THE FACTORS ANALYSIS INFLUENCE THE PROFESSIONAL TEACHERS’ COMPETENCE IN THE STATE SENIOR HIGH SCHOOLS IN MEDAN CITY

Hironymus Ghodang
Lecturer & Trainer in Training and Education Bureau of North Sumatera Provincial Government, Indonesia
Email: hironymus_ghodang@yahoo.com

Abstract: This study aims to know and to study: (1) the influence of principals’ leadership towards the teachers’ job satisfaction, (2) the influence of school committee towards the teachers’ job satisfaction, (3) the influence of school culture towards the teachers’ job satisfaction, (4) the influence of principals’ leadership towards the teachers’ performance, (5) the influence of school committee towards the teachers’ performance, (6) the influence of school culture towards the teachers’ performance, and (7) the influence of the teachers’ job satisfaction towards teachers’ performance and also to determine the theoretical model which can describe the casualistic correlation among latent variables in order to find out teachers’ performance. This study was carried out in State Senior High Schools in Medan City which involved 232 (two hundreds thirty-two) teachers of State Senior High School in Medan City as the respondents. The data of teachers’ performance, the principals’ leadership, school committees, the school culture and teachers’ job satisfaction were taken from the use of chosen questionnaires that is Likert Scala Model. The instruments of this study were tested before they were tried out. This is done in order to test their validity with the correlation of Product Moment, however, while to test the reliability of the formula of Alpa from Cronbac was used. The technique of the data analysis used two steps; they are descriptive analysis and inferential analysis. The aim of descriptive analysis is to describe the data characteristics such minimum score, deviation standard, ideal minimum score, ideal maximum score, ideal average and every variable and indicator. Inferential analysis is used to test the requirements and the hypothesis of the study. The result shows positive direct effects with proportion: (1) principals’ leadership towards the teachers’ job satisfaction with path coefficient of 0.432, (2) the school committee towards teachers’ job satisfaction, (3) the school culture towards teachers’ job satisfaction with path coefficient of 0.160, (4) the principals’ leadership towards the teachers’ professional competence with path coefficient of 0.076, (5) school culture towards teachers professional competence with path coefficient of 0.236 and, (6) teachers’ job satisfaction towards teachers professional competence with path coefficient of 0.397 which is based on the acceptance of the hypothesis of the study, it is found that the theoretical model or the fixed model describes the structure of a causal relationship between variables of principals’ leadership, school committee, school culture and teachers’ job satisfaction towards the professional competence of the senior school teachers in Medan City.

Keywords: Path Analysis, Principals’ Leadership, School Culture, Teachers’ Job Satisfaction and Teachers’ Professional Competence.

I. INTRODUCTION

Dalam dunia pendidikan, guru (pendidik) merupakan salah satu komponen yang paling In the world of education, a teacher (an educator) is one of the components which determines much on the increasing of the quality of whole education needs which needs much attention because the teachers give influence on creating the process and the result of qualified education. Therefore, one of the efforts to increase the quality of education is the supports of the qualified and professional teachers.

To increase the teachers’ competences in order to make qualified and professional teachers, the Government of Indonesia has established the Constitution No.14 Year 2005 about the teachers and lecturers. By establishing the constitution of teachers and lectures, it has become the government’s policy to intervene directly in increasing the competence of teachers as an obligation for those teachers who have qualification
of Strata 1 (S1-Bachelor Degree) or Diploma 4 (D4) and professional certification. By having a teacher certification, the teacher will have professional aid/support and it is reasonable to be called a professional teacher.

