making, staff cooperation and collegiality (Leithwood and Jantzi (2012) in Leithwood and Lois (2012)). It is teamwork leadership where there is no power disbursed and applies to non-powered positions.

The first pertinent determinant to collective leadership involves the variable of efficacy. Demir (2008) states that efficacy functions are important determinants of leadership. According to Bandura (1997), through his social cognitive theory, collective efficacy is the perception of teachers in a school that the efforts of the faculty as a whole will have a positive effect on the organization. This belief is embedded in Bandura's (1997) social cognitive theory which carries the idea that cognitive processes mediate change but that cognitive events are induced and altered most readily by experience of mastery arising from effective performance. This enables the idea of leadership efficacy which is a specific form of efficacy corresponding with the level of confidence in the knowledge, skills and abilities associated with leading others (Hannah et. al., 2008).

The significance as well as prominence of sources leadership efficacy in the field of leadership have prompted researchers to extend their investigation into its four elements, which are performance accomplishment, vicarious experience, social persuasion and emotional arousal. Performance accomplishment is the individual's evaluation of past performance, while vicarious experience is when individuals observe competent and relevant models, social persuasion deals with the ability to praise for heightened efficacy and emotional arousal is a feelings indicator to decide if efficacy beliefs are energizing factors or performance debilitators (Bandura, 1997).

Leadership efficacy of teachers is pivotal in the exercise of leadership in schools. Efficacious teachers review their experiences more adaptively, plan and organize more effectively and are more resilient when faced by challenges compared with teachers with lower sources of efficacy (Tschannen-Moran et.al., 1998; Woolfolk Hoy & Davies, 2006). Sources of efficacy (Bandura, 1997) have been found to predict the effort teachers put forward, how efficiently they stand tenacious in facing challenges, how well teachers pay attention to and hype themselves to attain what they triumph and what options they choose in life; and all these point to the reasons why researchers study how efficacy influences the motivation and behaviour of individuals in an academic setting (Pajares, 2002).

The commission of leadership and sources of efficacy is supported by studies done in countries outside Malaysia albeit limited. On the basis of encouraging teacher collective leadership efficacy, this study sets out to show that increase in efficacy among teachers is important for the effectiveness an organization (Gordon, 2001; Woolfolk Hoy & Davies, 2006).

The attainment of optimum collective leadership skills and sources of leadership efficacy can only be engineered through a positive school culture. The elements of leadership, efficacy and school culture must work together for improved leadership performance. Researchers have highlighted that these elements have a compounding effect on school. The 'Global Leadership and Organizational Behaviour Effectiveness' (GLOBE) report underlined that school culture influences leadership and that culture takes the place of primacy in work on leadership (House & Javidan, 2004). Further, scholars have also noted that effective school leadership is contingent on a thorough understanding of school culture (Leithwood & Jantzi, 2008; Leithwood & Riehl, 2003; Peterson & Deal, 2002; Fullan, 2001; Sergiovanni, 2000; Deal & Peterson, 1999). The relationship between school culture and efficacy is also found to have compounding effects of positively influencing leadership (McLeod, 2012).

School culture is defined as the system of basic assumptions, norms and values as well as the cultural artefacts which are shared by school members and influence their functioning at school (Bolman & Deal, 2013; Maslowski, 2006; Van Houtte, 2005; Cox, 1993). Jerald (2006) simplified this to mean the relationship between the administration and the teachers, teachers and teachers, teachers and students and students and students, in addition to the school's interaction with the community and other stakeholders. How things are accomplished in an organization sets the template for the culture of the school, hence the culture of the school facilitates or inhibits the development of teachers in a professional learning organisation (Chapman & Gregory, 2013).

On the local front, a study by Sullivan (2010) as cited in Parwazalam et. al. (2014) postulated that school culture correlates with leadership. Predictors of school culture in their study, include collective efficacy and communication. The other constructs in their study which are faculty trust, academic optimism and control do not generate a high predictor score. Yaakob Daud (2012) in his study also found that there is a

positive, significant relationship between school culture and leadership. A study in Taiwan by Wu et. al. (2013) echoes findings from McLeod (2012) describing school culture as an important variable in teacher's sense of efficacy which influences sources of leadership efficacy.

#### 1.2 Statement of the Problem

The Malaysian education system is growing to meet the needs of preparing Malaysia's children for the needs of the 21<sup>st</sup> century. And the roadmap for that is the Malaysian Education Blueprint 2013-2025. This document stipulates that greater liberty and liability requires constructive networking with key stakeholders across Government agencies, in particular, the teachers (Datuk Dr. Madinah Mohammad, Ministry of Education, 2013), hence the need for expanding leadership roles to teachers.

This research was carried out in the Federal Territory of Kuala Lumpur because leadership in urban schools operate under high-accountability conditions (Isa et. al., 2017; Boori et. al., 2015). Learning, variously construed, lies at the centre of public policy and societal concern for the quality of urban schools (Isa et. al., 2017). The teachers today, would then have to meet with the demands of various quarters as concerned is shown towards higher standards and improved performance (Ahmad Zabidi, 2011). In Kuala Lumpur, this high-accountability condition rises as a result of the Government Transformation Plan under the New Economic Model resulting in the National Education Blueprint (2013-2025). Through this effort Kuala Lumpur saw the first Trust School, Smart School, Sports School, Cluster School, High-Performance School and 1 BestariNet, - Wave 1 (2013-2015) under the Education Performance and Delivery Unit (PADU) (Ministry of Education, 2013). All these demanded the delivery of high-quality outcomes which created new challenges for teachers (Rosnazirah & Hussein, 2015). The difference in living standards in the urban area also gyrates towards the higher expectations from parents and students (Ahmad Zabidi, 2011) demanding dynamic leadership roles from teachers. In order to cope with this, teachers need to learn cognitive flexibility, stress tolerance and divergent thinking (Puccio, Murdock & Mance, 2011). For that, teachers in Kuala Lumpur have been given professional development courses in the field of leadership to develop autonomy, through Institut Aminuddin Baki and the Education Performance and Delivery Unit (PADU) (The Star, 2018). Therefore, researching collective leadership efforts among teachers in Kuala Lumpur is a worthy effort as it would measure the ability of teacher to cope in extraordinary urban conditions.

Previous studies usually lay focus on other types of leadership but presently, the idea of leadership that is gaining momentum is collective leadership. Yet, Ni et.al. (2017) report in their research that knowledge on collective leadership is very limited. There is also a dearth of studies on collective leadership involving teachers in Malaysia. To date, studies on leadership is focused on teacher leadership (Fitzgerald & Gunter, 2006; Harris, 2003), such as special education (Ngang, 2012), leadership in the area of vocational and technology (Rabindarang et. al., 2014), leadership and teacher efficacy (Bijat, 2016; Yusof & Alias, 2015; Adimin, 2012), distributed leadership and

teacher motivation/efficacy (Rosnarizah & Hussein, 2015; Jamalulail et. al., 2013), – to mention a few. Nevertheless, studies on collective leadership in education using the Malaysian context has yet to be done and this study sets out to discover the status of collective leadership, here.

Sources of leadership efficacy has received little attention in the leadership literature (Hannah, Avolio, Luthans & Harms, 2008). McCormick (2002) explored the idea of leadership efficacy, which predicted behavior and distinguished leaders from non-leaders. Yet, Hannah et. al. (2008), reported that their literature review did not uncover any articles addressing leadership efficacy. Results of the current study, can provide a perception into the building of efficacious leadership, which can become the element that enhances leaderships in schools.

