Correlates of Teacher Performance

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Performance can be regarded as almost any behavior, which is directed toward task or goal accomplishment. An empirical investigation was made of a model for predicting teacher performance. Predictor variables included personal variables as well as job-related factors. This correlational study involved a total of 370 secondary school teachers from 108 schools in Kedah. Two dimensions that are performance by supervisors and performance by teaching achievement measured job performance. Results indicated that achievement motivation was the highest predictor for job performance.

INTRODUCTION

Different facets of job performance have different antecedents. That is, the attributes that lead some applicants to excel in specific aspects of performance appear to be different from those that lead some applicants to excel in other aspects of job performance.

The construct job performance represents a set of behaviors that is relevant to the goals of the job or the organization. Several studies have examined the dimensionality of job performance (Ree & Earles, 1992; Schmidt & Hunter, 1992), and they have suggested a number of potential facets to the performance domain. These facets can be grouped into two broad categories; (a) individual task performance and (b) behaviors that create and maintain the social and organizational context that allow others to carry out their individual tasks.

In addition to specific tasks that are included on most job descriptions, the domain of job performance includeds a wide range of behaviors such as teamwork and customer service. Multiplicative models of employees's performance have intuitive appeal. For example, if the performance of tasks is a function of ability times motivation (P = f (A * M)), employees with high ability would not perform well unless they were also highly motivated, and higly motivated employees would not perform well unless they also had high levels of ability (Campbell & Pritchard, 1976).

TEACHERS' MOTIVATION

A plethora of studies have discussed the relationship between motivation and job performance. Sederberg and Clark (1990) claimed that motivation produced teacher with high vitality. They defined vitality as an essential, intangible, positive quality of individuals that is synonymous with purposeful production, dedicated to beliefs that produce action and sustained commitment. Motivations are a dynamic force that sustained vitality. They reported the finding of a study conducted on a motivation in regards to high vitality teachers. The findings of a study suggested that either organizational expectations or valued outcomes can stimulate motivation, and the effect of outcomes on motivation can be intrinsic or extrinsic.

The author listed seven integrated "needs" for motivation: group inclusion, trust, ontological security, avoidance of anxiety, material gratification, maintenance of self-concept, and a sense of facility. Without these seven needs, teachers are left with feelings of insignificance and deprivation. The teachers who underwent this study lay no claims to higher educations, nor for teacher preparation for their motivation, and all were good students themselves. They all had diligent work habits, genuine interest in young people and a true commitment to quality teachers in both elementary and secondary school setting. The teachers were ideal role models for future teachers.

Robbins (1993) studies supports the relationship between motivation and job performance. He suggests that workers will be hardworking if they feel that they are relationship between effort with performance, performance with rewards and reward with personal satisfaction. This motivation factors are related with performance. Therefore, to achieve high performance, individual must have his or her own skills.

In Malaysia, Noran Fauziah Yaakub and Habibah Elias (1999) have reported one research about job motivation and job performance of recipients for excellent

service in one of the higher education institutions. A total of 82 recipients were given instrumens on job motivation and job performance. The results showed that the overall job motivation was moderate, while job performance was high. In addition, there was no correlation between job motivation and job performance.

TEACHERS' EFFICACY

Definition of ability to complete a future act teacher efficacy abound, each dependent to lesser or greater degree upon Bandura's (1986) definition of self-efficacy as a subject's judgment about his or her action. Sternberg (2001) suggests that our level of self-efficacy can lead to self-fulfilling prophecies. When be believe we are able to do something, we are more likely to put in the effort and resources to do it, and therefore to achieve the outcome. One success leads to another, and we see ourselves as continually successful in maintaining the outcomes we desire. In contrast, if we have a low sense of self-efficacy, we may believe that we are unable to succeed and, as a result, will hardly even try. The result, of course, is failure, which leads to the expectation of future failure, which then becomes the basis for more failure.

Teacher efficacy is a form of self-efficacy. Its mean as an individual teacher's expectation that he or she will be able to bring about student learning. Many studies relate teacher's efficacy with work performance especially performance in classroom. Woolfolk, Rosoff and Hoy (1990) suggests that teaching efficacy is a teacher's belief that he or she can reach even difficult students to help them learn. It appears to be one of the few personal characteristics of teachers that is correlated with student achievement (Ashton & Webb, 1986). Self-efficacy theory predicts that teachers with a high sense of efficacy work harder and persist longer even when students are difficult to teach, in part because these teachers believe in themselves and in their students.

