

AN EMPIRICAL INVESTIGATION OF FACTORS EFFECTING TO MEDICAL DELEGATES' RETENTION: A CASE STUDY OF A SRI LANKAN LEADING MARKETER AND DISTRIBUTOR OF PHARMACEUTICALS

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ABSTRACT

Sri Lanka is having a growing demand for its Pharma market which simultaneously demand for people who can market the drugs. Even though every drug manufacturing company doesn't have license to sell drugs in every region of the world, due to various jurisdiction issues manufacturing companies has to relay on drug marketing companies which has the license to sell the drugs in its dedicated region in the world (Benson, 2015). Therefore "Medical delegates' job role" is having a high importance in Pharmaceutical companies due to Sri Lankan competitive pharma market. The competency of a medical delegate adjoined with the years of experience and the enhanced professional profile in the industry. Due to that retaining the well experienced profiles as medical delegates is a crucial success factor for Pharmaceutical companies. Therefore there is a growing need to identify the factors effecting to medical delegates' retention in Sri Lankan Pharmaceutical Market. This study empirically examines the factors effecting to XYZ LTD medical delegates' retention. Previous research done under various environments has recommended a variety of factors effecting medical delegates' retention. This study developed a model which adopted HR Policies, Compensation and benefits, Work Pressure, Relations with supervisor. Survey questionnaire was conducted to investigate the factors effecting medical delegates' retention. The collected data was analyzed using SPSS. The data analysis categorized under two main statistical techniques such as, "Descriptive Statistics" & "Inferential Statistics". The relationship between all the four independent variables and overall medical delegates' retention were tested using bivariate analysis. The results highlighted a medium positive relationship with HR policies and low positive relationships with Compensation and benefits, Work Pressure, Relations with supervisor. Also it was found that married and employees with less experience have work pressure and low relationship with the supervisor.

Keywords: Employee Retention, Medical Delegates, Pharmaceutical companies, HR policies, Compensation, Benefits, Work Pressure, Supervisor

Role of Spiritual Intelligence and Job Values in the Mental Health of Bank Executives

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ABSTRACT

Organizational environment of a workplace is one of the factors that explicitly or implicitly influence the level of mental health of employees and their level of job satisfaction and thus their happiness level. More and more employees are experiencing stress at work. They may be struggling with too much pressure, long hours or rapid change. The nature of employment has now changed and the idea of a job for a life has been replaced by an emphasis on performance.

Given that spiritual intelligence augment the mental health by mitigating stress. It has been seen that life pressures, be at personal or professional level, bypass the path of happiness due to a host of factors. Also review of literature, led the researcher to infer that in any type of organizational setup, working conditions, job security, perks and others plays a critical role in performance and psychological well-being of the employees. Thus, it would be interesting to explore the role of spiritual intelligence and job values on mental health of public and private sector bank employees.

The objectives of the study were to understand the effect of spiritual intelligence and job values on mental health of public and private bank executives. To understand whether working in different sectors affect mental health. The sample was restricted to 150 individuals, 75 from public sector and 75 from private sector holding the post of executives. The sample was taken from the banks of various cities of Rajasthan by simple randomized method. For the sake of simplicity and better comparison only the executives of banking sectors, aging between 25 to 35 years were taken. The standardized tools used in the study were. 1. Test your spiritual intelligence. 2. Job value questionnaire 3. Employee's mental health inventory. 4. General self-efficacy scale. Data was analyzed by Analysis of Variance (ANOVA). 2x2 factorial design has been used to study the effect of the independent variables on dependent variable. The data was processed through computer for appropriate computation to draw the results.

The major findings of the study are that spiritual intelligence significantly affects mental health in public and private sectors executives whereas, job values do not affect mental health in both the sectors. The study also reveals that executives of public sector have better mental health and more spiritually intelligent in comparison to private sector. Similarly, private and public sector executives differ on job value type (i.e. intrinsic and extrinsic).

Understanding that the stress is a major concern for many employees of private sectors, it is a duty of HR-heads of banking sector to address it properly. It is desirable to employ HR professionals with knowledge of positive psychology in banking sectors especially in private sector. These professionals can enhance mental health of the employees and can facilitate the growth of organizations in an immense way, by using spiritual training. Spirituality plays an important role in preventing many physical and mental illnesses, reducing both symptom and severity, and enhancement of positive mental health and psychological well-being. Approaches should be taken to minimize stress level and to maximize effectiveness through organizational efforts and individual efforts to ensure spiritual growth.

Key words: Spiritual intelligence, intrinsic job values, extrinsic job values and mental health.

SECTORAL EFFECT OF PUBLIC EXPENDITURE ON ECONOMIC GROWTH IN NIGERIA

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ABSTRACT

This study examines the effects of public expenditure on health care and education on economic growth in Nigeria from 1981-2016. The study focuses on the sectoral and disaggregated spending analyses. Public spending is such an important channel through which economic growth could be achieved. The study utilizes the Error Correction Model (ECM). The study uses the quasi-experimental research and the data for analysis was purely time series econometrics technique to examine the short and long run effects of government spending on economic growth in Nigeria. The ADF Unit Root Test was used to test for Stationarity of variables, where at various levels of significance (1%, 5%, and 10%), the variables were stationary, though, the time series were not stationary at their levels, the non-stationary variables were differenced and variables became stationary at first difference. That is, RGDP, EXHTE and EXEDU were integrated of order one 1(1). Granger Causality Test to ascertain the direction of the effect of the variables was also conducted. The results showed a unidirectional causality between the EXHTE and RGDP as well as EXEDU and RGDP. Meaning, that total expenditure on education and total expenditure on health care granger causes economic growth in Nigeria during the period of study. This further reveals that the variables; government expenditure on education and health care impact on economic growth. The result of the analyses is an indication that government spending on health care and education in Nigeria are statistically significant and are positive to economic growth in the long run. Therefore, the paper concludes and recommends that government in Nigeria should increase its expenditure on health care services delivery and education in order to accelerate real economic growth, especially as the economy is gradually exiting economic recession.

Keywords: Economic Growth, Education, Endogenous Growth, Error Correction Model, Health Care.

The Role of Shame in the Construction of Victim Narratives: A Feminist Literary Analysis of Antjie Krog's Oeuvre

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ABSTRACT

This paper will explore a relatively under researched aspect of victim narratives, namely the role that shame in general, and gendered shame in particular, plays in the construction of these narratives. Although Antjie Krog's *Country of my Skull* has received wide local and international attention, the dynamics of shame demand further scholarly attention. I will offer a feminist literary analysis of Krog's text, in addition to her *A Change of Tongue*, *Begging to be Black* and *There was this Goat* (co-written by Nosisi Mpolweni and Kopano Ratele), through a theoretical rubric of shame studies. In the South African context, victim narratives have become part of the public consciousness through the post-apartheid Truth and Reconciliation Commission Hearings. In the contemporary South African milieu, the gendered and racialized female body is more susceptible to violence than ever before and the emergent victim narratives of women thus deserve additional scholarly scrutiny. It has become a widely accepted reality that gender violence remains severely underreported and women's victim narratives are thus particularly vulnerable to silencing and elision from public discourses. The very nature of shame, with its impulse to shrink, hide and remain silent, makes this a phenomenon that shapes victim narratives in particularly insidious ways. In order to expose the dynamics of shame and their effects on the construction of victim narratives, I turn to literary texts as these provide a safe space from which to explore issues that are often immensely painful and traumatizing to the women who have been victimized. The prevalence of sexual violence in South Africa, with some of the highest rates of rape in the world, results in fiction writers often attempting to utilize the imaginative space of literary texts to grapple with this uncomfortable social reality. As a feminist scholar, I argue that these texts offer valuable analytical opportunities and I will explore Krog's oeuvre in order to ascertain the role that shame plays in the construction of South African victim narratives. My analysis will demonstrate that assumptions about "proper" feminine traits and behaviour are so deeply embedded that shame about perceived deviation from these normative standards goes to the very heart of the construction of victim narratives by both the female characters themselves and the larger societies in which they are located.

How Much Happiness Can We Find in the Fear Index?

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ABSTRACT

Many studies dealing with calendar market anomalies have ascribed positive or negative patterns detected in returns to investors' moods. However, in these studies, mood was not measured directly but rather speculated upon or inferred. This paper suggests capturing investors' moods by dividing the information contained in the VIX, popularly called the fear index, into two components: that which is correlated with volatility forecasts and information that is not. By doing so, we provide further evidence about the relationship between investor mood and risk aversion around joyful occasions (holidays) as well as for other occasions that may result in negative moods (the disruption of sleep resulting from the move to and from daylight savings time). We find that the actual values of the VIX and its cousin, the VXO, tend to be lower than their expected values in the case of joyful holidays, reflecting a more optimistic mood among investors, while during daylight savings time weekends, the actual values of the VIX and VXO tend to be higher than their theoretical values. Our results shed light on the information content of implied volatility beyond that captured in other volatility estimators.

Tackling Human Ping-Pong in Rohingya by way of Combine The ASEAN Regulation

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ABSTRACT

Amid the diplomatic flurry, ASEAN has stayed conspicuously silent. In Southeast Asia, there is a long history of ending displacement through resettlement and repatriation, and rarely through local integration. Based on UNHCR report on irregular maritime movements states, an estimated 25,000 Rohingya and Bangladeshis left the Bay of Bengal in the first quarter of 2015 and 300 have been recorded as having died at sea. ASEAN displays a lack of political will to manage peace and security for migration and refugee. Myanmar's inaction over the Rohingya is important, effectively putting ASEAN under the international microscope as it must prove itself capable of responding.

A reason why ASEAN do not take responsibility on those conflicts, refer to one of ASEAN principle saying "No intervention in each other internal conflicts". In this case, non-intervention is just worsen things. Considering that Rohingya conflict is not only a race, ethnic, or religion-based conflict. It is a humanity matter. Besides, the principle is contradictive to the motto of ASEAN, "One Vision, One Identity, One Community".

This research method used by the author is descriptive-analytics with data collection technique through literature study by reviewing a number of books, journals, documents, and scientific articles. As for analyse data, the authors use qualitative analysis techniques with deductive writing.

This paper puts forward the importance of clarifying the authority of ASEAN in contributing to the sensitive issues such as humanity, which occur between ASEAN member countries. Determine boundaries of the non-intervention principle is necessary to avoid ambiguity as to whether the problem belongs to a common problem in ASEAN or to the private matter of the country. Combining the regulation ASEAN countries is a solution to resolve internal conflicts and as a concrete form of ASEAN work that has existed for 50 years.

Keywords: Refugee, Rohingya, ASEAN, Regulation

Factors Affecting Customer Satisfaction: A Case Study of Wanon Niwat Provincial Electricity Authority, Sakon Nakhon Province, Thailand

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ABSTRACT

The purpose of this research was to investigate the influence of demographic factors and service quality factors on customer's satisfaction. The sample used in this research were 400 respondents who were a customer of Wanon Niwat Provincial Electricity Authority, Sakon Nakhon Province, Thailand. To collect the data, questionnaire was developed by two steps as follows. Firstly, it was checked by academic experts for content validity. Secondly, Cronbach's Alpha was conducted to test reliability. Then, correlation analysis, t-test, One-Way ANOVA and Multiple Regression Analysis were used for analyzing data.

The result of this study revealed that the demographic factors, including gender, age, marital status, occupation and salary showed a statistically significant difference in satisfaction. However, it showed that education level were not statistically significant difference. In addition, the findings also presented that the service quality factors which were the service quality of reliability, performance, response of customer and customer access had a positive influence on consumer's satisfaction. The results of this research were very useful for developing the organization into the suitable direction. Research contribution and avenue for future research was offered.

Keywords– Service Quality, Customer Satisfaction, Provincial Electricity Authority

INTRODUCTION

Background

The Provincial Electricity Authority is a state-owned enterprise in the field of utilities. The Provincial Electricity Authority has been established on 28 September 1960 following the Provincial Electricity Authority Act B.E. 2503, and it is under the Ministry of Interior. The assets, liabilities, and responsibilities of the Provincial Electricity Organization at that time have been transferred to be continuously proceeded. The main missions of the organization are to produce and distribute electricity to customers, businesses, and industries in the 74 service areas all over Thailand except Bangkok, Nonthaburi, and Samut Prakan. The service areas cover 510,000 square kilometers or 99 percent of the country. The operation goal of the organization is to develop the supply and service of the electric power to be effective, secure, reliable, sufficient, and able to keep pace with the demand which is increasing. Also, it could consort with any changing situations [14].

The Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province, Thailand is the organization under Phangkhan District, Sakon Nakhon Province that is directly under the Provincial Electricity Authority Area 1 (Northeast), Udon Thani. The Provincial Electricity Authority in Wanon Niwat District has been promoted from the Provincial Electricity Authority Wanon Niwat Branch in 2012. It is located at No.132 Moo 9 Wanon Niwat District, Sakon Nakhon Province, Thailand. The Wanon Niwat District organization is responsible for the other three districts that are Wanon Niwat, Ban Muang, and Kham Ta Kua [15]. In terms of the customers, there are 59,732 electricity consumers [16]. The organization has paid attention to improve the service quality and continuous operations. Those are the expansion of the

distribution system, replying to requests for an electricity installation, meter installation, power failure solution, and electricity bill payment in order to satisfy consumers. In terms of the organization missions, the ones that are always taken into consideration are to provide the quality services and to satisfy the customers.

However, from the past operations, there have been some complaints about the blackout, brownout, late meter installation, late electricity bill delivery, and stop distributing electricity. This was due to the complicated procedures and orders, and these problems also caused delayed services, employees' dysfunctions, inadequate staff, or no updated tools.

In the present study, the researcher is interested in studying on the factors affecting the customers' satisfaction with the service of the Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province. With the results of the present study, it could be used in the service development in order to meet the customers' needs. Also, the researcher aims to study on the problems affecting the service and the customers' opinions. This could help developing the service that will be satisfying the future customers.

Objective

This research has two objectives as follows:

1. To study on the demographic factors affecting the customers' satisfaction with the service of the Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province, Thailand.
2. To study on the service quality affecting the customers' satisfaction with the service of the Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province, Thailand.

LITERATURE REVIEW

Demographic

According to the study of the concepts and theories of the demography, the different demographic factors have effects on consumer behaviors. This is because each person is different following his own demographic characteristics. The characters mentioned earlier such as gender, age, marital status, and working period are the basic factors affecting the different satisfactions [10]. This corresponds to the theory of individual differences of De Fleur, 1996. The theory states that human behavior depends on an external force. So, it is believed that any person who has a different demographic feature behaves differently. Therefore, those who are in the same social level will choose and respond to any information similarly [6].

Customer Satisfaction

The definitions of a customer satisfaction have been defined by some scholars and are reported in this section. Satisfaction is the consumer's fulfillment response [8]. It is a judgment that a product or service feature or the product or service itself provided (or is providing) a pleasurable level of consumption-related fulfillment, including levels of under- or over-fulfillment. On the other hand, customer satisfaction stems from the client's reaction as result of evaluating the perceived expectations and the actual performance of a product or service [4]. Consumer satisfaction "reflects comparative judgments of a person connected to the difference between the perceived performance of a purchased product (or of a provided service) and the expectations that he made concerning this performance [9]. If the performance fails to meet expectations, the client will be unsatisfied or disappointed. If the performance meets expectations, the client will be satisfied. If the performance exceeds expectations, the client will be extremely satisfied or delighted. In conclusion, customer satisfaction is thus a particularly special indicator for evaluating the persons who formulate the demand. To be aware about the satisfaction or the dissatisfaction degree of consumers means to evaluate the success or the failure of some action, but also forecasting on their future behavior. At the same time, it allows comparisons between different market segments. Satisfaction refers to a person's sense of satisfaction that means customers will be satisfied when they receive the right things [7]. Satisfaction levels are measured by the thought and sensory reactions. Customer satisfaction is the key to future business goals [5].

Maslow's Theory of Motivation

1. Physical needs are the basic human needs and are the essential for life. These requirements include air, clothing, medicines, housing, sexual needs.

2. Safety or security needs include physical security and security
3. Social needs include demand for recognition, generosity, good friendship, good human relations, love from the boss and colleagues.
4. Esteem needs include Self Confidence, Success, Knowledge Self-esteem Independence and freedom of work.
5. Self - Actualization needs include when given the four levels of response, humans will work for the job. Try to develop your potential to peak performance [2].

Quality of Service

Service refers to an activity or abstract benefit one offers to the other; however, the consumer does not possess such service possession of the goods [12]. Quality of service means attitude. Long - term occurrences on all performance assessments [11]. Studying on the research papers related to the quality of the service, the researcher found that many scholars viewed that the successful service quality must include the key features such as reliability, responsiveness, access to services, gentle communication, honesty, stability, understanding, creation of tangible things, and so on [3]. With these features, it can be said that the quality of service will be the one that follows a professional standard in order to provide customers excellent services and to meet their expectations or more than what they expected. For the four main qualities, those include the reliability, competence, customer service, and customer access.

CONCEPTUAL MODEL AND HYPOTHESIS

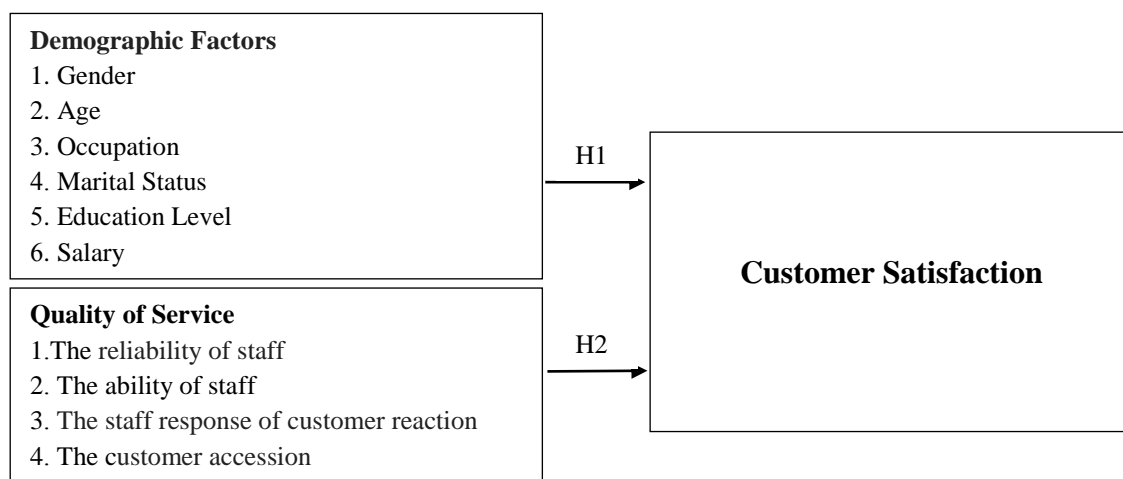
The present research mainly aimed to investigate the factors affecting the customer satisfaction. With this aim, the researcher has set the two following hypotheses that are:

H₁: Customer satisfaction of the service of the Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province is different when classified by demographic factors.

H₂: The quality of service factors of the Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province will affect the customer satisfaction.

Figure 1

A Conceptual Model Factors Affecting Customer Satisfaction



RESEARCH METHODOLOGY

Sample Selection and Data Collection

The samples used in this research were 400 respondents who were the customers of the Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province, Thailand. The sample size was calculated and based on the Yamane formula [1]. The error rate was not more than 0.05.

Data Collection and Method

A questionnaire was used in the data collection. The dependent variables of this study were measured by using a five-point scale ranging from 1=“strongly disagree” to 5= “strongly agree”. In the hypothesis assessment, the statistical methods which included t – test, F – test (One way ANOVA), and Multiple Regression Analysis were used. Cronbach’s alpha coefficient was used for measuring the reliability. As a result, the reliability of all scales was higher than 0.7 as showed in Table 1.

Table 1
Result of the Reliability Measurement

Variables	Cronbach Alpha Coefficient
Quality of Service	
1. The reliability of staff	0.734
2. The ability of staff	0.866
3. The staff response of customer reaction	0.818
4. The customer accession	0.886
Customer Satisfaction	0.769

From the Table 1, it showed the reliability measurement, and the determined coefficient of the Cronbach’s alpha must be higher than 0.7. After all variables were measured, it revealed that they all were higher than the determined value. In the other words, the reliability of staff was 0.734, The ability of staff was 0.866, the staff response of customer reaction was 0.818, the customer accession was 0.886, and the customer satisfaction was 0.769. This meant all items were higher than the acceptable level.

RESULT

The Demographic Factors Analysis

The analysis of the data showed that the majority of the respondents was male (50.7%) while female ones were around 49.3%. For the respondents’ ages, the most of them were lower than 30 years old (36%). In terms of the marital status, most of them (57%) were single. For the educational level, most of them (55.5%) hold a Bachelor's Degree, and they mostly worked for the government organizations (45%).

Hypothesis Tests

H₁: Customer satisfaction of the service of the Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province is difference when classified by demographic factors.

The results of this present study revealed that the demographic factors, including the gender, the age, the occupation, the marital status, and the salary showed a statistically significant difference at 0.5 in the customer satisfaction. However, it showed that the education level had no statistically significant difference at 0.5. Thus, H₁ was partially supported.

Table 2
The hypotheses (H₁) testing

Demographic Factors	Customer Satisfaction
Gender	✓
Age	✓
Occupation	✓
Marital Status	✓
Education Level	✗
Salary	✓

✓Had different statistically significant at 0.05

✗Had not different statistically significant at 0.05

Table 3
Result of the Customer Satisfaction is classified by education level

Education Level	Mean	S.D.	F-test	Sig.
Less than Bachelor	4.24	.416	.880	.416
Bachelor	4.25	.379		
Master	4.11	.000		

* P < .05

Table 3 showed the results of the One-way ANOVA statistic. In the customer satisfaction, it revealed the mean of the respondents who hold a Master's Degree was the lowest (4.11) while the one of those with a Bachelor's Degree was the highest (4.25). Moreover, the result revealed that the different educational levels had no statistically significant difference at 0.5.

Pearson's Correlation was used to determine the relationship of the independent variables according to research conceptual model. The objective was to find multicollinearity among the independent variables to avoid unreliable and unstable estimates of regression coefficients. Thus, correlation analysis between the independent variables was showed in Table 4.

Table 4
Result of the Correlation analysis between Independent Variables

Variables	CSF	RE	AB	RP	CA
Mean	4.24	3.93	4.15	3.90	4.11
Standard deviation	0.38	0.61	0.60	0.69	0.54
Customer Satisfaction CSF	1				
Reliability RE	.691**	1			
Ability AB	.627**	.630**	1		
Response RP	.544**	.547**	.528**	1	
Customer Access CA	.601**	.342**	.374**	.218**	1

* P < .05, ** P < .01

(CSF = Customer Satisfaction, RE = Reliability, AB = Ability, RP = Response, CA = Customer Access)

Table 4 showed the analysis of the relationship between the independent variables. After the analysis, it showed that the highest value was 0.691. So, this was supported by Hair et al who stated that the relationship between the variables must be less than 0.80 [13]. This was because if it is more than 0.80, it may cause the multicollinearity. This meant the multicollinearity phenomenon was not found in the study. Therefore, it could be analyzed in the next stage by using Multiple Regression.

H₂: The quality of service factors of the Provincial Electricity Authority in Wanon Niwat District, Sakon Nakhon Province will affect the customer satisfaction.

Table 5
The hypotheses (H₂) testing

Quality of Service	Customer Satisfaction
The reliability of staff	✓
The ability of staff	✓
The staff response of customer reaction	✓
The customer accession	✓

✓ Had different statistically significant at 0.05

✗ Had not different statistically significant at 0.05

From Table 5, the findings showed the differences of those four items (the reliability of staff, the ability of staff, the staff response of customer reaction, and the customer accession) had a statistically significant difference at 0.5 in the customer satisfaction. Thus, H₂ was all supported.

Table 6
Result of the Multiple Regression Results

Quality of Service	Beta	t	sig
The reliability of staff	.360	9.13	.000
The ability of staff	.165	4.17	.000
The staff response of customer reaction	.178	4.99	.000
The customer accession	.378	12.09	.000

* P < .05

Table 6 presented the results analyzed by the Multiple Regression Method. It showed that the differences of the quality of service factors including the reliability of staff, the ability of staff, the staff response of customer reaction, and the customer accession had a statistically significant difference at 0.5 in the customer satisfaction. It affected the customer satisfaction (P < .05). Therefore, H₂ was all supported.

CONCLUSIONS

From the study of factors affecting satisfaction of Provincial Electricity Authority at Wanon Niwat District, Sakon Nakhon Province, it found that personal factors such as gender, age, occupation, status and salary affected on the customer satisfaction. There was only one variable, education level, which did not affect. In addition, the result revealed that the quality of service factor, including of the reliability of staff, the ability of staff, the staff response of customer reaction and the customer accession, all affected to the customer satisfaction.

The result of this study could be used as a model in the organization to adjust appropriately with the customer requirement in changed time. For example, at the present as Thailand 4.0 period, customers always stress on the convenience; hence, Provincial Electricity Authority created Application PEA Smart Plus to be easier to pay for electricity bill, find payment counter, request for a new electricity account, request for a meter returning in stopped electricity case, calculate electricity bill, inform electricity problems, inform information and show contact details.

If the organization takes the result from this study to be advantage, it would influence to customers to be satisfied with PEA service and it would react that PEA is the leading organization of the excellent and modern service.

For the limitation in this study is the specific data collecting in Provincial Electricity Authority area of Wanon Niwat District, Sakon Nakhon Province; therefore, the researcher could access particular data. In the further research might provide the data collecting to Provincial Electricity Authority and study other factors that have the effects on the organizations such as work motivation or organizational commitment.

REFERENCES

- [1] Yamane, T. (1967), "Statistic: an introductory analysis", *New York: Harper & Row*.
- [2] Maslow, A. M. (1970), "Motivation and Personality", *New York: Harper & Row*.
- [3] Barry, V. (1986), "Moral Issues in Business", Belmont, *California: Wadsworth*.
- [4] Tse, D.K. & Wilton, P.C. (1988), "Models of Consumer Satisfaction Formation: An Extension", *Journal of Marketing Research*, No. 25, Pp. 204-212.
- [5] Jones, T.O. and Earl Sasser, W. Jr. (1995), "Why satisfied customers defect", *Harvard Business Review*, Vol. 73, No. 6, Pp. 88-99.

- [6] De Fleur, M. (1996), “Theories of mass communication” , *New York: A liberal art perspective, Boston: Houghton Mifflin.*
- [7] Kotler, P. (1997). “Marketing management: analysis, planning implementation and control”, 9th ed., *New Jersey: Asimmon&Schuster.*
- [8] Oliver, Richard L. (1997), “Satisfaction: A Behavioral Perspective on the Consumer”, *The McGraw-Hill Companies, Inc.* New York.
- [9] Kotler, P.(2003), “Marketing management”, 10th ed., *New Jersey: Prentice Hall Inc.*
- [10] Muanprasert, K. (2005), “Attitude relating to employee’s performance behavior in organization of Kuwait Petroleum (Thailand) Co.,Ltd”, Thesis Study Report, *Srinakharinwirot University, Thailand.*
- [11] Douglas, C.M. (2007), “Design and Analysis of Experiments”, 6th ed., *John Willey & Sons, Inc.* New York.
- [12] Kotler, P. & Keller, K. L., (2009), “Marketing management”, 13th ed., *New Jersey: Pearson Education, Inc.*
- [13] Hair, J. F., Black, W. C., Babin, B. J. & Anderson, R. E. (2010), “Multivariate data analysis”, 7th ed., *New Jersey: Prentice Hall.*
- [14] Provincial Electricity Authority.(2012), “Annual Report 2012”, URL: <http://www.pea.co.th>
- [15] Wanon Niwat Provincial Electricity Authority. (2016), “Suggested Wanon Niwat Provincial Electricity Authority”, *Sakon Nakhon: Wanon Niwat Provincial Electricity Authority.*
- [16] Wanon Niwat Provincial Electricity Authority. (2017), “Suggested Wanon Niwat Provincial Electricity Authority”, *Sakon Nakhon: Wanon Niwat Provincial Electricity Authority.*

Factors Influencing the Organizational Citizenship Behavior and Staff Performance

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ABSTRACT

This research aimed to study the influence of organizational commitment and leadership characteristic on the organizational citizenship behavior and the staff performance. In addition, this research examined the impact of the organizational citizenship behavior on the staff performance. Data was collected from a sample of 400 staffs who have worked in the Office of Highway 3 (Sakon Nakhon), Sakon Nakhon Province, Thailand. A questionnaire was used to collect data. The hypothesis testing was analyzed by multiple regression analysis. The results revealed that firstly, the organizational commitment (affective commitment and continuance commitment) significantly impacted the organizational citizenship behavior. Next, the organizational commitment (continuance commitment and normative commitment) significantly affected the staff performance. Furthermore, the results presented that the leadership characteristic (transformation leadership, transactional leadership and laissez-faire leadership) significantly impacted the organizational citizenship behavior. However, there were only 2 leadership characteristic that affected the staff performance, which were transformation leadership and laissez-faire leadership. Moreover, the staff performance was impacted by the organizational citizenship behavior. Several research implications were discussed and avenues for future research were offered.

Keywords– Organizational commitment, Leadership characteristic, Organizational citizenship behavior, Staff performance

INTRODUCTION

Background

The department of highways is responsible for constructing, rehabilitating, developing, and maintaining Thailand's highways, special highways, and concession highways following the highway act and the related acts. In addition to the responsibilities, the organization has to coordinate with another organization working on roads and highways as well as those related organizations in Thailand and foreign countries. Also, the organization is responsible for the other duties that are assigned or required by the department or the Cabinet [17].

For the office of highways 3 (Sakon Nakhon), there are different types of the staff that are government officials, government employees, temporary employees, and permanent employees. These staff has their own individual roles, duties, and functions that have been assigned by their manager or supervisor. In so doing, the manager has to match their duties with his subordinates' knowledge and individual expertise. Also, the manager is responsible for the organizational development and progress to keep up with new technologies. Also, the manager has to encourage his employees to love each other, be in unity, be able to work well with each other, and improve themselves continuously. These policies are from the head of the organization manager [18].

According to the information about the roles and responsibilities mentioned previously, the manager is one of the persons who are responsible for planning the personal management in the organization for effective performance. This is because the staff is the important human resources that could help the organization run effectively and achieve its goals. If the manager plans and assigns any jobs to the right

person, the performance will be more effective. Also, the one who is assigned to do what he is expertized will love his job and willingly work on it. Therefore, the manager should motivate his subordinates' performance and be royal to his personnel. This could strengthen the personnel's organization commitment, and they will show their willingness to stay or continue working for the organization. Therefore, the Office of Highway 3 (Sakon Nakhon), Thailand essentially maintains the quality personnel's retention by motivating their performance and organization commitment. When the staff could receive satisfied rewards, they are encouraged work creatively and effectively in order for achieving the objectives of the organization [19].

From the above problems, the researcher was interested in studying the factors affecting the performance of personnel in the Office of Highway 3 (Sakon Nakhon). In so doing, it could be utilized in enhancing and developing the personnel's organization commitment. This commitment is considered to be an anchor that will motivate the personnel to love his workplace and satisfy to work with the organization. Also, the information gathered from the study could be used in the human resources management which can reduce some problems e.g. personnel's resignation. In addition, the management can strengthen the staff's loyalty of the organization. Moreover, the information could be adapted to the policies of the personnel management and organization to be more effective. The findings may also be useful to other organizations to consider in the development and the working motivation for the personnel in the organization.

Objectives

- 1 . To study the influence of organizational commitment on organizational citizenship behavior of the Office of Highway staffs.
2. To study the influence of leadership characteristic on organizational citizenship behavior of the Office of Highway staffs.
- 3 . To study the influence of organizational citizenship behavior on staff performance of the Office of Highway staffs.

LITERATURE REVIEW

Organizational Commitment

The definitions of the organizational commitment have been defined by several scholars. The organizational commitment as the level of one's feeling or commitment to the organization in which it operates. The commitment consists of acceptance of the organization's values and goals, intention to work with the organization, and desire to maintain a part of the organization [11]. Similarly, the organizational commitment refers to a person's levels of engagement with the organization, desire to use available talent for the organization, and desire to be a part of the organization [8]. In addition, the organizational commitment refers to a sense of belonging to the organization, having a consistent attitude toward the goals and values of the organization, and desiring to work as a part of the organization. Therefore, with consideration of the definitions mentioned earlier, it can be concluded that the organizational commitment is the staff's feeling of love, perseverance, intention, and commitment toward the organization [9].

Three elements of the organizational commitment as follows: [3]

1. Affective commitment is the emotional commitment of employees toward the organization. Employees feel that they engage and belong to the organization. So, they will devote to work and feel proud of their jobs.
2. Continuance commitment means the engagement that the staff adheres to the organization, fell certain, and want to continue working for the organization. The longer they have been in the organization, the more their organizational loyalty will be.
3. Normative commitment means the employees' engagement that is from their social norms or values. Also, they adhere to the organization's rules and policies. Therefore, they could work in unison.

