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Running head: SCHOOL LEADERS AND TEACHER EMPOWERMENT

**Teachers' Perceptions of School Leaders' Empowering Behaviours and Psychological  
Empowerment: Evidence from a Singapore Sample**

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**Abstract**

Using a convenience sample of 289 teachers in Singapore, this study examined (1) whether there were significant differences between teachers' perceptions of principal's and immediate supervisor's empowering behaviours, and (2) teachers' perceptions of principal's and immediate supervisor's empowering behaviours in relation with teachers' psychological empowerment. Results indicated that teachers perceived their principals and immediate supervisors exercising empowering behaviours in their daily practices, but they also perceived their principal and immediate supervisor differing in magnitude in some specific dimensions of empowering behaviours such as delegation of authority, providing individualised concern and support, articulating a vision, and fostering collaborative relationships. Results also indicated that teachers' perceptions of principal's and immediate supervisor's empowering behaviours were positively associated with teachers' psychological empowerment, and that they added unique variance to each other in predicting teachers' psychological empowerment. This study suggests the importance of considering teachers' perceptions of principal's and immediate supervisor's empowering behaviours as two distinct constructs in empirical research so that their unique predictive power could be more aptly captured. From a practical standpoint, it suggests the importance for school leadership developers to enhance school leaders' awareness and capacity in exercising empowering behaviours towards their teachers in their daily practice. Essentially, schools may stand to gain from developing empowering leaders at different levels of management to promote teachers' psychological empowerment.

**Keywords:** school leader empowering behaviours, psychological empowerment, teacher empowerment, school leadership, Singapore context

## Introduction

The growing interest in adopting teacher empowerment as a school management strategy has prompted scholars and practitioners to look more closely into how school leaders may empower teachers more effectively (e.g., Blase & Blase, 1996, 1997; Giba, 1998; Lee & Nie, 2013; Muijs & Harris, 2003; Short, 1994; Short & Greer, 1997; Vecchio, Justin & Pearce, 2010; Wan, 2005; Yu, Leithwood & Jantzi, 2002). Generally, empowering school leaders are observed to be more capable in creating work conditions which could enhance teachers' psychological empowerment which in turn could result in teachers being more intrinsically motivated and professionally committed to their work roles (Bogler & Somech, 2004; Davis & Wilson, 2000; Marks & Louis, 1997; Sagnak, 2012; Simkins, 2005; Sweetland & Hoy, 2000; Vecchio et al., 2010; Wohlstetter, 1995). Despite the call for developing school leaders' capacity in exercising empowering leadership practices to facilitate teacher empowerment, it is, however, observed that previous research has tended to focus predominantly on the empowering behaviours of the principal at the top-level management to the extent that the empowering behaviours of teachers' immediate supervisor (i.e. head-of-department) at the middle-level management have often been neglected (Blase & Blase, 1997; Davis & Wilson, 2000; Lee & Nie, 2013; Short & Rinehart, 1992). As a result, it is unsure whether there would exist differences in teachers' perceptions towards their principal's and immediate supervisor's empowering behaviours and how they may in turn affect teachers' psychological empowerment at work.

Therefore, the present study aimed to (1) differentiate between teachers' perceptions of principal's and immediate supervisor's empowering behaviours by examining whether significant differences might exist between teachers' perceptions of

principal's and immediate supervisor's empowering behaviours, and (2) examine the relationship between teachers' perceptions of principal's and immediate supervisor's empowering behaviours and teachers' psychological empowerment. This study could contribute to a better understanding of how school leaders may empower teachers by using their specific empowering leadership behaviours to influence teachers' psychological empowerment.

### **School Leader Empowering Behaviours**

School leadership is widely recognised as an important research area in the field of educational management and administration (e.g., Darling-Hammond, 2003; Dimmock & Tan, 2013; Fullan, 2006; Gronn, 1996; Hallinger & Heck, 1998, 2002; Leithwood & Jantzi, 2000). Although existing school leadership research has identified a number of effective school leadership styles such as transformational leadership, instructional leadership, authentic leadership, servant leadership and distributed leadership (e.g., Dimmock, 2011; Gronn, 1996; Hallinger & Heck, 2002; Jantzi & Leithwood, 1996; Ng & Ho, 2012; Owusu-Bempah, Addison & Fairweather, 2014; Shatzer, Caldarella, Hallam & Brown, 2014; Yu et al., 2002), most of the empirical studies did not explicitly clarify which are the 'empowering' elements in these different styles or practices of school leadership. As a result, it is unclear which specific behaviours of school leaders are perceived as 'empowering' by the teachers, especially in inducing a sense of empowerment (or psychological empowerment) among the teachers to motivate them to perform their best at work.

On the other hand, from a review of empowerment research in educational organisations, it is found that empowering school leaders are generally more capable in fostering work conditions which could enhance teachers' psychological empowerment and their subsequent work outcomes (Blase & Blase, 1997; Davis & Wilson, 2000; Lee & Nie, 2013; Rinehart, Short, Short & Eckley, 1998). However, given that most of the existing empirical studies have often used a composite scale of empowering leadership (Davis & Wilson, 2000; Vecchio et al., 2010), our understanding of the relationships between specific dimensions of school leaders' empowering behaviours and teachers' psychological empowerment tends to be limited. Nevertheless, among the limited studies of empowering school leadership, Blase and Blase (1997) identified eight dimensions of principals' behaviours and characteristics by which they empirically linked with teachers' sense of empowerment in schools in the United States. The eight dimensions identified were: (1) demonstrating trust in teachers, (2) developing shared governance structures, (3) encouraging/listening to individual input, (4) encouraging individual teacher autonomy, (5) encouraging innovation, creativity, risk-taking, (6) giving rewards, (7) providing support, and (8) demonstrating care, enthusiasm, optimism, honesty and friendliness (principal's personal characteristics).

More recently, Lee and Nie (2013) identified seven dimensions of school leaders' empowering behaviours in their development and validation of the School Leader Empowering Behaviours (SLEB) scale based on an extensive review of empirical studies across diverse work settings. The seven dimensions of the SLEB scale<sup>1</sup> include: (1) delegation of authority; (2) providing intellectual stimulation; (3) giving acknowledgment

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<sup>1</sup> Appendix 1 presents the definitions of the seven dimensions of the SLEB scale.

and recognition; (4) articulating a vision; (5) fostering collaborative relationships; (6) providing individualised concern and support; and (7) providing role-modelling. In their validation of the predictive power of the SLEB dimensions in relation to Spreitzer's (1995) four-factor psychological empowerment scale using a sample of Singapore teachers, Lee and Nie (2013) demonstrated that teachers' perceptions of principal's and immediate supervisor's empowering behaviours in terms of these seven dimensions were positively correlated with each of the four dimensions of teachers' psychological empowerment (i.e. meaning, competence, autonomy, impact).