Ghaith and Yaghi (1997) investigate the relationships among teachers experience, efficacy, and attitudes toward the implementation of instructional innovation. Data were gathered through three questionnaires administered to 25 teachers immediately following a four-day staff development program on cooperative learning. Results showed that experience was negatively correlated, personal teaching efficacy positively correlated, and general teaching efficacy not correlated with teachers' attitudes toward implementing new instructional practices.

Sachs (1988) reported the results of several studies that indicate that there is a strong relationship between a teacher's self-efficacy and his or her actual performance. For him, regular educators are not provided opportunities to develop a high self-efficacy in their teacher preparation programs.

Brookhart and Loudman (1993) suggest that teacher with a high sense's of efficacy used a lot of strategies in teaching and one of a reason is to make student learn faster. Students with a low sense's of efficacy however believed that their goal of teaching is just to finish the school curriculum.

Lim Bee Lan (1997) investigated relationship between teacher efficacy with motivation factors, control and job performance. Her respondent are 116 secondary school teachers. The finding of the study showed that there is a relationship between teacher efficacy and their effort, commitment and control toward decision making, job performance, teaching experience and academic qualification. Teachers who teach less than 10 years reported low efficacy.

Ashton and Webb (1986) supported the previous findings that there is a relationship between teacher efficacy and school achievement. They stated that expectations about student ability were the most influence characteristics affecting teacher behavior. If a teacher has low expectations for student achievement, the he or she may not expend in a necessary extra effort needed to promote success. Teachers with a low sense of efficacy may attribute student failure to lack of ability, insufficient motivation, character deficiencies, or poor home environments rather than to their failure as a teacher. By contrast, high self-efficacy teachers felt that these students could be taught.

TEACHERS' ABILITIES

Research on teaching effectiveness also tended to focus on specific abilities related to teaching performance. Although many specified factors have been identified, we focus on two specific factors: teachers' knowledge of subject matter and teachers' pedagogical content knowledge.

Subject-Matter Knowledge

Beginning in the late 1980, research on teaching increasingly began to emphasize the importance of teachers' subject-matter knowledge to teaching performance (Shulman, 1986a). The rationale for this emphasis is straightforward: A deep knowledge of the subject being taught can support teachers in both the planning and interactive phases of teaching.

In planning for instruction, subject-matter knowledge supports the development of good lesson structures that organize and sequence instruction around important concepts and related operations. Ball and McDiarmid (1990) now recognize the important of teachers' subject matter knowledge as a function of research evidence and that the both their subject matter knowledge and pedagogicak knowledge are crucial to good teaching and student understanding. So that, expert teachers must have content knowledge of the subject matter to be taught.

Pedagogical Content Knowledge

Shulman (1986b) proposes that effective teachers have three kinds of knowledge: knowledge about the subject matter they are teaching (content knowledge), knowledge of general instructional strategies (pedagogical knowledge), and knowledge of specifiq strategies for teaching a particular subject matter (pedagogical content knowledge).

Pedagogical content knowledge (PCK) enables practicing teachers to make connections between their knowledge of content, connections critical for teaching effectiveness (Shulman, 1987). PCK differentiates expert teachers in a subject area from subject area experts. PCK concerns the manner in which teachers relate their subject matter knowledge (what they know about what they teach) to their pedagogical knowledge (what they know about teaching) and how subject matter knowledge is a part of the process of pedagogical reasoning.

TEACHERS' COMMITMENT

Teacher commitment has been appropriately defined by Coladarci (1992) as the "degree of psychological attachment to the teaching profession". Commitment is typically examined by asking teachers whether today they would still choose a teaching career. Finding from these studies show, for example, teachers of high ability to leave the profession earlier than others (Schlechty & Vance, 1981; Lyson & Falk, 1984) and elementary preservice teachers to be more committed to a teaching career than secondary preservice teachers (Evan & Tribble, 1986).

Commited employees are less likely to leave their positions and display other withdrawal behaviors, such as absenteeism (Reichers, 1985). Voluntary commitment is especially important in schools, given the difficulty in inspecting and controlling teachers' work (Firestone & Pennell, 1993).

Ong Chon Sooi (1995) suggests that not many empirical studies have been doned to look at work situation of Malaysian teachers. What are the factors that

motivate teachers to behave for maximum performance? This because work motivation and commitment are two important factors to influence performance dan the effectiveness school organization.

Despite extensive research, discussion and debate on how to predict teacher success, teacher performance is considered complex and remains difficult to predict. Not surprisingly, little empirical research has actually been conducted on the area especially from the perspectives of teachers. Teachers are still uncertain whether they can rely on some specific characteristics of performance (Lavigna, 1992).