A teacher’s duties as a profession are to educate, to teach and to train. To educate means to continue and to develop the values of life, to teach means to continue and to increase the knowledge and to improve the technology, while to train means to develop the students’ skills [2]. Arikunto (1993) states that a teacher’s competencies are as following: (1) the professional competence which means that a teacher should have broad knowledge about subject matters which are going to be taught and should have mastered the methodology such as theoretical concepts, able to choose the right methods and to use them in learning process as well. (2) the personal competence which means that a teacher should have a strong personality as a source of intensification as education subject, which means that a teacher should have a personality as the best model for the students, (3) the social competence means a teacher should have a good social ability to communicate with the students, teachers, principal, administration staff and even with the society. Based on the field observation, from the three competences, Arikunto finds out that many teachers have not optimized their professional competence especially competence in mastering the materials and learning strategy [3].

In improving the quality of education especially in a school, the role of a teacher has become the main requirement in education process. A teacher has a duty to guide, to lead and to be the model for the students. A professional teacher is a teacher who is able to show his/her good performance in order to create the qualified education. However, the teacher’s competence of innovating and creating as an effort to improve the performance has not developed yet naturally and smoothly. This is due to the influence of internal and external factors. According to Pustekkom Kemendikbud, the uses of a new strategy in improving the quality and the integration of Specific Instructional Aim in school are: (1) to guide the teaching and learning activity by orientating to efficient and effective process, (2) to grow the use of Specific Instructional Aim in school area in order to improve the quality learning and administration service and school information, (3) to improve the awareness and motivation of teachers in the use of Specific Instructional Aim in learning, (4) to improve the teachers’ competences as a role of educator and facilitator in helping the students in order to help the students to achieve the aim of the study by using Specific Instructional Aim, (5) to train the students in order to be able to organize learning activities from the student-centered, and do not always depend on teacher-centered (4). This is supported by one of the competences called a professional competence which must be possessed by a teacher. The professional competence is ability that a teacher must possess based on his/her skill. One of the skills is the ability to use information technology in learning.

The achievement of a teacher’s performance can be seen if the teacher tends to response positively such as the implementation management in increasing the quality of education, the teacher’s performance which can be felt by a teacher, the teacher’s high motivation to improve performance, the abilities of the principal in leading the teachers, and the rules of school are provided in order to achieve the vision, mission, and target/aim of the school.

In analyzing the performance especially the teacher’s professional competence in the school, the writer/researcher used some approaches such as performance model development and school effective model which are taken from some experts. Some school effective models not only will be compared by looking at variables which influence the performance but also will be analyzed the differences and the contrary of the performance models of the experts. From the differences results and the contrary of the performance models of the experts, the writer tried to find out new model that can be interpreted or described factors which influenced performance especially teachers’ performance.

The basic of developing the model used by the researcher in developing the performance model are: (1) Jason A. Colquit Model on performance (5), (2) James L.Gibson Model on performance [6], (3) Scheeren Model on school effectiveness [7], and (4) Heckman Model on school effectiveness. Based on the analysis result of exploration and comparison from some performance models and school effectiveness which are stated by previous experts and researches, therefore, it can be said that some variables influence directly and indirectly towards the school performance, in this case, the teacher’s professional competence performance. Therefore, the researcher tries to build a performance model from some theories, concepts and models, they
Based on the given analysis, it is found that there are many variations in the scope of school base management, the implementation of Specific Instructional Aim, school effectiveness model and teachers’ performance. In order to accommodate variables and indicators that given the variables in the implementation concept of MBS, the integration of Specific Instructional Aim and performance model especially for teachers’ professional competence of State Senior High Schools which were taken from previous models and experts, with the supported variables and models such as: (1) the school principal leadership, (2) the teacher performance satisfaction, (3) the role school committee, (4) school culture, and (5) teacher professional competence.

Based on the result of the analysis on the similarities, differences and contraries of the experts, the writer/researcher concluded that: (1) it is found that there are some variables which directly influence to professional competence like the teacher’s job satisfaction, principal leadership, role of students, role of school committee (parents and society) and school culture, and (2) there are some variables which influence indirectly on teacher professional competence such as principal leadership, the role of school committee (parents and society) and school culture. Based on the Government Roles No. 19 about Education National Standard article 28 (3) states that a teacher should have a professional competence as an agent of study which means that is the teacher must master the learning materials broadly and deeply in order to be able to lead the students in fulfilling the certain competence standard [10].