Leadership Characteristic

"Leadership" is the behavior influencing others to understand and agree with the set goals and ways to achieve them. It also helps the efforts of individuals and groups to achieve common goals [12]. Moreover,

a leadership refers to the use of the head's individual influence to help a group or organization achieve its goals [8]. Leadership is the process of persuading and actively supporting the achievement of objectives [14]. In other words it refers to the process of persuading or using various means to encourage the group to achieve its goals [6]. In conclusion, it could be concluded that the leadership is the behavior of influential superiors to persuade subordinates to adhere, and it can help the organization achieve its targeted goals. The commander can change or adapt an operation or working process to suit his subordinates by building their confidence and creating goals or objectives. This could help the subordinates willingly change and work on their assignments.

Three types of the leadership based on their full-scale leadership model that the leadership component analysis was used in proposing. Those types are (1) transformational leadership, (2) transactional leadership, and (3) laissez-faire leadership, and the explanations are as follows: [4].

1. Transformational leadership refers to how a supervisor influences a co-worker or subordinate on development of his talent to a higher potential level. In so doing, the supervisor behaves as a role model, respects others, and motivates his subordinates to recognize different problems. Also, it includes encouraging followers and trying to find new solutions as well as providing each subordinate individual care. This could motivate subordinates to work more for their organizational benefits than they used to do.

2. Transactional leadership refers to the way which the head supervisors give rewards to the co-workers and subordinates as a motivation for their performing as expected. With this, the organizational goals will be achieved, and mostly the head supervisor gives his subordinates external rewards. In addition, the head supervisors will understand the followers' needs that could help them to achieve the goals. This creates a relationship between the reward and the goal.

3. Laissez-faire leadership refers to the way in which the supervisor indicates no effort is being made. Also, he shows no responsibility, no recognition, and no enthusiasm for the colleagues' work performance. This is to avoid making decisions and escape problems.

Organizational Citizenship Behavior

The good organizational behavior is defined as an act that is not defined in the official functions or rules of the organization, and the members of the organization carry out their assigned roles and beyond. It is the behavior that promotes the organization functions especially in the workplace which changes dynamically, and the members of the organization are more responsible. It can help the organization succeed [15]. The behavior is being a good organization member which is beyond what is determined or set by the organization; however, it help the organization achieve its goals [9]. Furthermore, the behavior is a good member of the organization, which means that behavior is beyond the formal function, but it is a behavior that is essential to the survival of the organization or is important to the organization's image and acceptance [7].

In short, it can be said that the behavior of being a good organization member is a staff or personnel's sincere expression and willingness that he shows toward his colleagues, subordinates, and organization. However, the staff does not recognize the following results of his behavior. This behavior could enhance the organization's effectiveness and operation in order for making the best benefit for the organization.

Staff Performance

The definition of staff performance has been defined by several scholars. The performance is a part of a job description and how the employee's performance should be assessed [13]. Also, the expected standard that employees have to achieve could be set or determined. The staff performance is a decision-making process focusing on data management and having the reflective goals. This is to help improve the working performance, and any useful information for employees is also provided [10]. In addition, the performance means measureable behavior that is in line with a supportive approach of an organization [5].

In short, it can be concluded that the work performance is the quality of completing or doing any assigned work in order to meet the set objectives or goals. This could make the organization more efficient and productive.

CONCEPTUAL MODEL AND HYPOTHESIS

H₁ : The organizational commitment of the staff in the Office of Highway affects the organizational citizenship behavior.

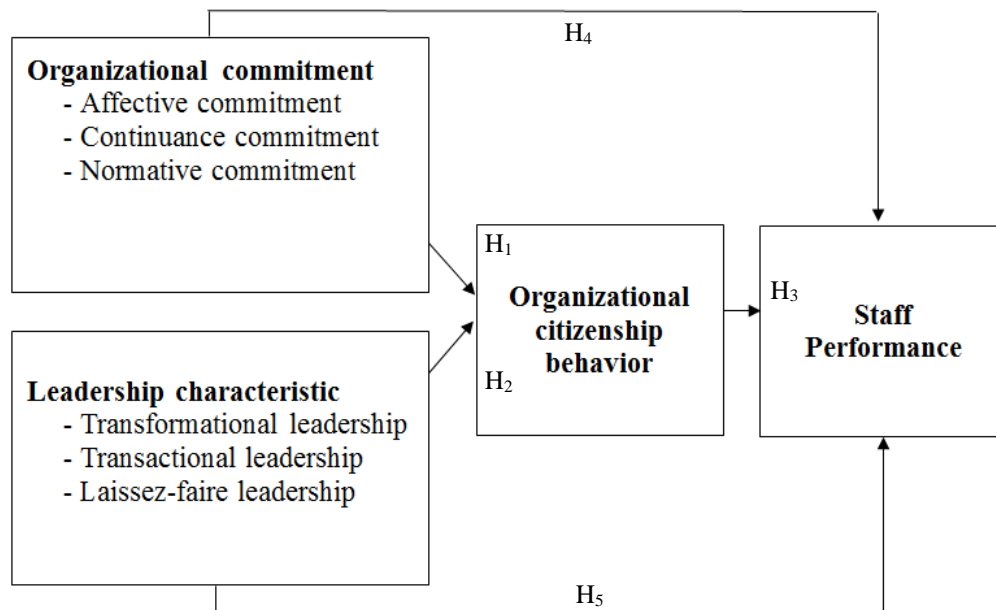
H₂ : The leadership characteristic of the Office of Highway affects the organizational citizenship behavior.

H₃ : The organizational citizenship behavior influences the staff performance of the Office of Highway

H₄ : The organizational commitment influences the staff performance of the Office of Highway

H₅ : The leadership characteristic influences the staff performance of the Office of Highway

Figure1
A Conceptual Model



RESEARCH METHODOLOGY

Sample Selection and Data Collection

The sample size used in this research was 400 persons in the Office of Highway 3 (Sakon Nakhon). The sample size was calculated by using the Yamane formula [2]. In this research, the questionnaire was used as a tool to collect the data. The questionnaire was divided into 5 parts. The first one was a personal questionnaire consisting of 6 questions about gender, age, education level, status, working period, and average monthly income. The part two was a questionnaire about the opinions on the organizational commitment including 14 questions. The third part consisted of 15 questionnaires. The fourth part consisted of 12 questionnaires. Also, the section five was a questionnaire about the working performance results of the office of highways 3, and there were seven questionnaires in this part.

Method

Pearson's Correlation was used to determine the relationship of the independent variables according to research conceptual model. The objective was to find multicollinearity among the independent variables to avoid unreliable and unstable estimates of regression coefficients. Thus, correlation analysis between the independent variables was showed in Table 1.

Table 1 showed the analysis of the relationship between the independent variables. After the analysis, it showed that the highest value was 0.270. So, this was supported by Hair et al who stated that the relationship between the variables must be less than 0.80 [16]. This was because if it is more than 0.80, it may cause the

multicollinearity. This meant the multicollinearity phenomenon was not found in the study. Therefore, it could be analyzed in the next stage by using Multiple Regression.

Table 1
Result of the Correlation analysis between Independent Variables

Variables	OC	LC	OCB	SP
Organizational commitment OC	1			
Leadership characteristic LC	.167**	1		
Organizational citizenship behavior OCB	.270**	.086**	1	
Staff performance SP	.035**	.214**	.047**	1

* P < .05, ** P < .01

(OC = Organizational commitment, LC = Leadership characteristic, OCB = Organizational citizenship behavior, SP = Staff performance)

In the questionnaire's reliability test, the research adopted Cronbach's coefficient alpha in order to analyze the confidence coefficient (α) [1]. The results were reported in the Table 2 that were the affective commitment was 0.826, the continuance commitment was 0.858, the normative commitment was 0.829, the transformational leadership was 0.706, the transactional leadership was 0.773, the laissez-faire leadership was 0.901, the organizational citizenship behavior was 0.874, and the staff performance was 0.911.

Table 2
Result of the Reliability Measurement

Items	Cronbach alpha
Affective commitment	.826
Continuance commitment	.858
Normative commitment	.829
Transformational leadership	.706
Continuance commitment	.773
Laissez-faire leadership	.901
Organizational citizenship behavior	.874
Staff performance	.911

RESULT

The research results were analyzed by using the statistical package for social science (SPSS). The research findings and the hypothesis testing in this study were described in this section.

In terms of the basic information of the respondents, the survey data showed that the 52.20% of whom were female. Also, the average ages of who were between 30 to 40 years old 43.00%. For their education, the majority of the respondents 52.30% have earned bachelor's degrees. In terms of the marital status, the most of them 53.80% were single. For the working period, the 40.50% of them has worked for the organization for less than five years. Also, the 43.80% of them monthly received the less than 10,000 baht in average. The information mentioned was reported in Table 3.

Table 3
Description of the respondents

n = 400

Demographic information		Numbers of respondents (NR)	Percentage of NR to number of TR*
Sex	Male	191	47.80%
	Female	209	52.20%
Age	Under 30 years	122	30.40%
	30-40 years	172	43.00%
	41-50 years	29	7.30%
	More than 50 years	77	19.30%
Education	Bachelor's degree or below	160	40.00%
	Bachelor's degree	209	52.30%
	Master degree or above	31	44.90%
Marital status	Single	215	53.80%
	Married	163	40.80%
	Divorce	22	5.50%
Number of years in work	Less than 5 years	162	40.50%
	5-10 years	93	23.30%
	11-15 years	36	9.00%
	More than 15 years	109	27.30%
Monthly income	Less than 10,000 baht	175	43.80%
	10,000-20,000 baht	24	6.00%
	20,001-30,000 baht t	101	25.30%
	More than 30,000 baht	100	25.00%

* TR denotes total respondents.

Hypothesis Testing

H₁: The organizational commitment of the staff in the Office of Highway affects the organizational citizenship behavior.

Table 4 presented the results analyzed by the Multiple Regression Method. It showed that the differences of the organizational commitment factors including affective commitment, and continuance commitment had a statistically significant difference at .05 in the organizational citizenship behavior. On the other hand, normative commitment had not statistically significant difference at .05. Therefore, H₁ was partial supported.

Table 4
Result of the multiple regression results

Organizational citizenship behavior	Beta	t	Sig.
Organizational commitment			
- Affective commitment	.293	4.293	.000
- Continuance commitment	.249	3.945	.000
- Normative commitment	.017	.288	.773

* P < .05

H₂: The leadership characteristic of the Office of Highway affects the organizational citizenship behavior.

Table 5 presented the results analyzed by the Multiple Regression Method. It showed that the differences of the leadership characteristic factors including transformation leadership, transactional leadership, and laissez-faire leadership had a statistically significant difference at .05 in the organizational citizenship behavior. It affected the leadership characteristic. Therefore, H₂ was all supported.

Table 5
Result of the multiple regression results

Organizational citizenship behavior	Beta	t	Sig.
Leadership characteristic			
- Transformation leadership	.379	7.374	.000
- Transactional leadership	.124	2.365	.018
- Laissez-faire leadership	-.098	-2.104	.036

* P < .05

H₃: The organizational citizenship behavior influences the staff performance of the Office of Highway

Table 6 presented the results analyzed by the Multiple Regression Method. It showed that the differences of the organizational citizenship behavior factors including staff performance had a statistically significant difference at .05 in the organizational citizenship behavior. It affected the staff performance. Therefore, H₃ was all supported.

Table 6
Result of the multiple regression results

Staff performance	Beta	t	Sig.
Organizational citizenship behavior	.476	10.794	.000

* P < .05

H₄: The organizational commitment influences the staff performance of the Office of Highway

Table 7 presented the results analyzed by the Multiple Regression Method. It showed that the differences of the organizational commitment factors including staff performance had a statistically significant difference at .05 in the affective commitment, continuance commitment, and normative commitment. It affected the staff performance. Therefore, H₄ was all supported.

H₅: The leadership characteristic influences the staff performance of the Office of Highway

Table 8 presented the results analyzed by the Multiple Regression Method. It showed that the differences of the leadership characteristic factors including staff performance had a statistically significant difference at .05 in the transformation leadership, transactional leadership, and laissez-faire leadership. It affected the staff performance. Therefore, H₅ was all supported.

Table 7
Result of the multiple regression results

Staff performance	Beta	t	Sig.
Organizational commitment			
- Affective commitment	.575	14.028	.000
- Continuance commitment	.513	11.927	.000
- Normative commitment	.480	10.911	.000

* P < .05

Table 8
Result of the multiple regression results

Staff performance	Beta	t	Sig.
Leadership characteristic			
- Transformation leadership	.546	12.998	.000
- Transactional leadership	.323	6.815	.000
- Laissez-faire leadership	.186	3.769	.000

* P < .05

CONCLUSIONS AND FUTURE WORK

From the study of factors influencing the organizational citizenship behavior and staff performance. The results of the first hypothesis testing found that the organizational commitment composed of; affective commitment, and continuance commitment were statistically significant at 0.05 level on the difference of organizational citizenship behavior, while only using normative commitment was not statistically significant at 0.05 level on the difference of level of organizational citizenship behavior. The second hypothesis testing found that, the leadership characteristic in the aspect of transformation leadership, transactional leadership, and laissez-faire leadership were statistically significant at 0.05 level of the influence on the organizational citizenship behavior. The third hypothesis testing found that, organizational citizenship behavior were statistically significant at 0.05 level of the influence on the staff performance. The fourth hypothesis testing found that, organizational commitment composed in the aspect of affective commitment, continuance commitment, and normative commitment were statistically significant at 0.05 level of the influence on the staff performance. The fifth hypothesis testing found that, leadership characteristic composed in the aspect of transformation leadership, transactional leadership, and laissez-faire leadership were statistically significant at 0.05 level of the influence on the staff performance.

The result of this study can be used as a guideline for organizational commitment and leadership characteristic. To benefit the organization in the management of personnel and management in the organization to be more efficient and effective. The agency may also provide training in personnel management. Observing the behavior of collaborating personnel. Evaluate the work by keeping track of the ongoing work.

For the limitation in this study is the specific data collecting in the Office of Highways 3 (Sakon Nakhon); therefore, the researcher should examine the sample in a bigger area, the Office of Highways in the Northeast, in order to investigate the differences results. Moreover, Future research may extend this research by studying with qualitative techniques including focused-group or in-depth interview or study other factors which affect the quality of work life or organizational climate, such as work motivation.

REFERENCES

- [1] Cronbach, L. J. (1951), "Coefficient Alpha and the Internal Structure of Tests", *Psychometrika*. (16): 297-334.
- [2] Yamane, T. (1967), "Statistics: An Introductory Analysis", *New York: Harpe*.
- [3] Allen, B. D. & J. P. Meyer (1990), "The Measurement and Antecedents of Affective, Continuance and Normative Commitment to the Organization", *Journal of Occupational Psychology*, Vol. 63, Pp. 1-18.
- [4] Bass, B. M. & B. J. Avolio (1991), "Developing Transformational Leadership: 1992 and Beyond", *Journal of European Industrial Training*, Vol. 14, No. 5, Pp. 1-32.
- [5] Cook, C. W. & P. L. Hansaker (2001), "Management and Organization Behavior", 3rd ed. *New York: McGraw - Hill, Inc.*
- [6] Haslam, A. (2004), "Psychology in Organization", 2nd ed. *London*.
- [7] Hellriegel, D. and J. W. Slocum (2004), "Organizational Behavior", 10th ed., *Cincinnati, Ohio: South – Western*.
- [8] Greenberg, J. (2005), "Managing Behavior in Organizations", 4th ed., *New Jersey: Pearson /Prentice Hall*.
- [9] George, J. M. and G. R. Jones. (2005), "Understanding and Managing: Organizational Behavior", 2nd ed. *Massachusetts: Addison - Wesley*.
- [10] Muchinsky, P. M. (2006), "Psychology Applied to Work: An Introduction to Industrial and Organizational Psychology", 8th ed., *California: Thomson Higher Education*.
- [11] Schultz, D. P. & S. E. Schultz (2006), "Psychology and Work Today", 9th ed. *New Jersey: Pearson Education*.
- [12] Yukl, G. A. (2006), "Leadership in Organizations", 6th ed. *New Jersey: Prentice - Hall*.
- [13] Aamodt, M. G. (2007), "Industrial/Organizational Psychology: An Applied", 5th ed. *United States of America: Wadsworth/Thomson Learning*.
- [14] Newstorm, J. W. (2007), "Organizational Behavior: Human Behavior at Work", 9th ed. *New York: United States of America: McGraw - Hill, Inc.*
- [15] Robbins, P. S. (2009), "Organizational Behavior", *New Jersey: Pearson Education*.
- [16] Hair, J. F., Black, W. C., Babin, B. J. & Anderson, R. E. (2010), "Multivariate data analysis", 7th ed., *New Jersey: Prentice Hall*.
- [17] Department of Hightway (2016), "Strategic Plan", URL: http://www.doh.go.th/doh/th/goverment/plan-doh/540-doh_strategic.html
- [18] Department of Hightway (2016), " Plan Human Resource Management", URL: <http://www.doh.go.th/doh/th/details/252-mrs-suntaree-surapan.html>
- [19] Office of Highways 3 (Sakon Nakhon) (2017), "Mission and Functions", URL: http://www.boh3.com/web/index2.php?option=com_content&view=section&layout=blog&id=45&Itemid=151

The Influence of Leadership and Quality of Work Life on Organizational Commitment of Hospital Staff, Thailand

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ABSTRACT

Research Objectives were as follow: 1) to study leadership of management level staff of Regional Sakon Nakhon Hospital 2) to study the quality of work life of the staff of Regional Sakon Nakhon hospital 3) to study the organizational commitment of the Sakon Nakhon hospital staff 4) to study the differences in quality of work life and organizational commitment of Regional Sakon Nakhon hospital staff classified by personal factors 5) to study the influence of leadership and quality of work life on organizational commitment of Regional Sakon Nakhon hospital staff.

This research was a quantitative research. The population consists of 1,939 staffs (Sakon Nakhon Regional Hospital) [24] of the hospital divided into 4 sections: medical department, nursing department, medical support department, and administrative department. The sample size was 410 samples. Sampling was done by proportional sampling and simple random sampling method. Data Collection by Questionnaire, this includes questions about transformational leadership 12 items, 27 quality of work life questions, and 13 questions about organizational commitment. Content validity was reviewing relevant documents, and the reliability testing of the variables was used of Cronbach's alpha coefficient, which measured the reliability of transformational leadership, quality of work life, and organizational commitment were .974, .951 and .949 respectively. The statistics used for the data analysis were frequency, percentage, mean, standard deviation. The hypothesis testing was used t-test, F-test (One-Way ANOVA), Pearson's product moment correlation coefficient and path analysis.

The research found that the mean of transformational leadership, quality of work life, and organizational Commitment was 3.694, 3.382 and 3.673 respectively. Personal factors were not statistically significantly different at 0.05 levels on quality of work life and organizational commitment. Transformational leadership had a positive influence on organizational commitment through quality of work life.

Keywords– Transformational Leadership, Quality of Work Life, Organizational Commitment

INTRODUCTION

Background

The health situation in Thailand states that Thai people are at risk of changing its population structure into an older society, declining in labor force and the healthy problems in elderly tend to be higher (Office of the National Economics and Social Development Board) [23]. A Thailand development strategy was formulating the public health goal to distribution of public services, including education, public health and social welfare, to cover all areas of the country. Because the Ministry of Public Health. It is an agency that has to bear the burden of providing public health services to most people in the country. The agency is governed by the government, which the most urgent needs reform, because there are many problems in public health services of the Ministry of Public Health. Therefore, it will propose problems in public health

service of the Ministry of Public Health, for the safety of patients and wellbeing of the people and public servants working for the people. At present, the Ministry of Public Health's has several important problems such as; lack of proper personnel, lack of proper budget, lack of buildings, facilities, technology, materials, supplies, medical supplies, over personnel workload, and too much patients.

Sakon Nakhon Regional Hospital was the center of public health facilities in Sakon Nakhon province and neighboring provinces. Sakon Nakhon province had a population of 1,149,472 people (The Bureau of Registration Administration of Thailand.) [25], and Sakon Nakhon Regional Hospital had 433,942 patients per year. [24] It was responsible for receiving patients with complications from the neighborhood. From this cause it was result in quality of work life and staffs' organizational commitment. From the literature review, it was found that significant factors affecting the organizational commitment of the personnel consisted of leadership and quality of work life. To solve this problem, the administrative team and the supervisor of the hospital are the key persons that influence the success of the organization. Leaders must inspire staffs to get excited about the firm and their work, pushing them to excel and helping them along the way. Leaders are also tasked with protecting the employees under their supervision from internal and external threats, including everything from political backstabbing to physical security. Mosadeghrad and Ferdosi [16] had explained employees' job satisfaction and commitment depends upon the leadership style of managers. In addition to, quality of work life is a fact that an individual's life can't be compartmentalized and any disturbance on the personal front will affect his/her professional life and vice-versa. A good work life balance is also what motivates staff the most to perform well at his or job and also spend quality time with the family. Therefore, organizations have started to focus on the overall development and happiness of the staff for their motivation, reducing his/her stress levels without jeopardizing the economic health of the organization, and get more organization commitment. For the above reasons, researchers were interested in studying "The Influence of Leadership and Quality of Work Life on Staff Organizational Commitment of Regional Sakon Nakhon Hospital". This will be beneficial to the development of leadership development policies for management personnel, development of quality of working life. This leads to an increase in the staffs' organizational commitment of hospital in the future.

Objectives

1. To study leadership of management level personnel of Region Sakon Nakhon Hospital
2. To study the quality of work life of the staff of Regional Sakon Nakhon hospital
3. To study the organizational commitment of the Sakon Nakhon hospital staff
4. To study the differences in quality of work life and organizational commitment of Regional Sakon Nakhon hospital staff classified by personal factors
5. To study the influence of leadership and quality of work life on organizational commitment of Regional Sakon Nakhon hospital staff

LITERATURE REVIEW

Transformational Leadership

Leadership had a concept evolution in many aspects; Thousands of empirical investigations of leaders have been conducted over the last 75 years. Still, no clarity has been reached as to what distinguishes leaders from non-leaders, or effective leaders from ineffective leaders (Bennis and Nanus) [6]. Transformation leadership concept was raised up since 1970. Research on leader' trait theory and implicit leadership theory have been reinvigorated by investigational studies on transformational leadership presented by Bass and Avolio [5]. Spahr [21] was explained transformational leadership inspires people to achieve unexpected or remarkable results. It gives workers autonomy over specific jobs, as well as the authority to make decisions once they have been trained. Some of the basic characteristics of transformational leadership are inspirational, in that the leader can inspire workers to find better ways of achieving a goal; mobilization, because leadership can mobilize people into groups that can get work done, and morale, in that transformational leaders raise the well-being and motivation level of a group through excellent rapport. They are also good at conflict resolution. All of these traits make transformational leadership a good fit for many types of business. Bass and Avolio [5] said transformational leadership may

be found at all levels of the organization: teams, departments, divisions, and organization as a whole. For bringing major changes, transformational leaders must exhibit the following four factors: 1) Inspirational Motivation: The foundation of transformational leadership is the promotion of consistent vision, mission, and a set of values to the members. They work enthusiastically and optimistically to foster the spirit of teamwork and commitment. 2) Intellectual Stimulation: Such leaders encourage their followers to be innovative and creative. They encourage new ideas from their followers. 3) Idealized Influence: The leaders act as role models that followers seek to emulate. Such leaders always win the trust and respect of their followers through their action. They typically place their followers needs over their own, sacrifice their personal gains for them, and demonstrate high standards of ethical conduct. 4) Individualized Consideration: The followers are treated differently according to their talents and knowledge. They are empowered to make decisions and are always provided with the needed support to implement their decisions. Orabi [22] was study “The Impact of Transformational Leadership Style on Organizational Performance: Evidence from Jordan” define transformational leadership in 4 aspects similar to Bass and Avolio [5] This research was used the concept of transformational leadership by adapted from Bass and Avolio [5] and Orabi [22].

Quality of Work Life

The quality of work life (QWL) is getting greater proportions, due to advances of studies on the subject, which was retaken in 1974 due to the global energy crisis and inflation. Walton [1] pointed out eight indicators of quality of work life composed of, 1) adequate and fair compensation 2) safe and healthy working conditions 3) opportunity to use and develop human capacities 4) opportunity to growth and security 5) social integration in the work organisation 6) constitution in the work organisation 7) work and total life span and 8) social relevance of work life. QWL is a way of thinking about people, work, and organizations (Nadler and Lawler) [4]. Martel and Dupuis [12] suggested definition of QWL as follows: Quality of work life, at a given time, corresponds to the condition of an individual in his or her dynamic pursuit of his or her hierarchically organized goals within work domains where the reduction of the gap separating the individual from these goals is reflected by a positive impact on the individual's general quality of life, organizational performance, and consequently to the overall functioning of society. In recent years, ethics, quality of work life (QWL) and job satisfaction are increasingly being identified as progressive indicators related to the function and sustainability of organizations (Koonmee et al.,). [15] Renuka et al. [18] nowadays Quality of Work Life is drawing more importance globally, organizations are facing many issues related to human resource of which, employee stability is one of the major problem and addressing it is a top most priority. Amongst various reasons for employee stability the Quality of Work Life is one among them. Quality of work Life is a multidimensional construct and it has been influenced by many variables. The following nine significant dimensions were identified based on factor analysis: Work environment, Organization culture and climate, Relation and cooperation, Training and development, Compensation and Rewards, Facilities, Job satisfaction and Job security, Autonomy of work and Adequacy of resources. This research was adapted of the concept of quality of work life from Walton [1], and Renuka et al. [18] by classified in 9 factors.

Organizational Commitment

The main focus of this part was to explore the concept “organisational commitment”. The discussion includes the following aspects: theoretical background; definition of the concept; the concept organisational commitment has grown in popularity in the literature on industrial and organisational psychology (Cohen) [9]. Early studies on organisational commitment viewed the concept as a single dimension, based on an attitudinal perspective, embracing identification, involvement and loyalty (Porter, Steers, Mowday and Boulian) [2]. According to Porter et al. [2] an attitudinal perspective refers to the psychological attachment or affective commitment formed by an employee in relation to his identification and involvement with the respective organisation. Miller [10] also states that organisational commitment is “a state in which an employee identifies with a particular organisation and its goals, and wishes to maintain membership in the organisation”. Organisational commitment is therefore, the degree in which an employee is willing to maintain membership due to interest and association with the organization's goals and values. Arnold [11] namely that organization commitment was “the relative strength of an individual's

identification with and involvement in an organisation”. In addition, the literature review of this study also covers the composition of organizational commitment, Meyer and Nancy Allen [7] have identified three types of organizational commitment: affective, continuance, and normative. Mowday et al. [3] they advanced commitment as an alternative construct to job satisfaction and argued that commitment can sometimes predict turnover better than job satisfaction. Commitment was characterized by 3 related factors: a) a strong belief in and acceptance of the organization's goals and values b) a willingness to exert considerable effort on behalf of the organization c) a strong desire to maintain membership in the organization. In this research was used concept of Mowday et al. [3] as a guideline to construct organizational commitment measurement.

The Link between Leadership, Quality of Work Life, and Organizational Commitment

Many researches showed the relationships between leadership and quality of work as follows; Swamy [17] had study “Leadership styles and quality of work life in SMEs” Small and Medium Enterprises (SMEs) in India are currently facing the challenges of increased competitions. In such environment, labor retention is very important factor for competition and survival. In this context, appropriate leadership styles and Quality of Work Life (QWL) are very important factors for survival. Ping-Yi Lin et al. [20] had investigated “The influences of nursing transformational leadership style on the quality of nurses’ working lives in Taiwan: a cross-sectional quantitative study” Transformational leadership contributes significantly to supervisor support. Workplace support, particularly from the supervisor, is an important mediator variable that explains the relationship between transformational leadership and job satisfaction. Organisational commitment was the strongest factor relevant to the general health well-being in Taiwanese nurses than job satisfaction. The hypothesized positive relationships between transformational leadership and all variables were supported by the data. In the aspects of the link between quality of work life and organizational commitment, there were empirical evidences as follow; Gnanayudam and Dharmasiri [13] “The Influence of Quality of Work-life on Organizational Commitment: A Study of the Apparel Industry” the main objectives were to investigate the relationship between the Quality of Work Life (QWL) and organizational commitment. The hypothesis was stated as QWL prevailing in the apparel industry of Sri Lanka positively influences the worker commitment. The empirical study included a sample of eighty seven workers from twenty five factories in Sri Lanka, selected through a convenient sampling technique. Both hypotheses were accepted and recommendations made based on the findings.

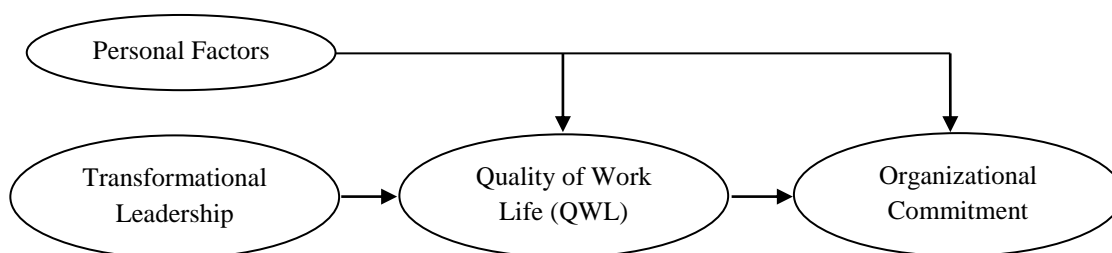
CONCEPTUAL MODEL AND HYPOTHESES

The research was aimed to investigate the impact of leadership of staff at the management on Quality of work life and Organizational commitment. Therefore the research hypotheses were:

H₁: Quality of Work Life and Organizational Commitment of Regional Sakon Nakhon hospital staff were different when classified by personal factors.

H₂: Leadership of staff at the management level has positive influence on Organizational commitment through Quality of Work Life.

Figure 1
The Research Conceptual Framework



RESEARCH AND METHODOLOGY

This research was a quantitative research. The population consists of 1,939 of the hospital divided into 4 sections: 1) medical department, 2) nursing department, 3) medical support department, and 4) administrative department. (Sakon Nakhon Regional Hospital) [24]. The sample size was 410 samples. Sampling was done by proportional sampling and simple random sampling method. Data Collection was by Questionnaire, this includes questions about transformational leadership, 12 items based on Bass and Avolio [5] and Orabi [22], 27 quality of work life questions adapted from Walton [1] and Renuka et al. [18], and 13 questions about organizational commitment adapted from Mowday et al. [3]. The reliability test was as the data in table 1.

Table 1
Reliability test

Variable	Cronbach Alpha Coefficient
Transformational Leadership	0.974
Quality of Work Life	0.951
Organizational Commitment	0.949

The statistics used for the data analysis were frequency, percentage, mean, standard deviation. The hypothesis testing was used t-test, F-test (One-Way ANOVA), Pearson's product moment correlation coefficient and path analysis.

ANALYSIS OF THE DATA

This research was used program for statistical analysis in social science to analysis of the data. The research finding and the hypothesis testing in this study were as follow. Table 2 had demonstrated the mean of all three variables

Table 2
Mean and standard deviation of research variables

Variables	Sub-variables	Mean	S.D.
Transformational Leadership	1. Inspirational Motivation	3.811	.802
	2. Intellectual Stimulation	3.627	.840
	3. Idealized Influence	3.680	.790
	4. Individualized Consideration	3.657	.812
Total Transformational Leadership		3.694	.756
Quality of Work Life (QWL)	1. Adequate and fair compensation	3.055	.868
	2. Safe and healthy working conditions	2.882	.864
	3. Opportunity to use and develop human capacities	3.663	.821
	4. Opportunity to growth and security	3.668	.789
	5. Social integration in the work organisation	3.569	.779
	6. Constitution in the work organisation	3.553	.765
	7. Work and total life span	3.304	.873
	8. Social relevance of work life	3.728	.718
	9. Sufficient resources	2.992	.880
Total Quality of Work Life		3.382	.599

Table 2 – (Continued)

Variables	Sub-variables	Mean	S.D.
Organizational Commitment	1. A strong belief in and acceptance of the organization's goals and values	3.659	.714
	2. A willingness to exert considerable effort on behalf of the organization	3.784	.691
	3. A strong desire to maintain membership in the organization	3.577	.893
Total Organizational Commitment		3.673	.664

The detailed analysis of each variable was as follows.

1. Data from respondents indicate that, 83.2% was females, age between 25-35 years 41.2%, marital status single 52.0% and married 42.9%, education 78.0% were undergraduate, work experience than 10 years was 49.0%, income was more than 30,000 baht / month 46.2%, position in operational level was 85.9%, and 62.7% was from nurse department respectively.