In view of this practice and in evaluating teacher performance at the work place, it is therefore the interest of the researchers to conduct a study about employees' performance to the case of teaching which a multidimensional construct is. Our purpose is to understand which variable can better explain teacher's performance.

METHODS

Subjects and Procedures

Samples of 370 secondary school teachers throughout Kedah were given questionnaires by mail. Of the 370 respondents, 127 were males and 243 were females. About 66.5% have degrees, 13.5% possess STPM, and 13.2% possess SPM while the rest possesss diploma. The length of service in the education field range from one to twenty seven years. Respondents were chosen using stratified random sampling from the list of names provided by Jabatan Pendidikan Kedah (2001).

Job performance instruments used by principals under the Malaysian Remuneration System (SSM) assessed performance. Teaching Achievement comprises a section on teaching achievement consists of 31 items. These items were adapted from Nottis, Feuerstein, Murray, and Adams (2000) and Instrumen Pemeringkatan Standard Tinggi Kualiti Pendidikan (2000) by Jemaah Nazir Sekolah. From 31 items, 17 items was in form of negative. Ratings were made on a 5-point scale in five areas: student teaching, classroom management, student evaluation, interpersonal relationship and general attitude. A summative score was derived from these five evaluations which standardized reliability coefficient was .86.

Achievement motivation consists five items to measure achievement motivations. This questionnaire was adapted from Steers and Braunstein (1976) and Sutarto Wijono (1997). Results of reliability testing using the Cronbach alpha gave a reliability value of .75. Autonomy Motivation consists five items to measure autonomy motivations. This questionnaire was also adapted from Steers and Braunstein (1976) and Sutarto Wijono (1997). Results of reliability testing using the Cronbach alpha gave a reliability value of .75. Teacher Efficacy consists of 22 items was taken from Schwarzer, Schmitz and Daytner (1999) to measure teacher efficacy. From 22 items, 10 items was negative. Results of reliability testing using the Cronbach alpha gave a reliability value of .85.

Teaching ability is measured by two dimention that is pedagogical content knowledge and subject-matter knowledge. Respondents were asked to rate themselves on a 5-point scale with respect to 22 teaching skills. All items were combined into a single scale (teaching ability) that had a standardized alpha reliability coefficient of .83.

Work commitment was operationally defined in a slightly different manner than in other studies. Instead of asking respondents to indicate whether they would still choose teaching as a career, teachers were asked to perceived their belief in and acceptance of the goals and values of the profession, a willingness to work hard on behalf of the profession, and a desire to remain with the profession. A 5-point response scale was provided on which a high score indicated strong commitment to their work. The data was analyzed using the SPSS ver.12. Multiple regression analysis using logistic regression and linear regression was performed to test the model postulated above.

RESULTS

Regression Analysis

Multiple regression analysis using logistic regression was performed to test the model postulated above. Significant regression coefficients, standard errors, standardized coefficients, and percentage of explained variance are presented in Table 1. As can be seen from Table 1, the relation between independent variables and dependents variables was not strong as can be seen by R Cox and Snell? and Naegelkerke that are 0.15 and 0.23. The model has goodness of fit and level to predict true is 79.8%.

As can be seen from Table 1, the regression model's performance was rather modest. The entire equation was statistically significant ($p < 0.05$) and all ten regression coefficients had the expected algebraic signs although eight were not statistically significant. The only significant variable was the academic qualification, teaching experience, teaching ability and work commitment.

The results for academic qualification indicate that as academic qualification increase; job performance by supervisor's evaluation improves. Each additional academic qualification increase, the job performance increase by 0.25, given that the other IV's are not changed

The results for achievement motivation indicate that as achievement motivation increase; job performance by supervisor's evaluation improves or become more positive. Each additional achievement motivation increase, the job performance increases by .15, given that the other independent variables are not changed.

The regression results also indicated that when work commitment increase; job performance by supervisor's evaluation will improve. Each additional work commitment increases, the job performance increase by .04, ceteris paribus. Thus, teachers with high work commitment will get higher performance.

Table 1: Regresion Analysis for Job Performance by Supervisor's Evaluation.