II. LITERATURE REVIEW

2.1 Personal Competence

Performance means as an expression of ability based on knowledge, attitudes, skills, and motivation in producing something. Simamora states that performance means achievement of a certain job requirement which finally can be seen from either the quality or quantity output. In this study, the researcher limits the study to the teachers’ performance by looking at the teachers’ professional competence in carrying out their tasks. Some experts define the performance such as: Hornby notes that performance is the same with achievement. Achievement means performance or the result of an effort. Similar to this, Rivai and Basri state that achievement is the result or the level of someone’s performance as a whole in a certain period in carrying out his tasks compared to some possibilities, namely: the result of work, targets or aims or criteria which are determined or agreed together before.

The word professional is related to the word profession. Profession is a job which needs certain requirements. The word professional can be translated as someone who does his profession and has a background of study that is Strata 1 degree (S1) and has joined the professional education and passed the profession exam [9]. Suharsimi Arikunto (1993) describes that professional competence means a teacher should not only have broad knowledge but also have subject matters which are going to be taught well as mastering the methodology such as have theoretical concepts of knowledge, able to choose the right method and able to use it in learning and teaching process. Therefore, in this research the meaning of professional competence is the ability of a teacher in mastering the learning material and learning management. Learning Management is able to know the students well, learn management planning master the method and learning media and evaluate the result of the study as well.

2.2 Principal’s Leadership

Gibson (2006) states that the leadership is an effort to influence an individual motivation in achieving some aims. In carrying out the task, a leader should have 3 (three) basic method of leadership styles, such as: emphasizing the importance of carrying out the task, emphasizing the importance of networking and emphasizing the achieving result. Davis and Nestorm define leadership as a process of pushing or helping other people to work enthusiastically in reaching the aims.

Similar to this, a principal as a school leader has responsibility to influence the school employees for one thing or something in order to reach the aim. The aim of school is dynamic related to the wishes and
school customers’ satisfaction. Therefore, a principal should be able facilitate and transform some hopes and wishes of school customers as a school vision and then approve it to be one action. So, it is hoped that a principal has an ability to inspire all people and those who involve in education management [12]. There are 5 (five) domains of principal’s leadership, they are (1) to conclude the school mission, (2) to manage the curriculum and lesson, (3) to create the positive atmosphere, (4) to observe and to improve the lesson, (5) to evaluate the learning program [13]. Operationally, the principal’s leadership is the ability of a leader to lead an education in influencing and motivating his employees to achieve the school’s aim with the following indicators: (1) making decision, (2) distributing the work, (3) delegating authority, (4) monitoring and evaluating, and (5) implementing of Special Instructional Aim.

2.3. The Role of School Committee

Along with the National Policy about education reform through school base management in relation to school, family and society need reform so that the responsibility of the education management is not only the burden of principal, teacher, and administration staff but also the burden of the role of society, in this case, parents who are important in order to improve the school quality which finally makes the school aim effective. In the autonomy era, parents have an important role in carrying out education in school, especially for determining and making achievement program actively.

According to Chang, the role of parents in school base management is to receive the qualified services through students who receive the needed education. The role of parents is as a partner and supporter who participate in the school process, educate the students comparatively, help the healthy improvement by donating resources and information, support and protect the school when it has a problem or crisis [14]. Furthermore, Syaiful expresses that the role of parents and society is important in improving the school education. Thus, the correlation between school and society is a source of improving the quality of education. School is a social institution which cannot be separated from school. It is said so because both of them have the same interest. A school has become a formal institution which has a mandate to educate, to train, and to guide young generations who have future, on the other side, society is as the user of education [15].

Operationally, the role of school committee is the family and society participation in reaching out the vision and school’s aims which are measured by indicators such as: (1) advisory, (2) supporting, (3) controlling, and (4) mediator.