2. Mean and Standard deviation of research variables were as follow; Total mean of transformational leadership was at 3.694, when classified by sub-variables found that inspirational motivation was highest at 3.811, while the lowest mean was intellectual stimulation at 3.627. Total mean of quality of work life was 3.382, when classified by aspects found that, the highest mean was social relevance of work life at 3.728, while the lowest mean was safe and healthy working conditions at 2.882. Total organization commitment mean was 3.673, when classified by sub-variables found that, the highest was “a willingness to exert considerable effort on behalf of the organization” at 3.784, while the lowest was “a strong desire to maintain membership in the organization” at 3.577.

3. The hypothesis testing of this research.

H₁: Quality of Work Life and Organizational Commitment of Regional Sakon Nakhon hospital staff were different when classified by personal factors.

The research testing by t-test, and F-test (One Way ANOVA) was as follow:

Table 3
The different of quality of work life and organizational commitment when classified by personal factors

Age Range	Organization Commitment			
	\bar{X}	S.D.	F	Sig.
Below 25 years	3.607	.556	11.103	.000**
25-35 years	3.551	.613		
36-45 years	3.583	.697		
Above 45 years	3.987	.646		
Marital Status	Organization Commitment			
	\bar{X}	S.D.	F	Sig.
Single	3.616	.614	4.771	.009**
Marriage	3.695	.705		
Devoice	4.072	.672		

Table 3– (Continued)

Education	Quality of work life (QWL)			
	\bar{X}	S.D.	F	Sig.
Below Bachelor	3.627	.638	4.024	.008**
Bachelor	3.360	.580		
Above Bachelor	3.395	.639		
Education	Organization Commitment			
	\bar{X}	S.D.	F	Sig.
Below Bachelor	4.061	.489	7.970	.000**
Bachelor	3.613	.640		
Above Bachelor	3.829	.752		
Department	Quality of work life (QWL)			
	\bar{X}	S.D.	F	Sig.
Medical Department	3.360	.645	2.473	.044*
Nurse Department	3.342	.585		
Medical Support	3.437	.522		
Administrative Department	3.502	.693		
Department	Organization Commitment			
	\bar{X}	S.D.	F	Sig.
Medical Department	3.619	.693	4.752	.001**
Nurse Department	3.592	.658		
Medical Support	3.799	.526		
Administrative Department	3.937	.737		

The first hypothesis found that some personal factors such as gender, working experience, job position was not statistical significance at 0.05 levels different in quality of work life and organization commitment. However, the hypothesis testing found statistical significance at 0.05 levels different in some personal factors composed of; age range: in the group of 25-35 years and 36-45 years had lowest mean of organizational commitment, marital status: single group had the lowest in organizational commitment, education: the group of bachelor had lowest mean in both of quality of work life and organization commitment, department: the nurse department had lowest mean in both of quality of work life and organization commitment.

H2: Leadership of staff at the management level has positive influence on organizational commitment through quality of work life. Path analysis was used for hypothesis testing.

The second hypothesis is to study the influence of independent variables on dependent variable, was used Pearson's Product Moment Correlation Coefficient to determine the relationship of the independent variable, and Path analysis to study the influence of Leadership of management level staff on organizational commitment through quality of work life. The symbols used to analyze in this research were as follows.

LDS	Represent	Transformational Leadership
QWL	Represent	Quality of Work Life
COM	Represent	Organizational Commitment

Table 4
Correlation analysis between variables

	LDS	QWL	COM
LDS	1		
QWL	.644**	1	
COM	.512**	.721**	1

Table 4 showed that relationship the variables that are related not exceed 0.80, hair et al. [14] described the relationship between the independent variables must be less than 0.80, which is more than 0.80 may cause of Multicollinearity. This research found the relationship between the independent the highest value was 0.644, it was not exceed 0.80. Multicollinearity problem was not found. Therefore, it can be tested by using Path analysis to the next.

The research equations to predict influence of Transformational Leadership on Organizational Commitment through Quality of Work Life

$$QWL = \beta_1 LDS \quad \dots\dots\dots (1)$$

$$COM = \beta_2 QWL \quad \dots\dots\dots (2)$$

The results of the equations analysis were as follows.

$$QWL = .784 LDS \quad \dots\dots\dots (1)$$

(25.539)

$$R^2 = .615, SEE. = .376, F = 652.24, \text{Sig of } F = .000$$

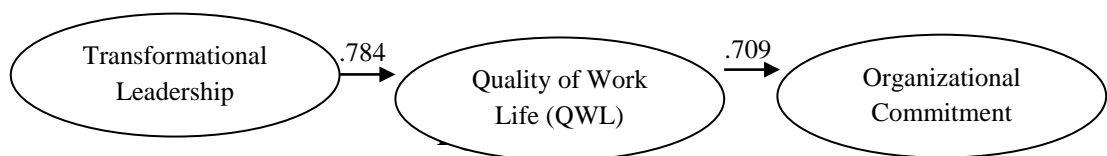
$$COM = .709 QWL \quad \dots\dots\dots (2)$$

(20.290)

$$R^2 = .520, SEE. = .486, F = 411.673, \text{Sig of } F = .000$$

Equations can be showed as Path analysis below.

Figure 2
Path analysis



The statistical analysis for the second hypothesis testing found that, the transformational leadership can explain the variation of quality of work life 61.50%, and Quality of Work Life can explain Organizational Commitment 52.00 %. The results reveled that the transformational leadership had statistically significant at 0.05 levels influence on quality of work life by standardize coefficient (β) .784, while quality of work life had statistically significant at 0.05 levels influence on organizational commitment by standardized coefficient (β) at .709 also.

CONCLUSION

The research was aimed to investigate the impact of leadership on quality of work life and organizational commitment. The research found that; leadership of management level personnel and organization commitment was higher than quality of work life (QWL). The low mean of quality of work life composed of; safe and healthy working conditions, sufficient resources, adequate and fair compensation. This was an issue that urgently needs to be addressed. Policy recommendations were as follows; Regional Sakon Nakhon

should be increased measures to promote the prevention of outbreaks of hospital-acquired infections, air filtration, appropriate temperature, light, unwanted odor control. Sound properly enough staff to handle the workload effectively. Equipment related to medical treatment or office supplies that are sufficient for the job, adequate budget support etc.

Theoretical contribution, this research revealed the influence of transformational leadership on organizational commitment through quality of work life (QWL), that was consisted with the research results of Gnanayudam and Dharmasiri [13], Swamy [18], Ping-Yi Lin et al. [20], however the investigation of this research showed independent variables could not explained the variance of dependent variable completely, it was still other factors that contribute to the quality of working life and organizational commitment such as organization culture, role of organization support, organizational agility etc. These variables are additional research in the future.

REFERENCES

- [1] Walton, R. E. (1973), "Quality of working life: what is it?", *Sloan Management Review*, Vol. 15, No. 1, Pp. 11-21.
- [2] Porter, L. W., R. M. Steers, R. T. Mowday, & P. V. Boulian, (1974), "Organizational commitment, job satisfaction, and turnover among psychiatric technicians", *Journal of Applied Psychology*, No. 59, Pp. 603-609.
- [3] Mowday, R. T., R. M. Steers, and L. W. Porter. (1982). "Employee organization linkages: The psychology of commitment, absenteeism, and turnover". *Academic Press*, 1st edition, New York.
- [4] Nadler, D. A. And Lawler, E.E. III (1983), "Quality of Work Life: Perspectives and Directions", *Organizational Dynamics*, Vol. 11, No. 3, Pp. 20-30.
- [5] Bass, B. M. & Avolio, B. J. (1994), "Improving Organizational Effectiveness through Transformational Leadership", 1st edition, *Sage Publications*, Thousand Oaks, California.
- [6] Bennis and Nanus. (1997), "Leaders: Strategies for Taking Charge" 1st edition, *Harper & Row*, New York.
- [7] Meyer, J. & Allen, N. (1997), "Commitment in the workplace: Theory, research, and application" 1st edition *Sage Publications*, Thousand Oaks, California.
- [8] Dubrin, J. (1998), "Leadership research finding: Practice and skills" 2nd edition, *Houghton Mifflin*, Boston
- [9] Cohen, A. (2003), "Multiple commitments in the workplace: an integrative approach" 1st edition, *Lawrence Erlbaum Associates*, Mahwah, New Jersey
- [10] Miller, K. (2003), "Values, attitudes and job satisfaction" In Robbins, S.P., Odendaal A. & Roodt, G. (eds), *Organisational Behaviour*, *Global and Southern African Perspectives*, Cape Town: Pearson Education, South Africa.
- [11] Arnold, J. (2005), "Work Psychology: Understanding Human Behaviour in the Workplace", 4th edition, *Prentice Hall Financial Times*, London.
- [12] Martel, J. P. & Dupuis, G. (2006), "Quality of Work Life: Theoretical and Methodological Problems, and Presentation of a New Model and Measuring Instrument", *Social Indicators Research*, Vol. 77 pp. 333-368.
- [13] Gnanayudam and Dharmasiri (2008), "The Influence of Quality of Work-life on Organizational Commitment: A Study of the Apparel Industry", *Sri Lankan Journal of Management*, Vol. 12, No. 3&4, Vol. 13, No 1&2.

- [14] Hair, J. F., Jr., Black, W. C., Babin, B. J., & R. E. Anderson. (2010), "Multivariate data Analysis", *Prentice Hall*, Upper Saddle River, NJ.
- [15] Koonmee et al., (2010), "Ethics institutionalization, quality of work life, and employee job-related outcomes: A survey of human resource managers in Thailand", *Journal of Business Research*, Vol. 63, issue 1, Pp 20-26
- [16] Mosadeghrad and Ferdosi. (2013), "Leadership, Job Satisfaction and Organizational Commitment in Healthcare Sector: Proposing and Testing a Model". *The Academy of Medical Sciences of Bosnia and Herzegovina*.
- [17] Devappa Renuka Swamy. (2015), "Leadership styles and quality of work life in SMEs". *International Journal of industrial*. Vol. 5, Issue 1 Pp. 65-78
- [18] Devappa Renuka Swamy. (2015), "Quality of Work Life: Scale Development and Validation". *International Journal of Caring Sciences*. Vol. 8, Issue 2, Pp. 281
- [19] Oon Fok-Yew. (2015), "The Relationship between Transformational Leadership and Followers' Work Characteristics and Task Performance." *International Journal of Academic Research in Business and Social Sciences*. Vol. 5, No. 6.
- [20] Ping-Yi Lin et al. (2015), "The influences of nursing transformational leadership style on the quality of nurses' working lives in Taiwan: A cross-sectional quantitative study." *BMC Nursing*. Vol. 14, No. 33.
- [21] Spahr, P (2015), "What is Transformational Leadership? How New Ideas Produce Impressive Results". URL: <http://online.stu.edu/transformational-leadership>, February 20, 2018.

Quality of Work Life and Organizational Commitment Antecedents of Employees Resignation of Palm Industry, Thailand

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ABSTRACT

The purposes of this study were to; 1) investigate quality of work life of Isan Palm Industry Development Co., Ltd. workforce 2) investigate organizational commitment of Isan Palm Industry Development Co., Ltd. 3) identify employees resignation of Isan Palm Industry Development Co., Ltd. 4) identify differences between quality of work life, organizational commitment and employees resignation of Isan Palm Industry Development Co., Ltd. classified by personal factors 5) examine impacts of quality of work life and organizational commitment on employees resignation of Isan Palm Industry Development Co., Ltd.

In this research, the data of 145 operative information were collected from a local palm oil manufacturer; Isan Palm Industry Development Co., Ltd. Questionnaires were consisted of; 30 quality of work life (QWL)-related-questions adapted from the model of Walton [2], Easton and Laar [9], 12 questions of Organizational Commitment adapted from Meyer and Allenand [6], 11 questions of resignation intention compiled with Shikiar and Freudenberg. [5] Cronbach's alpha coefficient were used for rater reliability which revealed that the alpha coefficients of reliability for quality of work life, organizational commitment, and resignation intention were .935, .904 and .866 respectively. Statistics for analysis were frequency, percentage, mean, standard deviation, and the research hypothesis testing was used Pearson's correlation coefficient and path analysis.

These findings indicate that quality of work life and organizational commitment of supervisor and management level are high. Meanwhile, resignation intention of employee was moderate. Hypothesis testing reveals personal factors were divided into two facts which gender was affecting resignation intention and education affecting on quality of work life. Female tends to have more turnover ratio than male. Bachelor-degree-level-workforce or higher has the highest quality of work life, while secondary-school-level-workforce or lower had the lowest quality of work life. In consequence, quality of work life had influence on organizational commitment. However, organizational commitment had negative impacted on employees' resignation of Isan Palm Industry Development Co., Ltd. workforce with statistical significance of 0.05.

Keywords– Quality of Work Life, Organizational Commitment, Employee Resignation.

INTRODUCTION

Background

According to 27th ASEAN summit, Kuala Lumpur, Malaysia, occurred in November 2015, Palm oil is still demanded high currently. Malaysia and Indonesia are the largest oil exporting countries in the OPEC (Organization of Petroleum Exporting Countries: OPEC) due to these two nations produce 85% of palm oil in the world while Thailand produces only 3%. Palm oil is an important economical product improving food

security and renewable energy. Thailand can grow palm because Thailand is located equatorial areas. As the result of a good location to grow palm trees, Thailand has been being able to support high-demand of palm oil in the global market. The global price of palm oil continually rises. This is because of a capability has been dropped since several droughts occurred in some supplier countries. Higher-demand in palm oil enlarging, but less oil supply has been decreasing, therefore, current stock of palm oil in the world has persistently been declining. [14]

Isan Palm Industry Development Company Limited was established on 15 December 2014. This company's main business of palm oil extraction has an experienced problem such as 1) the rate of a lack of employee substantially rises; 2) face the high cost of training new employees; 3) a lack of experienced and skilled employees; 4) retention of skilled employees. The organization supposes to understand current market circumstance and maintain adaptive method to retain skillful employees. Appropriate management best practices include determines common ideas in term of labour development concepts, evaluation of the work, progress report and all ideas based on collaboration of all stakeholders. [13]

On the one hand, quality of work life is often referred to as a broader concept of quality of life. In the first stage, it requires to address company goals for instance a meaning of maintain working. Besides, introducing the ideas of the dimensions, as such quality relationship between workers and work environment. On the other hand, the concept of quality of work life is the combination of job satisfaction and anxiety. The quality of work life and organizational commitment is a key to make employees happy to work, they will stay with the organization for a long time. In contrast, if employees feel uncomfortable, exhausted, motivated or dissatisfied with their work, the organization might considers them as disloyal employees and they might as well have the low-level of the sense of employee commitment. Hence, the research intends to resolve the problem of the human resource management by adopting a case study of Isan Palm Industry Development Company Limited. The researcher conducts a research framework to identify the factors that provide the company understaffed. The research outcome will be useful to assist Isan Palm Industry Development Company Limited to develop the full potential HRM system in the organization. The research plan also aims to decrease the resignation rate of the skillful employees.

Objectives

This research examines 5 objectives as follow

1. Investigate quality of work life of Isan Palm Industry Development Co., Ltd. Workforce
2. Investigate organizational commitment of Isan Palm Industry Development Co., Ltd.
3. Identify employees' resignation of Isan Palm Industry Development Co., Ltd.
4. Identify differences between quality of work life, organizational commitment, and employees' resignation of Isan Palm Industry Development Co., Ltd. classified by personal factors
5. Examine impacts of quality of work life and organizational commitment on employees' resignation of Isan Palm Industry Development Co., Ltd.

LITERATURE REVIEW

Quality of Work Life

Quality of work life is a comprehensive concept which is consisted of physical and psychological health, economic situations, personal belief and interaction with environment. [7] Some of the important scopes of the quality of work life, according to Walton, were: 1) adequate and fair compensation 2) safe and healthy working conditions 3) opportunity to use and develop human capacities 4) opportunity to growth and security 5) social integration in the work organisation 6) constitution in the work organisation 7) work and total life span and 8) social relevance of work life. [2] Lee, Back and Chan stated that quality of work life is an important part of the organization to attract and retain employees. [11] Quality of work life means employees can meet their critical needs, and work to achieve maximum organizational goals. Easton and Van Laar proposed six dimensions for QWL that include: Job and Career Satisfaction, Working Conditions, General Well-being, Home-Work Interface, Stress at Work, and Control at Work. [9] Job and career satisfaction related to general satisfaction with the job and with career development. Working conditions

refer to level of satisfaction with the physical working environment and conditions. General well-being is related to key aspects of psychological and physical well-being, such as happiness and wellness. Home-work interface reflects employees' views about the degree to which the organization understands and tries to help them with pressures outside of their work. Stress at work reflects level of work-related stress. Control at work refers to involvement in decision making. In this study was adapted quality of work life from the concept of Walton, Easton and Laar . [2], [9]

Organizational Commitment

In organizational behavior and industrial and organizational psychology, organizational commitment is the individual's psychological attachment to the organization. The basis behind many of these studies was to find ways to improve how workers feel about their jobs so that these workers would become more committed to their organizations. Organizational commitment predicts work variables such as turnover, organizational citizenship behavior, and job performance. Multiple definitions of organizational commitment are found in the literature. Mowday, Steers, and Porter identified commitment-related attitudes and commitment related behaviors. [4] Porter et al. further characterize affective commitment by three factors 1) belief in and acceptance of the organization's goals and values, 2) a willingness to focus effort on helping the organization achieve its goals, and 3) a desire to maintain organizational membership. [1] The concept of Mowday, Steers, and Porter was used for this research. [4]

Employee Resignation

A resignation is the formal act of giving up or quitting one's office or position. A resignation can occur when a person holding a position gained by election or appointment steps down, but leaving a position upon the expiration of a term is not considered resignation. When an employee chooses to leave a position, it is considered a resignation, as opposed to involuntary termination, which occurs when the employee involuntarily loses a job. Whether an employee resigned or was terminated is sometimes a topic of dispute, because in many situations, a terminated employee is eligible for severance pay and/or unemployment benefits. A resignation occurs when an employee takes the initiative to terminate the employment relationship. Employees resign for a wide range of reasons. Employees may leave their employers due to the type of continual confrontation mentioned, or for purely financial reasons. Employees may resign while maintaining a good relationship with their employer, to pursue other career opportunities, to move their home to a different area or a host of other possibilities. In rare cases, employees may voluntarily resign after committing an act that would require the company to discharge them. Shikiar and Freudenberg were study factors that effecting to the employees resignation, there were consist of 1) Push Factors, Push Factor is a factor within an organization that affects to employees dissatisfaction, such as pressure from the organization policies, commanding of leader, organization work process, low educational opportunities, problems in the relationship between people in the organization. 2) Pull factor refers to external factors. [5] This is what attracts employees moving or to resign to a new organization, such as the opportunity to have a better quality of work life, more career path development opportunity, and higher compensation. The concept of Shikiar and Freudenberg was used for develop employee resignation measurement tools in this research. [5]

The Link between Quality of Work Life, Organizational Commitment, and Employees Resignation

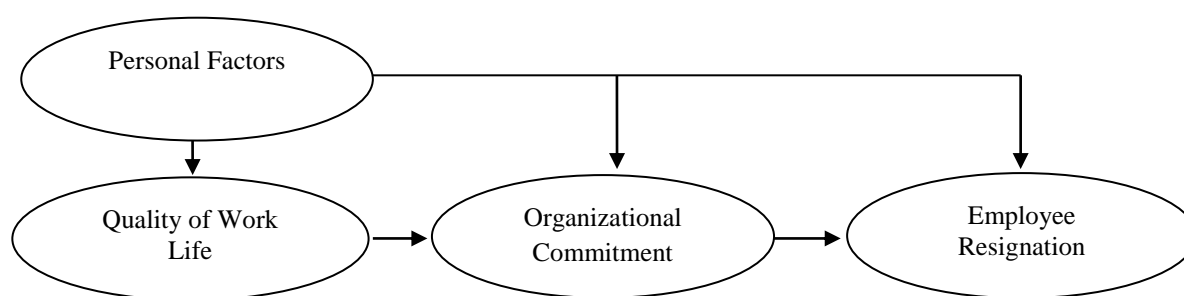
There were much empirical evidences about the link between quality of work life, organization commitment, and employees' resignation. Farid et al. were study relationship between quality of work life and organizational commitment among lecturers in a Malaysian public research university, and the research reveal that there is a high significant relationship between quality of work life and organizational commitment. [1 0] This study contributes to the existing literature and suggests some human resource development strategies on how the related ministry and universities could improve their employees' commitment. Yusoff, Rimi, and Meng were research the relationships among eight different dimensions of quality of work life (QWL), organizational commitment, and turnover intention, the study revealed that adequate and fair compensation, opportunity for continued growth, security, social relevance of work life, social integration and work and total life space in the work organization are negatively related to turnover

intention. [12] Opportunity for continued growth, security and social relevance of work life and social integration in the work organization are found to be positively related affective commitment. Moreover, opportunity for continued growth, security and social relevance of work life are positively related to continuance commitment. Adequate and fair compensation, opportunity for continued growth, security and social relevance of work life and social integration in the work organization are positively related to normative commitment. Besides, all commitment dimensions are found negatively related to turnover intention. Affective commitment and normative commitment partially mediate the relationship between quality of work life and turnover intention. The overall findings suggest the relative importance of different dimensions of QWL to get better employees' outcomes in terms of commitment and retention. The present study expects more research on the relationship between QWL and employees' outcomes. However, there was no empirical evidence about this concept in the area of northeastern of Thailand. Thus it is the reason of this research.

CONCEPTUAL MODEL AND HYPOTHESES

Based on the literature review, the concept of this research was presented in Figure 1, which illustrates the quality of work life and organizational commitment as a causal factor of the employee's need for resignation.

Figure 1
A conceptual model of research



Therefore the research hypotheses were:

H₁: The quality of work life, organizational commitment, and employee resignation were different when classified by employee personal factors.

H₂: The quality of work life had positive influence on employee resignation through organizational commitment.

RESEARCH METHODOLOGY

In this research, the data of 145 operative information were collected from a local palm oil manufacturer; Isan Palm Industry Development Co., Ltd. Questionnaires were consisted of; 30 quality of work life (QWL)-related-questions adapted from the model of Walton [2], Easton and Laar [9], 12 questions of Organizational Commitment adapted from Meyer and Allen [6], and 11 questions of resignation intention compiled with Shikiar and Freudenberg. [5] Cronbach's alpha coefficient were used for rater reliability which revealed that the alpha coefficients of reliability for quality of work life, organizational commitment, and resignation intention were .935, .904 and .866 respectively. Statistics for analysis were frequency, percentage, mean, standard deviation, and the research hypothesis testing was used Pearson's correlation coefficient, and path analysis.

ANALYSIS OF THE DATA

Company rating of the Isan Palm Industry Development Company Limited employees demonstrates high levels of the QWL mean at 3.84, high levels of mean of the organization commitment at 3.99 and middle high levels of mean the employment resignation mean at 2.14.

The results of the study of hypothesis 1 prove that the quality of bachelor's degrees are higher than undergraduates'. The outcomes also illustrate that personal factors differed in two aspects: gender and demand. In addition, female migrants are more likely to resign.

Table 1
Employment resignation analysis classified based on gender

Variable	Gender	Mean	S.D.	t	Sig.
Resignation	Male	1.99	0.519	-1.458	0.026*
	Female	2.40	0.844		

Table 2
Employment resignation analysis classified based on education

Variable	Educational	Mean	S.D.	F	Sig.
Quality of Work Life	High School, High Vocational Certificate	3.57	0.598	3.485	0.045*
	Bachelor	4.02	0.422		
	Higher than Bachelor	4.43	0.548		

Hypothesis 1

According to Mobley, states that push factors affect the resignation of workers, as such maturity affects the resignation significantly. [3] Mobley explains that people in labor market always have high expectation in term of finding a better workplace and salary and good salary usually can create a high degree of the quality of work life.

Similarly, research outcome demonstrates that there are two differences of personal factors (gender and education) contain statistic significance at a level of 0.05. Female has more possibility to resign than male. Also, on one hand, people who graduated in degree higher than bachelor degree, have the best quality of work life, on the other hand, people who have lower degree have the worst quality of work life in workplace.

Hypothesis 2

Pearson Correlation Coefficient was used to analyze the relationship of variables.

Acronym meaning in the research project

QWL: Quality of work life

OCM: Organization commitment

RSN: Employee resignation

Table 3, Hair et al. explained that the correlation between independent variables should not exceed 0.80. [8] If more than 0.80 was assumed the assumption that may be multicollinearity. From this research, it was found that the correlation coefficient between the independent variables was 0.85, which higher than the condition. The next step, the Variance Inflation (VIF) was used to test, and the condition should not exceed 5. In this study, it was found that $VIF = 4.182$, thus, the degree of correlation between independent variables is conditional. The path analysis can be used to test the hypothesis.

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Table 3
Correlation analysis between variables

	QWL	OCM	RSN
MEAN	3.84	3.99	2.14
S.D.	0.54	0.62	0.67
QWL	1		
OCM	.85**	1	
RSN	-.72	-.85**	1

* $p < .05$, ** $p < .01$

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Analytical equations were as follows.

$$OCM = \beta_1 QWL$$

(1)

$$RSN = \beta_2 OCM$$

(2)

The results of the equations analysis were as follows.

$$OCM = .853QWL$$

(1)

$$(8.636)$$

$$RSN = -.855OCM$$

(2)

$$(-8.730)$$

Equations can be showed in the form of Path Analysis as below.

Figure 2
Path analysis



The results of the H: 2 testing showed that accepting hypotheses, by quality of work life can explained the variation of organizational commitment, 71.70% (Adjusted $R^2 .717$), the standardized coefficient (β) was

.853. Organizational commitment had a negative impact on employee resignation, by it can explained the variation of employee resignation, 72.20.0% (Adjusted R^2 .722), the standardized coefficient (β) was -.855.

CONCLUSION

The study revealed that quality of work life had influenced on the company's need for resignation through organizational commitment, which is based on the hypothesis. The quality of work life composed of adequate and fair compensation, safe and healthy working conditions, opportunity to use and develop human capacities, opportunity to growth and security, social integration in the work organization, constitution in the work organization, work and total life span and, social relevance of work life had positive influence on organization commitment, and organization commitment had negative influence on employees' resignation, in others words, when employees have less commitment to the organization, they will increase the demand for resignation. Especially low education level female had more demand for resignation, due to many reasons such as: employee knowledge was not appropriate for the job and responsible, stable in the work, stress in the workplace, also the relationship between colleagues. This will result in less organizational commitment, absenteeism and resignation. This research finding was consistent with the research results of Farid et al. [10], Yusoff, Rimi, and Meng [12].

Theoretical recommendations and the future research, the results show that the quality of work life and organizational commitment can explain the variability of the employee need for resignation was not high level. Therefore, there were other independent variables (antecedent) that need further study in the future such as: leadership, organization culture. In addition, qualitative research should be used to add details of research findings. Moreover, there should be additional research in other types of organizations such as: government organization or service-oriented organization in order to increase the generalization of the theories and concept of quality of work life and organizational commitment.

REFERENCES

- [1] Porter, L. W., R. M. Steers, R. T. Mowday, & P. V. Boulian. (1974), "Organizational commitment, job satisfaction, and turnover among psychiatric technicians", *Journal of Applied Psychology*, No.59, Pp. 603-609.
- [2] Walton, R. E. (1975), "Improving the Quality of Work Life", *Harvard Business Review*, Vol.52, No.3, Pp. 12.
- [3] Mobley, W.H. (1977), "Intermediate Linkages in the Relationship between Job Satisfaction and Employee Turnover", *Journal of Applied Psychology*, No.62, Pp. 237-240.
- [4] Mowday, R. T., Steers, R. M., & L. W. Porter. (1979), "The measurement of organizational Commitment", *Journal of Vocational Behavior*, No.14, Pp. 224-247.
- [5] Shikiar, R. & R. Freudenberg. (1982), "Unemployment Rates as a Moderator of the Job Dissatisfaction-turnover Relation", *Human Relations*, No.25, Pp. 845-856.
- [6] Meyer, J. P & N. J. Allen. (1991), "A three-component conceptualization of organizational commitment", *Human Resource Management Review*, No.1, Pp. 61.
- [7] Khorsandi, M, F.Jahani, M. Rafie, & A. Farazi. (2009), "Health- Related quality of life in staff and hospital personnel of arak university of Medical sciences in", *Journal of Arak Medical University*. 2010 Vol.13, No.1, Pp. 40-48.
- [8] Hair, J. F., Jr., Black, W. C., Babin, B. J., & R. E. Anderson. (2010), "Multivariate data Analysis", *Prentice Hall: Upper Saddle River, NJ*.
- [9] Easton, S., & D. V. Laar. (2013), "QWL (Quality of Working Life) What, How, and Why", *Psychology Research*, Vol.3, No.10, Pp. 596-605.
- [10] Farid, H., Z. Izadi, I.A. Ismail, & F. Alipour. (2014), "Relationship between quality of work life and organizational commitment among lecturers in a Malaysian public research university", *The Social Science Journal*. No.1, Pp. 54-61.

- [11] Jin-soo Lee, Ki-Joon Back, Eric & S.W. Chan. (2015), "Quality of work life and job satisfaction among frontline hotel employees: A self-determination and need satisfaction theory approach", *International Journal of Contemporary Hospitality Management*, Vol.27, No.5, Pp.768-789.
- [12] Yusliza Mohd Yusoff, Nadia Newaz Rimi & Chuah Hun Meng. (2015), "A study of quality of work life, organizational commitment and turnover intention", *Problems and Perspectives in Management (open-access)*, No.13, Pp. 2.
- [13] Isan Palm Industry Development Company Limited (2016), "Employee Resignation Report", *Company Annual Report*.
- [14] Aranya Sriviroj (2017), "Palm oil in Thailand after the opening of the ASEAN Economic Community in 2015", <http://www2.manager.co.th/South/ViewNews.aspx?NewsID=9550000145646&Html>.

The Investigation Influence of Marketing Mix on Customer Retention: A Case Study of Gas Station

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ABSTRACT

The purposes of research were aim to: 1) study the level of customer's satisfaction on the marketing mix of S.P. Petroleum (1994) Company Gas Station 2) study ability for customer retention of S.P. Petroleum (1994) Company Gas Station 3) study the difference of customer's satisfaction on the marketing mix classified by personal factor and 4) study the influence of customer's satisfaction on the marketing mix on customer retention.

In this research, the target populations include customer of four branches of Petroleum (1994) Company Gas Station that total amount was un-identified, calculated by the formula of Cochran, sample size of 388 samples was selected by proportional sampling, collected data was used questionnaires. Research quality control was used literature review to determine the content validity, and used Cronbach alpha coefficient for the reliability testing, the Cronbach alpha was estimated to be .963 of customer satisfaction and .813 of customer retention. The data analysis was used frequency, percentage, mean, standard deviation, and the hypothesis testing was used t-test, F-test (One way ANOVA), Pearson product moment coefficient, and multiple regressions.

The results research was shows that mean score of customer satisfaction on the marketing mix was 3.895 and mean score of customer retention was 3.813. The hypothesis testing found the statistic significance at 0.05 levels different of customer satisfaction on the marketing mix and customer retention between education income, and gas station branches. The customer satisfaction on the marketing mix had positive influences on customer retention, by the independent variables could explain the variance of the dependent variable (Adjusted R²) was 71.50 percent and standard coefficient (β) of 0.815.

Keywords– Marketing Mix, Customer Retention

INTRODUCTION

Background

The world oil price has dropped to \$ 40-50 / barrel. It is likely that there will not be a return of more than \$ 100 / barrel in the next 2-3 years, because consumers turn to more fuel consumption as a result, the competition in this business increasingly [1]. From the intense competition of Thailand's gas and petroleum business, because of many petroleum trading companies in Thailand, such as PTT, Bangchak, Shell, Caltex, Esso etc., have a large number of gas stations in each area. Companies should be accepting the harsh competition of today's gas and petroleum business, and need to improve marketing strategies to keep the business survive [2]. It must be able to compete with competitors in the market. Because the gas station business is a service industry, unlike the general consumer goods industry, there are both tangible and intangible products. Therefore, the marketing strategy that will be applied to the business requires a satisfaction of customer on the business marketing mix [3]. Marketing mix is a key element in marketing.

Therefore, the gas station business must create the appropriate marketing mix to formulate the marketing strategy to satisfy customers in order to make the customer back frequently, and the old customers who change the use of other brands back to buy and use our services repeatedly. This process is called customer retention. Customer retention refers to the activities and actions companies and organizations take to reduce the number of customer defections. The goal of customer retention programs is to help companies retain as many customers as possible, often through customer loyalty and brand loyalty initiatives. While most companies traditionally spend more money on customer acquisition because they view it as a quick and effective way of increasing revenue, customer retention often is faster and, on average, costs up to seven times less than customer acquisition [4]. Companies that shift their focus to customer retention often find it to be a more efficient process because they are marketing to customers who already have expressed an interest in the products and are engaged with the brand, making it easier to capitalize on their experiences with the company. In fact, retention is a more sustainable business model that is a key to sustainable growth. The importance of the above mentioned reasons is why to do this research.