On the grounds that culture is a way of life for members of an organization, and their routines become habitual actions for that organization (Mohd Yaakob et. al., 2016; Turan & Bektas, 2013), the formation of that culture in educational settings, depend on shared objectives. When objectives are shared by all the school's stakeholders, it makes for the creation of a common culture where leadership efforts can emerge (Turan & Bektas, 2013). Therefore, studying culture for this research makes it the catalyst in creating the fitting environment for leadership efforts.

Findings of past research indicate that studies have been done on school culture (Karadag & Bayir, 2018; Levesque, 2017; Cansoy & Parlar, 2017; Yusof et. al, 2016; Carpenter, 2015; Dixon, 2014; Turan & Bektas, 2013) and sources of efficacy (Sun & Jiangang, 2018; Malinen & Savolainen, 2016; Rosnarizah & Hussein, 2015; Yusof & Alias, 2015; Mestrova et. al., 2015; Gallante, 2015; Huh et. al., 2014) but none linked together to collective leadership which is a concept associated with non-powered positions (Raelin, 2018), and in this research context it is referenced to teachers. Leithwood's (2012) framework through his analysis of research depicts that collective leadership has significant direct effects with teacher variables which include teachers' work setting i.e. school culture; and teacher motivation i.e. sources of efficacy. This makes the variables operationally linked. In addition, it also strengthens the choice for collective leadership as the dependent variable in this research, as past research from Leithwood and Louis (2102) indicate that studying collective leadership will not undermine the effectiveness and accountability of teamwork but potentially enhance them through its effects on teacher motivation (sources of efficacy) and workplace settings (school culture) (Leithwood & Jantzi, 2008). Therefore there is rational need to conduct a research to investigate the relationship between the three variables.

#### 1.3 Objectives of Research

Generally, this study attempts to determine the level of school culture, sources of leadership efficacy and collective leadership present among teachers in the government secondary schools in Kuala Lumpur. Also, it examines the relationship

between sources of efficacy, school culture and collective leadership among these secondary school teachers.

The specific objectives of this research are as follows,

- 1. To determine the level of collective leadership among secondary school teachers.
- 2. To determine the level of school culture and sources of leadership efficacy among secondary school teachers.
- 3. To examine the relationship between the dimensions of school culture and collective leadership among secondary school teachers.
- 4. To examine the relationship between the dimensions of sources of leadership efficacy and collective leadership among secondary school teachers.
- 5. To identify factors predicting collective leadership among secondary school teachers.

# 1.4 Research Questions

Research questions were formulated to guide the process of this research,

RQ <sub>1</sub>	What is the level of collective leadership practice towards secondary school teachers?
RQ <sub>2</sub>	What is the level of school culture among secondary school teachers?
RQ3	What is the level of sources of leadership efficacy among secondary school teachers?
RQ4	Is there any relationship between the dimensions of school culture towards collective leadership among secondary school teachers?
RQ5	Is there any relationship between the dimensions of sources of leadership efficacy towards collective leadership among secondary school teachers?
RQ6	What are the factors predicting collective leadership among secondary school teachers?

# 1.5 Hypotheses

To achieve objectives 4 to 6, three hypotheses will be tested:

- H<sub>1</sub> There is significant relationship between the dimensions of school culture with collective leadership among secondary school teachers.
- H<sub>2</sub> There is significant relationship between the dimensions of sources of leadership efficacy with collective leadership among secondary school teachers.
- H<sub>3</sub> Sources of leadership efficacy and school culture significantly predict the variance in collective leadership among secondary school teachers.

# 1.6 Significance of Study

Efficacy can greatly influence how people behave, think, feel, stimulate and inspire themselves. To this effect, efficacy can ascertain the effort teachers interpolate to face demanding problems, set challenging goals and demonstrate stronger sense of commitment when exercising leadership capabilities. The efficacious teacher indirectly becomes (an) effective teacher, according to Shaughnessy (2004). The sources of efficacy – mastery experience, vicarious experience and social persuasion, can provide a perception for solutions to produce better understanding into the concept of collective leadership. In addition, the application of efficacy needs the collaboration of school culture for the overall success of collective leadership to take place.

In addition to investigating efficacy, the idea of collective leadership also needs to be investigated. To date, there is limited empirical work supporting the approach. Collective leadership is a new age way of viewing the idea of leading an institution. Leadership is viewed as a collectivistic phenomenon that involves putting the "we" in leadership where multiple individuals interact, through a variety of formal and informal structures, broadly defined, and take on a variety of leadership roles, both formally and informally over time (Yammarino et. al., 2012).

This study, therefore aims to bring about an awareness to the teaching fraternity, of the importance for sources of efficacy and school culture in creating effective and efficacious collective leadership skills. With this awareness, teachers would be better prepared with an understanding of how to facilitate actions promoting collective leadership in facing the multitude of challenges in schools.

# 1.7 Limitations of Study

There are several limitations to this study. This study will focus on collective leadership of secondary school government teachers in the Federal Territory of Kuala Lumpur. As such, the findings of this study may not be generalized to teachers throughout Malaysia, since it is conducted in various schools, only in the city of Kuala Lumpur. In addition, different locations of schools could contribute to other school level variables that may interfere in the findings of the study.

Next, this study is focused on exploring the four sources of efficacy and school culture in its effect on collective leadership. The questionnaire is designed to get feedback from teachers only. Since the whole faculty is responsible in creating a conducive school environment, the scope of this research is limited as findings from the principals and school administration is excluded. A questionnaire also holds complex interpretations as what may be good to some may not be so, for others, thus raising the level of subjectivity to constructs that can lead to skewed results. Different understandings can stem from exogenous factors such as culture, age and education. These propensities can lead to data inaccuracies.

### 1.8 Definition of Terms

Significant important terms and variables used in this study are defined operationally as follows:

# 1.8.1 Collective Leadership

According to Leithwood and Jantzi (2012) in Leithwood and Louis (2012), collective leadership is the combined effects of authorities in the role of leadership; in the contribution made by each of these, for example administrators, teachers, students and parents. For this study, collective leadership discusses how far teachers practice leadership through aspects of setting directions, developing people and redesigning the organisation. Each of these dimensions, comprises from three to five more specific practices. Collective leadership is measured using the instrument from Leithwood (2012).

# 1.8.2 Sources of Leadership Efficacy

The belief in their capabilities to organize and execute actions to successfully accomplish tasks involving leading others in given contexts is what defines the understanding of leadership efficacy according to Hannah et.al. (2008). Factors that influence efficacy which influences the development of teachers' perceptions toward their capabilities, is derived from the four pertinent sources of leadership efficacy (Bandura, 1997). The four sources of leadership efficacy include performance accomplishment, vicarious experiences, social persuasion and emotional arousal.

These sources of leadership efficacy contribute to the analysis of the teacher's leadership competence and relationship between its proposed antecedents (Paglis, 1999). Performance accomplishment is represented by personal-behaviour interaction. Vicarious experiences and social persuasion is represented by personal-environment interaction. Emotional arousal is a personal behaviour influenced by an achievement and emotional state. These components are measured using the instrument adapted from Usher (2006) based on Bandura (1997).