In the present study, we adopted Lee and Nie's (2013) SLEB scale to assess Singapore teachers' perceptions of their school leaders' empowering behaviours because the SLEB scale has been validated in the Singapore education context as a common measure for assessing teachers' perceptions of principal's and immediate supervisor's empowering behaviours. We therefore defined school leaders' empowering behaviours as a set of behaviours exercised by school leaders aiming at enhancing teachers' psychological empowerment in the empowerment process.

### **Teachers' Perceptions of Principal's and Immediate Supervisor's Empowering Behaviours**

Leadership in organisations is fundamentally an influencing process which depends on how leaders interact with their subordinates (Bass, Waldman, Avolio & Bebb, 1987; Bush, 2008; Kark, Shamir & Chen, 2003; Shamir, House & Arthur, 1993; Yukl, 2002). Thus, a number of leadership scholars have opined that leadership can be considered as a process of 'being perceived as a leader' (e.g., Hall & Lord, 1995; Jantzi & Leithwood,

1996; Leithwood & Jantzi, 1997), which is largely a cognitive process such that the effectiveness of a leader's behaviours may be contingent upon how the subordinates perceive and interpret the authenticity of the leader's behaviours (Hall & Lord, 1995; Leithwood & Jantzi, 1997; Randolph & Kemery, 2011; Zhu, May & Avolio, 2004). As such, in teacher empowerment research, this also highlights the importance of understanding not only how school leaders may empower teachers but that a more accurate assessment of the effectiveness of collective school leadership would likely depend on how teachers may perceive and interpret their school leaders' behaviours at different levels of management (Lee & Nie, 2013, 2014).

Especially, most school organisations are traditionally hierarchical in structure and management (Busher & Harris, 1999; Tschannen-Moran, 2009). As noted by a number of organisational scholars, differences in status, rank, authority, social standing and power in hierarchical organisations can often translate into physical, social and psychological distances which may affect the degree of social intimacy and social contact that develops between individuals and their respective leaders at different levels of management (e.g., Antonakis & Atwater, 2002; Chun, Yammarino, Dionne, Sosik & Moon, 2009; Shamir, 1995). Given that school leadership is seldom a single-leader phenomenon, such that the principal being the head of school at the top-level management is often assisted by the various heads-of-department at the middle-level management who usually serve as individual teachers' immediate supervisors (Heng & Marsh, 2009; Ng & Ho, 2012), Brown, Rutherford and Boyle (2000) also noted that the middle-level leaders, being teachers' immediate supervisors, are usually the ones closer to the teachers at the classroom frontline and they also tend to work more closely with the teachers on a daily basis in solving

problems arising from classroom instruction and student management. As a result, in the context of teacher empowerment, the middle-level school leaders may more often have more opportunities in exercising their empowering behaviours towards the group of teachers they supervise and mentor as compared to the principal (Brown et al., 2000; Lee & Nie, 2013; Ng & Ho, 2012).

In recent years, many scholars have observed that the traditional managerial roles of the middle-level school leaders have evolved and changed from mainly the technical and tactical functions (e.g., planning of teachers' timetables and duties, introducing new curriculum) to leading roles which require increased leadership competence in shared vision building, relationship building and change management (e.g., Brown et al., 2000; Bush, 2008; Heng & Marsh, 2009; Koh, Gurr, Drysdale & Ang, 2011). For instance, in a study conducted by Ho and Chen (2009), they reported that principals in the Singapore schools indicated they often worked closely with their middle-level leaders (i.e. heads-of-department), such as in leading the teachers in the implementation of the use of ICT for teaching and learning. More importantly, their study also reported that leadership performance of the principals was significantly and positively correlated to the leadership performance of their heads-of-department, which suggests the close relationship and possible alignment between school leaders at different of management in ensuring the effectiveness of collective school leadership. Moreover, with an increasing interest on how leadership can be shared or distributed within the schools to provide for a more sustainable means for building the type of school climate that could create high-performing schools, the crucial roles played by the school leaders at different levels of management in the teacher empowerment process thus deserve to be given more attention in both research

and practice (Hallinger & Heck, 1998; Ho & Chen, 2009; Lee & Nie, 2013; Ng & Ho, 2012). Furthermore, with the increased importance of the middle-level leaders in collective school leadership and management, especially in bridging the link between the principal at the top hierarchical level and teachers at the lower hierarchical levels (Chen, Ho & Ng, 2013; Ng & Ho, 2012; Retna & Ng, 2006), there is an imperative need to to examine teachers' perceptions towards their principal's and immediate supervisor's behaviours in the teacher empowerment process to determine if there might exist differences between teachers' perceptions of their principal and their immediate supervisors (Chen et al., 2013; Heng & Marsh, 2009; Lee & Nie, 2013). A better understanding of how teachers may perceive the empowering behaviours of their school leaders at different levels of management can provide more insights for better alignment of empowering leadership practices across levels of management for promoting teacher empowerment more effectively as a school practice (Lee & Nie, 2013).

Given the fact that the middle-level leaders often have to work closely with their principal in empowering the teachers in the school workplace (Chen, et al., 2013; Ng & Ho, 2012), it is likely that teachers' immediate supervisors could be influenced by the empowering leadership behaviours of the principal to a large extent. Particularly in schools with a strong organisational culture, the principal might likely expect the middle-level leaders to model their leadership behaviours towards the teachers (Yang, Zhang & Tsui, 2010). Or, very often, the middle-level leaders may view it as a 'norm' to model their principal's leadership behaviours (Mayer, Kuenzi, Greenbaum, Bardes & Salvador, 2009). As posited by the social learning theory, most human behaviours are learned through observation and modeling (Bandura, 1977, 1986, 1999). Thus, in the present study, we

postulated that teachers' perceptions of their principal's and immediate supervisor's empowering behaviours in terms of their respective composite scores of SLEB would not differ significantly. We also postulated that there would be no significant difference between teachers' perceptions of principal's and immediate supervisor's empowering behaviours in terms of the factor/dimension 'providing role-modelling'. This is because teachers' perceptions of their principal's as well immediate supervisor's authenticity in leading by example and 'walking the talk' in the teacher empowerment process are critically important to influence how teachers may assess the effectiveness of their school leaders' empowering behaviours.