2.4. School Culture

Luthan states that an organization culture is norms and values which tend to the member of organization behavior. Each member will behave according to its valid culture which will be accepted by its circumstance [16]. Sharplin says that an organization culture is a value system, trust, and behavior of its organization which is interacted with each other with a formal system structure in order to produce organization behavior norms [17].

According to Tan, organization culture pushes organization to the improvement of organization achievement. So, the obligation of an organization is to improve the organization culture to reach the achievement culture. Furthermore, tan states that in order to improve improvement culture needs 8 (eight) core values or strong values, namely: (1) result oriented, (2) superior customer service, (3) innovation, (4) fairness, (5) respect, (6) change responsive, (7) accountability, and (8) passion [18].

Wallach writes that performance and job satisfaction relate each other and depend on organization culture [19]. Zammuto and Krakower show that organization management and culture can increase performance and job satisfaction of the employees [20]. Kline and Boyd state that relationship between the organization structure and job satisfactions [21]. Kerego and Muthpa describe that work condition and communication channel influence the job satisfaction of employees [24].

Operationally, the definition of school culture is values, norms, rules and policies which are stated systematically and dynamically spoken and written in reaching out the school vision and aims with the following indicators: (1) responsibility, (2) hard work, (3) disciplines, (4) democracy, (5) curious, (6) innovative, (7) model.
2.5 **Teachers’ Job Satisfaction**

Wexley and Yulk state that job satisfaction is the way of an employee feels his job. The job satisfaction is a generalization of attitudes based on aspects of various jobs. Job satisfaction is influenced by some job aspects such as: salary/payment, working condition, controlling, colleague, working materials, working guarantee and chance to develop [25].

Robin in his study shows that there are 4 (four) conducive factors that makes high level of employees’ job satisfaction, namely: (1) demanding job, (2) balanced salary, (3) working condition, (4) supporting colleague. Moreover, Robin finds that the effect of satisfied and unsatisfied job in an organization or institution towards its performance. The direct effects of job satisfaction towards performance cover such as (1) the high productivity of employees, (2) disciple employees (no absents), (3) the faithfulness of employees to their institution or organization, (4) the satisfied employees in order to increase the number of them. On the other hand, the unsatisfied job influences directly to performance which include (1) the lower job productivity, (2) many employees always absent, (3) the employee who quits from his institution or organization,(4) many customers complain and are left by his customers [26]. Patricia notes that transactional and transformational leadership influence job satisfaction. Patricia also concludes that transactional leadership does not relate positively towards the job satisfaction but transformational leadership relates positively to job satisfaction [27].

Operationally teachers’ job satisfaction is the reflection of the teachers’ satisfied and unsatisfied feeling of their job based on the promised expectation given by the school with the indicators as following: (1) given salary/payment, (2) materials and instruments of the Specific Instructional Aims to support the learning process, (4) supports from the colleagues and (5) the role of coordinator of the Specific Instructional Aims (teachers of the Specific Instructional Aims) for teachers in learning and management in the school.

### III. RESEARCH METHODOLOGY

3.1. **The Research Methodology**

This research was carried out in Senior High Schools in Medan city. The subject of the research is teachers or educators from Senior High School teachers in Medan City. The number of the Senior High School teachers was 21 (twenty one). The method used in this research can be classified in *ex post facto* method. Bungin states if the aim of the research to expose the processing events so it is called *ex post facto*. The method used in this research is survey method with path analysis method. Kusnendi (2008) quotes that in path analysis method the variables that are analyzed are cause and effect with its aim to know the influence of direct and indirect effect of a set variable on effect variables. The number of the population in this research is 1446 (one thousand and four hundred forty six) teachers and 232 (two hundred and thirty two teachers as samples who are mostly teach in State Schools in Medan.