#### 1.8.3 School Culture

According to Fullan (2001) school culture can be defined as the guiding beliefs and values evident in the way a school operates. When discussing the impact of the leadership variable on schools, the culture of the school is a priority as it gives direction to the success of leadership practices in schools. In this study, school culture is measured through dimensions, namely, participative leadership, teacher collaboration, professional development, unity of purpose and learning partnership. The School Culture Survey used in this research was developed by Gruenert and Valentine (1998).

# 1.9 Summary

In essence, this chapter gives a lead-in to the focus of this study which is the relationship between school culture, sources of leadership efficacy and collective leadership. The problem statement is given and the objectives of the research, as well as research questions and hypotheses that guide the study are stated. The preceding chapter will look at the literature which explores the variables, gearing towards explication of the problem.

#### REFERENCES

- Abdullah, A.G. & Ngang, T. K. (2006) Motivasi Guru & Pengurusan Budaya Kolaboratif Pengurus Pendidikan Wanita, *Jurnal Pendidikan*, 31, 97-105.
- Abu Daud Silong (2009). Leadership Theories Research & Practices: Framing Future Leadership Thinking. Selangor: UPM.
- Ahmad Zabidi A. R. (2011) Teachers' Challenging Experiences in Executing New Policy Initiatives: Implications For Refining Policy Implementation Towards Achieving World-Class Education. Kuala Lumpur: University Malaya.
- Ali, N, Sharma, S. & Zaman, A. (2016) School Culture & School Effectiveness: Secondary Schools in Pakistan. *Educational Management*, 4 (4), 50-65.
- Audryanah, A. (2007). *Kepimpinan Pengajaran dan Efikasi Kendiri Pengetua Sekolah Menengah Daerah Temerloh dan Bera*. (Unpublished Master Thesis). Serdang: Universiti Putra Malaysia.
- Avolio, B. J., Jung, D., Murry, W., & Sivasubramaniam, N. (1996). Building Highly Developed Teams: Focusing on Shared Leadership Process, Efficacy, Trust, and Performance. In D. A. J. D. A. Beyerlein & S. T. Beyerlein (Eds.), *Advances in Interdisciplinary Studies of Work Teams* (173-209). Greenwich, CT: JAI Press.
- Avolio, B.J., & Bass, B.M. (2004). *Multifactor Leadership Questionnaire: Manual and Sampler Set* (3rd ed.). CA: Mind Garden Inc.
- Babbie, E. (2005). *The Basics of Social Research* (3<sup>rd</sup> ed). Canada: Thompson Wadsworth.
- Baharom Mohamad & Mohamad Johdi Salleh (2009). *Kepimpinan Pendidikan dalam Pembangunan Modal Insan*. Prosiding "Seminar Pembangunan Modal Insan", Kecemerlangan Modal Insan. Pusat Sumber Pendidikan Negeri, Pengkalan Chepa, Kota Bharu, Kelantan.
- Balkar, B. (2015). Defining an empowering school culture (ESC): Teacher perceptions. *Educational Research*, 25 (3), 205-224.
- Bandura, A. (1997). Self Efficacy: The Exercise of Control. New York: Freeman.
- Barnett, K., McCormick, J., & Conners, R. (2001). Transformational leadership in schools: Panacea, placebo, or problem? *Journal of Educational Administration*, 39(1), 24-46.
- Bartlett, J.E., Kotrlik, J.W., & Higgins, C.C. (2001). Organizational research: Determining appropriate sample size in survey research. *Information Technology Learning and Performance Journal*, 19(1), 43-50.

- Bass, B.M. (1990). From transactional to transformational leadership: Learning to share the vision. *Organizational Dynamics*, 18 (3), 19-31.
- Beard, K.S., Hoy, W.K. & Hoy, A.W. (2010). Academic optimism of individual teachers: Confirming a new construct, *Teaching and Teacher Education*, 26 (5), 1136-1144.
- Beare, H., Caldwell, B. & Millikan, R. (1992). *Creating an Excellent School*. London: Routledge.
- Bennet, N., Harvey, J., Wise, C. & Woods, P.A. (2004). *Distributed Leadership : A Desk Study*. Nottingham: NCSL.
- Best, J.W. & Kahn, J.V. (2003). Research in Education (7<sup>th</sup> ed). Boston: Allyn and Bacon.
- Bijat, T. (2016). Pengaruh Kepimpinan Pengajaran Terhadap Efikasi Kendiri Guru, Budaya Sekolah dan Amalan Pentaksiran Guru Sekolah Menengah Kebangsaan Sarawak (Unpublished doctorate thesis). Sintok: Universiti Utara Malaysia.
- Boies, K., Lvina, E., & Martens, M. L. (2010). Shared leadership and team performance in a business strategy simulation. *Journal of Personnel Psychology*, 9: 195-202.
- Bolden, R. (2011). Distributed leadership in organizations: A review of theory and research. *International Journal of Management Reviews*, 13: 251-269.
- Bolman, L. & Deal, T. (1991). Leading and Managing: Effects of Context, Culture and Gender. *Educational Administration Quarterly*, 28 (3), 314-329.
- Bolman, L. & Deal, T. (2013). *Reframing Organizations: Artistry, Choice and Leadership* (5th ed.). New York, NY: John Wiley.
- Boone, C. & Hendricks, W. (2009). Top management team diversity and firm performance: Moderators of functional-background and locus-of-control diversity. *Management Science*, 55, 165-180.
- Boori, M., Netzband, M., Vozenilek, V. & Choudry, K. (2015) Urban Growth in Last 3 Decades in Kuala Lumpur, Malaysia, *Joint Urban Remote Sensing Event*, 2015
- Braslow, M.D., Guerrettaz, J., Arkin, R.M. & Oleson, K.C. (2012). Self Doubt. *Social & Personality Psychology Compass*, 6 (6), 470-482.
- Brendefur, J.L., Whitney, B., Stewart, R. A., Pfiester, J., & Zarbinisky, J. (2014). Instructional learning teams: a case study. *Journal of Curriculum and Teaching*, 3(1), 36.

- Brinton, C. M. (2007). Comparing Perceptions About Collaborative Culture from Certified And Non-Certified Staff Members Through The Adaptation of the School Culture Survey-Teacher Form. Thesis submitted for the Degree of Doctor of Education: University of Missouri-Columbia.
- Browne-Ferrigno, T. (2016). Developing and empowering leaders for collective school leadership: Introduction to special issue. *Journal of Research on Leadership Education*, 11(2) 151-157.
- Bryman, A. (2012). Social Research Methods (4th ed.) UK: Oxford University Press.
- Bush, T. (2008). *Leadership and Management Development in Education*. UK: Sage Publications.
- Cameron, K. (2008). A Process for Changing Organizational Culture. In Thomas G. Cummings (Ed.), *Handbook of Organizational Development*, (429-445) Thousand Oaks, CA: Sage Publishing.
- Carpenter, D. (2015). School culture and leadership of professional learning communities. *International Journal of Educational Management*, Vol. 29 Issue: 5, pp.682-694.
- Carson, J. B., Tesluk, P. E., & Marrone, J. A. (2007). Shared leadership in teams: An investigation of antecedent conditions and performance. *Academy of Management Journal*, 50: 1217-1234.
- Chambliss, C.A. & Murray, E.J. (1979). Efficacy attribution, locus of control, and weight loss. *Cognitive Therapy and Research*, 3, 349.
- Chan, K. Y. & Drasgow, F. (2001). Toward a theory of individual differences and leadership: Understanding the motivation to lead. *Journal of Applied Psychology*, 86 (3), 481-498.
- Chapman, C. & Gregory, G. (2013). *Differentiated Instructional Strategies: One Size Doesn't Fit All* (3rd Ed.). Thousand Oaks, CA: Sage Publications, Ltd./Corwin Press.
- Che Asiah C.M. (1998). *Tingkah laku Kepimpinan Pengetua & Kesannya Terhadap Motivasi Guru: Satu Kajian Kes*. Tesis Sarjana Pendidikan, Fakulti Pendidikan UKM, Bangi.
- Chhabra, S. & Yuvika. (2014). Gender and leadership: An analysis. *ENVISION-Apeejay's Commerce & Management Journal*, 13, 112-117.
- Chiles, A.M. & Zorn, T.E. (2009). Empowerment in organizations: Employees' perceptions of the influences on empowerment. *Journal of Applied Communication Research*, 23 (1), 1-25.
- Cochran, W.G. (1977). Sampling Techniques (3rd ed). NY: John Wiley & Sons.