**Hypothesis 1:** *Teachers' perceptions of principal's and immediate supervisor's empowering behaviours would not differ significantly in terms of the composite score and the dimension 'providing role-modelling' of the SLEB scale.*

On the other hand, we speculated that both the principal and immediate supervisor might display empowering behaviours towards their teachers and so they might likely differ in terms of magnitude in certain dimensions of the SLEB scale due to their differential leadership role functions at different levels of management. For instance, teachers might perceive their principals to significantly engage more in articulating a vision and providing collaborative relationships than their immediate supervisor. This is might largely due to the fact that, typically in most schools, the principal does not usually involve himself or herself directly in teachers' day-to-day classroom processes. Instead, the principal is usually seen as a 'big-picture focused' leader whose roles frequently include providing a clear vision, setting clear directions and communicating organisational policies and decisions to the teachers at staff meetings and to motivate teachers across

various departments to move in the same direction and work together towards achieving school goals (Darling-Hammond & McLaughlin, 1995; Hallinger & Heck, 2002; Yu et al., 2002). Hence, the principal might also be perceived by teachers to engage more in creating structures and providing resources for teachers to collaborate with one another through team-building activities during large-group gatherings or school annual retreats.

In contrast, the middle-level leaders as heads-of-department might more often be seen to take lead in departmental functions with a smaller group of teachers in their respective departments. In this aspect, teachers' immediate supervisors may be more able to delegate work and duties which suit the needs of individual teachers working with them and also to providing teachers with individualised concern and support as well as with opportunities for professional development and more personalised coaching. Being closer to the teachers in their daily work practice, teachers' immediate supervisor may also have more opportunities to stimulate teachers' innovative thinking and encourage them to initiate classroom-based innovations. Moreover, when teachers contribute quality work or have made any accomplishments to contribute to school goals, teachers' immediate supervisors may be more likely to know what work has been contributed by the teachers and to give more timely recognition and acknowledgement to the teachers.

**Hypothesis 2:** *Teachers' perceptions of principal's and immediate supervisor's empowering behaviours would differ significantly in six out of seven dimensions of the SLEB. Teachers would perceive their principal to significantly engage more than their immediate supervisor in 'articulating a vision' and 'providing collaborative relationships' but they would perceive their immediate supervisor to significantly engage more than their*

*principal in 'delegation of authority', 'providing intellectual stimulation', 'providing individualised concern and support', and 'providing acknowledgement and recognition'.*

### **Teachers' Psychological Empowerment**

Teachers of the 21<sup>st</sup> century are knowledge workers and autonomous teaching professionals (Bogler & Somech, 2004; Tschannen-Moran, 2009; Wan, 2005). In fact, a basic assumption of teacher empowerment is that teachers' judgments and actions are partly self-determined and they can effect change in themselves and their situations through their own efforts (Bandura, 1999; 2001; Conger & Kanungo, 1988; Gagne & Deci, 2005; Spreitzer, 1995, 1996). As such, teachers' psychological empowerment is often defined as an individual teacher's psychological state which manifests itself as four cognitions: *meaning*, *competence*, *autonomy*, and *impact* (Spreitzer, 1995, 1996). In essence, psychological empowerment is closely associated with an individual's intrinsic work motivation, and the four cognitions of psychological empowerment reflect an active orientation towards one's work role (Spreitzer, 1995, 1996; Thomas & Velthouse, 1990).

To elaborate further on the dimensions of psychological empowerment, '*meaning*' refers to a fit between the needs of one's work role and one's beliefs, values and behaviours (Hackman & Oldham, 1980); '*competence*' refers to self-efficacy specific to one's work, or a belief in one's capability to perform work activities with skill (Bandura, 1977; Gist, 1987); '*autonomy*' refers to a sense of choice in initiating and regulating one's actions (Deci, Connell & Ryan, 1989); and '*impact*' refers to the degree to which one can influence strategic, administrative, or operating outcomes at work (Ashforth, 1989).

In the context of teacher empowerment, this also suggests that in order to determine the effectiveness of the school leaders' influence, there is a need to take into account the motivational influence of the school leaders' empowering behaviours on teachers' psychological empowerment (Blase & Blase, 1997; Conger & Kanungo, 1988; Lee & Nie, 2013). However, it is observed that teacher empowerment studies have tended to examine school leaders' empowering behaviours and teachers' psychological empowerment in separate studies (Ghani et al., 2009; Sagnak, 2012; Vecchio et al., 2010) which thus failed to capture the motivational influence of school leaders' empowering behaviours on teachers' psychological empowerment. Though limited, Davis and Wilson (2000) reported that perceived principal empowering behaviours predicted teachers' overall work motivation in the form of psychological empowerment. Specifically, their results indicated that the perceived principal empowering behaviours predicted teachers' sense of autonomy and impact but not meaningfulness and competence (Davis & Wilson, 2000). In other another study, Moye, Henkin and Egley (2005) reported that teachers who found their work personally meaningful and who reported significant autonomy and substantial influence in their work environments had higher levels of interpersonal trust in their principals. Dee et al.'s (2003) study examined the relationships between four types of team participation by teachers, in terms of team teaching, community-relations teamwork, administrative/governance teamwork and curriculum development teamwork, and the four dimensions of Spreitzer's (1995) psychological empowerment.

In the present study, we therefore speculated that teachers' psychological empowerment would likely be affected by their day-to-day interactions with their principal's and immediate supervisor's empowering behaviours.

**Hypothesis 3:** *Teachers' perceptions of principal's and immediate supervisor's empowering behaviours, in terms of the seven factors and composite score of the SLEB scale, would correlate positively with teachers' psychological empowerment.*

**Hypothesis 4:** *Teachers' perceptions of principal's and immediate supervisor's empowering behaviours, in terms of their respective composite scores of the SLEB scale, would add additional unique influence to each other in predicting teachers' psychological empowerment.*

## Method

### Sample

A convenience sample of 289 teachers from the Singapore schools voluntarily participated in this study<sup>2</sup>. Table 1 presents the demographic data of the sample.

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Insert Table 1 here.