Research Objectives

This paper examines 5 objectives as follow:

1. Study the level of customer's satisfaction on the marketing mix of S.P. Petroleum (1994) Company Gas Station
2. Study ability for customer retention of S.P. Petroleum (1994) Company Gas Station
3. Study the difference of customer's satisfaction on the marketing mix classified by personal factor and
4. Study the influence of customer's satisfaction on the marketing mix on customer retention.

LITERATURE REVIEW

Marketing Mix

Reviews of the literature from the past until now, scholars have given the definition of the marketing mix as follows. McCarthy (1960) a marketing expert created the Marketing 4Ps, this classification has been used throughout the world. Business schools teach this concept in basic marketing classes. The marketing 4Ps are also the foundation of the idea of marketing mix. The marketing mix refers to the set of actions, or tactics, that a company uses to promote its brand or product in the market. The 4Ps make up a typical marketing mix - Price, Product, Promotion and Place [5]. However, the marketing mix increasingly includes several other Ps like Packaging, Positioning, People and even Politics as vital mix elements. The marketing mix element in the beginning period always describe in 4 aspects as follows: 1) Product: refers to the item actually being sold. The product must deliver a minimum level of performance; otherwise even the best work on the other elements of the marketing mix won't do any good. 2) Price: refers to the value that is put for a product. It depends on costs of production, segment targeted, ability of the market to pay, supply - demand and a host of other direct and indirect factors. There can be several types of pricing strategies, each tied in with an overall business plan. Pricing can also be used a demarcation, to differentiate and enhance the image of a product. 3) Place: refers to the point of sale. In every industry, catching the eye of the consumer and making it easy for her to buy it is the main aim of a good distribution or 'place' strategy. Retailers pay a premium for the right location. In fact, the mantra of a successful retail business is 'location, location, location'. 4) Promotion: this refers to all the activities undertaken to make the product or service known to the user and trade. This can include advertising, word of mouth, press reports, incentives, commissions and awards to the trade. It can also include consumer schemes, direct marketing, contests and prizes. Kotler and Anderson (1987) proposed an additional two Ps to the original model of 4. These were political power and public opinion formation. Kotler proposed that when entering foreign markets, there was a need to satisfy an audience beyond the target market. These were the governments, regulatory bodies, trade associations and even other interested groups who had power over the intended market. Hence the political power and public opinion formation was needed to gain their support. In the late 70's it was widely acknowledged by marketers that the marketing mix should be updated [6]. This led to the creation of the extended marketing mix by Booms and Bitner (1981) which added 3 new elements to the 4 Ps principles. This now allowed the extended marketing

mix to include products that are services and not just physical things. The new 3 elements composed of People: all companies are reliant on the people who run them from front line sales staff to the management level. Having the right people is essential because they are as much a part of business offering as the products/services offering. Processes: the delivery of service is usually done with the customer present so how the service is delivered is once again part of what the consumer is paying for. Physical Evidence: almost all services include some physical elements even if the bulk of what the consumer is paying for is intangible. For example a hair salon would provide their client with a completed hairdo and an insurance company would give their customers some form of printed material. Even if the material is not physically printed they are still receiving a "physical product" by this definition [7]. Mustawadjuhaefa et al. (2017) define the marketing mix in 7 elements composed of product, price, place, promotion, people, physical evidence, and process. All the elements of the marketing mix influence each other. They make up the business plan for a company and handled right, can give it great success. But handled wrong and the business could take years to recover. The marketing mix needs a lot of understanding, market research and consultation with several people, from users to trade to manufacturing and several others [8]. The research, which was assigned to the marketing mix, consists of 7 elements (7 Ps) as follow product, price, place, promotion, people, physical evidence, and process.

Customer Retention

Frederick (1996) "The Loyalty Effect: The hidden force behind growth, profits and lasting value" explained that customer retention refers to the ability of a company or product to retain its customers over some specified period. High customer retention means customers of the product or business tend to return to, continue to buy or in some other way not defect to another product or business, or to non-use entirely [9]. Selling organizations generally attempt to reduce customer defections. Customer retention starts with the first contact an organization has with a customer and continues throughout the entire lifetime of a relationship and successful retention efforts take this entire lifecycle into account. A company's ability to attract and retain new customers is related not only to its product or services, but also to the way it services its existing customers, the value the customers actually generate as a result of utilizing the solutions, and the reputation it creates within and across the marketplace. Customer retention is the measure of how well the customer stays and stays engaged with the organization or with specific products and services. Break-down of the definition of customer retention, Stays: customer being active and user of your product and service, this is mainly relevant to the products and services, having an existing contract. This includes banking, telecommunication and maintenance contracts. Stays Engaged: customer who maintain or increase the level of relationship. In this research customer retention was adapted from the concept of Youcef, Keltouma, and Imane (2015), consist of: service beyond expectation, customer satisfaction, future of service, appreciation of service to others, continuously promotion to the customer, ask questions after service, special offers that are beneficial to customer in case of continue to use the service [10].

The Link between Marketing Mix and Customer Retention

There are many empirical evidences the relation between customer satisfaction on the marketing mix and customer retention. Roland (1993) had study "Customer satisfaction, customer retention, and market share", the result found that customer retention is an outcome that is the result of antecedents as customer satisfaction: Research shows that customer satisfaction is a direct driver of customer retention in a wide variety of industries. Despite the claims made by some one-off studies, the bulk of the evidence is unambiguously clear: there is a positive association between customer satisfaction and customer retention/ though the magnitude of the association can vary based on a whole host of factors such as customer, product, and industry characteristics. Some companies and individuals have created mathematical models to evaluate customer satisfaction [11]. Singh (2006) the Importance of Customer Satisfaction in Relation to Customer Loyalty and Retention, the research reveal to be successful, organizations must look into the needs and wants of their customers. That is the reason why many researchers and academicians have continuously emphasized on the importance of customer satisfaction, loyalty and retention. Customer satisfaction is important because many researchers have shown that customer satisfaction has a positive effect on an

organization's profitability. Due to this, the consequences of customer satisfaction and dissatisfaction must be considered. There is also a positive connection between customer satisfaction, loyalty and retention. Therefore, customer satisfaction, loyalty and retention are all very important for an organization to be successful [12]. Ibojo and Odunlami (2015) Impact of Customer Satisfaction on Customer Retention: A Case Study of a Reputable Bank in Oyo, Oyo State. Nigeria, this paper examined the impact of customer satisfaction on customer retention. The objectives were: to determine the relationship between customer satisfaction and customer retention, and to examine the impact of customer satisfaction on customer retention. The findings show the R^2 value of 0.717 which reveals that customer satisfaction independently accounts for 71.7% of the variation in customer retention. The f statistics of 41.173 reveals that the model is statistically significant at 0.05 significant levels. It was concluded that the effective satisfaction of customers will give room for customer retention [13]. Hence, it could be conclude that there is a significant relationship between customer satisfaction and customer retention.

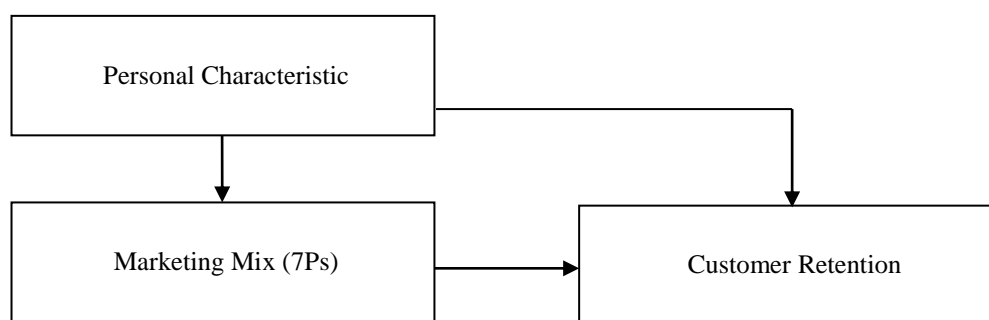
CONCEPTUAL MODEL AND HYPOTHESES

The research was mainly aimed to study the influence of marketing mix customer satisfaction on customer retention. The research hypothesis and conceptual framework were as follow:

H₁: Customer satisfaction in marketing mix and customer retention was different when classified by personal factors.

H₂: Customer satisfaction in marketing mix had positive influence on customer retention.

Figure 1
A conceptual model of research



RESEARCH METHODOLOGY

In this research, the target populations include customer of four branches of Petroleum (1994) Company Gas Station that total amount was un-identified, calculated by the formula of Cochran [14], sample size of 388 samples was selected by proportional sampling, collected data was used questionnaires, with as follows items: 26 questions of customer satisfaction on the marketing mix adapted from Mustawadjuhaefa et al. (2017) and 7 questions of customer retention adapted from Youcef, Keltouma, and Imane (2015). Research quality control was used literature review to determine the content validity, and used Cronbach alpha coefficient for the reliability testing, the Cronbach alpha was estimated to be .963 of customer satisfaction and .813 of customer retention respective. The data analysis was used frequency, percentage, mean, standard deviation, and the hypothesis testing was used t-test, F-test (One way ANOVA), Pearson product moment coefficient, and multiple regressions.

ANALYSIS OF THE DATA

This research was used program for statistical analysis in social science to analysis of the data. The research finding and the hypothesis testing in this study were as follows. Table 1

Table 1
Mean, standard deviation, and Cronbach's alpha of research variables

Variables	Indicator	Mean	S.D.	Cronbach's Alpha
Marketing Mix	Product	4.020	.659	.963
	Price	3.855	.725	
	Place	3.930	.663	
	Promotion	3.775	.739	
	People	3.857	.663	
	Physical Evidence	3.930	.708	
	Process	3.900	.574	
Customer Retention	Beyond Expectation	3.845	.773	.813
	Satisfaction	3.847	.792	
	Repurchasing	3.925	.800	
	Long Term Relationship	3.778	.719	

The detailed analysis of each variable reveal as follows.

1. Customer satisfaction in marketing mix, there was highest mean in the aspects of product, place, physical evidence, and process by mean at 4.020, 3.930, 3.930, and 3.900 respectively. The lowest mean was in aspect of promotion, price, and people, at 3.775, 3.855, and 3.857.

2. Customer retention, there was high mean in the aspect of repurchasing, satisfaction, beyond expectation, by 3.925, 3.847, and 3.845. The lowest mean was long term relationship at 3.778.

3. The hypothesis testing of this research.

H₁: The first hypothesis was investigating different of customer satisfaction in marketing mix and customer retention when classified by personal factors. The research finding by t-test, and F-test (One Way ANOVA) was as follow:

3.1 Personal factor in the aspect of educational

Table 2
The different of customer satisfaction in marketing mix and customer retention when classified by education

Education	Customer Satisfaction in Marketing Mix			
	\bar{x}	S.D.	F	Sig.
Below Bachelor Degree	3.978	.550	7.433	.001**
Bachelor Degree	3.746	.580		
Above Bachelor Degree	3.900	.654		
Education	Customer Retention			
	\bar{x}	S.D.	F	Sig.
Below Bachelor Degree	3.904	.622	6.520	.002**
Bachelor Degree	3.672	.638		
Above Bachelor Degree	3.638	.790		

3.2 Personal factor in the aspect of income

Table 3
The different of customer satisfaction in marketing mix and customer retention when classified by income

Income	Customer Satisfaction in Marketing Mix			
	\bar{x}	S.D.	F	Sig.
Below 10,000 Baht	4.013	.566	4.683	.003**
10,000-20,000 Baht	3.808	.567		
20,001-30,000 Baht	3.822	.503		
More than 30,000 Baht	3.723	.638		
Income	Customer Retention			
	\bar{x}	S.D.	F	Sig.
Below 10,000 Baht	3.936	.652	3.966	.008**
10,000-20,000 Baht	3.710	.629		
20,001-30,000 Baht	3.725	.640		
More than 30,000 Baht	3.761	.557		

Table 4
The different of customer satisfaction in marketing mix and customer retention when classified by gas station branch

Branch	Customer Satisfaction in Marketing Mix			
	\bar{x}	S.D.	F	Sig.
Municipality	4.412	.413	95.925	.000**
Huay Yang	3.419	.518		
Chiang Khrua	3.681	.362		
Ta Rae	3.895	.449		
Branch	Customer Retention			
	\bar{x}	S.D.	F	Sig.
Municipality	4.333	.548	59.821	.000**
Huay Yang	3.406	.569		
Chiang Khrua	3.553	.498		
Ta Rae	3.931	.527		

The results of the hypothesis testing, when classified by personal factors, found that there were three statistically significant differences at .05 level, including education, income, and branch. By the education aspect, the group of below bachelor degree had highest satisfaction in marketing mix and customer retention, while the group of bachelor degree had lowest in satisfaction in marketing mix, and the group of above bachelor degree had lowest in customer retention.

By the income level, it found that the group of income level below 10,000 Baht/month had highest mean in satisfaction in marketing mix and customer retention, while the group of more than 30,000 Baht/month had the lowest mean. The group of income between 10,000-20,000 Baht/month had the lowest mean in customer retention.

By the branch, the results were showed Municipality branch had the highest mean in satisfaction in marketing mix and customer retention, while Huay Yang branch had the lowest in all aspects.

H₂: Customer satisfaction in marketing mix had positive influence on customer retention.

This hypothesis testing of the research was to study the influence of independent variables on dependent variable was used Pearson's product moment correlation coefficient to determine the relationship of the independent variables, and Multiple analyses to study the influence of customer satisfaction in marketing mix on customer retention. The symbols used to analyze in this research was as follows.

AMX	Represent	Aggregate Marketing Mix
MX1	Represent	Marketing Mix in the Aspect of Product
MX2	Represent	Marketing Mix in the Aspect of Price
MX3	Represent	Marketing Mix in the Aspect of Place
MX4	Represent	Marketing Mix in the Aspect of Promotion
MX5	Represent	Marketing Mix in the Aspect of People
MX6	Represent	Marketing Mix in the Aspect of Physical Evidence
MX7	Represent	Marketing Mix in the Aspect of Process
CMR	Represent	Customer Retention

Table 5 showed that relationship the variables that are related not exceed 0.80, hair et al. (2010) described the relationship between the independent variables must be less than 0.80, which is more than 0.80 may cause of Multicollinearity [15]. This research found the relationship between the independent the highest value was 0.723, it was not exceed 0.80. Multicollinearity problem was not found. Therefore it can be tested by using multiple regressions to the next.

Table 5
Correlation analysis between variables

	MX1	MX2	MX3	MX4	MX5	MX6	MX7	AMX	CMR
MX1	1								
MX2	.715**	1							
MX3	.705**	.723**	1						
MX4	.526**	.606**	.647**	1					
MX5	.581**	.649**	.679**	.628**	1				
MX6	.626**	.603**	.692**	.615**	.672**	1			
MX7	.545**	.601**	.675**	.596**	.712**	.678**	1		
AMX	.803**	.842**	.877**	.798**	.842**	.839**	.823**	1	
CMR	.593**	.609**	.671**	.634**	.738**	.757**	.747**	.815**	1

The research equations to predict influence of investigate competitive advantage the consequence of entrepreneurship and innovation were as follows.

$$\text{CMR} = \beta_1 \text{AMX} \quad \dots\dots\dots (1)$$

$$\text{CMR} = \beta_2 \text{MX1} + \beta_3 \text{MX2} + \beta_4 \text{MX3} + \beta_5 \text{MX4} + \beta_6 \text{MX5} + \beta_7 \text{MX6} + \beta_8 \text{MX7} \quad \dots\dots\dots (2)$$

The result of equations was as follows.

$$\text{CMR} = .815 \text{AMX} \quad \dots\dots\dots (1)$$

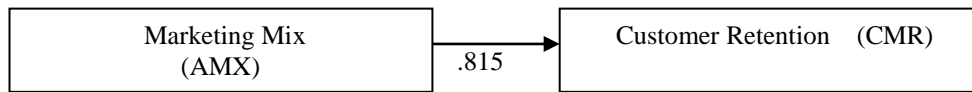
$$(28.038)$$

$$\text{CMR} = .096 \text{MX4} + .233 \text{MX5} + .315 \text{MX6} + .274 \text{MX7} \quad \dots\dots\dots (2)$$

$$(2.470) \quad (5.240) \quad (7.243) \quad (6.325)$$

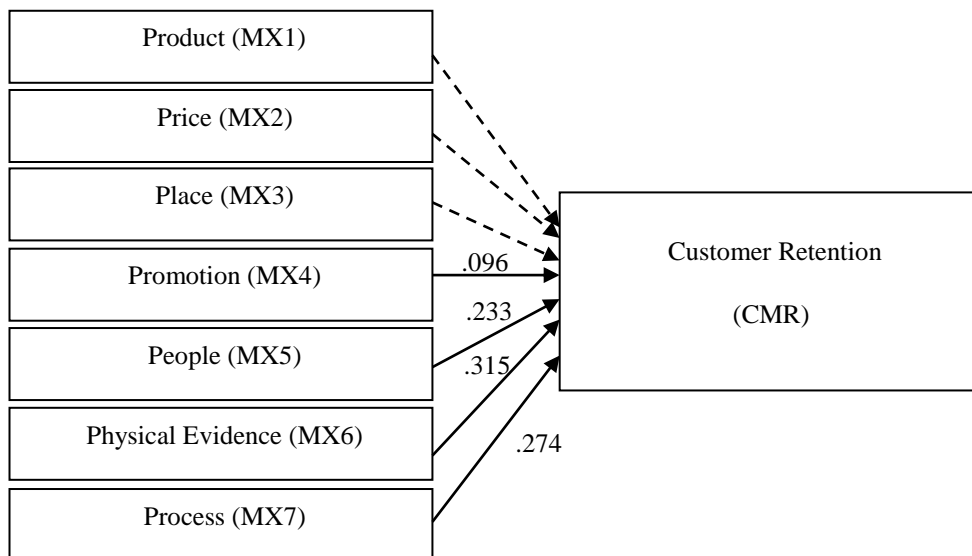
Equations can be showed in the form of Path Analysis as below.

Figure 2
Influence of aggregate marketing mix on customer retention



When classified customer satisfaction on marketing mix by aspect

Figure 3
Influence of marketing mix on customer retention when classified by aspects



Second hypothesis test Results, from the first equation simple regression analysis was used, it was found that the customer satisfaction in marketing mix could explain the variance (R^2) of the customer retention (dependent variable) by 60.40 percent. The independent variables had the standard coefficient (β) of 0.815. When classified the marketing mix by aspects the research result was found that the marketing mix consisted of promotion, people, physical evidence and process had influence on customer retention at statistically significant level of 0.05. All the independent variables could explain variable variance by 71.5 percent. The standard coefficients (β) were .096, .315, and .274, respectively.

CONCLUSION

The purpose of this research was to investigate the influence of marketing mix on customer retention. The findings were used to determine marketing strategies of the gas station business. The results showed that personal factors, including education level, income and branch, had different effects on customer satisfaction in marketing mix and customer retention, while the results of the analysis of the retreat, physical evidence, processes, and people had a positive influence on customer retention.

Theoretical contribution, the results of this research was in line with the research of Roland (1993), Singh (2006) and Ibojo and Odunlami (2015). The model could be confirming the influence of marketing mix on customer retention. However, in the multiple regression analysis, it was found that products, prices and place had not influence on dependent variables; this can be explained by the suppressor variables phenomenon. Although the marketing mix could explained the variance of customer retention more than 70 percent, anyway the future research should be study other antecedent variables that can influence on customer retention according the proposal of Eberle, Milan, and Matos (2016) that mentioned the relation between

organization context and customer retention [16]. In addition, the study of how to measure customer retention beyond the measurement of customer opinion is important as it increases the reliability of measuring instruments such as customer retention rate.

REFERENCES

- [1] International Energy Agency (2017), "Oil Market Report", URL: <https://www.iea.org/oilmarketreport/omrpublic/>
- [2] PTT (2017), "PTT Trading Review", URL: [http://www.pttplc.com/th/About/Business/PTT-Owned-Business/International-Trading-Unit/Documents/Trading%20Review/trading%20No.15\(low\).pdf](http://www.pttplc.com/th/About/Business/PTT-Owned-Business/International-Trading-Unit/Documents/Trading%20Review/trading%20No.15(low).pdf).
- [3] Fieldboom (2018), "Marketing Mix Is Key to A Successful Marketing Plan", URL: <https://www.fieldboom.com/blog/marketing-mix/>
- [4] NG DATA (2018), "What is a Customer Retention?", URL: <https://www.ngdata.com/what-is-customer-retention/>.
- [5] McCarthy, E.J. (1960), "Basic Marketing: A Managerial Approach", R.D. Irwin, Illinois.
- [6] Kotler, P. & Anderson, A. (1987), "Strategic Marketing for Non-Profit Organizations. Englewood Cliffs", Prentice Hall, New Jersey.
- [7] Booms, B. H., & Bitner, B. J. (1981), "Marketing Strategies and organization Structures For service firm", *Conference Proceedings: American Marketing Association*, Pp. 47-52.
- [8] Mustawadjuhaefa, Basrimodding, Jobhaarbima, M., & Ilhamlabbase. (2017), "Marketing mix and service quality effect on Custom Satisfaction and Loyalty o Toyota cars", *Journal of research in Business and Management*, Vol. 5, No. 1, Pp. 13-23.
- [9] Frederic R. (1996), "The Loyalty effect: The hidden force behind growth, profits and lasting value", *Bain & company*, Boston.
- [10] Youcef, S., Keltouma, M., Imane, A. (2015), "The Impact of Marketing Mix Elements on Customer Loyalty for an Algerian Telecommunication Company", *Expert Journal of Marketing*, Vol. 3, No. 1, Pp. 1-10.
- [11] Roland, T. R., & Anthony, J. Z. (1993), "Customer Satisfaction, Customer Retention, and Market Share", *Journal of Retailing*, Vol. 69, No. 2, Pp. 193-215.
- [12] Singh, H. (2006), "The Importance of Customer Satisfaction in Relation to Customer Loyalty and Retention", *Asia Pacific University College of Technology & Innovation*, Kuala Lumpur.
- [13] Ibojo, B.O. & Odunlami, A. (2015), "Impact of Customer Satisfaction on Customer Loyalty: A case study of reputable Bank in Oyo, Oyo State, Nigeria", *International Journal of Managerial Studies and Research*, Vol. 3, No. 2, Pp. 59-69.
- [14] Cochran, W. (1977), "Samplings Techniques", *John Wiley and Sons*, 3rd edition, New York.
- [15] Hair, J.F., Black, W.C., Babin, B.J. & Anderson, R.E. (2010), "Multivariate data analysis", *Engle wood Cliffs*, Prentice Hall, 7th edition, New Jersey.
- [16] Eberle, L., Milan, G.S. & Matos, C.A. (2016), "Antecedents to Customer Retention in a Corporate Context", *Brazilian Business Review*, Vol. 13, No. 1, Pp. 1-23.

The Influence of Leadership on Performance through Employee Work Motivation of Office of Highways in Northeastern Thailand

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ABSTRACT

The purposes of this research were: 1) to study the level of transformational leadership of Office of Highways administrators in the northeastern area in Thailand 2) to study the level of employee work motivation of Office of Highways 3) to study the Office of Highways employee performance 4) to study the influence of transformational leadership on performance through employee work motivation. The population is the employee of the Office of Highways in Northeastern area, the population was 1,639 and the sample size was used Taro Yamane's formula. The sample size was 322 persons. Sampling was based on probability, the stratified sampling method, and the simple random sampling method. The questionnaire used in this study consisted of the 12 questions of transformational leadership, 39 questions of employee work motivation, and 9 questions of the employee performance was adapted from the Department of Highways performance evaluation criteria (2017) with reliability test of .937, .947, and .915 respectively. Statistical data analysis was performed by descriptive statistics and inferential statistics such as frequency, percentage, mean, standard deviation. The hypothesis testing was used t-test, F-test (one-way ANOVA) and path analysis.

The results of the hypothesis test showed that: 1) Transformational leadership had statistical significant at the level of 0.05 influenced on employee work motivation, by the adjusted R square reveal that the independent variable can explained the variance of the dependent variable was 62.5 percent, and the standard coefficient (Beta) was at .790. 2) The influence of employee work motivation on the performance was at the 0.05 level of significance, the adjusted R square was 41.9 percent, and has a standardized coefficient (Beta) at .647. Hence, the results of this study concluded that transformational leadership had influence on performance through employee work motivation.

Keywords– Transformational Leadership, Motivation, Performance

INTRODUCTION

Background

Because of the current situation in the world is changing rapidly in all aspects. Due to the advancement of modern technology, economic, social, political changes, and competitive environment, public administration needs to be adapted to the new situation. Department of Highways is an agency under the Ministry of Transport. It is responsible for the construction, control, restoration and maintenance of the highway. And highways concessions to facilitate rapid and safe highway access across the country, facilitating economic, social, governance, security and defense. The Highways Office is an agency under the control of Department of Highways, with offices located in various parts of Thailand. According to the

report of the annual operational plan of 2017, there are both external factors and internal factors that affect the mission of the Department of Highways, which is the inability to streamline operations and in line with government policies, and needs of the society. Because of the government policy is changing rapidly. To solve this problem, the executives of Department of Highways need to change the concepts and behaviors in the work of the employee. It also supports the efficient use of information technology to support rapid operations. These causes should be result in the work can achieve the objectives. The success of goals and policies of the Office of Highways, it all depends on the leadership of the highway administrators and the employee work motivation. From the importance of this problem above is the beginning of this research.

Research Objectives

1. To study the level of transformational leadership of highways administrators in the northeastern.
2. To study the level of employee motivation of the Office of Highways.
3. To study the Office of Highways employee performance
4. To investigate the different of transformational leadership, employee work motivation, and employee performance when classified by organization area.
5. To study the influence of transformational leadership on performance through employee work motivation.

LITERATURE REVIEW

Leadership

There are a lot of definitions to explain about leadership. However, to understanding the meaning of leadership, the researchers should begin with an understanding of leader. A Leader is defined as a person or thing that holds a dominant or superior position within its field, and is able to exercise a high degree of control or influence over others & Cause others to follow some course of action or line of thought (Business Dictionary, 2017)[5]. Alghazo and Al-Anazi (2016) Leaders and managers play an important role in creating an atmosphere and culture of enthusiasm and productivity among the employees that help them do what they need to do [1]. What is a difference between leader and leadership? The difference is that leaders embody leadership mindsets and actions. It's who you are as a person that makes you a leader. Doing leadership actions or holding a leadership position does not make you a leader. From the study, it has been found that the concepts and theories related to leadership have been developed in a changing context; in order to arrive at the conclusion that what is a good style leadership can impact on the employee motivation, and organization effectiveness? There are many theories of leadership that try to explain the relation between leadership and motivation, or leadership and employee performance such as traits theory, leadership behavior, situational leadership, contingency leadership, transactional leadership, charismatic leadership. But over the past decade there have been many studies that have examined transformational leadership. Transformational leadership is a style of leadership where a leader works with subordinates to identify needed change, creating a vision to guide the change through inspiration, and executing the change in tandem with committed members of a group. Transformational leadership serves to enhance the motivation, morale, and job performance of followers through a variety of mechanisms; these include connecting the follower's sense of identity and self to a project and to the collective identity of the organization; being a role model for followers in order to inspire them and to raise their interest in the project; challenging followers to take greater ownership for their work, and understanding the strengths and weaknesses of followers, allowing the leader to align followers with tasks that enhance their performance. Bass and Avolio (1994); Balwant (2016) had study "Transformational Instructor-Leadership in Higher Education Teaching: A Meta-Analytic Review and Research Agenda", divided transformational leadership or the full range of leadership introduces four elements: 1) Individualized Consideration; the degree to which the leader attends to each follower's needs, acts as a mentor or coach to the follower and listens to the follower's concerns and needs. The leader gives empathy and support, keeps communication open and places challenges before the followers. This also encompasses the need for respect and celebrates the individual contribution that each follower can make to the team. The followers have a will and aspirations for self development and have

intrinsic motivation for their tasks. 2) Intellectual Stimulation; the degree to which the leader challenges assumptions, takes risks and solicits followers' ideas. Leaders with this style stimulate and encourage creativity in their followers. They nurture and develop people who think independently. For such a leader, learning is a value and unexpected situations are seen as opportunities to learn. The followers ask questions, think deeply about things and figure out better ways to execute their tasks. 3) Inspirational Motivation; the degree to which the leader articulates a vision that is appealing and inspiring to followers. Leaders with inspirational motivation challenge followers with high standards, communicate optimism about future goals, and provide meaning for the task at hand. Followers need to have a strong sense of purpose if they are to be motivated to act by purpose and meaning provide the energy that drives a group forward. The visionary aspects of leadership are supported by communication skills that make the vision understandable, precise, powerful and engaging. The followers are willing to invest more effort in their tasks; they are encouraged and optimistic about the future and believe in their abilities. 4) Idealized Influence; provides a role model for high ethical behavior, instills pride, gains respect and trust. As a development tool, transformational leadership has spread already in all sectors of western societies, including governmental organizations[2] [3]. In this research was used the concept of transformational leadership by adapted from Bass and Avolio (1994); Balwant (2016), transformational leadership composed of 1) Individualized Consideration 2) Intellectual Stimulation 3) Inspirational Motivation and 4) Idealized Influence.

Employee Motivation

The concept of employee motivation had long been developed. Gareth and Jennifer (2008) Employee motivation, or methods for motivating employees, is an intrinsic and internal drive to put forth the necessary effort and action towards work-related activities. It has been broadly defined as the "psychological forces that determine the direction of a person's behavior in an organization, a person's level of effort and a person's level of persistence"[11]. Also, Moran (2013) Motivation can be thought of as the willingness to expend energy to achieve a goal or a reward. Motivation at work has been defined as the sum of the processes that influence the arousal, direction, and maintenance of behaviors relevant to work settings. Motivated employees are essential to the success of an organization as motivated employees are generally more productive at the work place [12]. There are important employee motivation theories such as; Maslow's hierarchy of needs [14] [13], Maslow viewed motivation as being based off a hierarchy of needs, of which a person cannot move to the next level of needs without satisfying the previous level. Maslow's hierarchy starts at the lowest level of needs, basic physiological needs. Basic physiological needs include air, water, and food. Silberstein and Asher (2017) Employers who pay at least a minimal living wage will meet these basic employee needs. The next level of needs is referred to as safety and security needs. This level includes needs such as having a place to live and knowing one is safe. Employers can meet these needs by ensuring employees are safe from physical, verbal and/or emotional hazards and have a sense of job security. The third level of needs is social affiliation and belonging.[20] This is the need to be social, have friends, and feel like one belongs and is loved. Implementing employee participation programs can help fulfill the need to belong. Rewards such as acknowledging an employee's contributions can also satisfy these social and love needs. The fourth level on the hierarchy is esteem needs [20]. This level is described as feeling good about one's self and knowing that their life is meaningful, valuable, and has a purpose. Employers should use the job design technique to create jobs that are important to and cherished by the employee [19]. These first four needs, Maslow called D-Needs (deficient). The last level Maslow described is called self-actualization. Maslow called this the B-Need (being). This level refers to people reaching their potential states of well-being. An employer who ensures that an employee is in the right job and has all other needs met will help the employee realize this highest need. Maslow further expanded self-actualization into four needs: cognitive, aesthetic, self-actualization, self-transcendence [6]. There are also important motivational theories and used for the main conceptual framework of this research is Herzberg's two-factor theory, Skemp-Arlt and Toupence (2007) Herzberg developed the two-factor theory of motivation based on satisfiers and dissatisfies. Satisfiers are motivator factors associated with job satisfaction while dissatisfies are associated with hygiene or maintenance. Satisfiers include achievement, responsibility, advancement, and recognition. Satisfiers are all intrinsic motivators that are directly related to rewards attainable from work performance and even the

nature of the work itself. Dissatisfies are extrinsic motivators based on the work environment, and include a company's policies and administration such as supervision, peers, working conditions, and salary. Herzberg believed providing for hygiene and maintenance needs could prevent dissatisfaction but not contribute to satisfaction [20]. Herzberg also believed that satisfiers hold the greatest potential for increased work performance. Work-life programs are a form of satisfier that recognizes the employee's life outside of work which, in turn, helps motivate the employee. Improving a job to make it more interesting can improve the overall satisfaction an employee is experiencing on the job. A dissatisfies looked at by employees is how relationships form with colleagues [7]. Colleagues play an important role of the workplace as they are all interacting daily. Forming high quality relationships with peers can extrinsically improve employee motivation [7]. In this research was applied employee motivation from the concept of Herzberg [9], by divided employee motivation in 2 aspects as follow; 1) motivate factor 2) hygiene factor.