- Cohen, L. & Manion, L. (1980). Research Methods in Education. London: Croom Helm.
- Coladarci, T. (1992). Teachers' sense of efficacy and commitment to teaching. Journal of Experimental Education, 60, 323-337.
- Contractor, N. S., DeChurch, L. A., Carson, J. B., Carter, D. R., & Keegan, B. (2012). The topology of collective leadership. *Leadership Quarterly*, 23, 994–1011.
- Coakes, S. & Steed, L. (2002). SPSS Analysis Without Anguish. Brisbane: John Wiley & Sons.
- Cox, T. Jr (1993). Theory, Research and Practice: Cultural Diversity in Organizations, Berrett-Koehler, San Francisco, CA.
- Cozby, P.C. (2001). *Measurement Concepts. Methods in Behavioral Research* (7<sup>th</sup> ed). California: Mayfield Publishing Company.
- D'Innocenzo, L., Mathieu, J.E. & Kukenberger, M.R. (2014). A meta-analysis of different forms of shared leadership-team performance relations. *Journal of Management*, 42 (7), 1-28.
- Dansereau, F. & Yammarino, F. (1998). *Leadership: The Multiple Level Approaches* (Volume B). Stamford CT: JAI Press.
- Day, C., Harris, A. & Hadfield M. (2001). Challenging the orthodoxy of effective school leadership. *International Journal of Leadership in Education*, 4(1), 39–56.
- Day, D.V., Gronn, P. & Salas, E. (2004). Leadership capacity in teams. *The Leadership Quarterly*, 15, 857-880.
- Day, D. V., Fleenor, J. W., Atwater, L. E., Sturm, R. E., & McKee, R. A. (2014). Advances in leader and leadership development: A review of 25 years of research and theory. *The Leadership Quarterly*, 25(1), 63–82.
- Demir, K. (2008). Transformational leadership and collective efficacy: The moderating roles of collaborative culture and teachers' self-efficacy. *Eurasian Journal of Educational Research*, 8 (33), 93-112.
- Denis, J.L., Lamothe, L. & Langley, A. (2001). The dynamics of collective leadership and strategic change in pluralistic organizations. *Academy of Management Journal*, 44, 809–837.
- Denscombe, M. (2014). *The Good Research Guide: For Small-scale Social Research Projects*. UK: McGraw-Hill.

- Deal, T. E., & Peterson, K. D. (1990). The principal's role in shaping school culture. *Washington, D.C.: U.S. Office of Educational Research and Improvement*. Retrieved from: http://files.eric.ed.gov/fulltext/ED325914.pdf
- Deal, T. E., & Peterson, K. D. (1999). Shaping School Culture: The Heart of Leadership. San Francisco: Jossey-Bass.
- Deal, T.E. & Peterson, K.D. (2009). Shaping School Culture: Pitfalls, Paradoxes, & Promises. Jossey-Bass Inc., Publishers, San Francisco, CA.
- Deal, T. E. & Kennedy, A. (1982). Corporate Cultures: The Rites & Rituals of Corporate Life. NY: Perseus Book Publishing.
- DeRue, D. S. (2011). Adaptive leadership theory: Leading and following as a complex adaptive process. *Research in Organizational Behavior*, 31: 125-150.
- Dinh, J. E., Lord, R. G., Gardner, W. L., Meuser, J. D., Liden, R. C., & Hu, J. (2014). Leadership theory and research in the new millennium: Current theoretical trends and changing perspectives. *The Leadership Quarterly*, 25(1), 36–62.
- DuFour, R. (2008). Revisiting Professional Learning Communities: New Insights for Improving Schools. Solution Tree, Bloomington, IN.
- Durukan, H. (2006). The visioner role of school administrator. KEFAD, 7(2), 277-286.
- Faul, F., Erdfelder, E., Lang, A.G. & Buchner, A. (2007). G\*Power 3: A flexible statistical power analysis program for the social, behavioural and biomedical science. *Behaviour Research Methods*, 39, 175-191.
- Finn, F., Mason, C. & Bradley, L. (2007). *Doing Well with Executive Coaching:*Psychological and Behavioral Impacts. Paper presented at the Academy of Management Conference, Philadephia.
- Fitzgerald, T. & Gunter, H. (2006). Teacher leadership? A new form of managerialism. New Zealand Journal of Educational Leadership, 21(2), 44-57.
- Fraenkel, J. R., Wallen, N.e, & Hyun, H.H. (2015). *How to Design and Evaluate Research in Education* (9th ed.). Boston: McGraw-Hill.
- Friedrich, T. L., Griffith, J. A., & Mumford, M. D. (2009). Collective leadership behaviors: Evaluating the leader, team network, and problem situation characteristics that influence their use. *The Leadership Quarterly*, 27(2), 312–333.
- Friedrich, T.L., Vessey, W.B., Schuelke, M.J., Ruark, G. & Mumford, M.D. (2009). A framework for understanding collective leadership: The selective utilization of leader and team expertise within networks. *The Leadership Quarterly*, 20, 933-958.

- Fryberg, S. & Rhys, R. (2007). What are Cultural Models? University of Arizona.
- Fullan, M. (2001). Leading in The Culture of Change. San Fransisco: Jossey-Bass.
- Fullan, M. (2003). *The Moral Imperative of School Leadership*. Thousand Oaks, CA: Corwin.
- Fullan, M., & Hargreaves, A. (1991). What's Worth Fighting for in Your School? New York: Teachers College Press.
- Gentry, W., Deal, J., Stawiski, S. & Ruderman, M. (2012) Are Leaders Born or Made? Perspectives from the Executive Suite, *Centre for Creative Leadership*, March Issue 2012
- George, D. & Mallery, M. (2003). SPSS for Window Step by Step: A Simple Guide and Reference, 17.0 Update (10th ed.). Boston: Pearson.
- Ghasemi, A. & Zahediasl, S. (2012). Normality tests for statistical analysis: A guide for non-statisticians. *Int J Endocrinal Metab*, 10(2): 486–489.
- Giles, C. and Hargreaves, A. (2006). The sustainability of innovative schools as learning organizations and professional learning communities during standardized reform. *Educational Administration Quarterly*, 42 (1) 124-156.
- Gist, M.E. & Mitchell, T.R. (1992). Self-efficacy: A theoretical analysis of its determinants and malleability. *Academy of Management Review*, 17, 183-211.
- Goddard, R. D., Hoy, W. K., & Woolfolk Hoy, A. W. (2004). Collective efficacy beliefs: Theoretical developments, empirical evidence, and future directions. *Educational Researcher*, 33(3), 3-13.
- Goleman, D. (1995). Emotional Intelligence. New York: Bantam Books.
- Gordon, L.M. (2001). High Teacher Efficacy as A Marker of Teacher Effectiveness in the Domain of Classroom Management. Paper presented at the annual meeting of the California Council on Teacher Education, San Diego: CA.
- Green, S.B. (1991). How many subjects does it take to do a regression analysis? *Multivariate Behavioral Research*. 26, 499-510.
- Gruenert, S., & Whitaker, T. (2015). School Culture Rewired: How to Define, Assess, and Transform It. ASCD.
- Gronn, P. (2002). Distributed leadership as a unit of analysis. *The Leadership Quarterly*, 13, 423-452.
- Gruenert, S.W. & Valentine, J.W. (1998). *The School Culture Survey*. Columbia, MO: University of Missouri-Columbia.