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### Measures

**School Leader Empowering Behaviours (SLEB).** The seven-factor SLEB scale developed by Lee and Nie (2013) was adopted for use to measure teachers' perceptions of the empowering behaviours of their principal and immediate supervisor respectively. All the 21 items of the seven-factor scale were used in the present study as no item was deleted

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<sup>2</sup> The 289 teachers were full-time and fully trained teachers from at least 76 schools in Singapore.

or revised due to its sound psychometric properties<sup>3</sup>. Appendix 1 presents the items of the seven factors of SLEB.

**Psychological Empowerment.** The 12-item psychological empowerment scale developed by Spreitzer (1995) was used. The mean was 5.12, standard deviation was .77, and Cronbach alpha coefficient was .73.

### **Data Collection**

A cover letter was attached to each questionnaire to explain the objectives of the study and assured anonymity and confidentiality of participation. Informed consent was obtained from each participant. To standardise all the instrument used in the full questionnaire, a 7-point Likert scale was adopted (1= Strongly Disagree to 7= Strongly Agree). Participants were asked to provide their demographic data and separately rate their respective school principal and their immediate supervisor by responding to the same set of SLEB items in the questionnaire. Participants also responded to items which measured teachers' psychological empowerment. The completed questionnaires were collected in sealed envelopes from the participants within three weeks of survey administration.

## **Analyses and Results**

### **Exploratory and Confirmatory Factor Analyses of the SLEB Scale**

Exploratory and confirmatory factor analyses were conducted on the SLEB scale. Table 2 presents the exploratory factor analyses of the principal's and immediate supervisor's SLEB scale. The seven factors of the principal's SLEB accounted for 88.0%

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<sup>3</sup> Please refer to the section 'Results and Analyses' for Table 2 which presents the factor loadings of exploratory factor analyses and Table 3 which presents the fit indices of principal's and immediate supervisor's SLEB scale resulting from the confirmatory factor analyses. Table 4 presents the Cronbach alpha coefficients of each of the seven factors of SLEB scale.

of the total variance. The seven factors of the immediate supervisor's SLEB accounted for 88.2% of the total variance.

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Insert Table 2 here.

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Based on the confirmatory factor analyses, Table 3 presents the fit indices of the first-order seven-factor structure as well as a second-order one-factor structure of the principal's and immediate supervisor's SLEB scales respectively. Our results indicated that there existed a first-order seven-factor structure as well as a second-order one-factor structure.

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Insert Table 3 here.

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### **Means, Standard Deviations, Cronbach Alpha Coefficients and Interfactor**

#### **Correlations**

Table 4 presents the means, standard deviations, Cronbach alpha coefficients of each of the seven factors and composite scores of principal's and immediate supervisor's SLEB. The mean score of each factor was calculated by taking the mean of the number of items which constituted each factor. Given that in Table 3, the results of the confirmatory factor analyses indicated that the first-order seven-factor SLEB structure could be collapsed into a second-order one-factor structure, a composite score was created for each

of the principal's and immediate supervisor's SLEB scale in this study. The composite scores for the principal's and immediate supervisor's SLEB were each scored by calculating the mean of the seven factors of the principal's and immediate supervisor's SLEB respectively.

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Insert Table 4 here.

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Table 5 presents the inter-factor correlations of teachers' perceptions of principal's and immediate supervisor's empowering behaviours in terms of the seven factors and composite scores of the SLEB scale.

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Insert Table 5 here.

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### **Paired Samples T-Tests**

To test Hypotheses 1 and 2, a series of paired samples t-tests was conducted between the seven factors and composite scores of teachers' perceptions of principal's and immediate supervisor's empowering behaviours. The results of the paired samples t-tests and their effect sizes (Cohen's *d*) are presented in Table 4.

Results indicated that there were no significant differences between the composite scores and three of the factors of the principal's and immediate supervisor's SLEB: '*giving acknowledgment and recognition*', '*providing intellectual stimulation*' and '*providing role-*

*modelling*'. However, results of paired samples t-tests indicated that there were significant differences between four of the seven factors of principal's and immediate supervisor's SLEB. These four factors were '*providing individualised concern and support*', '*delegation of authority*', '*articulating a vision*', and '*fostering collaborative relationships*'. Teachers generally perceived their principal to significantly engage more in '*articulating a vision*' and '*fostering collaborative relationships*' than their immediate supervisor. Teachers also perceived their immediate supervisor to significantly engage more in '*providing individualised concern and support*' and '*delegation of authority*' than their principals. As such, Hypothesis 1 was supported but Hypothesis 2 was not supported.

### **Bivariate Correlations Between Teachers' Perceptions of Principal's and Immediate Supervisor's Empowering Behaviours and Psychological Empowerment**

To test for Hypothesis 3, bivariate correlation analyses were conducted between teachers' perceptions of principal's and immediate supervisor's empowering behaviours and teachers' psychological empowerment. Table 6 presents the results of bivariate correlations which indicated that all the seven factors and composite scores of principal's and immediate supervisor's SLEB were positively correlated with teachers' psychological empowerment ( $p > .01$ ). As such, Hypothesis 3 was fully supported.

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Insert Table 6 here.

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### **Joint Relationship Between Teachers' Perceptions of Principal's and Immediate Supervisor's Empowering Behaviours in Predicting Psychological Empowerment**

To test for Hypothesis 4, hierarchical multiple regression analyses were conducted to examine whether teachers' perceptions of principal's and immediate supervisor's empowering behaviours added unique variance to each other in predicting teachers' psychological empowerment, after controlling for each other.

The first model was tested by first controlling for teachers' demographic factors (i.e. gender, age, race, educational qualification, school type, years of teaching experience, number of years of service in the current school, number of years working with the current principal and number of years working with the current immediate supervisor) in the first step. The composite score<sup>4</sup> of principal's SLEB was then entered into the regression in the second step and then followed by entering the composite score of immediate supervisor's SLEB in the third step. Similarly, the second model was tested by first controlling for teachers' demographic factors (i.e. gender, age, race, educational qualification, school type, years of teaching experience, number of years of service in the current school, number of years working with the current principal and number of years working with the current immediate supervisor) in the first step. The composite score of immediate supervisor's SLEB was entered into the regression in the second step and then followed by entering the composite score of principal's SLEB in the third step. Teachers' psychological empowerment was entered as the criterion variable in the regression in both models.

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<sup>4</sup> Given that leadership behaviours in practice are seldom neatly 'packaged' into distinct dimensions of behaviours (Costello & Osborne, 2009; Villa, Howell, Dorfman & Daniel, 2003), the use of a composite score rather than the individual factors of leaders' empowering behaviours could provide a fuller representation of the leaders' empowering behaviours as a whole.