Performance

In this study, performance refers to the performance of individual employees. Rotundo and Sackett (2002) the concept of performance of employee in the organization is widely and extensively studied. In general, the performance of employee refers to the performance, behavior, and other attributes under the operation of personnel that affect the efficiency and effectiveness of the organization [18]. In the context of public organizations in Thailand, Office of Personnel Research and Development (2015) states that the employee performance at the individual level is a part of the systematic process of administering the results to promote the performance of public agencies, through a clear targeting process, and developing the right worker [16]. For this research, performance measurement was adapted from criteria for evaluating the performance of the Department of Highways (2017). It was referring to the performance of assigned duties of employee of the Department of Highways, comprising; 1) achievement of work, concentration of work, quality of work, speed / timeliness, and 2) the behavior of employee, the ability and behavior of the personnel in the accumulation of professional expertise, adherence to righteousness and ethics, and teamwork [8].

The Link between Leadership, Motivation, and Performance

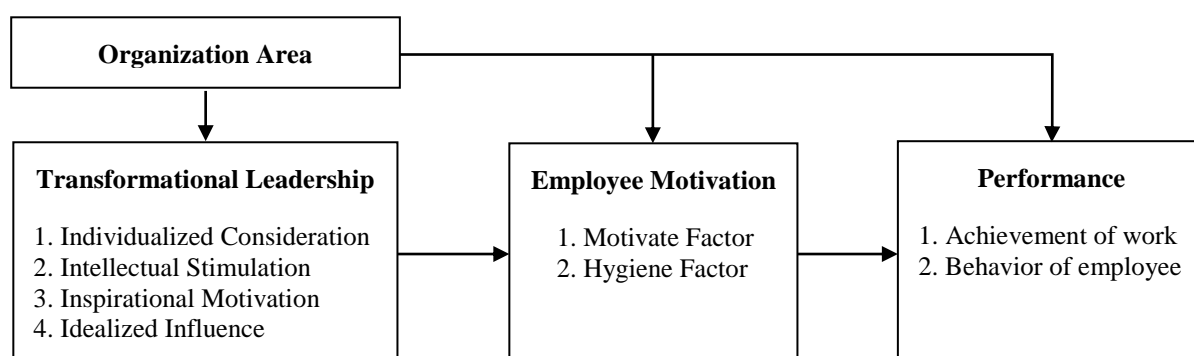
There was empirical evidence about the link between variables that used in this investigation. Sougui (2016) was study "The Impact of Leadership on Employee Motivation in Malaysian Telecommunication Sector", the purpose of this paper was to review the recent literature on the significant of the leadership on the employees' motivation. They reviewed the most relevant and related papers in these last decades. Literature of the leadership had shown a significant positive impact on the employee's motivation, there was also compelling evidence that indicate a negative link between the two variables. As the father of the transformational and transactional leadership, Burns (1978) has defined the transformational leadership as achieving a common aim base on the leader directing and employees' motivation [4]. Hence, leader guiding the employees in a good direction and motivating them it is very crucial for the organization's performance [22]. Naile and Selesho (2014) was study "The Role of Leadership in Employee Motivation", the study reveals that there strong relationship between transformational leadership behaviors and commitment (affective commitment; continuance commitment; and normative commitment). The findings further highlighted the relationship trust, inspiring a shared vision, encouraging creativity and emphasizing development as positive aspect that motivates staff, while it can be argued that transformational leadership cannot raise job satisfaction, however the commitment of employee to their job can raise job satisfaction and ultimately improve the performance [15]. Alghazo and Al-Anazi (2016) was study "The Impact of Leadership Style on Employee's Motivation", this research was mixed methods study aimed to examine the relationship between the adopted leadership style and employees motivation in a private petrochemical company that is located in the eastern province of Saudi Arabia. Furthermore, interviews were conducted with a focus group of 10 employees to validate the results of the survey. The study found that there was a strong relationship between leadership style and employee motivation where the correlation was positive with transformational style and negative with transactional style [1]. In addition, the researcher was literature review the link between employee motivation and performance, and found the empirical results from many

research as follow; Shahzadi et al. (2014), was study “Impact of Employee Motivation on Employee Performance”, the results of this study show that significant and positive relationship exists between employee motivation and employee performance. It is also concluded that intrinsic rewards has a significant positive relationship with employee performance and employee motivation. This study concludes that employee perceived training effectiveness has a negative relationship with motivation. It is also proved from to their responses, they were provided with the training courses but this training was not implemented by them in their routine teaching as they considered it to be ineffective. They were not satisfied the training provided to them and this affected their motivation to teach [21]. Robescu and Iancu (2016) was study “The Effects of Motivation on Employees Performance in Organizations”, the approaches presented shows that there is no clear answer to the question what kind of motivators are the best to increase people performance. There is strong support for addressing in which the money are prioritize and economic factor motivating of human. On the other hand, there are opinions that do not agree entirely with this model saying that money does not significantly affect people's motivation. Finally, there are opinions that do not focus on money at all. Instead they put interest and effort to analyze other reasons. The findings show the importance of leadership style and language used by leaders in increasing the performance of subordinates. Designing job is a crucial motivation of employees [17]. Literature review and related research found positive relationships between leadership, motivation, and performance. However, there are differences in the pattern of influence of leadership on motivation and performance.

CONCEPTUAL MODEL AND HYPOTHESES

The research was aimed to investigate the influence of transformational leadership on performance through employee work motivation. From literature review the research conceptual framework, the researcher was define transformational leadership as independent variable, motivation as mediator variable, and employee performance as dependent variable, detail was on figure 1.

Figure 1
Research conceptual framework



Based on the reviews of the literature of the constructs with the conceptualization of the relationships among variables, the hypotheses suggested by the conceptual framework can be laid out as follows:

H₁: Transformational leadership of administrator, employee motivation, and employee performance are different when classified by organization area.

H₂: Transformational leadership has indirect positive influence on employee performance through motivation.

RESEARCH METHODOLOGY

The population is the employee of the Office of Highways in northeastern area, the population was 1,639, and the sample size was used Taro Yamane's formula. The sample size was 322 persons. Sampling was

based on probability, the stratified sampling method, and the simple random sampling method. The questionnaire used in this study consisted of the 12 questions of transformational leadership adapted from the concept of Bass and Avolio (1994) and Balwant (2016), 39 questions of employee work motivation adapted from the two factors theories of Herzberg (1959), and the employee's performance was adapted from the Department of Highways performance evaluation criteria (2017) with reliability test of .937, .947, and .915, respectively. Statistical data analysis was performed by descriptive statistics and inferential statistics such as frequency, percentage, mean, standard deviation. The hypothesis testing was used t-test, F-test (one-way ANOVA) and path analysis.

ANALYSIS OF DATA

The research data analysis was defined consistent with objective in 5 parts as follow.

1. The level of transformational leadership of highway administrators in the northeastern area, in the overall total mean of transformational leadership was high ($\bar{X} = 4.01$), when classified by aspects found that individualized consideration $\bar{X} = 4.15$, intellectual stimulation $\bar{X} = 4.06$, inspirational motivation $\bar{X} = 3.94$, and idealized influence $\bar{X} = 3.90$ respectively.

2. The employee motivation, in the overall total mean was high ($\bar{X} = 4.00$), when classified by aspects found that the motivate factor was lower mean than hygiene factor by $\bar{X} = 3.96$, and $\bar{X} = 4.05$ respectively.

3. The employee performance, in the overall total mean of employee performance was high ($\bar{X} = 4.21$), when classified by aspects found that behavior of employee had mean more than achievement of work by $\bar{X} = 4.27$, and $\bar{X} = 4.12$ respectively.

4. The first hypothesis testing H_1 : transformational leadership of administrator, employee motivation, and employee performance are different when classified by organization area. The results were as table 1.

Table 1
Compare the different between transformational leadership, employee motivation, and employee performance

Organization Area	Transformational Leadership			
	\bar{X}	S.D.	F	Sig.
Office of Highways 3 (Sakon Nakhon)	3.858	.803	5.703	.004**
Office of Highways 7 (Khon Kaen)	4.203	.733		
Office of Highways 9 (Ubon Rachathani)	4.019	.748		
Organization Area	Employee Motivation			
	\bar{X}	S.D.	F	Sig.
Office of Highways 3 (Sakon Nakhon)	3.973	.574	.780	.459
Office of Highways 7 (Khon Kaen)	4.059	.508		
Office of Highways 9 (Ubon Rachathani)	4.000	.467		
Organization Area	Employee Performance			
	\bar{X}	S.D.	F	Sig.
Office of Highways 3 (Sakon Nakhon)	4.215	.606	1.567	.210
Office of Highways 7 (Khon Kaen)	4.276	.461		
Office of Highways 9 (Ubon Rachathani)	4.144	.532		

This hypothesis aim to compare the different of transformational leadership of administrator, employee motivation, and employee performance are different when classified by organization area, the research found that, there was only transformational leadership had statistic significant at 0.05 levels, by the Office of Highways 7

(Khon Kaen) had ranked first ($\bar{X} = 4.203$), second was the Office of Highways 9 (Ubon Rachathani) ($\bar{X} = 4.019$), third was Office of Highways 3 (Sakon Nakhon) ($\bar{X} = 3.858$).

The second hypothesis testing H₂: Transformational leadership has indirect positive influence on employee performance through motivation.

The second hypothesis is to study the influence of independent variables on dependent variable, was used Pearson's Product Moment Correlation Coefficient to determine the relationship of the independent variable, and path analysis to study the influence of transformational leadership on employee performance through employee motivation. The symbols used to analyze in this research were as follows.

TLD	Represent	Transformational Leadership
EMO	Represent	Employee Motivation
PFM	Represent	Employee Performance

Table 2
Correlation analysis between variables

	TLD	EMO	PFM
Mean	4.016	4.009	4.210
S.D.	.775	.521	.542
TLD	1		
EMO	.730**	1	
PFM	.432**	.658**	1

Table 2 showed that relationship the variables that are related not exceed 0.80, hair et al. (2010) [10] described the relationship between the independent variables must be less than 0.80, which is more than 0.80 may cause of Multicollinearity. This research found the relationship between the independent the highest value was 0.730, it was not exceed 0.80. Multicollinearity problem was not found. Therefore it can be tested by using path analysis to the next.

The research equations are purpose to predict influence of transformational leadership on employee performance through employee motivation.

$$\text{EMO} = \beta_1 \text{TLD} \quad \dots\dots\dots (1)$$

$$\text{PFM} = \beta_2 \text{EMO} \quad \dots\dots\dots (2)$$

The results of the equations analysis were as follows.

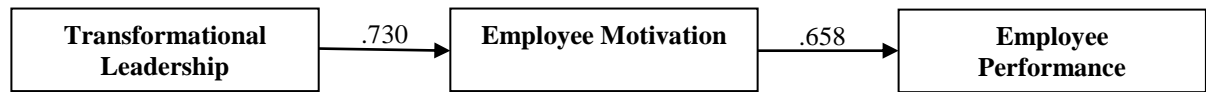
$$\begin{aligned} \text{EMO} &= .730 \text{TLD} \quad \dots\dots\dots (1) \\ &\quad (19.810) \end{aligned}$$

$$R^2 = .532, \text{SEE.} = .356, F = 379.205, \text{Sig of } F = .000$$

$$\begin{aligned} \text{PFM} &= .658 \text{EMO} \quad \dots\dots\dots (2) \\ &\quad (8.466) \end{aligned}$$

$$R^2 = .433, \text{SEE.} = .408, F = 254.270, \text{Sig of } F = .000$$

Figure 2
The path analysis



The research result found that the transformational leadership had statistic significant at 0.05 levels positive influence on employee motivation, by the standardize coefficients (β) at .730, and could explained the variance (R^2) of employee motivation in the moderate level at 53.20%. While employee motivation had statistic significant at 0.05 levels positive influence on employee performance, by the standardize coefficients (β) at .658, and could explained the variance (R^2) of employee performance in the moderate level at 43.30% also.

CONCLUSION

This research was aim to study the influence of transformational leadership on employee performance through employee motivation of the Office of Highways in northeastern Thailand. It is expected that the results of this research can be used as a means to improve the efficiency and effectiveness of the Office of Highways in the future. The transformational leadership level of the Office of Highways administrators, employee work motivation, and employee performance was high. The research hypothesis results found that; for the first hypothesis: accepted some parts of hypothesis, however, the study found the different of transformational leadership of administrators between organization areas, by the Office of Highways 3 (Sakon Nakhon) had lower mean than Office of Highways 7 (Khon Kaen) and Office of Highways 9 (Ubon Rachathani), while employee work motivation and employee performance were not different when classified by organization areas. The second hypothesis was accepted, the results of the investigation reveal the empirical evidence in the influence of transformational leadership on employee performance through employee motivation. Hence, the Office of Highways administrators should be support the policy to enhance and develop the knowledge and skill of the administrators that concern with transformational leadership, especially in the Office of Highways 3 (Sakon Nakhon). In addition, executives should accelerate the measures that will help motivate the work of the employee compose of motivate factor and hygiene factor, because this factor was directly affecting the performance. For the future research recommendation; the researcher should be increase in the study area and population to get more generalization of finding, the research measurement of employee performance in this research was based on opinion of the respondents, it was a weakness point because of respondents often have a bias in response. This causes problems with research reliability.

REFERENCES

- [1] Alghazo, M. & Ali-Anazi, M. (2016), "The Impact of Leadership Style on Employee's Motivation", *International Journal of Economics and Business Administration*, Vol. 2, No. 5, Pp. 37-44. Retrieved from <http://www.aiscience.org/journal/ijeba>.
- [2] Bass, B.M., Avolio, B.J. (1994), "Improving organizational effectiveness through transformational leadership", *Thousand Oaks, CA: Sage Publications*.
- [3] Balwant, P.T. (2016), "Transformational Leadership in Higher Education Teaching: A Meta Analytic Review and Research Agenda", *Journal of Leadership Studies*, Vol. 9, No. 4, Pp. 20-42. Retrieved from <https://doi.org/10.1002/jls.21423>
- [4] Burns, J.M. (1978), "Leadership", New York. Harper & Row.
- [5] BusinessDictionary.com. (2017), Retrieved from <http://www.businessdictionary.com/definition/leader.html>
- [6] D'Souza, J.; Gurin, M. (2016), "The universal significance of Maslow's concept of self-actualization", *The Humanistic Psychologist*, Vol. 44, No. 2.

- [7] Damij, N., Levnajić, Z., Rejec Skrt, V., & Suklan, J. (2015), "What Motivates Us for Work? Intricate Web of Factors beyond Money and Prestige", *PLOS ONE*, Vol. 10, No. 7, e0132641. Retrieved from <https://doi.org/10.1371/journal.pone.0132641>
- [8] Department of Highways. (2017), "Department of Highways Performance Evaluation Criteria", Retrieved from <http://www.doh.go.th/doh/th>
- [9] Frederick Irving Herzberg. In: *ManagementMania.com* [online]. Wilmington (DE) 2011-2018, 01/28/2014
[cit. 03/20/2018]. Available at: <https://managementmania.com/en/frederick-irving-herzberg>
- [10] Hair, J.F., Black, W.C., Babin, B.J., & Anderson, R.E. (2010), "Multivariate Data Analysis", 7th Edition.
Prentice Hall, Upper Saddle River, New Jersey.
- [11] Gareth, R.J., M.G. Jennifer. (2008), "*Contemporary management* ", 5th ed., Boston: Irwin McGraw-Hill,
Retrieved from <https://trove.nla.gov.au/version/182015738>
- [12] Moran, Barbara B. (2013), "Library and Information Center Management". Santa Barbara, CA: Libraries Unlimited.
- [13] Maslow, A. H. 1954. Motivation and Personality. Harper & Row, Publishers, Inc.
- [14] McLeod, S. (2007), "Maslow's Hierarchy of Needs", Retrieved from
<https://www.simplypsychology.org/maslow.html>
- [15] Naile, I. and Selesho, J. M. (2014), "The Role of Leadership in Employee Motivation", *Mediterranean Journal of Social Science*, Vol. 5, No. 3, Pp.175-182. MCSER Publishing, Rome-Italy. E-ISSN 2039-2117, ISSN: 2039-9340. Doi:10.5901/mjss.2014.v5n3p175.
- [16] Office of Personal Research and Development. (2015), "Development of the quality of life of government officials", Website: www.ocsc.go.th. Retrieved from
<http://brd.ocsc.go.th/PublicQWL/?p=49>
- [17] Robescu, O., Iancu, G. (2016), "The Effects of Motivation on Employees Performance in Organizations", *Valahian Journal of Economic Studies*, Vol. 7, No.21, Issue 2, Pp. 49-56. doi: 10.1515/vjes-2016-0006.
- [18] Rotundo, M., Sackett, P. R. (2002), "The relative importance of task, citizenship, and counterproductive performance to global ratings of job performance: A policy-capturing approach", *Journal of Applied Psychology*, Vol. 87, Pp. 66–80, doi:10.1037/0021-9010.87.1.66.
- [19] Silberstein, Shula Asher. (2017), "The hierarchy of Needs for Employees", Retrieved from
<http://smallbusiness.chron.com/hierarchy-needs-employees20121.html>.
- [20] Skemp-Arlt, K.M., Toupençe, R. (2007), "The administrator's role in employee motivation", *Coach & Athletic Director*, Pp. 28–34.
- [21] Shahzadi, I., Javed, A., Pirzada, S. S., Nasreen, S., & Khanam, F. (2014), "Impact of Employee Motivation on Employee Performance", *European Journal of Business and Management*, Vol. 6, No. 23, pp. 159-166. ISSN: 2222-2839. Retrieved from <http://www.iiste.org/journals/>
- [22] Sougui, A. O., Bon, A. T., & Mahamat, M. A. (2017), "The Impact of Leadership on Employee Motivation in Malaysian Telecommunication Sector", *Galore International Journal of Applied Sciences and Humanities*, Vol. 1, Issue: 1, Pp. 59-68. Website: www.gkpublication.in

Should education be in English-medium? Friend or foe?

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ABSTRACT

English has long gained a prominent role and status worldwide (Crystal, 2012). Therefore, while the common premise is that the medium of education should be English providing the aim of the education is to prepare students for an international career, some opponents, however, believe in the setbacks of English-medium instruction (EMI). The purpose of this study was to investigate 146 undergraduate students' perceptions on EMI at a state university in Turkey and to reveal how their department and their genders affect their perception levels.

Data were analyzed through SPSS version 16 performing descriptive statistics, frequencies and independent samples t test. Deductive qualitative analyses were employed for the open-ended responses. The overall results indicate that 63 % of the students in the English department and 59,26 % of the students in other departments think that the instruction needs to be conducted in English-medium at universities. In particular, easy access to resources, employment opportunities, and contribution to academic success have been reported to be prominent upsides of EMI. On the other hand, the majority of the participants in both parties noted that EMI sets a barrier to internalize the subject matter. However, the students rather appear to see EMI as a cultural richness as proposed by Görgülü (1998) and Sayarı (2007). Finally, gender seems to affect students' perception about the EMI at a statistically significant level. In language classes, the best route to follow would not be either L1 or L2 approach but to embrace both ways to promote highly proficient bilinguals.

Keywords: English Medium of Instruction, EFL, EAP, advantages, disadvantages

A Research on Security Practices of Accommodation Establishments in Istanbul

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ABSTRACT

For tourist, the safety and security is one of the most effective factors in selecting destinations and hotels. Threats such as theft, murder, harassment, terrorist attacks, diseases, natural disasters and cyber - attacks against tourists put pressure on the managers to take the measures in tourism enterprises. In this study, it is investigated, from the managers' point of view, which measures are more important for tourist and enterprise security in accommodation establishments in Istanbul where is an important destination. In addition, it is also investigated the occurrence of an event in accommodation establishments that would jeopardize the safety of tourists or establishments itself. A survey was developed to obtain data for the purpose of the research. The e-mail addresses of the accommodation establishments have been obtained from their web pages for the online survey. Later, the survey was sent to the security officers or the hotel manager of 551 accommodation establishments.

Once the data have been collected, various statistical tests will be used in accordance with the purpose of the study. Finally, it is thought that findings obtained as a result of the study will contribute and guide the business managers and related literature.

Keywords: Safety and Security, Hotel Industry, Istanbul, Turkey.

THE ECONOMIC, POLITICAL AND SOCIAL DIMENSION OF RESOURCE ABUNDANCE: A SURVEY

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ABSTRACT

Resource abundance as a curse or blessing has been an overarching topic of research for both academics and policy makers. This paper aims to study the economic, political and social dimension of resource abundance. The extensive literature regarding economic dimension of resource abundance indicates the negative correlation between resource abundance and economic growth. Literature exploring political dimensions overwhelmingly reports the deterioration of political institutions in the form of rent seeking and corruption in face of resource abundance. The literature regarding social dimensions is also compatible with the findings stated for economic and political dimensions. However, a good deal of studies also reveal that the relationship between resource abundance and all three dimensions of nation life is not straight forward and depends on several factors among which institutional quality and the level of economic growth are of utmost importance. Due to favourable economic, political and social factors resource abundance can become a blessing rather than a curse.

Keywords: Resource Curse, Dutch Disease, Institution Quality, Human Capital

Analyzing of Economic Value Source of Manado City Revenue in Bunaken National Park

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ABSTRACT

Indonesia is an archipelagic country, with a ratio of land area and waters 1: 3 and internationally recognized (UNCLOS 1982) which was then ratified by Indonesia with Law No.17 Year 1985. Based on UNCLOS'82 data The extent of Indonesian territorial territory includes an area of 3.1 million km², consisting of 2.8 million km² of coastal territory and 0.3 million km² of marine territory. No wonder if nature tourism, especially its maritime tourism is more advanced and become the main attraction for tourists both local and international. Bunaken National Marine Park in North Sulawesi is representative of tropical water ecosystems in Indonesia consisting of mangroves, seagrass, coral reefs and coastal is one of the flagship objects of tourism that is in great demand by both National and International tourists and is also an asset that can help the economy of Manado people in particular and North Sulawesi in general. Namun series ng with the growth of ecotourism activities This study aims to determine and learn the economic value of Bunaken National Park based on travel costs to visit and study factors that influence visitors to pay the benefits of the existence of Bunaken National Park.

Keywords: *Bunaken National Park, Bunaken community income, Economic Value*

Analysis the Impact of Water Resources in Bunaken National Park to Marine Biodiversity

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ABSTRACT

Bunaken National Park is one of the international tour's destination in Indonesia which has the worlds' attention because it becomes a diving sports destination. Bunaken National Park consists of five islands that is Bunaken, Siladen, Manado Tua, Mantehage, and Nain. Among the five islands, there are twenty main spots for diving, twelve are in Bunaken Island. In 2011, the number of tourists that come to Bunaken National Park is about thirteen thousand, which is ten thousand is foreign tourists. The beauty that Bunaken National Park offer is the highest biodiversity of marine biota that seldom to find on another island. One of the reason is that of the geographical location of Bunaken National Park that is located in the heart of the coral triangle among Malaysia, Philippines, Papua New Guinea, Timor Leste, and Solomon Islands. The area of coral triangle is a habitat for half of all of the coral species, this national park has 390 coral species. Geographical location is also affect the type of waters in Bunaken National Park. Based on water resources theory, the type and quality of waters have an important part in order to create biota biodiversity. Accordingly, the purpose of this paper made by the researcher is to analyze the effect of water resources in Bunaken National Park to marine biodiversity.

Keywords: *Bunaken National Park, Biodiversity, Coral, Water Resources*

Synthesis and Characterization of 1-(5-benzoyl-1H-1,2,3-benzotriazole-1-yl) 2-oxoethylamino) propionic acid and their metal complexes

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ABSTRACT

1-(5-benzoyl-1H-1,2,3-benzotriazole-1-yl) 2-chloroethanone was condensed with 2-amino propionic acid (Alanine) and resulting 1-(5-benzoyl-1H-1,2,3-benzotriazole-1-yl)2-oxoethylamino) propionic acid. The newly synthesized ligand and their complexes that been prepared, were analyzed and characterized by using different techniques, such as elemental analysis, infrared and electronic spectra. The IR spectra, NMR spectra and atomic absorption analysis show that the benzotriazole ligand forming chelates with 2:1(Ligand: Metal) stoichiometry. Metal complexes were evaluator in-vitro antibacterial activity against Negative and Positive bacteria. The complexes showed significant antibacterial activity.

Keywords: Alanine, Benzoyl benzotriazole, Metal complexes, Synthesis, antibacterial activity.

The Relationship between Work Motivation and Staff Organizational Commitment of Revenue Department, Thailand

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ABSTRACT

The objectives of this research were as follow 1) to study the work motivation of the staff 2) to study the staff organizational commitment 3) to study the different of work motivation and organizational commitment classified by personal factors 4) to study the relation between work motivation and organizational commitment.

In this research the target populations include, the staff of revenue department region 10 amounts of 1,322 staffs. Calculated according to the formula of Taro Yamane (1973), sample size of 400 samples was selected by proportional sampling and simple random sampling. Data collected were used from questionnaires with as follows items: 31 questions of work motivation questionnaire, 12 questions of organization commitment. Research quality control was used literature review to determine the validity of the content, and used Cronbach alpha coefficient for the reliability testing. It was estimated to be .949 of work motivation questions, and .914 of organizational commitment questions respectively. Hypothesis testing was used t-test, F-test (One Way ANOVA), and multiple regressions.

The research results reveal that work motivation of revenue department region 10 staffs was at 3.97 by mean and organizational commitment staffs was at 3.88. The hypothesis testing found that personal factors were only gendered with statistic significant different at 0.0level on organizational commitment by male was higher organizational commitment than female. Work motivation composed with motivate factors and hygiene factors had positive influence on organizational commitment, the independent variables could be explain the variance of the dependent variables (Adjusted R^2) by 58 percent. Therefore, it can be concluded that work motivation had a positive influence on organizational commitment.

Keywords– Organizational Commitment, Work Motivation.

INTRODUCTION

Background

In the economic development of Thailand, government agencies are very important to gaining government income from 3 main agencies as follow; the Revenue Department, the Customs Department and the Excise Department. It is said that the Department of Revenue is a major organization of tax collection for the government to spend and manage the economic and social development of the country, under the Ministry of Fiscal oversight. Ministry of Fiscal has enforced the Department of Revenue to implement the policy and target. Hence, the Revenue Department needs to develop its capabilities to be consistent and up-to-date with rapidly evolving information technology. The result of current technological developments, the Revenue Department is trying to adapt to the changing economic structure of the country. Over the years, the Revenue Department has put technology for the operation, therefore the staffs need to learn and understand

increasing of systems. The work system relies on internal information technology of the Department of Revenue has many systems. Some systems have duplicate features. Because the database used is not linked to each other. In many systems, there are operational rules that clearly define the time frame for work. Staffs are strictly controlled by that operation rules. This is a great increase workload for the staff of the Revenue Department [1]. Another important issue is the imposition does not meet the expectation. Taxation is a difficult task. It also has the opportunity to dispute with the taxpayers, from this cause it can affect to staffs more stress from the work. Over the past 4-5 years, the Revenue Department's personnel have been able to access the Revenue Department and leave the Revenue Department within a short period of time. Therefore, the Department of Revenue must be admitted to the recruitment often. The trend of problems arising from reducing the number of personnel working at the Revenue Department for a continuous period of several consecutive years clearly shows that the problem of the reduced number of personnel is critical to the operation [2].

In addition to staff in the Revenue Department is one of the most stressful occupations and affects the motivation to their work, as well as organizational commitment. Because it is professions that people generally have prejudices, have a sense of resistance, and look at the staff member in the negative [3]. Especially the staffs of the Revenue Department region and branch Revenue Office have to contact the taxpayer directly. Include tax inspectors have to inspect the business at the taxpayer's premises; the nature of the work will be monitored closely by taxpayers, tax payments must be checked, the correct payment of tax, the appropriate of tax to the condition of the business, from this causes it may create dissatisfaction to the business owners or tax payer. As a result, staff members face pressure, the feeling is not safe, boredom. In addition, the performance of various positions must be in line with the objectives and targets set by the Revenue Department [4]. This affects the motivation and commitment to the organization. Therefore, the motivation for working in the organization is important and very sensitive to the behavior that will cause the organizational commitment. It is imperative that motivation is created to motivate desirable behaviors such as diligence, commitment, determination, harmony, and loyalty to the organization, to achieve the goal. This is the source of the study. The relationship between job motivation and organizational commitment of the Revenue Department region 10 will benefit the problem, and the development of motivation and organizational commitment of Revenue Department region 10 staffs in the future.

Research Objectives

This paper examines 4 objectives as follow 1) To study the work motivation of the staff 2) To study the staff organizational commitment 3) To study the different of work motivation and organizational commitment classified by personal factors 4) To study the relation between work motivation and organizational commitment.

LITERATURE REVIEW

Motivation

Literature review in this section includes meanings, significant, theories, concepts related to motivation, as well as motivation measurement. Maehr and Mayer "Understanding Motivation and Schooling: Where We've Been, Where We Are, and Where We Need to Go" motivation is a word that is part of the popular culture as few other psychological concepts are. Motivation theories can be classified on a number of bases; Natural vs. Rational: based on whether the underlying theory of human cognition is based on natural forces (drives, needs, desires) or some kind of rationality (instrumentality, meaningfulness, and self-identity). Content vs. Process: based on whether the focus is on the content ("what" motivates) vs. process ("how" motivation takes place) [5]. Elliot and Covington, from "Approach and Avoidance Motivation" motivation is the reason for people's actions, desires, and needs. Motivation is also one's direction to behavior, or what causes a person to want to repeat a behavior. A motive is what prompts the person to act in a certain way, or at least develop an inclination for specific behavior. Human motivation is a complex and well studied field that has broad roots in a diverse collection of academic disciplines including psychology, sociology, education, political science, and economics. In simplified terms, motivation can be defined as, "what causes

people to behave as they do”. Because motivation is so difficult to define, it may help in determining what motivation is not. Motivation can outline four examples. Motivation is not directly observable, the same as satisfaction, always conscious, and directly controllable [6]. Content Theories of Motivation, was proposed a five level hierarchy of needs which he outlined as necessary for the achievement of a completely, satisfied individual; or in his terms, a self-actualized being. Those needs are: physiological, safety, love, esteem, and self-actualization. Maslow, proposed a five level hierarchy of needs which he outlined as necessary for the achievement of a completely satisfied individual; or in his terms, a self-actualized being. Those needs are: physiological, safety, love, esteem, and self-actualization [7]. Herzberg, influenced by both Maslow and McGregor, posited his own theory of motivation called the motivation-hygiene theory. In this, he describes two dimensions of conditions: motivators and hygiene factors. Motivators, akin to Maslow’s higher-level needs, are what lead to job satisfaction and are associated with the nature of the work itself: achievement, recognition, responsibility and growth. Motivators are intrinsic factors which lead to job satisfaction. On the other hand, hygiene factors, associated with Maslow’s lower-level needs, do not lead necessarily to motivation or satisfaction, but rather are extrinsic and simply reduce job dissatisfaction. Examples of hygiene factors include: company policy and administration, supervision, relationships with supervisors, and work conditions [8]. In addition, Stella et al., had study “Motivation and Work Performance: Complexities in Achieving Good Performance Outcomes; a Study Focusing on Motivation Measures and Improving Workers Performance in Kitgum District Local Government”, and theory of Herzberg was used as a guideline for construct motivation measurement [9]. Onanda, these motivation factors help the organization to avoid clashes and non cooperation, avoid wastage of resources, reduce industrial accidents and also reduce the rate of labor turnover and absenteeism, motivation brings harmony, unity and cooperative and outlook among employees [10]. In this research was adapted motivation measurement form Herzberg and Onanda concept.

Organization Commitment

The first organizational behavior research, such as the famous Hawthorne Studies, focused on worker low productivity. Later studies focused on examining the relationships between job satisfaction and job performance, and it was found that this relationship was not all that strong. Researchers then began to look at other attitudinal concepts, such as organizational commitment. Meyer and Allen reported; we started to conduct research on commitment in the early 1980s. Our interest was stimulated initially by practical considerations: What made some volunteers in nonprofit organizations so highly committed to their work and how might this sense of commitment be instilled in others [11]. Maxwell, this primer explores the topic of organizational commitment, its possible influence on organizational efficiency, and actions leaders can take to build highly-committed workforces [12].

It is commitment that gets the job done. This intense dedication is more powerful than our best intentions, willpower, or circumstances. Without commitment, influence is minimal; barriers are unreachable; and passion, impact, and opportunities may be lost. Cohen was remark that commitment is a force that binds an individual to a course of action of relevance to one or more targets [13]. This general description of commitment relates to the definition of organisational commitment by Arnold, namely that it is “the relative strength of an individual’s identification with and involvement in an organisation” [14]. Mowday, Steers, and Porter, identified commitment-related attitudes and commitment-related behaviors. They were explained three major components of organizational commitment as being “a strong belief in and acceptance of the organization’s goals, a willingness to exert considerable effort on behalf of the organization, and a definite desire to maintain organizational membership” [15]. These concepts above were used as a guideline for framing organization commitment in this research.