- Hackman, M. & Johnson, C. (2000). *Leadership: A Communication Perspective*. Illinois: Waveland Press.
- Hannah, S.T., Avolio, B., Luthans, F. & Harms, P.D. (2008). *Leadership Efficacy : Review and Future Directions*. Management Department Faculty Publications (5).
- Hargreaves, A. (1998). The emotional politics of teaching and teacher development: with implications for educational leadership. *International Journal of Leadership in Education*, 1(4), 315-336.
- Harris, A. (2003). *Teacher Leadership: Principles and Practice*. Institute of Education: University of Warwick.
- Harris, A. (2007). Distributed leadership: Conceptual confusion & empirical reticence. *International Journal for Leadership in Education*, 10(3), 315-325.
- Harris, A. (2013). Distributed leadership: Implications for leaders and leadership & future possibilities. *Educational Management, Administration and Leadership*, 41 (5).
- Hartley, D. (2010). Paradigms: How far does research in distributed leadership 'stretch'? *Educational Management, Administration and Leadership*, 38 (3), 271-285.
- Hattie, J. & Timperly, H. (2007). The Power of Feedback. *Review of Educational Research*, 77 (1), 81-112.
- Heffner, L. (2013). A Case Study of a Professional Learning Community: An Investigation of Sustainability Within a Rural Elementary School. Dissertation for degree of Doctor of Education, Appalachian State University.
- Hendriks, J. & Payne, S. (2007). Beyond the Big Five: Leaders goal orientation as a predictor of leadership effectiveness. *Human Performance*, 20, 317-343.
- Hiller, N.J., Day, D.V. & Vance R.J. (2006). Collective enactment of leadership roles and team effectiveness: A field study. *The Leadership Quarterly*, 17, 387-397.
- Hinkin, T. R., Tracey, J. B., & Enz, C. A. (1997). *Scale Construction: Developing Reliable and Valid Measurement Instruments*. Retrieved 15 July 2017 from Cornell University, School of Hotel Administration site: http://scholarship.sha.cornell.edu/articles/613
- Hinkle, Wiersma, & Jurs (2003). *Applied Statistics for the Behavioral Sciences* (5th ed.). USA: Houghton Mifflin.

- Hollander, E. P. (1993). Legitimacy, Power, and Influence: A Perspective on Relational Features of Leadership. In M. M. Chemers & R. Ayman (Eds.), *Leadership Theory and Research: Perspectives and Directions* (pp. 29-47). San Diego, CA: Academic Press.
- Holsapple, C.W. & Joshi, K.D. (2000). An investigation of factors that influence management & knowledge in organizations. *Journal of Strategic information Systems*, 9, 235-261.
- House, P. W., & Javidan, M. (2004). *Culture, Leadership, and Organizations: The GLOBE Study of 62 Societies*. London: Sage Publications.
- Hoy, W.K. & Woolfolk, A.E. (1993). Teachers' sense of efficacy and the organizational health of schools. *The Elementary School Journal*, 93, 356-372.
- Huh, Y., Reigeluth, C.M. & Lee. D. (2014). Collective efficacy and its relationship in a computer-mediated project-based group work, *Contemporary Educational Technology*, 5 (1), 1-21.
- Isa, N., Naim, W., Salleh, S. & Md. Nasrudin, N.A. (2017) Urban Climate Analysis Mapping of Kuala Lumpur City, *Pertanika Journal of Social Science & Humanities*, 25 (S), 291-300.
- Ishak, S. (1993). *Perkaitan Antara Kepimpinan Pengetua Dan Tahap Motivasi Guru*. Tesis Sarjana Pendidikan, Fakulti Pendidikan UKM, Bangi.
- Israel, G.D. (1992). *Determining Sample Size*. Fact Sheet PEOD -6, Florida Cooperative Extension Service, Institute of Food and Agriculture Science: University of Florida, USA.
- Iyer, M.G. (2008). Current Views of The Characteristics of School Effectiveness in The Context of National Secondary Schools from The Perception of Principals, Heads of Department and Teachers (Doctoral Thesis). University of Leicester, United Kingdom.
- Jamalulail, A.W., Aida Hanim, A.H., Suriati, Z. & Md Fuad, M.R. (2013). The relationship between headteacher's distributed leadership practices and teachers' motivation in national primary schools. *Asian Social Science Journal*, 9,16.
- Jameson, J. (2007). *Investigating Collaborative Leadership for Communities of Practice In Learning & Skills*. Lancaster University: CEL Practitioner Research Programme 2006-2007, Lancester University: CEL.
- Jamil Adimin (2012). Prosiding Seminar Nasional Kepimpinan dan Pengurusan Pendidikan kali ke-18, 24-35. *Kepimpinan untuk Pembelajaran: Belajar Memimpin Diri untuk Membawa Perubahan*. Institut Aminuddin Baki, Kementerian Pelajaran Malaysia.

- Jayasingam, S. & Moey Y.C. (2009). Leadership style and perception of effectiveness: Enlightening Malaysian managers. *Asian Social Science*, 5(2), 54-65.
- Jerald, C.D. (2006). Issue. Brief school culture: 'The Hidden Curriculum', Washington D.C.: The Center for Comprehensive School Reform and Improvement www.centerforcsri.org
- Joet, G., Usher, E.L. & Bressoux, P. (2011). Sources of efficacy: An investigation of elementary school students in France. *Journal of Educational Psychology*, 103(3), 649-663.
- Kaplan, A. & Patrick, H. (2016). Learning Environments and Motivation. In Wetntzel,K. & Miele, D. (Eds.), *Handbook of Motivation at School* (pp. 251-274).Routledge.
- Kessels, J. (2013). Distributed leadership in practice: A descriptive analysis of distributed leadership in European Schools, *European Policy Network of school leaders*. http://josephkessels.com/sites/default/files/duijf\_e.a.\_2013\_distributed\_leadership in practice esha-etuce 0.pdf
- Kohm, B. & Nance, B. (2009). Creating collaborative cultures. *Educational Leadership*, 67(2), 67-72.
- Krejcie, R.V & Morgan, D.W. (1970). Determining sample size for research activities. Educational and Psychological Measurement, 30, 607-610.
- Kythreotis, A., Pashiardis, P & Kyriakides, L. (2010). The influence of school leadership styles & culture on students' achievement in Cyprus primary schools. *Journal of Educational Administration*, 48 (2), 218-240.
- Lambert, L. (2003). A framework for shared leadership. *Educational Leadership*, 58(8), 37-40.
- Le Clear, E. (2005). Relationships Among Leadership Styles, School Culture & Student Achievement. Dissertation for degree of Doctor of Education, University of Florida.
- Leithwood K. (2005). Understanding successful principal leadership: progress on a broken front. *Journal of Educational Administration*, 43 (6), 619-629.
- Leithwood, K. (2010). How the leading student achievement project improves student learning: An evolving theory of action, New York: The Wallace Foundation.
- Leithwood, K., & Louis, K. (2012). *Linking Leadership to Student Learning*. San Francisco, CA: Jossey-Bass.
- Leithwood, K. & Mascall, B. (2008). Collective leadership effects on student achievement. *Educational Administration Quarterly*, 44 (4) 529-561.