Table 7 presents the results of the hierarchical multiple regression which indicated that teachers' perceptions of immediate supervisor's empowering behaviours added 2.7% of unique variance to teachers' perceptions of principal's empowering behaviours in predicting teachers' psychological empowerment, after controlling for each other. On the other hand, teachers' perceptions of principal's empowering behaviours added 12.4% of unique variance to teachers' perceptions of immediate supervisor's empowering behaviours in predicting teachers' psychological empowerment, after controlling for each other. Therefore, Hypothesis 4 was supported.

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Insert Table 7 here.

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### **Discussion**

In the present study, the results indicated that school leaders in the Singapore schools generally demonstrated empowering behaviours with mean scores ranging from 4.43 to 5.43 for teachers' perceptions of their principal's empowering behaviours and mean scores ranging from 4.86 to 5.27 teachers' perceptions of their immediate supervisor's empowering behaviours based on the seven factors and composite scores of the SLEB.

In addition, results indicated that there was no significant difference between teachers' perceptions of principal's and immediate supervisor's empowering behaviours in terms of the composite scores of the SLEB. The findings are supported by previous research (e.g., Chun et al., 2009; Yang et al., 2010) which contended that similar behavioural leadership patterns across levels of management can frequently be observed in

work organisations with a strong leadership or organisational culture. For instance, Yang et al. (2010) noted that top-level management may have certain expectations of their lower-level management, and this may cause the lower-level managers to emulate the upper-level's leadership behaviours as accepted behavioural norms. In terms of teacher empowerment, this could be beneficial for empowering leadership alignment or effective coordination of empowering leadership behaviours across levels of management because the influence of the principal at the top-level management could be exerted via the intermediate management or middle-level leaders to the teachers at the lower hierarchical levels (Bass et al., 1987; Mayer et al., 2009; Yang et al., 2010).

Results indicated that there were no significant differences between teachers' perceptions of their principal's and immediate supervisor's empowering behaviours in three of the factors of SLEB: '*providing intellectual stimulation*', '*giving acknowledgment and recognition*' and '*providing role-modelling*'. These findings corroborated with the findings of Lowe, Kroeck and Sivasubramaniam's (1996) study which reported that providing intellectual stimulation was associated with the effectiveness of higher-level as well as lower-level leaders. Similarly, providing appropriate role-modelling is likely an important behaviour of empowering school leaders as the present study also found no significance difference between teachers' perceptions of their principal and immediate supervisor in providing appropriate role-modelling. This also suggests that the role-modelling behaviour emanating from the principal may likely influence the middle-level school leaders towards adopting similar leadership behaviours in fostering an empowering work climate (Mayer et al., 2009; Oshagbemi & Gill, 2004; Yang et al., 2010). In the Singapore education context, given that a typical primary or secondary school organisation

consists of mainly two levels of management (i.e. the principal at the top level of management and the various heads-of-department as teachers' immediate supervisors at the lower level of management), probably due to more frequent communications and direct contacts between teachers and both levels of leaders in the Singapore schools, the results in our study indicated that there was no statistical difference between how teachers perceived their principal and immediate supervisor in providing acknowledgement and recognition as a form of contingent reward. This finding differs from Bass et al.'s (1987) as well as Oshagbemi and Gill's (2004) studies which found that providing contingent reward was more evident with leaders at the higher levels of management than with leaders at the lower levels of management conducted in large, hierarchical business organisations with multiple layers of management. Nevertheless, future research could further examine if the business nature of an organisation or organisational structure may play a part in the difference in observation between large business organisations and school organisations.

In the present study, the results of paired samples t-tests indicated a significant difference between four factors of the principal's and immediate supervisor's SLEB. The results indicated that teachers perceived their principal to significantly engage more in '*articulating a vision*' and '*fostering collaborative relationships*', whereas teachers perceived their immediate supervisor to significantly engage more in '*delegation of authority*' and '*providing individualised concern and support*'. It is not surprising that teachers perceived their principal to significantly engage more in '*articulating a vision*' than their immediate supervisor. This is likely because the principal, being the head of the school, may more often be seen at school-level gatherings or meetings to communicate school goals, foster teamwork structures, articulate a vision and set directions for the staff

to work collaboratively together to achieve school objectives. Furthermore, teachers also perceived their principal to significantly engage more in '*fostering collaborative relationships*' than their immediate supervisor. This might be due to the fact that the principal has more positional power within the school hierarchy which would then enable him or her to provide the infrastructure and resource support (i.e. in providing space and structured time, and allocating budget for professional collaborations within and outside the school as well as building IT networks for social interactions and knowledge sharing) more easily for the teachers to share knowledge and build collegial relationships.

On the other hand, our results indicated that teachers perceived their immediate supervisor to significantly engage more in '*providing individualised concern and support*' and '*delegation of authority*' than the principal. This could be due to the fact that, as teachers' immediate supervisor, the middle-level leaders may likely have more opportunities to work directly with teachers at the classroom level to facilitate the smooth delivery of daily instructional processes or in individual and team projects initiated by their departments,. As such, they may tend to know the individual teachers' character, strengths and weaknesses better than the principal. Thus, having a closer working relationship with the teachers they supervise, it thereby makes it easier for the middle-level leaders to develop mutual interpersonal relationship and trust with the teachers, which are critical elements for effective delegation and participative decision-making at the departmental level. The results therefore supported previous studies on organisational leadership which indicated that middle-level leaders, in contrast with top-level leaders, may tend to be also socially and psychologically close to their subordinates and are therefore more able to

show individualised concern and professional support for their subordinates when needed (Antonakis & Atwater, 2002; Shamir, 1995).

Taken together, the present study indicated that the sample of Singapore teachers generally perceived their respective principals and immediate supervisors to be empowering in their leadership behaviours. While teachers perceived their principal at the top-level management and immediate supervisor at the middle-level management may demonstrate similar empowering behavioural patterns in certain dimensions of the SLEB, they also perceived that they might differ in magnitude or the degree in which they displayed certain dimensions of the SLEB. So far, this study is one of the few which has systematically examined and compared the dimensions of school leader empowering behaviours to determine whether the principal and teachers' immediate supervisor may differ in their empowering behaviours as perceived by teachers, especially in an Asian educational context.