The Link between Motivation and Organization Commitment

Danish et al., had study “The Impact of Motivation on Employee’s Commitment: Evidence from Public and Private Sector of Pakistan” to analyze the impact of employee’s motivation on employee’s commitment they had selected four core variables better employment opportunity, job involvement, working environment, and incentives which were very essential part to motivate employees and to meet the necessity of life specially in developing countries where economic, social, technological and political instability is

found. In today's world, the major challenge for HR directors and policy makers is to find committed employees and is to make existing employees committed towards organization. The research result showed job involvement that was one of the motivation factor had positive and strong relationship with employee's organizational commitment [16]. Salleh et al., had study "The Influence of Work Motivation on Organizational Commitment in the Workplace" commitment is a vital element in an organization. It depends on the activities and role, produced by employees in an organization, committed employees who are more productive and efficient, less likely to leave from their organization. It is because such employees are willing to sacrifice for the sake of the organization's goal with a strong desire to stay. In addition, motivated employees will provide a high commitment towards them; feel less pressure thus love their work. Unmotivated employees will contribute to absenteeism; perform poorly at work and other negative factors that may contribute to organization. Therefore, the objective of this paper is to measure the relationship between work motivation and organizational commitment among employees in an engineering company in Dungun, Terengganu [17]. The findings show that, there is a positive association between work motivation and organizational commitment. In conclusion, an organization should consider in enhancing work motivation to boost the level of their employees' commitment. The above research was the empirical evidence of the relationship between work motivation and organizational commitment.

CONCEPTUAL MODEL AND HYPOTHESES

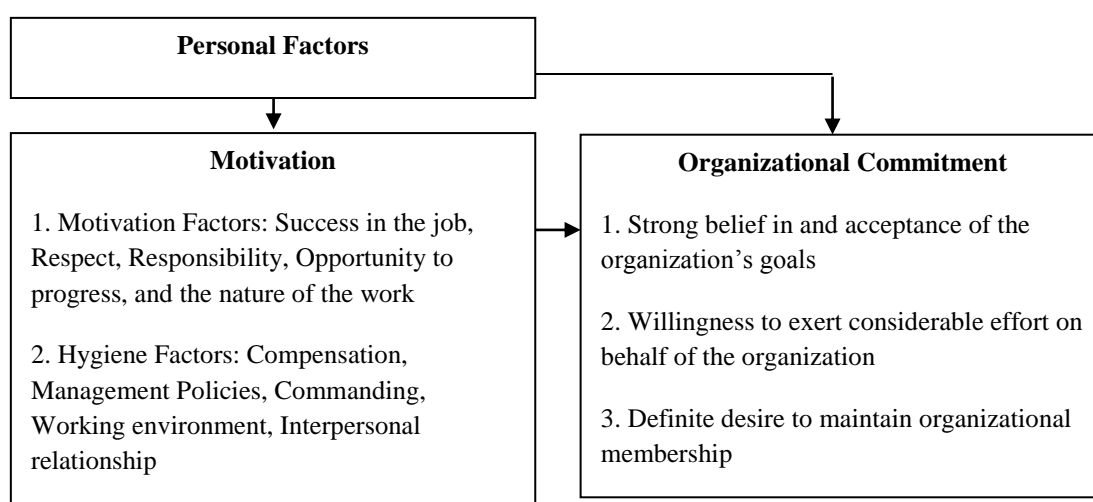
The research was mainly aimed to study the influence of staff work motivation on organizational commitment. The research hypothesis and conceptual framework were as follow:

H₁: Staff work motivation and organizational commitment was different when classified by personal factors.

H₂: Staff work motivation had positive influence on organizational commitment.

H₃: Staff work motivation when classified by aspects (Hygiene factor, Motivate factor) had different positive influence level on organizational commitment.

Figure 1
A conceptual model of research



RESEARCH METHODOLOGY

In this research the target populations include, the staff of revenue department region 10 amounts of 1,322 staffs. Calculated according to the formula of Taro Yamane (1973) [17], sample size of 400 samples

was selected by proportional sampling and simple random sampling. Data collected were used from questionnaires with as follows items: 31 questions of work motivation questionnaire adapted from Two-Factor Theory of Herzberg (1966) and Onanda (2015), 12 questions of organization commitment adapted from Mowday, Porter and Steers (1982). Research quality control was used literature review to determine the validity of the content, and used Cronbach alpha coefficient for the reliability testing. It was estimated to be .963 of work motivation questions, and .914 of organizational commitment questions respectively. Hypothesis testing was used t-Test, F-Test (One Way ANOVA), and multiple regressions.

ANALYSIS OF THE DATA

This research was used program for statistical analysis in social science to analysis of the data. The research finding and the hypothesis testing in this study were as follows.

Table 1
Mean, standard deviation, and Cronbach's alpha of research variables

Variables	Indicator	Mean	S.D.	Cronbach's Alpha
Motivation	Success in the job	4.139	.607	Motive Factor .925
	Respect	3.825	.640	
	Responsibility	4.021	.668	
	Opportunity to progress	3.502	.809	
	the nature of the work	3.815	.730	
	Compensation	3.841	.776	Hygiene Factor .913
	Management Policies	3.711	.979	
	Commanding	3.841	.776	
	Working environment	3.614	.888	
	Interpersonal	3.855	.762	
	Total Motivation	3.755	.581	.949
Organizational Commitment	Strong belief in and acceptance of the organization's goals	3.800	.675	.941
	Willingness to exert considerable effort on behalf of the organization	4.063	.723	
	Definite desire to maintain organizational membership	3.676	.929	
	Total Organizational Commitment	3.846	.687	

The detailed analysis of each variable reveal as follows.

1. The analysis of the variables used in the study, including staff working motivation and organizational commitment, found that the overall was moderate. The mean of compensation was lowest at 3.199, opportunities in progress mean at 3.502 and the working environment at 3.614. Organizational commitment found that the desire to maintain membership of the organization was minimal, while willingness to exert considerable effort on behalf of the organization mean was highest at 4.063.

2. The hypothesis testing of this research.

H₁: Staff work motivation and organizational commitment was different when classified by personal factors

Table 2
The different of motivation and organizational commitment classified by personal factors

Age Range	Work Motivation			
	\bar{x}	S.D.	F	Sig.
Below 31 years	3.399	.735	10.073	.000**
31-40 years	3.627	.530		
41-50 years	3.833	.519		
Above 50 years	3.935	.627		
Age Range	Organizational Commitment			
	\bar{x}	S.D.	F	Sig.
Below 31 years	3.430	.922	10.614	.000**
31-40 years	3.677	.647		
41-50 years	3.971	.607		
Above 50 years	4.018	.692		
Education	Work Motivation			
	\bar{x}	S.D.	F	Sig.
Below Bachelor Degree	3.578	.800	3.146	.044*
Bachelor Degree	3.795	.529		
Above Bachelor Degree	3.716	.587		
Education	Organizational Commitment			
	\bar{x}	S.D.	F	Sig.
Below Bachelor Degree	3.605	.953	4.251	.015*
Bachelor Degree	3.902	.624		
Above Bachelor Degree	3.792	.682		
Marital Status	Work Motivation			
	\bar{x}	S.D.	F	Sig.
Single	3.605	.580	7.506	.001**
Married	3.842	.548		
Devoice/Separate	3.781	.675		
Marital Status	Organizational Commitment			
	\bar{x}	S.D.	F	Sig.
Single	3.650	.708	9.133	.000**
Married	3.949	.635		
Devoice/Separate	3.953	.765		
6-15 years	3.644	.562		
16-25 years	3.785	.492		
More than 25 years	3.984	.657		

Table 2 – Continued

Marital Status	Organizational Commitment			
	\bar{x}	S.D.	F	Sig.
Single	3.650	.708	9.133	.000**
Married	3.949	.635		
Devoice/Separate	3.953	.765		
Department	Work Motivation			
	\bar{x}	S.D.	F	Sig.
Tax Inspectorate	3.683	.448	5.019	.000**
Planning/Evaluation	3.766	.576		
Process and Tax Return	3.844	.556		
Law and Accelerated Tax Debt	3.666	.573		
General Management	3.558	.721		
Area Revenue	4.050	.606		
Department	Organizational Commitment			
	\bar{x}	S.D.	F	Sig.
Tax Inspectorate	3.814	.574	5.227	.000**
Planning/Evaluation	3.802	.723		
Process and Tax Return	3.948	.602		
Law and Accelerated Tax Debt	3.613	.699		
General Management	3.640	.876		
Area Revenue	4.209	.596		
Working Experience	Work Motivation			
	\bar{x}	S.D.	F	Sig.
Below 6 years	3.589	.727	5.536	.000**
6-15 years	3.644	.562		
16-25 years	3.785	.492		
More than 25 years	3.984	.657		
Working Experience	Organizational Commitment			
	\bar{x}	S.D.	F	Sig.
Below 6 years	3.674	.835	3.959	.000**
6-15 years	3.753	.690		
16-25 years	3.858	.623		
More than 25 years	4.103	.688		

Table 2 – Continued

Salary	Work Motivation			
	\bar{x}	S.D.	F	Sig.
Below 20,001 Baht	3.642	.596	3.271	.039*
20,001-40,000 Baht	3.738	.562		
More than 40,000 Baht	3.755	.581		
Salary	Organizational Commitment			
	\bar{x}	S.D.	F	Sig.
Below 20,001 Baht	3.720	.691	1.942	.145
20,001-40,000 Baht	3.863	.698		
More than 40,000 Baht	3.899	.667		

The first hypothesis was testing the different of motivation and organizational commitment classified by personal factors, research results found that there was not different between genders. There were statistically significant different at the 0.05 level in the following factors. By age range, the group of below 31 years had the lowest mean in the aspect of work motivation and organization commitment. By educational level, the group of under bachelor degree had lowest mean. By the marital status, the group of single had lowest mean. By department, the department of general management, and law and tax accelerated debt were lower mean than other department. By working experience, the group of below 6 years had lowest mean. By salary, the group of below 20,001 baht/month had the lowest mean.

To test hypothesis, the researchers defined the symbol of variables as follows; MOT1 Represent Motivate Factor, MOT2 Represent Hygiene Factor, TMOV Represent Total Motivation, and OCOM Represent Organizational Commitment. This hypothesis testing of the research was used Pearson's product moment correlation coefficient to determine the relationship of the independent variables, and Multiple regression analysis to study the influence of work motivation on organizational commitment. The hypothesis testing result was as follow; table 3 showed that relationship the variables that are related not exceed 0.80, hair et al. (2010) described the relationship between the independent variables must be less than 0.80, which is more than 0.80 may cause of Multicollinearity. This research found the relationship between the independent the highest value was 0.756, it was not exceed 0.80. Therefore it can be tested by using multiple regressions to the next.

Table 3
Correlation analysis between variables

	MOT1	MOT2	TMOV	OCOM
Mean	3.860	3.644	3.755	3.846
S.D.	.550	.694	.581	.687
MOT1	1			
MOT2	.756**	1		
TMOV	.926**	.947**	1	
OCOM	.767**	.766**	.817**	1

H₂: Staff work motivation had positive influence on organizational commitment.

H₃: Staff work motivation when classified by aspects (Motivate factor, Hygiene factor) had different positive influence level on organizational commitment.

The results of research testing were as follow.

Table 4
The influence of staff total work motivation on organizational commitment

Variable	Standardized Coefficient (β)	t	Sig.t
Total Work Motivation (TMOV)	.817	28.613	.000**
$R^2 = .688$, SEE = .396, F = 818.729, Sig. of F = .000			

Table 5
The influence of staff total work motivation on organizational commitment

Variable	Standardized Coefficient (β)	t	Sig.t
Motivation Factor (MOT1)	.439	10.067	.000**
Hygiene Factor (MOT2)	.435	9.982	.000**
$R^2 = .670$, SEE = .396, F = 411.601, Sig. of F = .000			

Hypothesis 2 and hypothesis 3 showed that staff work motivation had statistical significance at 0.05 levels positive influences on organizational commitment, by total work motivation, motivation factor and hygiene factor could be explained the variance (R^2) of dependent variable (organizational commitment) 68.80 and 67.00 percent in a similar level. When compare influence between motivate factor and hygiene factor found that, hygiene factor had lower influence than motivate factor, by standardize coefficient (β) at 4.35, and .439 respectively.

CONCLUSION

This research was aim to investigate the level of staff working motivation, organizational commitment, and influence of motivation on organizational commitment of the Revenue Department region 10. The results found that staff working motivation and organizational commitment in the overall was moderate. The first hypothesis was accepted, the staff working motivation and organizational commitment was different when classified by personal factors. The remark follow: the staff of Revenue Department region 10 in the group of younger staffs, education below bachelor, single, low salary, low work experience, and work in the department of general management and law and accelerated tax debt had also poor in motivation and organizational commitment. Therefore, the administrator of Revenue Department region 10 should be formulate urgent policy that can enhance in motivation such as: 1) compensation; improvement of compensation scheme, appropriate for the amount of work and responsibility, and criteria for salary increase clear and fair 2) work progress; training opportunities to increase staffs' expertise, appropriate criteria for promotion, career path plan for the future 3) working environment; appropriate allocated in workspace proportion, adequate office equipment, appropriate and efficient facilities for operation. The second hypothesis and the third hypothesis was accepted, the research revealed that staff work motivation had positive influence on organization commitment; the finding was consisted with the research results of Danish et al. (2013), Salleh et al. (2016) these findings supported the relationship between the independent variables and the variables used in the study. However, although the independent variables used in this study had the power to explain the variance of the dependent variables almost 70%, future study should need to study the other independent variables in order to better explain the causal factors of organizational commitment. In addition, the study of the consequence of organizational commitment is also necessary. The study of the

relationship between organizational commitment and the performance of personnel or the overall performance of an organization is essential for future research.

REFERENCES

- [1] Revenue Department (2018), "The Revenue Department Magazine 2018-2561", URL: <http://www.rd.go.th/publish/27803.0.html>.
- [2] Revenue Department (2017), "The Revenue Department Magazine 2017-2560", URL: http://download.rd.go.th/fileadmin/eMagazines/RD_June_Online_Single.pdf.
- [3] Revenue Department (2017), "The Revenue Department Magazine 2017-2560", URL: http://download.rd.go.th/fileadmin/eMagazines/rd_sep_17/#p=1.
- [4] Revenue Department (2017), "The Revenue Department Magazine 2017-2560", URL: http://download.rd.go.th/fileadmin/eMagazines/RD_Nov_Online_Single.pdf.
- [5] Maehr, M.L., & Meyer, H.A. (1997), "Understanding Motivation and Schooling: Where We've Been, Where We Are, and Where We Need to go", *Educational Psychology Review*, Vol. 9, No. 4, Pp. 371-409.
- [6] Elliot, A.J., & Covington, M.V. (2001), "Approach and Avoidance Motivation", *Educational Psychology Review*, Vol. 13, No. 2, Pp. 73-92.
- [7] Maslow, A.H. (1954), "Motivation and Personality", *Harper & Row*, New York, Pp. 112-165.
- [8] Herzberg, F. (1968), "One More Time: How do you motivate employees?", *Harvard Business Review*, Vol. 40, No. 1, Pp. 53-62.
- [9] Salleh, S.M., Zahari, A.S., Said, N.S.M. & Ali, S.R.O. (2016), "The Influence of Work Motivation on Organizational Commitment in the Workplace", *Journal of Applied Environmental and Biological Science*, Vol. 6, No. 55, Pp.139-143.
- [10] Onanda, B. (2015) , "The effect of Motivation on Job Performance: A Case Study of KCB Coas Region", *International Journal of scientific and Research Publications*, Vol. 5, No. 9, Pp. 11-19.
- [11] Meyer, J.P., & Allen, N.J. (1997), "Commitment in the Workplace", *Sage Publications*, California, Pp. 109-169.
- [12] Maxwell, J.C. (1999) , "The 21 Irrefutable Laws of Leadership", Nashville: *Thomas Nelson Incorporated*, Pp. 68-129.
- [13] Cohen, A. (2003) , "Multiple commitments in the workplace: An integrative approach", *Lawrence Erlbaum*, New Jersey, Pp. 112-146.
- [14] Arnold, J. (2005) , "Work Psychology: Understanding Human Behavior in the workplace 4th edition", London: *Prentice Hall Financial Times*, Pp. 235-299.
- [15] Mowday, R., Porter, L., & Steers, R. (1982), "Employee Organization Linkages: The psychology of commitment, absenteeism, and turnover", *Academic Press*, 2nd edition, New York, Pp. 66-94.
- [16] Danish, R.Q., Saif, U. R. & Yasin, M. (2012), "The Impact of Motivation on Employee's commitment: Evidence from Public and Private Sector of Pakistan", *World Review of Business Research*, Vol. 2, No. 1, Pp.109-118.
- [17] Yamane, T. (1973), "Statistics an introduction analysis", *Harper & Row*, New York, Pp. 45-77.

Competitive Advantage the Consequence of Entrepreneurship and Innovation: A Case Study of Processed Fish Product Community Enterprise in Thailand

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ABSTRACT

This research was examine 1) the level of entrepreneurship of the processed fish products community enterprises 2) the level of innovation of the processed fish product community enterprises 3) the competitive advantage of the processed fish product community enterprises 4) the different of entrepreneurship, innovation, and competitive advantage classified by organizational factors 5) the influence of entrepreneurship and innovation on competitive advantage of processed fish product of community enterprises.

The study was used quantitative approach. There were 36 groups of the community enterprises in Nakhon Phanom province, 583 members, based on Yamane formula , there were 400 sampling, and used proportional sampling and simple random sampling. Questionnaires were used to collect data. Reliability testing was used Cronbach's alpha coefficient as follow entrepreneurship was .934, innovation was .940, and competitive advantage was .920. General data on respondents and business data were analyzed by descriptive statistics composed of frequency, percentage, mean, and standard deviation. Hypothesis testing was used t-test, F-test, Pearson product-moment correlation coefficient, and path analysis.

The research results found that the mean score of entrepreneurship, innovation, and competitive advantage were 4.55, 4.54, and 4.55 respectively. The entrepreneurship had positive statistical significant at 0.05 on competitive advantage through innovation. The entrepreneurship can be explained the variance of innovation by 33.8%, with a standardized coefficient (Beta) of .489, while innovation can be explained the variance of competitive advantage by 41.0% , with a standardized coefficient (Beta) was .527, and entrepreneurship can be explained the variance of competitive advantage by 32.1% , with a standardized coefficient (Beta) was .485.

Keywords– Entrepreneurship, Innovation, Competitive Advantage

INTRODUCTION

Background

Nakhon Phanom is a province in the upper northeastern region of Thailand, which is a fertile border town, beautiful scenery and a variety of cultures and ethnicities, including a long history. The northern and eastern areas of the province are adjacent to the Mekong River. People in Nakhon Phanom mostly live in rural areas with low income. The government has promoted the group to raise higher income in the form of community enterprise. Community enterprises are a grouping of people in rural areas to supply and share raw materials used in production, labor and equipment, production, marketing, distribution of goods and services. Community enterprise in Thailand is the concept of encourage people in rural areas to have to integrate into the business based on the development of sufficiency economy by using the community

capital. The communities have the opportunity to development their local knowledge and wisdom to make the community more self-reliant and ready for future trade competition.

Fish processing community enterprise in Nakhon Phanom province was a combination of agriculturists and housewives. Processed fish by the community enterprise in Nakhon Phanom was development of traditional wisdom of the community as a product and make money for the community by focus on local ingredients such as the Mekong River fish, which can be obtained from local natural sources. The processed fish product was a process of adding value to fish products. However in the current situation found that factors business operation of processed fish community enterprises are now more intense competition, thus businesses of community enterprise have both successful and failed. This study was aim to analyzing the factors that affected the success or failure of community enterprises, by focusing on entrepreneurship, innovation and competitive advantage. For this reason above, the researcher was interested in studying the causal factors, the pattern of the impact of these factors on the success of the business. The results of this research will be used as a guideline for the development of community enterprises business operation and the improvement of the quality of life of members in the community fish processing industry in Nakhon Phanom province in the future.

Research Objectives

This paper examines 5 objectives as follow:

- 1) To study the level of entrepreneurship of the processed fish products community enterprises
- 2) To study the level of innovation of the processed fish product community enterprises
- 3) To study the competitive advantage of the processed fish product community enterprises
- 4) To study the different of entrepreneurship, innovation, and competitive advantage classified by organizational factors
- 5) To study the influence of entrepreneurship and innovation on competitive advantage of processed fish product of community enterprises.

LITERATURE REVIEW

Entrepreneurship

The review of the relevant literature scholars had to provide a meaning of entrepreneurship as follows: Leibenstein has defined that an entrepreneur is characterized as "someone who demonstrates initiative and creative thinking, is able to organize social and economic mechanisms to turn resources and situations to practical account, and accepts risk and failure. [1] Hisrich have comment the entrepreneur as a person who habitually creates and innovates to build something of recognized value around perceived opportunities. [4] Onuoha found that entrepreneurs usually are considered to bear risk while pursuing opportunities, and often are associated with creative and innovative actions. In addition, entrepreneurs undertake a managerial role in their activities. [15] Lumpkin and Dess have clarifies the nature of the entrepreneurial orientation (EO) construct, entrepreneurial orientation is the processes, practices, intentions, and decision-making activities leading to new entry. It has five key dimensions: autonomy, innovativeness, risk taking, proactiveness, and competitive aggressiveness. Although all five dimensions are central to understanding the entrepreneurial process, they occur in different combinations, and the factors vary independently in a given context. [16] Eisenmann has define entrepreneurship as 1) "Pursuit" implies a singular, relentless focus. Entrepreneurs often perceive a short window of opportunity. They need to show tangible progress to attract resources, and the mere passage of time consumes limited cash balances. Consequently, entrepreneurs have a sense of urgency that is seldom seen in established companies, where any opportunity is part of a portfolio and resources are more readily available. 2) "Opportunity" implies an offering that is novel in one or more of four ways. The opportunity may entail: pioneering a truly innovative product, devising a new business model, creating a better or cheaper version of an existing product, targeting an existing product to new sets of customers. 3) "Beyond resources controlled" implies resource constraints. At a new venture's outset, its founders control only their own human, social, and financial capital. Many entrepreneurs bootstrap: they keep expenditures to a bare minimum while investing only their own time and, as necessary, their personal funds. In some cases, this is adequate to bring a new venture to the point where it becomes self-sustaining

from internally generated cash flow. With most high-potential ventures, however, founders must mobilize more resources than they control personally: the venture eventually will require production facilities, distribution channels, working capital, and so forth. The conceptual framework of this research was used entrepreneurship adapted from Lumpkin and Dess. the entrepreneurship was includes: 1) creativeness 2) risk taking 3) proactiveness 4) competitive aggressiveness 5) self confidence 6) integrity [16]

Innovation

The definitions of innovation from literature review are as follow, innovations are new ideas that consist of new products and services, new use of existing products, new markets for existing products or new marketing methods. Simmonds has complete a task development in a radically new way. [3] Davenport creating a new association combination product market-technology- organization. [5] Boer and During explain Innovation can be defined as a process that provides added value and a degree of novelty to the organization, suppliers and customers, developing new procedures, solutions, products and services and new ways of marketing.[6] Knox .innovation is management discipline: it focuses on the organization's mission, searches for unique opportunities, deter mines whether they fit the organization's strategic direction, defines the measures for success, and continually reassesses opportunities.[9] Gaynor has defined innovation is the implementation of a new or significantly improved product (good or service), or process, a new marketing method, or a new organizational method in business practices, workplace organization or external relations. [8] OECD/Eurostat. Have comment For some problems a universal yardstick is enough but innovation encompasses creation of new opportunities, businesses, markets, environments, methods of working and operating.[12] Shapiro has defined sustainable and profitable growth in a company requires sustainable innovation activities.[13] Gupta has comment innovation is important because in this knowledge era, many companies see it as a strong contributor and means for generating business and profitable growth that will improve an organization's performance and competitiveness[14] Potters found that developing successful technological innovations is essential for creating and sustaining an organization's competitive advantage.[2] Castro et al has also defined innovation has been consistently defined as the adoption of idea or behavior that is new to the organization. [20] Bon and Mustafa have given the meaning innovation varies in scope, time for completion and organizational and societal impact. Categorization of any kind usually involves areas of duplication, where the lines between one category and another overlap.[19] Edison, Ali, and Torkar. had study the types of innovation, and the conclusion of research was four types of innovation accord-ing to primary studies: 1) Product innovation: This refers to creation and introduction of new (technologically new or significantly improved) products which are different from existing products 2) Process innovation: This refers to implementation of a new design, analysis or development method that changes the way how products are created 3) Market innovation: This refers to implementation of new or significantly modified marketing methods, strategies and concepts in product design or packaging, placement, promotion or pricing 4) Organisation innovation: This refers to the implementation of a new organisational method in the firm's business practices, workplace organisation or external relations. The conceptual frame work of this research was used innovation adapted from [21]

Competitive Advantage

The definitions of competitive advantage from literature review are as follow, the term competitive advantage was first introduced by Porter has defined competitive strategies analysis. According to competitive advantage stems from the company's ability to create value for its buyers that will exceed the cost of its creation. Value is what buyers are willing to pay, and superior value stems from offering lower prices than competitors for similar benefits or unique benefits at a higher price. the competitive advantage theories suffer from the same weakness as a neoclassical theory of the firm. So according to writer the idea of competitive advantage gives explanatory power of strategy and organization. The success of firm in the market depends upon the organization work of firm, sector and their interrelationship. They sought where a competitive advantage could be established by devolving organizational superiority.[2] Bagnoli et al has also defined competitive advantage occurs when an attribute or combination of attributes in an organization are acquired or developed that allows the organization to outperform its competitors. In a service oriented business, competitive edge is well achieved through innovation strategies which are value creating and their

implementation is simultaneous by any current or potential player. [11] Smith has defined competitive advantage as the degree to which a firm explores its opportunities neutralizes threats and reduces cost.[24] Sigalas found that Competitive advantage is described as position of superiority or uniqueness of a firm over its rivals or competitors, derived from its products/ services, processes or ways of doing business. A firm must establish how well to perform its functions to bring that uniqueness or superiority in relation to competition. The superiority or distinction to the customer should be valuable and should be perceived. The conceptual frame work of this research was used competitive advantage adapted from the literature review above, competitive advantage was includes as follow: 1) low cost advantage 2) differentiation advantage 3) market focus. [23]

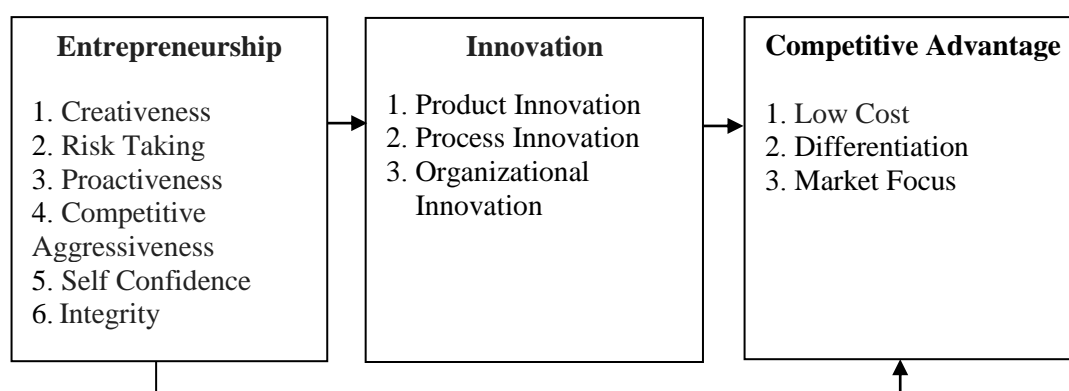
The link between Entrepreneurship, Innovation and Competitive Advantage

There were many empirical evidences of link between entrepreneurship, innovation and competitive advantage. Beaver was study innovation, entrepreneurship and competitive advantage in the entrepreneurial venture, the research found a critical examination of the process and management of innovation and the attainment of competitive advantage in the emerging enterprise. The ingredients for the successful management of innovation are explored using two case illustrations of companies that have attained profitable and sustainable business development against the odds in the pharmaceutical and fiber-optics industries. [11] Azzam, Ghaith and Ayed. were study of impact of innovation on realizing competitive advantage in banking sector in Jordan. The results illustrated that innovation has a direct positive impact on competitive advantage through its dimensions (time, quality, cost, and flexibility). [18]

CONCEPTUAL MODEL AND HYPOTHESES

The research was mainly aimed to investigate competitive advantage the consequence of entrepreneurship and innovation. Therefore the research hypothesis is: The entrepreneurship has positive influence on competitive advantage through innovation.

Figure 1
A conceptual model of research



RESEARCH METHODOLOGY

This research was used quantitative study. There were 36 groups of the community enterprises in Nakhon Phanom province, 583 members, based on Yamane formula, there were 400 sampling, and used proportional sampling and simple random sampling. The questionnaires on entrepreneurship were 21 items adapted from the concepts of Lumpkin and Gregory [16]. The questionnaires on innovation were 18 items was adapted from Edison, Ali, and Torkar [21] and a measure of the competitive advantage was adapted from the concept of Protogerou, Caloghirou and Lioukas. with 9 items.[17] The Reliability test was as data in table 1.

Table 1
Result of the Reliability Measurement

Variables	Cronbach Alpha Coefficient
Entrepreneurship	0.934
Innovation	0.940
Competitive Advantage	0.920

The data was analyzed by descriptive statistics composed of frequency, percentage, mean, and standard deviation (S.D.). Hypothesis testing was used Pearson product moment correlation coefficient, and path analysis.

ANALYSIS OF THE DATA

This research was used program for statistical analysis in social science to analysis of the data. The research finding and the hypothesis testing in this study were as follows. Table 2

Table 2
Mean and standard deviation of research variables

Variables	Mean	S.D.
Entrepreneurship	4.55	0.21
Innovation	4.54	0.24
Competitive Advantage	4.55	0.22

The detailed analysis Of each variable reveal as follows.

1. The entrepreneurship mean score were as follows; entrepreneurship in creativeness 4.61, entrepreneurship in risk taking 4.58, entrepreneurship in proactiveness 4.35, entrepreneurship in competitive aggressiveness 4.54, entrepreneurship in self confidence 4.53, and entrepreneurship in integrity 4.50

2. The innovation mean score were as follows; the highest mean was product innovation at 4.57, process innovation at 4.53, and the lowest mean was organizational innovation at 4.50.

3. The competitive advantage mean score were as follows; the highest mean was competitive advantage in differentiation at 4.55, competitive advantage in market focus at 4.55, and the lowest mean was competitive advantage in low cost at 4.54.

4. The hypothesis testing of this research was to study the influence of independent variables on dependent variable was used Pearson's product moment correlation coefficient to determine the relationship of the independent variables, and Path analysis to study the influence of entrepreneurship and innovation on competitive advantage. The symbols used to analyze in this study was as follows.

EOS	Represent	Entrepreneurship
INO	Represent	Innovation
CAV	Represent	Competitive Advantage

Table 3 showed that relationship the variables that are related not exceed 0.80, described the relationship between the variables must be less than 0.80, which is more than 0.80 may cause of Multicollinearity. This research found the relationship between the independent the value was 0.512, it was not exceed 0.80. Multicollinearity problem was not found. Therefore it can be tested by using multiple regressions to the next.

Table 3
Correlation analysis between variables

	EOS	INO	CAV
Mean	4.55	4.54	4.55
S.D.	0.21	0.24	0.22
EOS	1		
INO	.512**	1	
CAV	.503**	.527**	1

The research equations to predict influence of investigate competitive advantage the consequence of entrepreneurship and innovation were as follows.

$$\text{INO} = \beta_1 \text{EOS} \quad \dots\dots\dots (1)$$

$$\text{CAV} = \beta_2 \text{INO} \quad \dots\dots\dots (2)$$

$$\text{CAV} = \beta_3 \text{EOS} \quad \dots\dots\dots (3)$$

The result of equations was as follows.

$$\text{INO} = .489 \text{EOS} \quad \dots\dots\dots (1)$$

(11.170)

$$\text{CAV} = .527 \text{INO} \quad \dots\dots\dots (2)$$

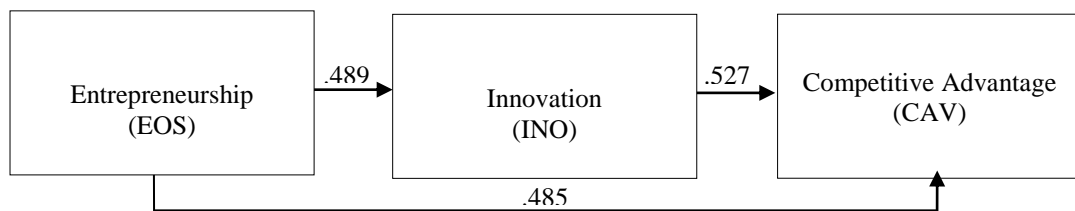
(12.383)

$$\text{CAV} = .485 \text{EOS} \quad \dots\dots\dots (3)$$

(11.052)

Equations can be showed in the form of Path Analysis as below.