3.2. **The Technique of Data Analysis**

In this qualitative study the data analysis activity covers: (1) the description of data analysis, (2) inclined test of research data, (3) data normality test, (4) data homogeneity test, (5) data multicolinearity test, (6) linearity test and meaningful regression equality, and (7) data hypothesis test.

### IV. THE RESULT OF THE STUDY

This study consists of 5 (five) variables, namely: variables of principal leadership (X_1), variables of school committee role (X_2), and school culture (X_3), teachers’ job satisfaction (X_4) and teachers’ performance (X_5). The description analysis of the research variable scores can be seen in the following pictures: (1) Picture 4.2 is The School Committee Role’s Scores, and Picture 4.5 is The Professional Competent Teachers’ Scores.

Based on the cost of path coefficient taken from the calculation results, it can be described that there is still any insignificant left in path analysis, that is, the influence of school committee role (X_2) towards the teachers’ professional competence (X_3), with \( \rho = -0.011 \) and \( t \) calculation = -0.156 which can be seen in Picture 4.6. Trimming method is the method used to improve a path analysis structure model by taking out
from the model where exogen variables with insignificant coefficient path. The result of trimming method can be in Picture 4.7.

The significant test calculation of path coefficient is with t calculation. Based on the calculation, it is found that the conclusion of the test result can be seen in table 4.1.
Table 4.1 Recapitulation of the Research Hypothesis Test Result

<table>
<thead>
<tr>
<th>The direct influence among variables</th>
<th>t calculation</th>
<th>t table</th>
<th>Conclusion</th>
</tr>
</thead>
<tbody>
<tr>
<td>X1 towards X4 (ρ_{41})</td>
<td>7,042</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X2 towards X4 (ρ_{42})</td>
<td>4,705</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X3 towards X4 (ρ_{43})</td>
<td>3,254</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X1 towards X5 (ρ_{51})</td>
<td>2,027</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X2 towards X5 (ρ_{52})</td>
<td>-1,156</td>
<td>1,960</td>
<td>insignificant</td>
</tr>
<tr>
<td>X3 towards X5 (ρ_{53})</td>
<td>4,035</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X4 towards X5 (ρ_{54})</td>
<td>5,202</td>
<td>1,960</td>
<td>significant</td>
</tr>
</tbody>
</table>

After taking out from the model, exogen variables with coefficient path are insignificant. Based on the calculation, it is found that the conclusion of the test result which can be seen in Table 4.2. is as follows.

Table 4.2 Recapitulation of the Research Hypothesis Test Result

<table>
<thead>
<tr>
<th>The direct influence among variables</th>
<th>t calculation</th>
<th>t table</th>
<th>Conclusion</th>
</tr>
</thead>
<tbody>
<tr>
<td>X1 towards X4 (ρ_{41})</td>
<td>7,042</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X2 towards X4 (ρ_{42})</td>
<td>4,705</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X3 towards X4 (ρ_{43})</td>
<td>3,254</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X1 towards X5 (ρ_{51})</td>
<td>2,027</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X2 towards X5 (ρ_{52})</td>
<td>-1,156</td>
<td>1,960</td>
<td>insignificant</td>
</tr>
<tr>
<td>X3 towards X5 (ρ_{53})</td>
<td>4,035</td>
<td>1,960</td>
<td>significant</td>
</tr>
<tr>
<td>X4 towards X5 (ρ_{54})</td>
<td>5,202</td>
<td>1,960</td>
<td>significant</td>
</tr>
</tbody>
</table>

Furthermore, by using the SU Increasing Formula [33], it can result the conclusion of proportional direct influence of Principal’s Leadership (X1), the Role of School Committee (X2) and the School Culture (X3) towards the Teachers’ Job Satisfaction (X4) in table 4.3 is as follows.