This study could also add value to the existing teacher empowerment research by offering more empirical insights for understanding the relationship between teachers' perceptions of school leaders' empowering behaviours and teachers' psychological empowerment. For instance, when teachers perceived their school leaders to demonstrate empowering behaviours, it could positively influence on teachers' psychological empowerment. Our results indicated that both the principal as well as the immediate supervisor of individual teachers could play differential yet instrumental roles to enhance teachers' psychological empowerment as a whole. It thus suggests the importance to develop empowering school leaders across levels of management for better leadership

alignment and coordination in the facilitation of teacher empowerment in the school workplace.

### **Limitations and Suggestions for Future Research**

First, the present study required the teacher participants to provide ratings to assess their school leaders' empowering behaviours and this could likely cause a certain level of sensitivity among the teachers and also may increase their response bias in favour of their school authority. Although a random sampling design may be considered by obtaining endorsement of school principals to administer the questionnaire at their school sites, a convenience sampling design was adopted for this study by having the researchers approaching the teachers personally through direct contacts with them at professional training courses and conferences to encourage their voluntary participation so as to reduce teachers' sensitivity and uneasiness in participating willingly in this study. Nevertheless, future studies could consider using a large sample of participants with random sampling design to provide a more reliable basis for the generalisability of findings (Scherbaum & Ferreter, 2009).

Second, this study opted for the use of an anonymous questionnaire to encourage teachers' voluntary participation as well as their genuine responses to the questionnaire so as to enhance the validity of the data collected. As it was optional for teacher participants to indicate their name and school name in the questionnaire, we were unable to know the exact number of schools based on this teacher sample to better understand the spread of teachers across schools.

Third, both the principal's and teachers' immediate supervisor's empowering behaviours were assessed using teachers' perceptual ratings at the individual level which also rendered it a single-source dataset. A more objective assessment of both the principal's and teachers' immediate supervisor's empowering behaviours could consider the use of group-level teachers' ratings or a combination of teachers' and school leaders' self ratings as multi-source data to provide more confidence in the robustness of the observed findings.

Fourth, teachers' perceptions of their principal's and immediate supervisor's empowering behaviours may change over time. As this study was cross-sectional in nature, future studies could adopt a longitudinal design by conducting the research at multiple time intervals so as to enhance the reliability of the results.

Fifth, perceptions of empowerment may vary across different cultural contexts (Fock, Hui, Au & Bond, 2013). As this study used only a sample of teachers in Singapore, the generalisability of the findings across cultural contexts may need to be interpreted with caution. Future studies could consider replicating this study in other cultural settings or conduct a cross-cultural comparison study to examine whether cultural differences may affect teachers' perceptions of their principal's and immediate supervisor's empowering behaviours in different educational contexts, and how it might further affect teachers' psychological empowerment.

### **Conclusion and Implications**

Despite its limitations, this study has noteworthy significance and implications for research and practice.

First, as previous empowering school leadership studies tend to use only a single, generic leadership construct without differentiating between teachers' perceptions of their principal's and immediate supervisor's empowering behaviours (Blase & Blase, 1997; Davis & Wilson, 2000; Vecchio et al., 2010), our study suggests that it may be more valuable to consider teachers' perceptions of principal's empowering behaviours as well as teachers' perceptions of immediate supervisor's empowering behaviours as separate constructs in future studies, so that it could take into account the unique predictive power of teachers' perceptions of principal's empowering behaviours as well as teachers' perceptions of immediate supervisor's empowering behaviours to give more meanings to research findings.

Second, this study highlighted that although teachers perceived both their principal and immediate supervisor to be empowering, they also perceived that their principal's and immediate supervisor's empowering behaviours differed in specific dimensions of the SLEB. From the comparison of the similarities and differences of the specific dimensions of principal's and immediate supervisor's empowering behaviours, it not only enables a better understanding of the empowering leadership practices across levels of management but also provides useful insights and feedback for school leadership developers for making changes in leadership development as well as for school leaders to change their leadership practices towards fostering a more cohesive, empowering work climate for effective facilitation of teacher empowerment in the school workplace.

Third, this study also provides more empirical understanding on the positive relationship between teachers' perceptions of principal's and immediate supervisor's empowering behaviours and teachers' psychological empowerment. Particularly, the

results of this study indicated that teachers' perceptions of principal's and immediate supervisor's empowering behaviours added unique variance to each other in predicting teachers' psychological empowerment. This study thus highlights the differential yet instrumental roles played by both the principal and middle-level leaders (as individual teachers' immediate supervisor) in the teacher empowerment process, and more importantly, it also suggests an imperative need for increasing the awareness and capacity of school leaders at different levels of management to exercise empowering behaviours to promote teachers' psychological empowerment. In essence, schools stand to gain from developing empowering leaders across levels of management to foster a cohesive, empowering work climate or culture for more effective empowerment of teachers (Lee & Nie, 2014; Zhu, Devos & Tondeur, 2014).

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**Table 1.** *Demographic Data of Teacher Participants (N=289)*

Item	Category	Percentage (%)
Gender	Female	75.4
	Male	24.6
Race	Chinese	68.4
	Malays	18.6
	Indians	9.8
	Eurasians and other minority races	3.2
Age	30 years or less	16.1
	Between 31 and 40 years	56.4
	Between 41 and 50 years	20.4
	51 years and above	7.1
Highest qualification attained	Master's degree and above	7.3
	Bachelor's degree	82.2
	Diploma	9.8
	Secondary School certificate	0.7
Type of school teaching in	Primary	62.3
	Secondary	37.7
Number of years in teaching (teaching experience)	3 years or less	16.9
	Between 4 and 10 years	44.2
	Between 11 and 20 years	29.7
	21 years or more	9.2
Number of years working in the current school	3 years or less	30.6
	Between 4 and 10 years	52.5
	Between 11 and 20 years	14.8
	21 years or more	2.1
Number of years which participant had worked with his/her current principal	1 year or less	15.5
	Between 1 and 3 years	55.9
	Between 4 and 10 years	27.9
	11 years or more	0.7
Number of years which participant had worked with his/her current immediate supervisor	1 year or less	23.8
	Between 1 and 3 years	48.6
	Between 4 and 10 years	25.4
	11 years or more	2.2

**Table 2.** Factor Loadings of Exploratory Factor Analysis (EFA) of Principal's and Immediate Supervisor's SLEB Scales (N=289)