Figure 2
Path analysis of Competitive Advantage the Consequence of Entrepreneurship and Innovation



The statistical analysis for hypothesis testing found that the entrepreneurship can explain the variation of the innovation, the innovation can explain the variation of the competitive advantage, and the entrepreneurship can explain the variation of competitive advantage by 33.8% (Adjusted R Square .338), 41.0% (Adjusted R Square .410), and 32.1% (Adjusted R Square .321) respectively. It was found that the entrepreneurship had statistically significant at 0.05 levels positive influence on the innovation by standardized coefficients (β) .489, the innovation had statistically significant at 0.05 levels positive influence on the competitive advantage by standardized coefficients (β) .527, and the entrepreneurship had statistically significant at 0.05 levels positive influence on competitive advantage by standardized coefficients (β) .485 also.

CONCLUSION

This research was mainly aimed to investigate competitive advantage the consequence of entrepreneurship and innovation. The research revealed that entrepreneurship had positive indirect impact on competitive advantage through innovation, and direct impact also.

Theoretical contribution, the results of this study was confirmed that entrepreneurship had influence on innovation and competitive advantage, in addition to innovation had positive influence on competitive advantage also. The research finding consistent with the concept Azzam, Ghaith and Ayed, it was confirmed that innovation has a direct positive impact on competitive advantage. the firm should support innovation in all aspects of business and operations [18] Also, according to the research results of Shahram and Saeed, it was confirmed that entrepreneurship can play a strong leverage strategic entrepreneurship would result in production and service-provision, in other words, they create some Value for customer-friendly service-provision, in other words, they create some value for customer which can become competitive advantage.[25]

Policy contribution, the government should encourage community enterprises prepare for future trade competition. It also promotes the development of community enterprises to small and medium enterprises or SMEs by promoting business knowledge as well as creating entrepreneurship for leaders and members of community enterprises. The government should promote community enterprises to be able to develop their own innovations composed of product innovation, process innovation, and organizational innovation. It may provide an innovative reward to community enterprises to build on.

The future research, this research had study limited to the processed fish product only, therefore future research should enlarge the population scope of research to other community enterprises such as beef cattle of Sakon Nakhon province, the operator of Sugar Palm of Phetchaburi province, and the jasmine rice of Srisaket province. There are also other variables that are causal factors of competitive advantage, such as organizational culture, leadership, organizational structure; this are variables that should be studied in the future.

REFERENCES

- [1] Leibenstein, H.(1979). "The General X-Efficiency Paradigm and the Role of the Entrepreneur". In M. Rizzo (ed), *Time, Uncertainty, and Disequilibrium. Exploration of Austrian Themes*, Lexington, MA: Lexington Books, Pp. 127-39.
- [2] Porter, M.E. (1985). "Competitive Advantage: Creating and Sustaining Superior Performance", The Free Press, New York, Pp. 537-540
- [3] Simmonds, K., (1986). "Marketing as innovation; the eight paradigm", *Journal of Management Studies*, Vol.5, No.23
- [4] Hisrich, R.D. (1990). "Entrepreneurship/Intrapreneurship". *American Psychol* NO.45(2), Pp. 209-222.
- [5] Davenport, T.H., (1991). "Process Innovation: Reengineering Work Through IT" (Boston, Harvard Business School Press).
- [6] Boer, H., and W. During. (2001). "Innovation, what innovation? A comparison between product, process and organizational innovation". *International Journal of Technology. Management*. 22(1-3): Pp. 83-107.
- [7] Garcia and Calantone, R. (2002). "A Critical Look at Technological Innovation Typology and Innovativeness Terminology: A Literature Review". *The Journal of Product Innovation Management*, vol.19, Pp.110-132.
- [8] G.H. Gaynor,(2002). "Innovation by Design", Amacom.
- [9] Knox, S. (2002) , " The boardroom agenda: developing the innovative organisation" , *Corporate Governance*, Vol. 2 No. 1, Pp. 27-39.
- [10] Bagnoli, M. and Watts, S. (2003) . "Selling to socially responsible consumers: competition and the private provision of public goods". *Journal of Economics and Management Strategy*, No.12, Pp. 419-445
- [11] Beaver, G. (2003). "Small firms: owners and entrepreneurs". *Strategic Change*, 12(4), Pp. 177-183.
- [12] OECD/Eurostat (2005). *Oslo Manual, Guidelines for Collecting and Interpreting Innovation Data*, Paris: OECD.

- [13]Shapiro (2006). "Measuring Innovation: Beyond Revenue from New Products". Research Technology Management, Vol. 49, Pp. 42-51
- [14] Gupta, A. K., Tesluk, P. E., & Taylor, M. S. (2007). "Innovation at and across multiple levels of analysis". Organization Science, Vol.18 No.6, Pp. 885-897.
- [15] Onuoha G., (2007). "Entrepreneurship", AIST International Journal 10, Pp. 20-32.
- [16] Lumpkin and Gregory G.Dess (2008). "Clarifying The Entrepreneurial Orientation Construct and Linking It to Performance". Vol.21, Pp.135-172.
- [17] Protogerou A., Y. Caloghirou and S. Lioukas, (2012). "Dynamic capabilities and their indirect impact on firm performance ", Industrial and Corporate Change, Vol.21, No.3, Pp. 1–33
- [18] Azzam Azmi Abou-Moghli, Ghaith Mustafa Al Abdallah, and Ayed Al Muala. (2012). "Impact of Innovation on Realizing Competitive Advantage in Banking Sector in Jordan" American Academic & Scholarly Research Journal. Applied Science Private University, Amman, Jordan. Vol. 4, No. 5
- [19] Bon, A. T., & Mustafa, E. M. A. (2012). "Recent and Influential Studies on TQM-innovation Relationship: A review". International Journal of Management Studies, Statistics and Applied Economics (IJMSAE), Vol.2, No.2, Pp. 147-162
- [20] Castro, G.M., Delgado-Verde, D., Navas-López, J., Cruz-González, J., (2013). "The moderating role of innovation culture in the relationship between knowledge assets and product innovation", Technological Forecasting & Social Change, Vol.80, Pp. 351–363
- [21] Edison, H., bin Ali, N., and Torkar, R. (2013). "Towards innovation measurement in the software industry". Journal of Systems and Software, Vol.86, Pp.1390-1407
- [22] Thomas Eisenmann.(2013). "The Entrepreneurial Manager: Course Overview, 2013 Wintererm". Harvard Business School Course Overview Note Pp. 813-155
- [23] Sigalas Ch., Economou V.P. (2013). "Revisiting the concept of competitive advantage: Problems and fallacies arising from its conceptualization", Journal of Strategy and Management, Vol.6, No.1, Pp. 61-80
- [24] Smit, A.J. (2013). "The competitive advantage of nations: is Porter's Diamond Framework a new theory that explains the international competitiveness of countries", Southern African Business Review, Vol.14, No.1, Pp.105-130
- [25] Shahram Mirzaei Daryani and Saeed Tabrizinia (2015). "Relation between strategic entrepreneurship with going competitive advantages and wealth- creation" Journal of Applied Environmental and Biological Sciences Journal Apply Islamic Azad University, Tabriz ,Iran. Environ. Biol., Vol.5, No.10, Pp.106-111

The Impact of Client Development Staff Competency and Group Member Participation on the Effectiveness of Community Development Projects Prototype under Sufficiency Economy Philosophy of Thailand

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ABSTRACT

The objectives of this research were as follow 1) to study the competency of the client development staff 2) to study the participation of the project's group members 3) to study the effectiveness of the project 4) to study the different of the competency of the client development staff, the participation of the project's group members, and the effectiveness of the project when classified by personal factors 5) to study the impact of the client development competency and project's group members participation on the effectiveness of the project.

This research was used quantitative study, the population consisting of 11,668 members of the Sufficiency Economy Project of the Bank for Agriculture and Agricultural Cooperatives in Sakon Nakhon Province and the samples was 400 project's group member, collect data was using questionnaire. The questionnaire on the competency of the client development staff was based on the concept of the Bank for Agriculture and Agricultural Cooperatives of 10 items, the questionnaires on the participation of project group member were 15 items, adapted from the concept of Cohen and Uphoff [5], and a measure of the effectiveness of the project was based on the concept of the Bank for Agriculture and Agricultural Cooperatives [23] , with 15 items. The data was analyzed by frequency, percentage, mean, and standard deviation (S.D.). The t-test, F-test (One Way ANOVA), Pearson's product moment correlation coefficient and path analysis were used for hypothesis testing.

The research finding found that the competency of client development staff, the participation of the project's group members, and the effectiveness of the project were high, by the mean was 4.79, 4.71, and 4.79 respectively. The hypothesis testing; there was found the statistic significant at 0.05 levels different between gender and age toward the competency of client development staff, the competency of client development staff had positive impact on the participation of the project's group members, and the standard coefficient (β) was .583, the participation of the project's group members had positive impact on the project effectiveness, and the standard coefficient (β) was .467.

Keywords– Competency, Participation, Effectiveness

INTRODUCTION

Background

According to the most recent data from the National Statistical Office [22], approximately 13.63m Thais worked in the agricultural sector. This was around 35% of the total workforce, with no other single sector coming close in terms of numbers employed manufacturing, for example, and accounted for around 16%. In terms of contribution to GDP, however, the agriculture sector accounted for only about 10.7% of the total in

the fourth quarter of 2015, while manufacturing accounted for 26.3%. Agriculture's proportion of both these measures has been falling over the years. The results of the development of Thailand to the modernization country, this had caused a lot of change for Thai society in all aspects such as economic, political, cultural, social and environmental, therefore the process of change was complex and difficult to explained. The positive result was the increase in the economic growth rate, modern communication or expanding the volume and spread more thorough Thai people's education. However, these positive results could not spread to rural people or disadvantaged people in society. "Sufficiency Economy" was a philosophy conceived and developed by His Majesty King Bhumibol Adulyadej of Thailand over 60 years of tireless development work to improve the lives of the Thai people in urban, rural, especially agriculturist.

The goal of implementing the Sufficiency Economy Philosophy was to create balanced and stable development, at all levels, from the individual, family and community to society at large by developing the ability to cope appropriately with the critical challenges arising from extensive and rapid changes (i.e. globalization) in the material, social, environmental, and cultural conditions of the world. The principle of Sufficiency Economy stresses the importance of following or adopting the middle path for appropriate conduct by the population at all levels of society (individual, family, community and nation) in terms of development and administration in order to modernize in line with the forces of globalization. In other words, people should try to avoid extreme thoughts, behaviors and actions. Sufficiency had three components: moderation, reasonableness, and self-immunity, with two accompanying conditions: appropriate knowledge and ethics and virtues.

The Bank for Agriculture and Agricultural Cooperatives had set up a program to strengthen the Thai agricultural sector in accordance with the philosophy of sufficiency economy for 3 consecutive years from 2015 to 2017. The budget was 600 million baht, focusing on developing and linking knowledge, to maximize the potential of marketing, networking, learning and continuous improvement. This was in line with the farmers' development plan currently being implemented by the Ministry of Agriculture and Cooperatives. However, the effectiveness of the project depends on several important factors. The success factor of a project is what the project must have or should have to accomplish Bacarrini [19], This is exactly what the project manager must know about how to get these factors. That means more opportunities for the project to achieve its goals. In general, the project manager often had an opinion on the success factors of a project in a different perspective. As a result, different in the concept of project management can make different in the project effectiveness. For example, some project managers' focus on building competencies for staffs and teams, some project managers' focus on communication management, some project managers' give priority to the support of management and the participation of stakeholders of the project.

The purpose of this research was to study the important factors affecting the effectiveness of the community development projects prototype under sufficiency economy philosophy of Bank for Agriculture and Agricultural Cooperatives in Sakon Nakhon province, Thailand. The focus was on how the competency of the client development staffs and the participation of the group members, both factors impact on the effectiveness of the project. The benefits of this study will help the project management of the Bank for Agriculture and Agricultural Cooperatives in rural are become more fruitful in the future.

Objectives

This paper examines 5 objectives as follow:

- 1.To study the competency of the client development staff
2. To study the participation of the project group members
3. To study the effectiveness of the project
4. To study the different of the competency of the client development staff, the participation of the project's group members, and the effectiveness of the project when classified by personal factors
5. To study the impact of the client development competency and project group members' participation on the effectiveness of the project.

LITERATURE REVIEW

Competency

The review of the relevant literature scholars had to provide a meaning of competency as follows: Competence is the ability of an individual to do a job properly. A competency is a set of defined behaviors that provide a structured guide enabling the identification, evaluation and development of the behaviors in individual employees. The term "competence" first appeared in an article authored by White[2], as a concept for performance motivation. Lundberg (1970)[3]defined the concept in "Planning the Executive Development Program". The term gained traction when in 1973, McClelland [1],wrote a seminal paper entitled, "Testing for Competence Rather than for Intelligence". It has since been popularized by Boyatzis[6], and many others, such as Gilbert [4], who used the concept in relationship to performance improvement. Its use varies widely, which leads to considerable misunderstanding. Boyatzis[6], and Fogg [11], extend this definition to include both internal and external constraints, environments, and relationships related to the job or occupation. Motivations and perceptions of the work and one's self or talent also are viewed as influential in competently and successfully performing in a position. In summary, competencies are specific personal qualities that are "causally related to effective and/or superior performance" (Boyatzis) [6], are common across many settings and situations, and endure for some time. As per Hoffmann [12], the definition varies with competency utilization and user requirements. Accordingly, competencies have been defined from various perspectives in the literature (Table 1).

Table 1
Definition on Competency/Competencies

Author/Year	Definition
Boyatzis (1982)	As an essential characteristic of a person in that it may be a motive, trait, skill, aspect of one's self-image or social role, or body of knowledge which he or she uses
Spencer and Spencer (1993)	An underlying characteristic of an individual that is causally related to criterion-referenced effective and/or superior performance in a job or situation
van der Klink and Boon (2002)	Defined competencies in terms of three distinct perspectives: competencies as individual characteristics; competencies as characteristics of organizations; and the notion of competencies as a tool to structure and facilitate communication between education and the labor market
Bartram (2005)	As sets of behaviors that are instrumental in the delivery of desired results or outcomes

From the literature review found similarities and differences in competency concept. In this study, the framework of the study was based on the client development position competency criteria of the Bank for Agriculture and Agricultural Cooperatives [23], which includes the following details: knowledge of business operation of the Bank for Agriculture and Agricultural Cooperatives, knowledge in business loans, agricultural loans, knowledge in rural development, expertise and experience to develop customers and communities, knowledge in the process of coordinating and linking rural development and multilateral work. The focus is on the development of customers and communities in accordance with the philosophy of sufficiency economy and new theories, understand how to work in the context of development, understand the context, direction, plans and groups participation in rural development, and promote the implementation of the community with emphasis on counseling, finding knowledge or experts in the promotion process and support to improve the people quality of life.

Project Participation

Over the past decade, many researchers have contributed to the literature on project participation. Participation of people in the project is one of the important factors that affect the effectiveness of the project. Participation is a dynamic process. Hence, it is difficult to predict or even to quantify using a standard measurement. Participation is rather molded by, and originates from, individuals' experiences in participating. As such, the qualitative-ethnographic approach employed in this study was able to assist in understanding the process of people's participation in community development activities. This approach has also helped to deepen the knowledge about participation itself. This was not achieved merely by putting participation into a measurable variable that can be defined into four quantifiable aspects, i.e. decision making, implementing, benefit sharing and evaluation (Cohen and Uphoff) [5]. Participation is a very broad concept (Lane) [15], that means different things to different people (Kelly) [14]. The vagueness and lack of conceptualization of the concepts of participation and empowerment cause confusion over expectations and over the evaluation of outcomes of the participatory development process (Lyons, Smuts et al.) [15]. A wide suite of definitions of participation have been identified from the literature and will be identified and discussed as follows. One commonality to all definitions is the role of community in decision-making. As such participation is often referred to as community participation. Community can be defined as a range of factors including geographic location, norms, and interests. Many definitions of participation hint at the participation continuum (see typologies section) and the various levels of community involvement. Some definitions focus on other aspects such as the involvement of all stakeholders, at all stages of development; on outcomes; on empowerment; and on the important role of disadvantaged groups particularly women and the poor. Ndekha, Hansen et al. (2003)[17], supported this, identifying that the overall objective of community participation is twofold in that it is a mechanism to empower and facilitate an improvement in the lives of the world's poor people. From the above literature review, this research identifies the project members' participation from Cohen and Uphoff [5], concept. It consists of 4 aspects as follows, participation of project members in the decision-making process, participation of project members in project implementation, participation of project members in gaining benefits, participation of members in project evaluation.

Project Effectiveness

Within the field of project management (PM) the concepts of efficiency and effectiveness are commonly used, but rarely defined. Some researchers apply the concepts when describing how to improve some part of PM (Ward) [13], Goff [21], effectiveness adds another dimension. The quality movements of the 1980s and into the 90s increased business emphasis on effectiveness. They achieved this, in part, by also focusing on results. A handful of visionaries, including Deming, Juan, Crosby, Stewart, and others, introduced a range of concepts into companies that made it clear that success is not just about numbers and statistics, it is about satisfaction. That satisfaction requirement included customers, staff, and other stakeholders, such as shareholders. The Bank for Agriculture and Agricultural Cooperatives [23], had set the criteria for evaluating the effectiveness of community development projects prototype under sufficiency economy philosophy as follows: 1) Project can develop the prototype community strengthen in the economy, society and environment 2) Project can develop the prototype community to respond the career of the farmers and community members by integrating with the others bank projects 3) Project can encourage community shops in the prototype communities Stage 2 and 3 to serve as a place to distribute products of the community, production factors. Project members can by goods at fair price, and a center for gathering the main agricultural products of the community linking to the external market 4) Project community stage 2 or stage 3 is a community of shared learning community of the Bank for Agriculture and Agricultural Cooperatives employees by assigning client development staff act as mentors and coach 5) Support stage 3 of the prototype community project to extend the philosophy of sufficiency economy to neighboring communities 6) Development of the prototype community stage 3 to become a prototype community with high potential 7) Improve project members' financial literacy to achieve financial discipline, know the use of money correctly by using know the life, know saving before borrowing, can manage the community debt management by participatory process.

The Link between Staff Competency, Members' Participation, and Project Effectiveness

Research on the influence of personnel competency or project team behavior on people's participation was not much in empirical evidence. However, the individual skills and behaviors of the project team are paramount to a successful and effectiveness of United States Environmental Protection Agency (2017)[25], public participation program. There is no one magic skill that will help you to always succeed. However the right attitudes and behaviors are always necessary for success and will go a long way in building the trust and credibility necessary for successful public participation. Furthermore, project management research had demonstrated the relationship between staffs' competencies and community people participation, including public participation on the effectiveness of the project. For over 20 years, it has been argued that successful development projects, including water supply projects, must have a participatory component. To briefly summarize, it is argued that people's participation can contribute to the achievement of five main objectives of water supply Projects: effectiveness, efficiency, empowerment, equity and coverage (Narayan) [10], In addition, if people are involved in a project they are more likely to feel ownership, support it and work to make it succeed (Tacconi and Tisdell 1992)[7], Grabman et al. (2017)[24], the research found that community participation ranged from outreach educational activities to communities being full partners in decision-making, community participation as a process and the presence of a focus to strengthen community capacity to participate may be a key factor for long term effectiveness and success.

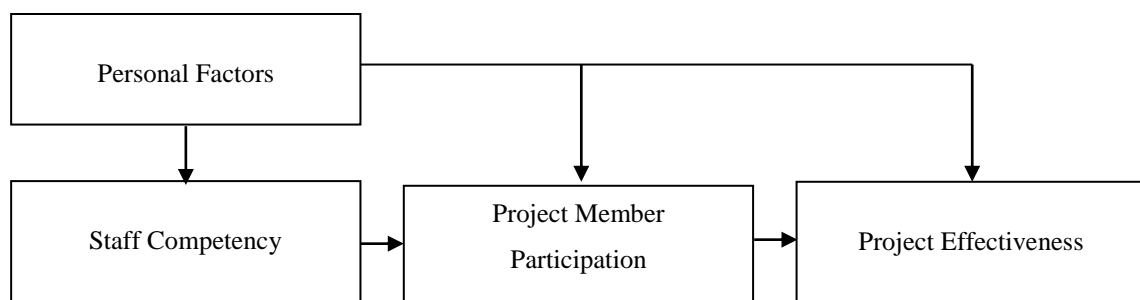
CONCEPTUAL FRAMEWORK AND HYPOTHESES

The research was mainly aimed to investigate the impact of client development staff competency and group member participation on the effectiveness of community development projects. Therefore the research hypotheses were:

H₁: Client development staff competency, project members' participation, and the effectiveness of the prototype community project were different when classified by personal factors.

H₂: The client development staff competency has a positive impact on the effectiveness of the prototype development project through participation of project members.

Figure 1
A conceptual model of research



RESEARCH METHODOLOGY

This research was used quantitative study, the population consisting of 11,668 members of the Sufficiency Economy Project of the Bank for Agriculture and Agricultural Cooperatives in Sakon Nakhon Province and the samples was 400 project's group member. Sampling was used proportional sampling and simple random sampling. Collect data was using questionnaire. The questionnaire on the competency of the client development staff was based on the concept of the Bank for Agriculture and Agricultural Cooperatives (2017)[23], of 10 item, the questionnaires on the participation's of project's group member were 15 items, adapted from the concept of Cohen and Uphoff [5], and a measure of the effectiveness of the project was

based on the concept of the Bank for Agriculture and Agricultural Cooperatives (2017)[23], with 15 items. The reliability test was as the data in table 1.

Table 1
Cronbach's alpha coefficient of variables

Variables	Cronbach Alpha Coefficient
Competency of the client development staff	0.915
Participation's of project's group member	0.924
Project effectiveness	0.914

The data was analyzed by frequency, percentage, mean, and standard deviation (S.D.). The Pearson's product moment correlation coefficient and path analysis were used for hypothesis testing.

ANALYSIS OF THE DATA AND RESULTS OF THE STUDY

This research was used program for statistical analysis in social science to analysis of the data. The research finding and the hypothesis testing in this study were as follows. Table 3 had demonstrated the mean of all three variables.

Table 2
Mean and standard deviation of research variables

Variables	Mean	S.D.
Competency of the client development staff	4.79	0.36
Participation's of project's group member	4.71	0.34
Project effectiveness	4.79	0.30

The detailed analysis of each variable reveal as follows.

1. Competency of the client development staff was described by mean and standard deviation. The staff competencies analysis was as follows; the staff had a service mind and always ready to assist with project members was at the highest mean at 4.90, the bank's staff can plan strategies to meet the project target, and the bank's staff can coordinate and improve the capacity of the project members to work better was sequential mean at 4.87. The lowest mean was the bank's staff can build good relationships between banks and project members, and the bank's staff can find enough resources to support the project at 4.70, 4.60 respectively.

2. Participation's of project's group member was categorized by 4 activities consist of; 1) participation of project members in the decision-making process 2) participation of project members in project implementation 3) participation of project members in gaining benefits 4) participation of members in project evaluation. The highest mean was participation of project members in gaining benefits at 4.80, participation of project members in the decision-making process mean was 4.73, participation of project members in project implementation mean was 4.68, and the lowest mean was participation of members in project evaluation at 4.67.

3. Project effectiveness the finding was as follow; the highest mean was the bank's project helps people in the community learn to share knowledge that is mutually beneficial at 4.90, the bank helps people in communities to use and conserve more resources at 4.87, project strengthens both in communities economic , social and environment aspects at 4.83, project participation helps member and member's family know about savings and more reasons to spend money at 4.83, project participation allows member and member's family to have extra careers at 4.83. The lowest mean was development staff acts as a mentor and a trainer for member as well at 4.60.

4. The statistical analysis for hypothesis testing: for the first hypothesis the t-test and F-test (one-way ANOVA) showed that there were statistically significant of 0.05 different of the project members' opinion toward staff competency, when classified by gender and age.

And the second hypothesis to study the influence of independent variables on dependent variable was used Pearson's Product Moment Correlation Coefficient to determine the relationship of the independent variables, and Path analysis to study the influence of staff competency on project effectiveness through project members' participation. The symbols used to analyze in this research was as follows.

COM Represent Competency of the client development staff
 PAR Represent Participation's of project's group member
 EFN Represent Project effectiveness

Table 3 showed that the relationship between the variables that are related not exceed 0.80, Hair et al. (2010)[20], described the relationship between the variables must be less than 0.80, which is more than 0.80 may cause of Multicollinearity. This research found the relationship between the independent variables the highest value was 0.754, it was not exceed 0.80. Multicollinearity problem was not found. Therefore it can be tested by using Multiple Regression to the next.

Table 3
Correlation analysis between variables

	COM	PAR	EFN
Mean	4.79	4.71	4.79
S.D.	0.36	0.34	0.30
COM	1		
PAR	.583**	1	
EFN	.480**	.467**	1

The research equations to predict influence of competency of the client development staff on project effectiveness through participation of project's group member were as follows.

$$PAR = \beta_1 COM \dots\dots\dots (1)$$

$$EFN = \beta_2 PAR \dots\dots\dots (2)$$

The result of equations was as follows.

$$PAR = .583COM \dots\dots\dots (1)$$

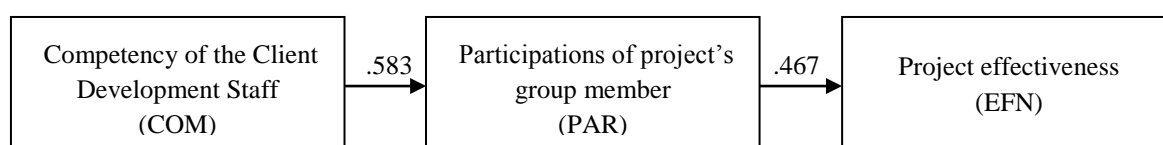
(3.800)

$$EFN = .467PAR \dots\dots\dots (2)$$

(2.793)

Equations can be showed in the form of Path Analysis as below.

Figure 2
Research Results



The statistical analysis for hypothesis testing found that, the competency of the client development staff can explain the variation of members' participation and members' participation can explain the variation of project effectiveness, 34.0% (Adjusted R² .340), and 27.9% (Adjusted R² .279) respectively. It was found that the competency of the client development staff had statistically significant at 0.05 levels positive

influence on members' participation by standardized coefficients (β) .583, and members' participation had statistically significant at 0.05 levels positive influence on project effectiveness by standardized coefficients (β) .467 also.

CONCLUSION AND DISCUSSION

This research was mainly aimed to investigate the impact of client development staff competency and group member participation on the effectiveness of community development projects. The research revealed that staffs' competency had positive impact on project effectiveness through project members' participation. Theoretical contribution, the results of this research was consistent with the concept of United States Environmental Protection Agency (2017)[25], it was confirmed that the project staff competency and skills, and behaviors of the project team was paramount to a successful public participation program. Also, according to the research results of Tacconi and Tisdell (1992)[7], Narayan (1995)[10], and Grabman et al. (2017)[24], it was confirmed that project members' participation in project decision-making, project implementation, project benefit, and project evaluation had impact on public project effectiveness.

REFERENCES

- [1] McClelland (May 20, 1917 – March 27, 1998) was an American social psychologist. He is known for his work in the field of motivation and especially his theory of people's "need for achievement." Rejecting IQs and personality tests as valuable measures of a person's potential success at a task or career,
- [2] White, R. W. (1959), "Motivation reconsidered: The concept of competence". *Psychologica Review*, 66(5), Pp.297-333.
- [3]] Lundberg (1970), A. Lindbergh excitatory control of the Ia inhibitory pathway. P. Andersen, J.K.S. Jansen (Eds.), *Excitatory Synaptic Mechanisms*, Universitetsforlag, Oslo (1970), Pp. 333-340. Matthews and Watson, 1981. P.B.C. Matthews, J.D.G. Watson Effect of vibrating agonist or antagonist muscle on the reflex
- [4] Gilbert (1978), 'Full publication history'; DOI: 10.1002/pfi.4180170915 View/save citati Cited by (CrossRef): 8 articles Check for updates. Citation tools. Set citation alert. Citing literature. Article has an altmetric score of 1
- [5] Cohen and Uphoff. (1980), "Participation's Place in Rural Development" *Seeking Clarity Through Specificity World Development* 8(3):213-235 • February 1980
- [6] Boyatzis (1982), "The competent manager: A model for effective performance", Richard E.Boyatzis, Wiley, New York, 1982. No. of pages: 308.
- [7] Tacconi and Tisdell (1992). L. Tacconi, C. Tisdell Rural development projects in LDCs: appraisal, participation and sustainability. *Public Admin. Dev.*, 12 (1992), Pp. 267-278. Tacconi and Tisdell
- [8] Spencer & Spencer (1993), which in turn are influenced by some personal antecedents Bartram, (2005) Identifying competencies with behavioral event interviews. *Psychological Sciences*, 9, 331–339.
- [9] Lane (1995), participation meant involvement of the community in the implementation of a project with the purpose of increasing the acceptance and efficiency of use
- [10] Narayan (1995), Ramesh; Yi, Insu. Publication: *Astrophysical Journal* v.452, Pp.710. Publication Date: 10/1995. Origin: APJ; KNUDSEN. Astronomy Keywords: ACCRETION, ACCRETION DISKS, BLACK HOLE PHYSICS, RADIATION.
- [11] Fogg (1999), "Finding meaning through caregiving" development of an instrument for family care givers of persons with Alzheimer's disease. *J Cline Psychol. Sep*, 55(9), Pp.1107-1125.
- [12] Hoffmann (1999), "The meanings of competency", *Journal of European Industrial Training* , Vol. 23 Issue: 6, Pp.275-286,
- [13] Ward (1999), "Chapman / *International Journal of Project Management*" 21 (2003) 97–105. 99
- [14] Kelly (2001), "Community participation in rangeland management" a report for the Rural Industries Research and Development Corporation.' (RIRDC: Barton ACT).

- [15] Lyons & Smuts et al (2001), "the participatory development process" (McArthur, 1995 in Lyons et al., 2001, Pp.1233).
- [16] Van der Klink & Boon (2002), "The investigation of competencies within professional domains. Article in Human Resource Development International" 5(4): Pp.411-424.
- [17] Ndekha, Hansen et al. (2003) *Acta Trop.* 2003 Mar;85(3):325-38. Community participation as an interactive learning process: experiences from a schistosomiasis control project in Zimbabwe.
- [18] Bartram (2005), "The Great Eight competencies": a criterion-centric approach to validation. *The Journal of applied psychology*, 90(6), Pp.1185-1203.
- [19] Bacarrini (2008), "International Journal of Public Sector Management" 21 (7), 75776, 2008. 62, 2008. Understanding project cost contingency: A survey. D Bacarrini. QUT ReseaWeek 2005:
- [20] Hair et al (2010) Principle component exploratory factor analysis. Principle component exploratory factor analysis is a method through which one is able to measure latent variables by measuring indicators of these variables (Everitt, 2010:235. Field, 2005:619; Hair et al., 2010:99). Factor analysis is a technique used to comprehend.
- [21] Goff (2013), "www.pmworldlibrary.net. Page 6 of 11. Chart 3": GAPPS Mapping of Assessment Methods for Global Project Management. Certifications, Credentials and Qualifications (our graphic is based on an extract from. GAPPS data). Rigor of Assessment is a very subjective criterion, with many "moving parts."
- [22] National Statistical Office (2015), The 2015 Household Socio-Economic Survey. Date 14-12- 16. The Labor Force Survey Whole Kingdom 2016.
- [23] Bank for Agriculture and Agricultural Cooperatives. (2017), "Projects Prototype under Sufficiency Economy Philosophy of Bank for Agriculture and Agricultural Cooperatives"
- [24] Grabman et al. (2017), Grabman L, et al. *BMC Pregnancy Childbirth*. 2017. Show full citation
- [25] United States Environmental Protection Agency (2017) United States Environmental Protection Agency (EPA). <http://www.epa.gov/> Recognized as a Verification Mechanism for PEFC Chain of Custody Certification - 02 Jun 2017; Trump's proposed budget includes cuts to EPA, DOE and USDA - 31 Mai 2017; Awards, Rewards in bio and sustainability - 16 Mai 2017; Dow, BASF,

Service Quality and Customer Loyalty of Thai Massage Spa Business

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ABSTRACT

This research objectives were 1) To study the quality of services of Orchid Siam Spa Group Co., Ltd. 2) To study customer loyalty of Orchid Siam Spa Group Co., Ltd. 3) To study the difference of opinions of customers on service quality and customer loyalty classified by personal factors and 4) To study the influence of service quality on customer loyalty.