![Picture 4.6](image1)

![Picture 4.7](image2)
Table 4.3 The Conclusion of Professional Direct Influence of Principal’s Leadership (X₁), the Role of School Committee (X₂) and the School Culture (X₃) towards the Teachers’ Job Satisfaction (X₄)

<table>
<thead>
<tr>
<th>Variables</th>
<th>Influence to X₄</th>
<th>Direct to X₄</th>
<th>Indirect to X₄, through:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>X₁</td>
<td>X₂</td>
</tr>
<tr>
<td>X₁</td>
<td>0.186</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>X₂</td>
<td>0.078</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>X₃</td>
<td>0.025</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

Notes:
S = Spurious Component
U = Unanalyzed Component
r = Correlation Coefficient

Based on Table 4.3 it is stated that: (1) the Strength of Principal’s Leadership (X₁) which directly determines the Changes of Teachers’ Job Satisfaction (X₄) with 18.6 %, (2) the Strength of School Committee Role (X₂) which directly determines the Changes of Teachers’ Job Satisfaction (X₄) with 7.8%, and (3) the Strength of School Culture (X₃) which directly determines the Changes of Teachers’ Job Satisfaction (X₄) with 25 %.

Furthermore, by using the SU Increasing Formula, it can result the conclusion of proportional direct influence of Principal’s Leadership (X₁), the School Culture (X₃) and the Teachers’ Job Satisfaction (X₄) towards the Teachers’ Job Satisfaction (X₅) in table 4.4 as follows.

Table 4.4 The Conclusion of Professional Direct Influence of Principal’s Leadership (X₁), the School Culture (X₃) and the Teachers’ Job Satisfaction (X₄) towards the Teachers’ Job Satisfaction (X₅)

<table>
<thead>
<tr>
<th>Variables</th>
<th>Influence to X₅</th>
<th>Direct to X₅</th>
<th>Indirect to X₅, through:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>X₁</td>
<td>X₃</td>
</tr>
<tr>
<td>X₁</td>
<td>0.005</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>X₃</td>
<td>0.055</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>X₄</td>
<td>0.157</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td>0.270</td>
<td>0.053</td>
</tr>
</tbody>
</table>

Notes:
S = Spurious Component
U = Unanalyzed Component
r = Correlation Coefficient

Based on Table 4.3 it is stated that: (1) the Strength of Principal’s Leadership (X₁) which directly determines the Changes of Teachers’ Job Satisfaction (X₄) with 18.6 %, (2) the Strength of School Committee Role (X₂) which directly determines the Changes of Teachers’ Job Satisfaction (X₄) with 7.8%, and (3) the Strength of School Culture (X₃) which directly determines the Changes of Teachers’ Job Satisfaction (X₄) with 25 %.

V. CONCLUSION

Based on the result of analysis, the factors which influence the teachers’ professional competence result in two structural similarities which can be accepted to describe each of exogen variables towards its endogen variables. The result of this research will give some information that can be concluded as follows: (1) the principal’s leadership influences directly, positively and significantly towards the teachers’ job
satisfaction. It means that the more the principal gives his leadership to the teachers, the teachers will feel more satisfied and vice versa, (2) the role of school committee influences directly, positively and significantly towards the teachers’ job satisfaction. It means that the better the role of school committee, the more satisfied the teachers feel and vice versa, (3) the school culture influences directly, positively and significantly towards the teachers’ job satisfaction. It means that the better the school culture, the more satisfied the teachers feel and vice versa, (4) the principal’s leadership influences directly, positively and significantly towards the teachers’ performance. It means that the better the principal’s leadership, the better the teachers’ performance and vice versa, (5) the school culture influences directly, positively and significantly towards the teachers’ performance. It means that the better the school culture, the better the teachers’ performance and vice versa, (6) the teachers’ job satisfaction influences directly, positively and significantly towards the teachers’ performance. It means that the more satisfied the teachers, the better the teachers’ performance and vice versa.

REFERENCES
[26] Huang, Y. C. (2004), Job satisfaction and organizational commitment among faculty at Taiwan's higher education institutions (A Dissertation). Faculty of The Graduate College at the University of Nebras-ka, Omaha.