Factor	Item	Factor Loadings	
		Principal's SLEB	Immediate Supervisor's SLEB
Delegation of Authority (3 items)	Gives me the authority to make changes necessary to improve things.	.960	.942
	Gives me the authority I need to make decisions that improve work processes and procedures.	.911	.936
	Delegates authority to me that is equal to the level of responsibility that I am assigned.	.855	.831
Providing Intellectual Stimulation (3 items)	Asks questions that prompt me to think.	.994	.922
	Stimulates me to rethink the way I do things.	.953	.924
	Challenges me to re-examine some of the basic assumptions about my work.	.901	.923
Giving Acknowledgment & Recognition (3 items)	Always gives me positive feedback when I perform well.	.809	.878
	Gives me special recognition when my work is very good.	.834	.911
	Personally compliments me when I do outstanding work.	1.034	.906
Articulating a Vision (3 items)	Paints an interesting picture of the future for our school.	1.050	.995
	Is always seeking new opportunities for the school.	.772	.917
	Inspires staff with his/her plans for the future.	.649	.539
Fostering Collaborative Relationships (3 items)	Fosters collaboration among staff members.	.918	.874
	Encourages staff members to be "team-players".	.973	.981
	Gets staff members to work together for the same goal.	.904	.921
Providing Individualised Concern & Support (3 items)	Treats me as equals.	1.054	.898
	Takes the time to discuss my concerns patiently.	.771	.701
	Stays in touch with me.	.855	.956
Providing Role-modelling (3 items)	Works as hard as anyone in my school.	.949	.959
	Sets a good example by the way he/she behaves.	.955	.929
	Leads by example.	.895	.858

*Note.* EFA loadings >.40. In EFA, Promax rotation was used and the factors were rotated obliquely. As such, the factor loadings were standardised regression coefficients which could be greater than one.

**Table 3.** *Fit Indices of Principal's and Immediate Supervisor's SLEB Scales (N=289)*

Fit Index*	Principal's SLEB		Immediate Supervisor's SLEB	
	Model		Model	
	First-order Seven-factor	Second-order One-factor	First-order Seven-factor	Second-order One-factor
$X^2$	368.230	452.071	394.232	442.843
$df$	168	182	168	182
$p$	.001	.001	.001	.001
$X^2/df$	2.192	2.484	2.347	2.433
TLI	.958	.948	.955	.952
CFI	.969	.959	.967	.962
RMSEA	.064	.072	.068	.071

*Note.* \*Recommended guidelines for model fit indices (Hair, Black, Babin, Anderson & Tatham, 2006; Hu & Bentler, 1999; Kline, 2005):  $X^2/df < 3$ ; TLI =  $> 0.90$ ; CFI =  $> 0.90$ ; RMSEA  $< 0.08$ .

**Table 4.** Means, Standard Deviations, Cronbach Alpha Coefficient, Paired Samples *t*-tests and Effect Sizes of Teachers' Perceptions' of Principal's and Immediate Supervisor's Empowering Behaviours (N=289)

Factors and Composite Score of SLEB	No. of items	Teachers' Perceptions' of Principal's Empowering Behaviours			Teachers' Perceptions' of Immediate Supervisor's Empowering Behaviours			Paired Sample <i>t</i> -test	Degree of Freedom	Effect Size
		<i>M</i>	<i>SD</i>	Cronbach alpha coefficient, $\alpha$	<i>M</i>	<i>SD</i>	Cronbach alpha coefficient, $\alpha$	<i>t</i>	<i>df</i>	Cohen's <i>d</i>
1. Delegation of authority	3	4.64	1.38	.93	5.12	1.19	.93	-7.473**	285	-.371
2. Providing intellectual stimulation	3	4.88	1.27	.95	4.86	1.26	.94	.331	288	.016
3. Giving acknowledgement & recognition	3	4.94	1.23	.91	5.05	1.21	.91	-1.528	285	-.090
4. Articulating a vision	3	5.26	1.20	.89	4.96	1.17	.89	5.203**	288	.253
5. Providing collaborative relationships	3	5.43	1.13	.95	5.27	1.15	.96	2.933**	287	.140
6. Providing individualised concern and support	3	4.43	1.44	.92	4.93	1.28	.92	-6.272**	286	-.367
7. Providing role-modelling	3	5.27	1.36	.93	5.20	1.34	.92	.861	287	.052
8. SLEB Composite	21	4.98	1.05	.92	5.05	1.03	.93	-1.465	288	-.067

*Note.* \*\*  $p < .01$ . Each factor of the principal's and immediate supervisor's SLEB was scored by calculating the mean of the items that composed each factor/. The composite scores for the principal's and immediate supervisor's SLEB were each scored by calculating the mean of the seven factors of the principal's and immediate supervisor's SLEB respectively. Effect size using Cohen's *d* (Cohen, 1988): small, .2; medium, .5; large, >.8.

**Table 5.** Inter-factor Correlations Among the Seven Factors and Composite Scores of Principal's and Immediate Supervisor's SLEB

		Principal								Immediate Supervisor							
Factor and Composite Score		1	2	3	4	5	6	7	8	1	2	3	4	5	6	7	8
Principal	1. Delegation of authority	1															
	2. Providing Intellectual Stimulation	.578**	1														
	3. Giving acknowledgement & recognition	.640**	.629**	1													
	4. Articulating a vision	.553**	.653**	.561**	1												
	5. Providing collaborative relationships	.538**	.584**	.643**	.730**	1											
	6. Providing individualised concern and support	.643**	.603**	.712**	.556**	.615**	1										
	7. Providing role-modelling	.534**	.526**	.635**	.627**	.648**	.620**	1									
	8. SLEB Composite	.791**	.799**	.844**	.811**	.822**	.840**	.806**	1								
Immediate Supervisor	1. Delegation of authority	<b>.655**</b>	.424**	.483**	.427**	.468**	.467**	.387**	.583**	1							
	2. Providing Intellectual Stimulation	.410**	<b>.606**</b>	.426**	.485**	.496**	.421**	.318**	.552**	.518**	1						
	3. Giving acknowledgement & recognition	.413**	.371**	<b>.505**</b>	.408**	.447**	.398**	.354**	.506**	.640**	.664**	1					
	4. Articulating a vision	.467**	.462**	.397**	<b>.654**</b>	.515**	.417**	.412**	.580**	.559**	.671**	.677**	1				
	5. Providing collaborative relationships	.423**	.421**	.452**	.537**	<b>.675**</b>	.423**	.410**	.579**	.589**	.632**	.673**	.692**	1			
	6. Providing individualised concern and support	.404**	.401**	.420**	.443**	.485**	<b>.508**</b>	.362**	.531**	.701**	.612**	.751**	.653**	.720**	1		
	7. Providing role-modelling	.402**	.374**	.376**	.437**	.455**	.359**	<b>.452**</b>	.499**	.583**	.593**	.659**	.638**	.684**	.710**	1	
	8. SLEB Composite	.544**	.523**	.524**	.579**	.603**	.513**	.462**	<b>.655**</b>	.785**	.802**	.865**	.832**	.849**	.883**	.835**	1

Note. \*\* Denotes correlation is significant at  $p < .01$ . Correlations between teachers' perceptions of principal's and immediate supervisor's SLEB factors and composite scores are in **bold**.