	B	S.E.	Wald	Df	Sig.	Exp(B)
Achievement Motivation *	.15	.07	4.70	1	.03	1.16
Autonomy Motivation	.03	.07	.25	1	.62	.97
Teacher Efficacy	.001	.03	.001	1	.97	1.00
Teaching Ability	.02	.02	.94	1	.33	1.02
Work Commitment *	.04	.02	3.75	1	.04	1.04
Academic Qualification	-.51	.14	12.19	1	.00	.59
Age	-.03	.04	.641	1	.42	.96
Teaching Experience	-.12	.05	4.57	1	.03	.88
Constant	3.70	2.20	2.83	1	.09	40.62

* Significant at $p < 0.05$

Multiple regression analysis linear regression was performed to test the second model. Significant regression coefficients, standard errors, standardized coefficients, and percentage of explained variance are presented in Table 2. R? was .52 with standard error is 8.50.

As can be seen from Table 2, the regression model's performance was rather modest. The eight independent variables managed to explain 52% of the variance in the teaching achievement scores. The entire equation was statistically significant ($p < 0.05$) and all eight regression coefficients had the expected algebraic signs although four was not statistically significant. The significant variable was the achievement motivation, teacher efficacy, teaching ability and work commitment.

Table 2: Regresion Analysis for Job Performance by Teaching Achievement.

	B	SE B	Beta	T	Sig.
Achievement Motivation*	1.44	.22	.32	6.32	.00
Autonomy Motivation	-.14	.19	-.02	-.70	.48
Teacher Efficacy*	.42	.07	.31	5.63	.00
Teaching Ability*	.12	.06	.10	1.99	.04
Work Commitment*	.25	.07	.14	3.11	.002
Academic Qualification	.42	.44	.04	.95	.34
Age	-1.388E-02	.15	-.007	-.09	.92
Teaching Experience	-4.583E-03	.18	-.003	-.02	.98
(Constant)	62.99	7.28		8.64	.00
R^2	.52	Adjusted R^2	.50		
S.E.	.8.50				
F	33.33	Sig. F =	0.00		

* Significant at $p < 0.05$

The result indicates that as achievement motivation increase; job performance by teaching achievement improves or become more positive. Each additional achievement motivation increase, the job performance increases by 1.44, ceteris paribus. The regression results also indicated that teacher efficacy increase; job performance by teaching achievement will improve. Each additional teacher

efficacy increases, the job performance increase by 0.42, ceteris paribus. Thus, teachers with high efficacy will get higher performance. The results for teaching ability also indicate that as teaching ability increase; job performance by teaching achievement will improves.

The results for work commitment also indicate that as work commitment increase; job performance by teaching achievement will improves. Each additional work commitment increase, the job performance increases by 0.25, given that the other independent variables are not changed.

DISCUSSION AND CONCLUSIONS

The findings reported here provide preliminary support for the broad hypothesis that work performance is a function of various dimensions of teachers' ability, motivation, and work commitment. The effect sizes of variables measuring these broad constructs were not large in this study (always less than .10 SD)

Our study contributes to performance research in two ways. First, it supports the theoretical claim that performance is depends on motivation and ability, a finding reached earlier by Rowan, Chiang and Miller (1997).

In general, the teachers who participated in this survey showed that more than half of respondent rate themselves highly achievement motivation. At the same time, they expressed great confidence in their abilities in the classroom and rated themselves highly as teachers. The practical implication for a finding is good for teaching profession because these teachers possess such positive characteristics, namely high achievement motivations.

The study found the contribution of organizational factor such as leadership and rapport with colleague for high job motivation. At the same time, respondents reported their love for their own work as another important factor for their motivation at work place.

The practical implication for a finding is the process of taken a teacher for training by Bahagian Pendidikan Guru (BPG) should take achievement motivation as one of the criteria for teacher's candidate. Make sure that only the teachers that were very interested and qualify were chose to become a teacher. The same procedure should apply in university. The teachers also need to enhance

their knowledge and skills in teaching ability (pedagogical knowledge and pedagogical content of knowledge of the subject) in order to become more effective. This can be done through course, workshop and training from the various unit like Jabatan Pelajaran Negeri, Pejabat Pelajaran Daerah, College, University and Dewan Bahasa dan Pustaka.

In this case, super teacher can be as a mentor or as a facilitator to the beginning teacher. In other words, the concept of mentoring within experience teacher and beginning teacher should be strengthen.

One of the limitations in our studies (model 2) was the use of self-administered questionnaires to predict teachers work performance. More accurate studies of the relationships among these constructs might have been obtained by interviewing teachers using open-ended probes.

To conclude, teacher performance is a complex phenomenon. Eight seemingly relevant variables were investigated as to their impact upon performance out of which only three were found to have direct relationship. Moreover, these three accounted for only 52% of the variance in performance scores, meaning that most of the variance remained unexplained.

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