- Leithwood, K. & Jantzi, D. (2008). Linking leadership to student learning: The contributions of leader efficacy. *Educational Administration Quarterly*, 44 (4) 496-528.
- Leithwood, K. & Riehl, C. (2003). What we know about successful leadership. *Philadelphia: Laboratory for Student Success*, Temple University.
- Lo, R.M., Ramayah, T. & De Run, E.C. (2010). Does transformational leadership style foster commitment to change? The case of higher education in Malaysia. *Procedia-Social and Behavioral Sciences*, 2(2), 5384-5388.
- Lord, R.G. & Brown, D.J. (2004). *Leadership Processes and Follower Self-Identity*, New Jersey: Lawrence Erlbaum.
- Louis, K.S., Marks, H.M. & Kruse, S. (1996). Teachers' professional community in restructuring schools. *American Educational Research Journal*, 33, 757-798.
- Louis, K.S. and Marks, H.M. (1998). Does professional community affect the classroom? Teachers' work and student experiences in restructuring schools, *American Journal of Education*, 106 (4), 532-575.
- Luthans, F. & Peterson, S. J. (2002). Employee engagement and manager self-efficacy. *Journal of Management Development*, Vol. 21 Issue: 5, pp.376-387.
- Martin, S. T. (2009). *Relationships Between Leadership Styles of Principals and School Culture* (Doctoral Thesis). Georgia Southern University.
- Maslowski, R. (2006). A review of inventories for diagnosing school culture. *Journal of Educational Administration*, 44(1), 6-35.
- Mayo, M.C., Meindl, J.R. & Pastor, J.C. (2003). Shared Leadership in Work Teams: A Social Network Approach. In Pearce, C.L. & Conger, J.A. (eds) Shared Leadership: Reframing the Hows and Whys of Leadership. Thousand Oaks, CA: Sage Publications.
- McLeod, R.P. (2012). An Examination of The Relationships between Teachers' Sense of Efficacy and School Culture. (Unpublished doctorate thesis). USA: University of Toledo.
- McCormick, M.J. (1999). The Influence of Goal Orientation and Sex-Role Identity on the Development of Leadership Self-Efficacy During Training Intervention. (Unpublished dissertation). Texas: A&M University.
- McCormick, M.J., Tanguma, J & Lopez-Forment, A.S. (2002). Extending self-efficacy theory to leadership: A review & empirical test. *Journal of Leadership Education*, 1(2), 34-49.

- Mellor, S., Barclay, L., Bulger, C. & Kath, L. (2006). Augmenting the effect of verbal persuasion on self efficacy to serve as a steward: Gender similarity in a union environment. *Journal of Occupational and Organizational Psychology*, 79, 121-129.
- Miller, R. J. & Rowan, B. (2006). Effects of organic management on student achievement. *American Educational Research Journal*, 43(2), 219-253.
- Ministry of Education Malaysia. (1992). Creative Effective Schools: School Based Management, Teachers Empowerment and Leadership Training Strategies and Policy Incentives. Paper presented at the Senior Malaysian Educators High Level Leadership Seminar. Stanford University, CA: USA.
- Ministry of Education. (2013). *Malaysia Education Blueprint (2013-2025): Preschool to Post-Secondary Education*. Putrajaya: Ministry of Education.
- Ministry of Education Malaysia. (2016). *Number of Schools by Type Group and States*. Retrieved April 2, 2017 from MOE website: <a href="http://www.moe.gov.my/">http://www.moe.gov.my/</a>
- Mohd. Yaakob, M.F., Yunus, J. & Yusof, H. (2016). Model pengukuran budaya sekolah: Kajian di sekolah kebangsaan di Malaysia. *Jurnal Kepimpinan Pendidikan*, 3 (4), 58-71.
- Mohd. Yusoff, H. (2011). Budaya Organisasi Sekolah Menengah Harian: Satu Tinjauan di Beberapa Buah Sekolah di Kuala Lumpur. University Malaya, KL.
- Morgeson, F. P., DeRue, D. S., & Karam, E. P. (2010). Leadership in teams: A functional approach to understanding leadership structures and processes. *Journal of Management*, 36: 5-39.
- Ng, A. Y. M., (2016) School Leadership Preparation in Malaysia: Aims, content and impact. *Educational Management and Leadership*.
- Ngang, T.K. (2012). A comparative study on teacher leadership in special education classroom between China and Malaysia. *Procedia Social & Behavioral Sciences*, 31, 231-235.
- Ni, Y.M., Rui Yan & Pounder, D. (2017). Collective leadership: Principals' decision influence and the supportive or inhibiting decision influence of other stakeholders. *Educationa Administration Quarterly*, 1-33.
- Noor Hashimah, H. H. (2000). Perkaitan antara Gaya Kepimpinan Pengetua dan Tahap Motivasi Guru: Tinjauan di Sekolah-Sekolah Menengah Daerah Segamat. Projek Sarjana Pendidikan, Fakulti Pendidikan UKM, Bangi.
- Norashikin A.B., Ramli B. & Nurnazahiah A. (2013) *Kepimpinan pengajaran pengetua dan kepimpinan guru*. In Graduate Research in Education Seminar (GREduc 2013) 1 Dec 2013, Faculty of Educational Studies, University Putra Malaysia

- Nunnally, J.C. (1978). Pscyhometry Theory. New York: McGraw-Hill.
- Ogawa, R. & Bossert, S. (1995). Leadership as an organizational quality. *Educational Administration Quarterly*, 31, 224-243.
- O'Neill, C. & Brinkerhoff, M. (2017) Advancing Critical Conversations: How to Get There from Here in *Five Elements of Collective Leadership for Early Childhood Professionals*. US: Redleaf Press.
- Paglis, L. (1999). Searching For The Wellspring of Leading Change: Leader Self-Efficacy in Organizations (Unpublished doctoral dissertation). Purdue University.
- Pajares (2002). Self-efficacy beliefs in academic contexts: An outline. Retrieved from http://des.emory.edu/mfp/efftalk.html
- Pallant, J. (2013). SPSS Survival Manuals: A Step by Step Guide to Data Analysis Using IBM SPSS (5<sup>th</sup> ed). UK: Open University Press.
- Parwazalam Abd Rauf, Syed Kamaruzaman Syed Ali, Aliza Aluwi & Nor Afizah Mohd Noor (2014). The effect of school culture on the management of professional development in secondary schools in Malaysia. *The Malaysian Journal of Educational Science*, 2(3), 41-52.
- Patten, M.D. (2015). An insider's reflection on quantitative research in the social and environmental disclosure domain. *Critical Perspectives on Accounting* 32, 45–50.
- Peterson, K. (2002). Enhancing School Culture: Reculturing Schools. *Journal of Staff Development*, 23 (3).
- Peterson, K., & Deal, T. (2002). Shaping School Culture fieldbook. San Francisco: Jossey-Bass.
- Pillai, P. & Williams, E.A. (2004). Transformational leadership, self-efficacy, group cohesiveness, commitment and performance. *Journal of Organizational Change Management*, 17, 144-159.
- Platt, S. (2010). *The Development of a Leadership Self-Efficacy Measure*. Thesis submitted for the Degree of Master of Science in Engineering Management: Air University, Ohio.
- Portin, B. S., Knapp, M.S., Dareff, S., Feldman, S., Samuelson, C., Ling Yeh, T. (2009), *Leadership for Learning Improvement in Urban Schools*, The Wallace Foundation: Center for the Study of Teaching and Policy, University of Washington