**Table 6.** *Bivariate Correlations of Teachers' Perceptions of Principal's and Immediate Supervisor's SLEB Factors with Teachers' Psychological Empowerment*

SLEB Factor and Composite Score	Bivariate Correlations of Teachers' Perceptions of Principal's SLEB Factors with Teachers' Psychological Empowerment ( <i>r</i> )	Bivariate Correlations of Teachers' Perceptions of Immediate Supervisor's SLEB Factors with Teachers' Psychological Empowerment ( <i>r</i> )
1. Delegation of authority	.641**	.555**
2. Providing intellectual stimulation	.528**	.469**
3. Giving acknowledgment & recognition	.532**	.433**
4. Articulating a vision	.539**	.513**
5. Fostering collaborative relationships	.498**	.421**
6. Providing individualised concern & support	.495**	.438**
7. Providing role-modelling	.466**	.448**
8. SLEB Composite	.648**	.560**

Note. \*\* Denotes correlation is significant at  $p < .01$ .

**Table 7.** Hierarchical Multiple Regression Results of Teachers' Perceptions of Principal's and Immediate Supervisor's SLEB Composite Scores in Predicting Psychological Empowerment

Steps and Variables Entered	Criterion Variable: Teachers' Psychological Empowerment				
	<i>B</i>	<i>SE</i>	<i>p</i>	<i>R</i> <sup>2</sup>	$\Delta R^2$
<b>Model 1:</b>					
Step 1: Enter 'Teachers' demographic factors (i.e. gender, age, race, educational qualification, school type, years of teaching experience, number of years of service in the current school, number of years working with the current principal and number of years working with the current immediate supervisor)'			.000	.116	.116
Step 2: Enter 'Composite score of principal's SLEB'	.458	.033	.000	.492	.376
Step 3: Enter 'Composite score of immediate supervisor's SLEB'	.169	.044	.000	.519	.027
<b>Model 2:</b>					
Step 1: Step 1: Enter 'Teachers' demographic factors (i.e. gender, age, race, educational qualification, school type, years of teaching experience, number of years of service in the current school, number of years working with the current principal and number of years working with the current immediate supervisor)'			.000	.116	.116
Step 2: Enter 'Composite score of immediate supervisor's SLEB'	.408	.037	.000	.394	.278
Step 3: Enter 'Composite score of principal's SLEB'	.350	.043	.000	.519	.124

## **Appendix 1. Definitions and Items of the Seven Dimensions of Lee and Nie's (2013) School Leader Empowering Behaviours (SLEB)**

### **Dimension 1: Delegation of Authority** (e.g., Blase & Blase, 1997; Konczak, Stelly & Trusty, 2000)

It refers to the leader's provision of delegated authority to enable followers to control their own work by allowing them to assume the responsibility and authority to make decisions in their work role.

- Item 1: Gives me the authority to make changes necessary to improve things.
- Item 2: Gives me the authority I need to make decisions that improve work processes and procedures.
- Item 3: Delegates authority to me that is equal to the level of responsibility that I am assigned.

### **Dimension 2: Providing Intellectual Stimulation** (e.g., Blase & Blase, 1997; Konczak et al., 2000; Podsakoff, MacKenzie, Moorman & Fetter, 1990; Yu et al., 2002)

It refers to the leader's provision of encouragement to followers to take calculated risks, initiate new ideas, and treat mistakes and setbacks as opportunities to learn.

- Item 1: Asks questions that prompt me to think.
- Item 2: Stimulates me to rethink the way I do things.
- Item 3: Challenges me to re-examine some of the basic assumptions about my work.

### **Dimension 3: Giving Acknowledgment & Recognition** (e.g., Blase & Blase, 1997; Podsakoff et al., 1990; Yu et al., 2002)

It refers to the leader's provision of rewards such as praise and acknowledgement of effort for achievement of specified goals with the intention of motivating and shaping the behaviour of followers.

- Item 1: Always gives me positive feedback when I perform well.
- Item 2: Gives me special recognition when my work is very good.
- Item 3: Personally compliments me when I do outstanding work.

### **Dimension 4: Articulating a Vision** (e.g., Blase & Blase, 1997; Podsakoff et al., 1990; Yu et al., 2002)

It refers to the leader articulating a clear vision to followers, identifying new opportunities for the organisation or department and inspiring followers with his or her vision of the future.

- Item 1: Paints an interesting picture of the future for our school.
- Item 2: Is always seeking new opportunities for the school.
- Item 3: Inspires staff with his/her plans for the future.

### **Dimension 5: Fostering Collaborative Relationships** (e.g., Arnold, Arad, Rhoades & Drasgow, 2000; Podsakoff et al., 1990; Yu et al., 2002)

It refers to the leader supporting and stimulating followers to collaborate and work together as a team.

- Item 1: Fosters collaboration among staff members.
- Item 2: Encourages staff members to be team-players.
- Item 3: Gets staff members to work together for the same goal.

### **Dimension 6: Providing Individualised Concern & Support** (e.g., Arnold et al., 2000; Blase & Blase, 1997; Podsakoff et al., 1990; Yu et al., 2002)

It refers to the leader showing concern for the welfare of followers, taking time to discuss their concerns and attending to their individual needs.

- Item 1: Treats me as equals.
- Item 2: Takes the time to discuss my concerns patiently.
- Item 3: Stays in touch with me.

### **Dimension 7: Providing Role-Modelling** (e.g., Arnold et al., 2000; Blase & Blase, 1997; Podsakoff et al., 1990; Yu et al., 2002)

It refers to the leader providing an appropriate model to his or her followers and setting an example for followers to follow which is consistent with the values which the leader espouses.

- Item 1: Works as hard as anyone in my school.
- Item 2: Sets a good example by the way he/she behaves.
- Item 3: Leads by example.