- Pounder, D., Ogawa, R., & Adams, E. (1995). Leadership as an organization-wide phenomena: Its impact on school performance. *Educational Administration Quarterly*, 31(4), 564-588.
- Puccio, G.J., Murdock, M.C. & Mance, M. (2011) *Creative Leadership: Skills That Drive Change* (2<sup>nd</sup> ed.) UK: Sage Publications.
- Rabindarang, S., Khuan, W.B. & Khoo, Y.Y. (2015). The influence of distributed leadership on job stress in technical and vocational education. *International Journal of Academic Research in Business and Social Sciences*, 4 (1), 490-499.
- Raelin, J.A. (2018) What are you afraid of: Collective Leadership and its learning implications. *Sage Journals*, 49(1), 59-66.
- Rahimah, H.A. & Ghavifekr, S. (2014). School leadership for the 21<sup>st</sup> century: A conceptual overview. *Malaysian Online Journal of Educational Management*, Vol.2: 1.
- Roels, J. (2014, May 3) The Fourth Paradigm in Leadership Part II [Blog post]. Retrieved from http://www.creativeinterchange.be/?m=201405
- Rohaty Mohd Majzub & Muhammed Yusuf (2011). Investigating relationship between self-efficacy, achievement motivation, and learning strategies of UKM undergraduate students. Advanced Educational Technologies.
- Rosnarizah, A.H. (2009). *Kajian Eksplorasi Distributed Leadership di Malaysia*. Seminar Nasional Pengurusan dan Kepimpinan Pendidikan ke-16, Institut Aminuddin Baki
- Rosnarizah, A. H. & Hussein, H. A. (2015) Distributed leadership, contextual factor and teachers' self-efficacy in Malaysia. *Malaysian Online Journal of Educational Management*, 3 (3), 1-12.
- Rosnarizah, A. H. & Zulkifli, A.M. (2009). *The Prevalence of Distributed Leadership in Selected Secondary Schools in Malaysia*. Paper presented at the 16<sup>th</sup> National Seminar on Management and Leadership in Education, Aminuddin Baki Institute (IAB).
- Ross, J.A. & Gray, P. (2006). School leadership and student achievement: The mediating effects of teacher beliefs. *Canadian Journal of Education* 29, 3, 798-822.
- Rowan, B. (1990). Commitment and Control: Alternative Strategies for The Organizational Design of Schools. In C. Cazden (Ed.), *Review of Research in Education* (Vol. 16, pp. 353–389). Washington, DC: American Educational Research Association.
- Rowan, B. (1995). Learning, teaching and educational administration: Toward a research agenda. *Educational Administration Quarterly*, 31(3), 344-354.

- Salkind, N.J. (1997). *Exploring Research* (3<sup>rd</sup> ed). Upper Saddle River, NJ: Prentice Hall.
- Salkind, N.J. (2005). Exploring Research (6th ed). Upper Saddle River, NJ: Prentice Hall
- Sani Cln, L.I. (2013). Data collection techniques a guide for researchers in humanities and education. International Research Journal of Computer Science and Information Systems (IRJCSIS), 2(3), 40-44.
- Saw, H.C. (2007). Relationship Between Sources and Teachers' Sense of Efficacy Among Novice Teachers in Selangor, Malaysia. Thesis submitted for the Degree of Master of Science. University Putra Malaysia.
- Schein, E. (1992). *Organizational Culture and Leadership* (2nd ed.). San Francisco: Jossey- Bass.
- Schneider, F. (1994). The shadow economies of Western Europe. *Economic Affairs*, 17: 42–48.
- Seashore-Louis, K., Leithwood, K., Wahlstrom, K.L. & Anderson, S.E. (2010). *Investigating the Links to Improved Student Learning Final report of research Findings*. The Wallace Foundation: University of Minnesota.
- Seers, A., Keller, T. & Wilkinson, J.M. (2003). Can Team Members Share Leadership Foundations. In research and theory in Pearce, C.L. & Conger, J.A. (eds) Shared Leadership: Reframing the hows and whys of leadership. Thousand Oaks, CA: Sage Publications.
- Sergiovanni, T. J. (1999). Organisations or communities? Changing the metaphor changes the theory. *Educational Administration Quarterly*, 30(2), 214-226.
- Sergiovanni, T. J. (2000). The Lifeworld of Leadership. San Francisco: Jossey-Bass.
- Shaughnessy, M.F. (2004). An interview with Anita Woolfolk: The educational psychology of teacher efficacy. *Educational Psychology Review*, 16 (2), 153-176.
- Singleton, J.R.A., Straits, B.C. & Straits, M.M. (1993). *Approaches to Social Research* (2<sup>nd</sup> ed). NY: Oxford University Press.
- Slavin, R.E. (1992). *Research Methods in Education* (2<sup>nd</sup> ed). Boston: Allyn and Bacon.
- Sofi, S.N.S. & Sharif, A.M.S. (2014). Transformational leadership of vocational college directors and self-efficacy of vocational college lecturers. *Journal of Science, Mathematics and Technology*, 1(2), 30-40.
- Spillane, J.P. (2006). Distributed Leadership. San Fransisco, CA: Jossey Bass.

- Spiro, J. (2017) *Leading Change Handbook: Concepts and Tools*, The Wallace Foundation: Center for the Study of Teaching and Policy, University of Washington
- Stajkovic, A. & Luthans, F. (1979). Social Cognitive Theory & Self Efficacy: Implications for Motivation Theory and Practice. In R.M. Steers, L.W. Porter, & G.A., Bigley (Eds.), *Motivation and Work Behavior* (7th ed.). Boston: McGraw-Hill.
- Stoll, L., Bolam, R., McMahon, A., Wallace, M., Greenwood, A. and Thomas, S. (2006). "What is a professional learning community? A summary", *Creating and Sustaining Effective Professional Learning Communities*, University of Bristol.
- Suárez, E., et al. (2017). Quantitative research on the EFQM excellence model: A systematic literature review (1991–2015). European Research on Management and Business Economics, 23(3), 147-156.
- Sullivan, J. L. (2010). The Influence of School Culture, School Goals, and Teacher Collaboration on Teachers' Attitudes toward Their Professional Development Plan. (Unpublished doctoral dissertation). George Mason University.
- Sundram, V.P.K., Govindaraju, V.G.R.C., Bahrin, A.S., Krishnasamy, T., Mohd, R., Sayuti, N.M. & Othman A.A. (2016). *Research Methodology: Tools, Methods and Techniques*. Selangor: MLSCA.
- Tannenbaum, R (1961). Leadership and Organization: A Behavioural Science Approach. New York: McGraw-Hill.
- Tannenbaum, R. & Schmidt, W. (1973). How to choose a leadership pattern. *Harvard Business Review*, 51 (3), 162-180.
- Tschannen-Moran, M., Woolfolk Hoy, A., & Hoy, W. K. (1998). Teacher efficacy: Its meaning and measure. *Review of Educational Research*, 68, 202-248.
- Tschannen-Moran, M. & Woolfolk Hoy, A. (2001). Teacher efficacy: Capturing an elusive construct. *Teaching and Teacher Education*, 17 (7), 783-805.
- Tuckman, B.W. (1999). *Conducting Educational Research* (5<sup>th</sup> ed). San Diego: Harcourt Brace Jovanovich Inc.
- Turan, S., & Bektas, F. (2013). The relationship between school culture and leadership practices. *Eurasian Journal of Educational Research*, 52, 155-168.
- Usher, E. L. (2006). Teaching self-efficacy, sources of teaching self-efficacy, teacher satisfication, teacher stress, collective teacher efficacy, optimism, teacher authenticity, and invitations. Unpublished raw data.

- Valentine, J (2006). A collaborative culture for school improvement: significance, definition and measurement in *Research Summary of School Culture*, *Collaborative Culture: The Building Block of School Improvement*. Middle Level Leadership Center
- Van Houtte, M. (2005). Climate or culture: A plea for conceptual clarity in school effectiveness research. *School Effectiveness and School Improvement*, 16, 71-89.
- Versland, T.M. (2016). Exploring self-efficacy in education leadership programs: What makes a difference? *Journal of Research on Leadership Education*, 11 (3), 298-320.
- Visser, P. S., Krosnick, J. A., Lavrakas, P. J., Reis, Harry T., Judd, Charles M. (2000). Handbook of Research Methods in Social and Personality Psychology. NY: Cambridge University Press.
- Walumbwa, F.O., Wang, P., Lawler, J.J., & Shi, K. (2004). The role of collective efficacy in the relations between transformational leadership and work outcomes. *Journal of Occupational and Organizational Psychology*, 77, 515-530.
- Wan Mohamed, W.H. S. & Yunus, N. (2014). *Application of Albert Bandura's Theory in Optimizing Academia for Secondary School Students*. Paper presented at the International Seminar for Global Education II, UKM.
- Wasserberg, M. (2000). Creating the Vision and Making It Happen. In Tomlinson, H., Gunter, H. and Smith, P. (Eds.), *Living Headship: Voices, Values and Vision*. London, Paul Chapman.
- Wepner, S. B. (2011). Defining Collaborative Leadership. In S. B. Wepner & D. Hopkins (Ed.), *Collaborative Leadership in Action: Partnering for Success in Schools*. New York: Teachers College Press.
- Wepner, S. B., & Hopkins, D. (2011). *Collaborative leadership in action: Partnering for successes in schools*. New York, NY: Teachers College Press.
- Williams, K. M. (2015). *Dynamics of Efficacy for Teachers in Formal Leadership Roles*. (Doctoral dissertation). East Tennessee State University.
- Williams, L.K., Hoffman, L.R. & Mann, F.C. (1959). An Investigation of the Control Graphy: Influence in a Staff Organization. Survey Research Center: University of Michigan.
- Woolfolk Hoy, A., & Davis, H. A. (2006). Teacher Self-efficacy and Its Influence on the Achievement of Adolescents. In F. Pajares & T. Urdan (Eds.), *Self-efficacy Beliefs of Adolescents* (pp. 117-137). Greenwich, CT: Information Age Publishing.

- Wu, J.H., Wayne K.H. & Tarter C.J. (2013). Enabling school culture, collective responsibility and a culture of academic optimism: toward a robust model of school performance in Taiwan. *Journal of Educational Administration*, 51 (2), 176-193.
- Yaakob Daud Yahya Don (2012). School cultures, transformational leadership and students' academic achievement. *Budaya Sekolah Kepimpinan Transformasional*, 111-139, Universiti Utara Malaysia.
- Yamane, T. (1967). *Elementary Sampling Theory*. New Jersey: Prentice-Hall, Inc.
- Yammarino F.J., Salas, E., Serban, A., Shirreffs, K & Shuffler, M.L. (2012). Collectivistic leadership approaches: Putting the 'we' in leadership science and practice. *Industrial and Organizational Psychology* (5), 382-402.
- Yukl, G. (2009). Leadership in organisations. Upper Saddle River, NJ:Prentice-Hall.
- Yusof, M.H.M. & Alias, M.K. (2015). The relationship between instructional leadership & self efficacy in environmental education among Malaysian secondary school teachers. *International Academic Journal of Social Science*, 1(1), 41-50.
- Zaccaro, S., Kemp, C., & Bader, P. (2004). Leader Traits and Attributes. In J, Antonakis, A, Cianciolo, & R Sternberg (Eds.), *The Nature of Leadership*. Thousand Oaks, CA: Sage Publications.
- Zhu, C, Devas, G, & Tandeur, J. (2014). Examining school culture in Flemish and Chinese primary schools. *Educational Management Administration* & *Leadership*, 42 (4), 557-575.

#### **BIODATA OF STUDENT**

Shiveh Sivalingam was born on 28 September 1977 in Taiping, Perak. She is the eldest of two siblings. Her academia journey started at Tadika All Saints, Kamunting after which she began her primary schooling in SRK Convent Kota, Taiping. Her secondary journey was at SMK Convent, Taiping, subsequently doing pre-university for a short time before receiving a scholarship to pursue a Bachelor's of Education degree in Dunedin, New Zealand with the University of Otago.

Upon graduation, her first posting was to SMK Puterijaya, Kuala Lumpur where she served for 9 years before being posted, on a pre-university academic teacher upgrade to SMK Cochrane, Kuala Lumpur. She served at Cochrane until the point of receiving her second scholarship to pursue postgraduate studies in the field of leadership and educational administration at University Putra Malaysia. She currently teaches at Victoria Institution's Pre University Centre in Kuala Lumpur.

During her career, she held many important positions, spanning from Assistant Head of the Disciplinary board to Advisor for the Pre University Council where there were many feats achieved. She was also examiner for the SPM, STPM and MUET examinations and examiner and chief examiner for the MUET Speaking assessment for many years. In addition, she was a facilitator for MUET under *Jabatan Pelajaran Negeri Wilayah Persekutuan* for some years. Her contribution was not only to MUET but also to English language and English for Science and Technology, during her tenure as a teacher. In recognition for her services, she was conferred the Excellent Service Award (*Anugerah Perkhidmatan Cemerlang*) in 2005 and 2013.

At University Putra Malaysia, she was actively involved in on-campus activities and participated in the 4<sup>th</sup> International Conference on Educational Research and Practice 2017 (ICERP 2017), presenting a paper on leadership. She then presented her second paper at the 3<sup>rd</sup> International Conference on Social Sciences, Humanities and Technology (ICSHT 2019) at Penang, Malaysia.

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### LIST OF PUBLICATIONS

# Journal

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