A quantitative method was used as a major approach of this research. The sample size was 400 samples, and used proportional sampling and simple random sampling. A questionnaire was use to collect data, and divided into 3 parts. Service quality Questionnaire (SERVQUAL), based on the concept of Parasuraman et al., (1998) composed of reliability, assurance, tangibility, empathy, responsiveness, and customer loyalty questionnaire adapted from Pratminingsih, Lipuringtyas, and Rimenta (2013) consists of attitude and behavior. The quality control of this research was adopted by reviewing the literature for content validity, and the reliability test was used Cronbach's Alpha method. The results showed that service quality and customer loyalty were .982 and .969 respectively. The hypothesis testing was use t-Test, and F-Test (One Way ANOVA) to compare the different of service quality and customer loyalty between customer's personal factors, and to study the influence of service quality on customer loyalty was use Pearson's product moment correlation coefficient, and multiple regression analysis.

The results of the hypothesis testing revealed that: 1) Service quality and customer loyalty differed by gender, age, education level, and income level, with significant difference at the 0.05 level. 2) Service quality had a positive influence on customer loyalty at 0.05 levels. Service quality can explain 70% customer loyalty variance with a standardized coefficient of .831.

Keywords– Service quality, Customer loyalty

INTRODUCTION

Background

Thai massage is one of the oldest traditional Thai healing methods. Thai massage is based on the experience from one generation to next generation. There is a principle in practice and a unique way, Thai massage is both a science and art, developed sequentially while exchanging and learning from other major cultures such as Indian culture. At present, Thai massage spa business in Thailand is a business that has been very fast expanding and developing continuously. Thai people are more interesting about their health. Moreover, it is supported by the government to regulate the quality of service in the spa business to supports the tourism industry which is gaining popularity from both Thai and foreign tourists, as a result, the competition in the spa business is higher than the past as well.

Ababneh (2017) Service quality in the hospitality industry becomes one of the most important factors for gaining a sustainable competitive advantage and customers' confidence in the highly competitive marketplace, and therefore service quality can give the hospitality industry a great chance to create

competitive differentiation for organizations. It is thus considered as a significant core concept and a critical success factor in the hospitality industry. A successful business delivers excellent quality service to customers, and service quality is considered the life of business. Many benefits can be achieved by service quality such as establishing customer satisfaction, contributing to business image, establishing customer loyalty, and providing a competitive advantage to a business. Service quality performance can mean different to different people, for example, employees may show higher perceptions of service quality than customers perceived, and thus managers and their employees never like to identify deficiencies in service quality [1].

For this reason as mentioned, the researcher was interested in studying quality of service and customer loyalty of spa business a case study of Orchid Siam Spa Group Co., Ltd. Researchers could use the research results to develop business strategies to maximize customer satisfaction, and could plan and applied to improve the Thai spa business. This was important and affects the efficiency and effectiveness in the operation of the service quality and customer loyalty of the company to sustainable growth and better performance in the future.

Research Objectives

This paper was investigating 4 objectives as follow:

1. To study the quality of services of Orchid Siam Spa Group Co., Ltd.
2. To study customer loyalty of Orchid Siam Spa Group Co., Ltd.
3. To study the difference of opinions of customers on service quality and customer loyalty classified by personal factors and
4. To study the influence of service quality on customer loyalty.

LITERATURE REVIEW

Service Quality

There were many marketing literatures that explain the meaning, importance and measurement service quality as follows. Balakrishnan and Barry (1994) in its contemporary conceptualization, service quality is a comparison of perceived expectations (E) of a service with perceived performance (P), giving rise to the equation $SQ = P - E$. These conceptualizations of service quality have its origins in the expectancy-disconfirmation paradigm [2]. Kenzelmann (2008) from the viewpoint of business administration, service quality is an achievement in customer service. It reflects at each service encounter. Customers form service expectations from past experiences, word of mouth and marketing communications. In general, customers compare perceived service with expected service, and which if the former falls short of the latter the customers are disappointed [3]. Hoffman and Bateson (2011) the quality of service as a criterion for the degree of match the actual performance of the service with the expectations of customers or the difference between customer expectations and perceptions of the actual performance of the service [4]. According to Haq and Muhammad (2012) one of the main elements of customer service quality is customer satisfaction and their aim to buy. It is also one of the considerable strategic weapons for an organization with developing need to facilitate the service quality. Service quality is also considered as an intermediary aspect in evaluating previous and current perception. In retail industries service quality is one of the most important factor to achieve the organization goals, which out which organization may not be able to succeed in today global economy as well as competitive [5]. Dimension of service quality; Parasuraman, Berry, and Zeithaml (1993) demonstrate that the claimed psychometric superiority of the alternative non-difference score conceptualization is debatable. We also argue that the SERVQUAL conceptualization offers richer diagnostics. Many researchers have struggled with the issue of how to measure service quality. Perhaps the most widely used measure is based on a set of five dimensions which have been consistently ranked by customers to be most important for service quality, regardless of service industry. These dimensions defined by the SERVQUAL measurement instrument are as follows: Tangibles: appearance of physical facilities, equipment, personnel, and communication materials; Reliability: ability to perform the promised service dependably and accurately; Responsiveness: willingness to help customers and provide prompt service; Assurance: knowledge and courtesy of employees and their ability to convey trust and confidence; and

Empathy: the caring, individualized attention the firm provides its customers [6]. The measurement of the service quality of this research had been applied to the measurement tools from framework of Parasuraman, Berry, and Zeithaml (1993).

Customer Loyalty

Customer loyalty marketing is a major segment of marketing theory and considered one of the value propositions that a marketer can offer a potential customer. The customer loyalty theory, based on the consideration of some variable demographics, was developed over years of research studying the habits of consumers. The theory attempts to define what drives loyalty in customers and can represent an effective tool for gaining and retaining your hard-won patrons. Business owners who witness repeat customers know on an intuitive level that customer loyalty is an invaluable commodity. Incorporating the precepts of the customer loyalty theory into daily dealings can influence the creation of more business. Based on the theory mentioned by Kotler and Armstrong (2004), it indicates that consumers will define their choice based on their perception on the value embedded in a product or service that satisfies their need. The satisfied customers generally will be advantageous for organization. Thus, it is concluded that theoretically there is a relationship among customer value, customer satisfaction, and customer loyalty [7]. Mascarenhas, Kesavan, and Bernacchi (2006), customer loyalty can be defined as the closest step to the repurchasing behavior of customers. Customer loyalty has usually been referred to as a consequence of all the experiences that a customer has with a service/product provider [8]. PR Loyalty Solution (2011) Customer loyalty is both an attitudinal and behavioral tendency to favor one brand over all others, whether due to satisfaction with the product or service, its convenience or performance, or simply familiarity and comfort with the brand. Customer loyalty encourages consumers to shop more consistently, spend a greater share of wallet, and feel positive about a shopping experience, helping attract consumers to familiar brands in the face of a competitive environment [9]. Pratminingsih, Lipuringtyas, and Rimenta (2013), had been investigate “Factors Influencing Customer Loyalty toward Online Shopping”, research had noted that although action loyalty is ideal, it is difficult to observe and difficult to measure. As a compromise, most researchers tend to employ behavioral-intention measure. Loyalty can be examined through behavioral and attitudinal loyalty. Behavioral loyalty is customer willingness to continue a relationship and repurchase the product. Attitudinal loyalty is the level of the customer’s attitudinal advocacy and psychological attachments to the service provider [10]. Another way to measure loyalty is using composite approach. This approach argued that customer loyalty is regarded as an integration of behavioral measures (in the sense of exclusive purchase, hardcore loyalty, repeat purchase probability, share of category requirements, etc.) and attitude (with reference to brand preference, liking, commitment, intention to buy. The concept of Pratminingsih, Lipuringtyas, and Rimenta (2013) was used as a major guide line in this research, the measurement of customer loyalty composed of behavior and attitude.

The Link between Service Quality and Customer loyalty

In the field of marketing research, there were found many study concern with the relation between customer service and customer loyalty. Kranias and Bourlessa (2013) had been study investigating the relationship between service quality and loyalty in Greek Banking Sector; the present study assessed and compared the level of perceived service quality offered by various Greek banks. Significant differences were found between the Greek banks regarding the perceived quality of their banking services. Moreover, this study examined the highly-debated link between service quality and service loyalty. The findings of the present study indicate that the convenience-proximity of the bank impacts significantly on the loyalty of bank customers [11]. Nuchsara Pringviriya (2015) service quality has a strong positive relationship with customer satisfaction, customer trust, and customer loyalty. Secondly, customer satisfaction has a positive relationship with customer loyalty. Thirdly, customer trust has a positive relationship with customer loyalty. Finally, customer satisfaction and customer trust partially mediate the relationship between service quality and customer loyalty. Plausible reasons for the results are discussed within the context of the study. Both practical and theoretical contributions, as well as recommendations for future research made [12]. Dubey and Srivastava (2016) had been study impact of service quality on customer loyalty a study on telecom sector in India; the research found that the service quality has significant and positive impact on customer relationship

management and customer loyalty. Out of the four antecedents of service quality, tangibility and assurance has significant and positive impact on customer relationship management, while tangibility has a significant impact on customer loyalty. The study suggests that the service providers should put their endeavor to upgrade the technology and serve the customers with modern equipments. Besides, the staff should try to please the customers by their neat appearance [13]. The research results above were confirmed the empirical evidence about the link of service quality and customer loyalty.

CONCEPTUAL MODEL AND HYPOTHESES

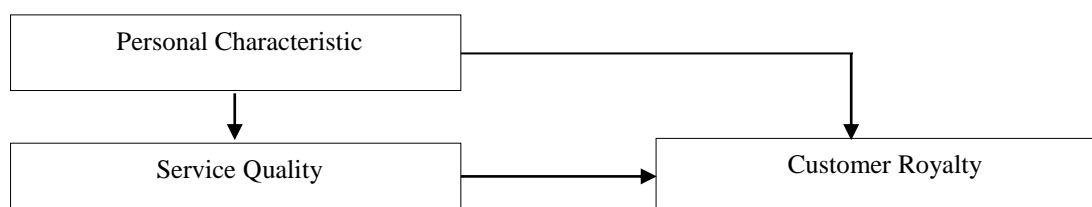
The research was mainly aimed to examine the influence of service quality and customer loyalty. The research hypothesis and conceptual framework were as follow:

H₁: Customer opinion toward service quality and customer loyalty was different when classified by personal factors.

H₂: Service quality had positive influence on customer loyalty.

H₃: Service quality when classified by aspects (Reliability, Assurance, Tangibles, Empathy, and Responsiveness) had different influence on customer loyalty.

Figure 1
Research conceptual framework



RESEARCH METHODOLOGY

A quantitative method was used as a major approach of this research. Unknown population, to formulate the sampling size was used of the Cochran (1953) [14], thus the sample size was 400 samples, and used proportional sampling and simple random sampling. A questionnaire was use to collect data, and divided into 3 parts. Service quality Questionnaire (SERVQUAL), based on the concept of Parasuraman et al., (1998) composed with reliability, assurance, tangibility, empathy, responsiveness, and customer loyalty questionnaire adapted from Pratminingsih, Lipuringtyas, and Rimenta (2013) consists of attitude and behavior. The quality control of this research was adopted by reviewing the literature for content validity, and the reliability test was used Cronbach's Alpha method. The results showed that service quality and customer loyalty were .982 and .969 respectively. The hypothesis testing was use t-Test, and F-Test (One Way ANOVA) to compare the different of service quality and customer loyalty between customer's personal factors, and to study the influence of service quality on customer loyalty was use Pearson's product moment correlation coefficient, and multiple regression analysis.

ANALYSIS OF DATA

This research was used program for statistical analysis in social science to analysis of the data. The research finding and the hypothesis testing in this study were as follows. Table 1

Table 1
Mean, standard deviation, and Cronbach's alpha of research variables

Variables	Indicator	Mean	S.D.	Cronbach's Alpha
Service Quality	reliability	4.735	.298	.982
	assurance	4.701	.305	
	tangibility	4.782	.288	
	empathy	4.794	.277	
	responsiveness	4.714	.303	
	total service quality	4.743	.243	
Customer Loyalty	attitude	4.800	.306	.969
	behavior	4.852	.261	
	total customer loyalty	4.830	.242	

The detailed analysis of each variable reveal as follows.

1. Overall, the quality of service was at a high level, when classified by aspects found that empathy had the highest mean at 4.794, and assurance had the lowest mean at 4.701. Overall, customer loyalty had high mean, when compare by aspects found that customer behavior had higher mean than customer attitude.

2. The hypothesis testing of this research.

The first hypothesis was customer opinion toward service quality and customer loyalty was different when classified by personal factors. The research testing by t-test, and F-test (One Way ANOVA) was as follow:

Table 2
The different of service quality and customer loyalty when classified by personal factors

Age Range	Service Quality			
	\bar{x}	S.D.	F	Sig.
Below 25 year	4.525	.378	17.752	.000**
25-35 year	4.755	.218		
36-45 year	4.790	.207		
Above 45 year	4.743	.185		
Age Range	Customer Loyalty			
	\bar{x}	S.D.	F	Sig.
Below 25 year	4.633	.386	13.944	.000**
25-35 year	4.861	.195		
36-45 year	4.851	.220		
Above 45 year	4.859	.188		

Table 2 (continue)

Education	Service Quality			
	\bar{x}	S.D.	F	Sig.
Secondary Education	4.550	.338	20.723	.000**
Diploma/Diploma of Vocational Education	4.654	.228		
Bachelor Degree	4.802	.211		
Above Bachelor Degree	4.770	.193		
Education	Customer Loyalty			
	\bar{x}	S.D.	F	Sig.
Secondary Education	4.688	.375	9.901	.000**
Diploma/Diploma of Vocational Education	4.794	.271		
Bachelor Degree	4.842	.213		
Above Bachelor Degree	4.909	.135		
Income	Service Quality			
	\bar{x}	S.D.	F	Sig.
Below 20,000 Baht	4.570	.356	13.484	.000**
20,000-40,000 Baht	4.789	.220		
40,001-60,000 Baht	4.740	.189		
Above 60,000 Baht	4.768	.205		
Income	Customer Loyalty			
	\bar{x}	S.D.	F	Sig.
Below 20,000 Baht	4.690	.379	9.601	.000**
20,000-40,000 Baht	4.851	.214		
40,001-60,000 Baht	4.824	.220		
Above 60,000 Baht	4.899	.143		
Occupation	Service Quality			
	\bar{x}	S.D.	F	Sig.
Student	4.479	.398	21.516	.000**
Business Employee	4.765	.200		
Business Owner	4.685	.193		
Public Officer	4.877	.169		
Occupation	Customer Loyalty			
	\bar{x}	S.D.	F	Sig.
Student	4.578	.405	13.175	.000**
Business Employee	4.879	.183		
Business Owner	4.799	.255		
Public Officer	4.876	.159		

Table 2 (continue)

Branch	Service Quality			
	\bar{x}	S.D.	F	Sig.
Donmuang	4.580	.360	24.798	.000**
Bangseu	4.793	.224		
Ladprao	4.924	.038		
Nonthaburi	4.768	.117		
Sanampao	4.937	.100		
Rungsit	4.570	.145		
Tonglor	4.675	.171		
Samut Prakan	4.875	.151		
Silom	4.873	.081		
Branch	Customer Loyalty			
	\bar{x}	S.D.	F	Sig.
Donmuang	4.679	.381	14.594	.000**
Bangseu	4.936	.168		
Ladprao	4.885	.148		
Nonthaburi	4.992	.045		
Sanampao	4.947	.104		
Rungsit	4.735	.239		
Tonglor	4.769	.279		
Samut Prakan	4.892	.134		
Silom	4.925	.110		

The hypothesis test could be described as follows, the customer under 25 years group had an opinions on service quality and customer loyalty at lowest mean, while other groups had similar mean. In the aspect of education, the result showed the secondary education had lowest mean in service quality and customer loyalty, whereas the group of bachelor or above education degree had highest mean. In the aspect of income, the group of income below 20,000 baht/month had the lowest mean, while other had the mean at high level similar. In the aspect of occupation, the student group had the lowest mean, while public officer group had the highest mean. When classified by branch the research found that Sanampao branch had the highest mean, whereas Rungsit branch had lowest mean in quality service, and Donmuang branch had lowest mean in customer loyalty.

To test hypothesis 2 and hypothesis 3, the researchers defined the symbol of variables as follows.

SQ: Represent Service quality in the aspect of reliability, SQ2: Represent Service quality in the aspect of assurance, SQ3: Represent Service quality in the aspect of tangibility, SQ4: Represent Service quality in the aspect of empathy, SQ5: Represent Service quality in the aspect of responsiveness, TSQ: Represent Total service quality, CLO: Represent Customer loyalty.

This hypothesis testing of the research was to study the influence of independent variables on dependent variable was used Pearson's product moment correlation coefficient to determine the relationship of the independent variables, and Multiple regression analysis to study the influence of service quality on customer loyalty. The hypothesis testing result was as follow.

Table 3 showed that relationship the variables that are related not exceed 0.80, hair et al. (2010) described the relationship between the independent variables must be less than 0.80, which is more than 0.80 may cause of Multicollinearity. This research found the relationship between the independent the highest value was 0.671, it was not exceed 0.80. Multicollinearity problem was not found. Therefore, it can be tested by using multiple regressions to the next.

Table 3
Correlation analysis between variables

	SQ1	SQ2	SQ3	SQ4	SQ5	TSQ	CLO
SQ1	1						
SQ2	.594**	1					
SQ3	.533**	.565**	1				
SQ4	.597**	.579**	.671**	1			
SQ5	.634**	.636**	.581**	.633**	1		
TSQ	.819**	.845**	.789**	.834**	.833**	1	
CLO	.513**	.494**	.609**	.593**	.514**	.652**	1

H₂: Service quality had positive influence on customer loyalty.

The research equations to predict influence of service quality on customer loyalty was as follows.

$$CLO = \beta_1 TSQ \dots\dots\dots (1)$$

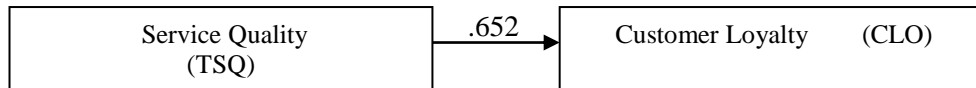
The result of equations was as follows.

$$CLO = .652 TSQ \dots\dots\dots (1)$$

(17.917)

Equations can be showed in the form of model as below.

Figure 2
The path analysis



H₃: Service quality when classified by aspects (Reliability, Assurance, Tangibles, Empathy, and Responsiveness) had different influence on customer loyalty.

The research equations to predict influence of service quality when classified by aspects on customer loyalty was as follows.

$$CLO = \beta_2 SQ1 + \beta_3 SQ2 + \beta_4 SQ3 + \beta_5 SQ4 + \beta_6 SQ5 \dots\dots\dots (2)$$

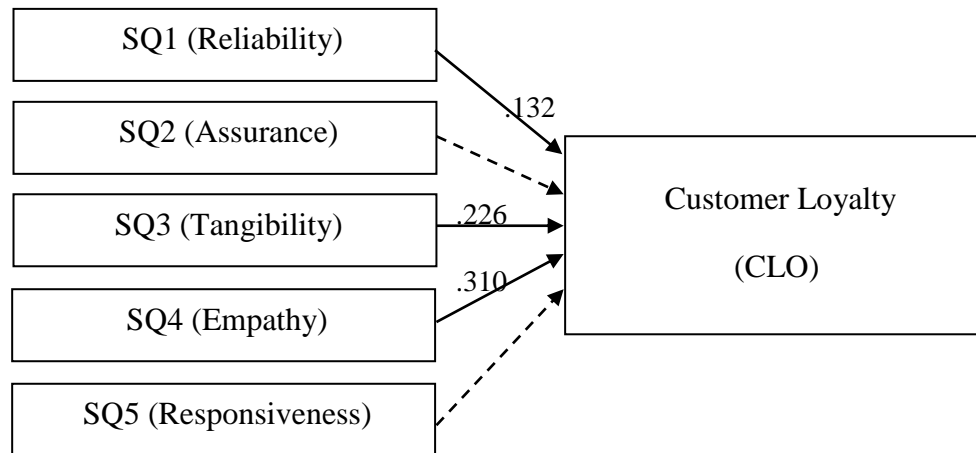
The result of equations was as follows.

$$CLO = .132 SQ1 + .310 SQ3 + .226 SQ4 \dots\dots\dots (2)$$

(2.609) (6.067) (4.147)

Equations can be showed in the form of model as below.

Figure 3
Influence of service quality on customer loyalty when classified by aspects



The second and third hypothesis test results, from the first equation simple regression analysis was used, it was found that the total service quality could explain the variance (R^2) of the customer loyalty (dependent variable) by 42.60 percent. The independent variables had the standard coefficient (β) of 0.652. When classified the service quality by aspects the research result was found that the service quality consisted of reliability, tangible, and empathy had influence on customer loyalty at statistically significant level of 0.05. All the independent variables could explain the dependent variable variance (R^2) by 67.60 percent. The standard coefficients (β) were .132, .310, and .226, respectively. However, the results showed that some independent variables of service quality did not influence customer loyalty. This is due to the phenomenon of the suppressor variable of the independent variable.

CONCLUSION

The purpose of this study was to analyze the influence of quality of service on customer loyalty. The research concluded that according to the hypothesis. Theoretical contribution, this research was consisted with the research result of Kranias and Bourlessa (2013), Nuchsa Pringviriya (2015), and Dubey and Srivastava (2016), it was confirmed the generalization influence of customer service on customer loyalty in the context of hospitality industry. However, for the future research it could be investigate the antecedent variables of customer loyalty such as product quality, or marketing mix etc. Furthermore, the researchers can investigate the consequence of customer loyalty such as growth of business.

REFERENCES

- [1] Ababneh, M.M. (2017), "Service Quality in the Hospital, Department of Hotel and Tourism and Archaeology", *Journal of Tourism & Hospital*, Vol. 6, No. 133, Pp. 1-6.
- [2] Balakrishnan, P.V. & Barry, B. (1994), "The relationship between customer loyalty and customer Satisfaction", *International Journal of Contemporary Hospitality Management*, Vol. 13, No. 5, Pp. 213-217.
- [3] Kenzelmann, P. (2008), "Dimensions of service quality", Vienna: *linde Verlag*.
- [4] Hoffman, K.D. & Bateson, E.G. (2011), "Essentials of services marketing: concepts, strategies & cases. (2nd ed.), Chapter 12-13, South-Western: *Thomson Learning*.
- [5] Haq, W.U. & Muhammad, B. (2012), "Customer Satisfaction at Public Sector A Case Study of Pakistan Housing Authority", *Pakistan Journal of Social Sciences*, Vol. 35, No. 2, Pp. 1037-1050.
- [6] Parasuraman, A., Zeithaml, V.A. & Berry, L.L. (1994), "Reassessment of expectations as a comparison standard in measuring service quality: implications for further research", *Journal of Marketing*, Vol. 58, No. 1, Pp. 104-110.

- [7] Kotler, P. & Armstrong, G. (2004), "Principles of Marketing, 10th Edition", New Jersey: *Pearson Prentice Hall*.
- [8] Mascarenhas, O.A., Kesavan, R. & Bernacchi, M. (2006), "Lasting customer loyalty: a total customer experience approach", *International Journal of Retail and Distribution Management*, Vol. 44, No. 8, Pp. 799-813.
- [9] PR Loyalty Solution (2011), "What is Customer Loyalty?", URL: <http://prloyaltymarketing.com/customer-loyalty/what-is-customer-loyalty/>.
- [10] Pratminingsih, S.A., Lipuringtyas, C. & Rimenta, T. (2013), "Factor Influencing Customer Loyalty Toward Online Shopping", *International Journal of Trade, Economic and Finance*, Vol. 4, No.3, Pp. 104-110.
- [11] Kranias, A. & Bourlessa, M. (2013), "Investigating the relationship between service quality and loyalty in Greek banking sector", *Procedia Economics and Finance*, Vol. 5, Pp. 453 – 458.
- [12] Nuchsara Pringviriya, (2015). "Service quality and customer satisfaction in Thailand's audit firms: Moving Forward to a Prosperous and Sustainable Community", *Burapha University International Conference 2015*.
- [13] Dubey, A. & Srivastava, A.K. (2016), "Impact of Service Quality on Customer Loyalty- A Study on Telecom Sector in India", *IOSR Journal of Business and Management (IOSR-JBM)*, Vol. 18, No. 2, Pp. 44-50.
- [14] Cronbach, L. J. (1953), "Essentials of psychological testing", 5th Edition, New York: *Harper Collins*.

Marketing Mix Factors Affecting Customer Satisfaction and Purchase Goods from Vending Machine in Northeastern Region of Thailand

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ABSTRACT

The vending machine was new technology and way for retailer business that help decrease operating cost and cut-off poor service cycle from employees, consequently maintain customer satisfaction and purchase goods. From the above reasons, this is the beginning of research. This paper examines the marketing mix affecting customer satisfaction and purchasing goods from the vending machine.

In the study, target population include people that live in Northeastern region of Thailand amount of 21,916,034 peoples. Calculated according to the formula of Taro Yamane, 400 samples were selected by multistage sampling. Data collected were used from questionnaires with as follows items: 22 questions of marketing mix that effect purchase goods from vending machine separate to 4 questions of product factor, 4 questions of price factor, 3 questions of place factor, 4 questions of promotion factor, 4 questions of process factor, 3 questions of physical evidence factor and 6 questions of customer satisfaction and purchase goods from vending machine. All questions of this research were estimated reliability coefficient more than 0.6

The study was used Mean, Standard deviation as descriptive statistical and used Correlation Analysis and Multiple Regression Analysis as inferential statistic analyzed at the statistically significant level .05

The first hypothesis testing can explain that the marketing mix was affected the customer satisfaction to purchase goods from vending machine 41.5 % (Adjust R-square .415) and the second hypothesis testing found that product factor of marketing mix was positive influence for the customer purchase goods from vending machine standard coefficients(β) .480 at statistically significant level .05 .Therefore, can be concluded that the marketing mix had statistically positive influence on the customer satisfaction and purchase goods from vending machine in northeastern region of Thailand.

Keywords– marketing mix ,customer satisfaction, vending machine

INTRODUCTION

Background

Currently situation in Thailand are many things to change. Especially the economic and social conditions, the result is a change of personal life style to a hurry. Businesses need to adjust to these changes. Retailers in Thailand are trying their best to improve their stores and services. High operating costs are an important issue and can affect business growth. For example, the cost of updating a store, cost of creating a new service, expense for employees. What concerns entrepreneurs are the rising prices of materials, transportation and labor costs. If the entrepreneur does not plan carefully, it can cause a business crisis. Introducing new technologies as an opportunity to stabilize and improve the efficiency of the retail business to provide high quality products and services to customers. “Vending Machine” is a new technology and approach for retail businesses that reduces operating costs and reduces bad service issues from employees. It maintains customer satisfaction and purchases. For the above reasons, this is the beginning of this research.

Research Objectives

This paper examines

1. Marketing mix affecting customer purchase goods from the vending machine.
2. Marketing mix factors affecting customer satisfaction and purchasing goods from the vending machine.

LITERATURE REVIEW

Marketing mix

The review of the relevant literature scholars had to provide a meaning of marketing mix as follows: Kotler, Philip "Marketing Mix is the set of controllable variables that the firm can use to influence the buyer's response". The controllable variables in this context refer to the 4 'P's (product, price, place and promotion). Each firm strives to build up such a composition of 4 'P's, which can create highest level of consumer satisfaction and at the same time meet its organizational objectives. Product refers to the goods and services offered by the organization. Price is the amount charged for a product or service. Place refers to area for the customer can conveniently make purchases goods and involves a chain of distribution. Promotion refers to a process of informing, persuading and influencing a consumer to make choice of the product to be bought [1]. Magrath proposed services marketing versus regular marketing is that apart from the traditional "4 P's," Product, Price, Place, Promotion, there are three additional "P's" consisting of People, Physical evidence, and Process. People mean people inside and outside of the business who are responsible for every element of sales and marketing strategy and activities. Physical Evidence is the element of the service mix which allows the consumer again to make judgments on the organization. Process is a functional activity that assures service availability and quality [2].

Customer satisfaction

The definitions of customer satisfaction from literature review are as follow, Oliver proposed as Satisfaction is the consumer's fulfillment response. It is a judgment that a product or service feature, or the product or service itself, provided (or is providing) a pleasurable level of consumption-related fulfillment, including levels of under- or over-fulfillment [3]. On the other hand, Tse and Wilton argue that customer satisfaction stems from the client's reaction as result of evaluating the perceived expectations and the actual performance of a product or service [4]. Kotler, Philip considers that consumer satisfaction "reflects comparative judgments of a person connected to the difference between the perceived performance of a purchased product or of a provided service and the expectations that he made concerning this performance. If the performance fails to meet expectations, the client will be unsatisfied or disappointed. If the performance meets expectations, the client will be satisfied. If the performance exceeds expectations, the client will be extremely satisfied or delighted [5]. In conclusion, customer satisfaction is thus a particularly special indicator for evaluating the persons who formulate the demand. To be aware about the satisfaction or the dissatisfaction degree of consumers means to evaluate the success or the failure of some action, but also forecasting on their future behavior. At the same time, it allows comparisons between different market segments.

Consumer behavior

Walters consumer behavior defined as the process whereby individuals decide whether, what, when, where, how, and from whom to purchase goods and services [6]. Schiffman and Kanuk define consumer behavior as: "The behavior that consumers display in searching for, purchasing, using, evaluating, and disposing of products, services, and ideas, elaborate on the definition by explaining that consumer behavior is, therefore, the study of how individuals make decisions to spend their available resources (time, money, effort) on consumption-related items. It includes the study of what, why, when, where and how often they purchase and how they use the purchased product. In addition, it encompasses all the behaviors that consumers display in searching for, purchasing, using, evaluating and disposing of products and services that they expect will satisfy their needs [7]. Lavidge and Steiner proposed model for marketing communication are six steps before making a purchase: 1) Awareness 2) Knowledge 3) Liking 4) Preference 5) Conviction 6) Purchase [8].

Vending machine

The word vending can be derived from the English word “vend” that mean trade, offer goods for sale. This is a business concept of vending machine. As the idea of vending is to have an automated service process, it is often referred to as ‘automatic retail trade [9], “automatic merchandizing”[10] and “automatic sale”[11]. Some authors discuss vending in terms of product innovations across marketing distribution channels[12],[13],whereas others discuss it from the point of view of innovations in terms of the value chain. In this respect, the evolution of the vending concept is related to the IT and communication technologies which are revolutionizing the industry, and it is seen as part of SST technologies (self-service technologies). With SST technologies, the user alone is doing the purchase, and there is no ‘face-to-face’ communication between client and vendor [14]. These services are based on some integrated technology innovations, which exclude any intervention or interaction between user and vending operator. That’s why, vending channels can be generally defined as a means of providing goods or services through a vending machine on a self-service basis. To further clarify the role and place of vending machines in today’s business environment, it is necessary to discuss the vending market from the point of view of non-store retailing of goods and services used by companies and operators in the retail sector.

CONCEPTUAL MODEL AND HYPOTHESES

The research was mainly aimed to investigate *marketing mix 6 P’s affecting customer satisfaction and purchase goods from vending machine. A conceptual model of this research study was presented in figure 1. It described the influence between the marketing mix as independent variable and customer satisfaction dependent variable that purchase goods from vending machine in northeastern region of Thailand. The conceptual model has been made on basis of relevant literatures.

Figure 1
A conceptual model of this research



The research hypothesis

H₁: The marketing mix 6 P’s affecting customer satisfaction and purchase goods from vending machine in north east region of Thailand.

H₂: At least one of marketing mix factor in 6 P’s affecting customer satisfaction and purchase goods from vending machine in Northeastern region of Thailand.

RESEARCH METHODOLOGY

This research study target population include, people that live in North east of Thailand amount of 21,916,034 peoples. Calculated according to the formula of Taro Yamane[15], 400 samples were selected by multistage sampling. Data collected were used form questionnaires with as follows items: 22 questions of marketing mix that affect purchase goods from vending machine adapted from Kotler, Phillip[1]and 6 questions of customer satisfaction and purchase goods from vending machine reliability tested is showed on table 1

Table 1
Cronbach's alpha coefficient of variables for reliability test

Variables	Cronbach's alpha
Marketing mix	0.786
Product	0.708
Price	0.765
Place	0.715
Promotion	0.751
Process	0.672
Physical evident	0.720
Customer satisfaction	0.732

ANALYSIS OF DATA AND RESULTS OF THE STUDY

Pearson's Correlation was used to determine the relationship of the independent variables according to research conceptual model. The objective was to find multicollinearity among the independent variables to avoid unreliable and unstable estimates of regression coefficients. Thus, correlation analysis between the independent variables was showed in Table 2

Table 2
Correlation analysis between the independent variables

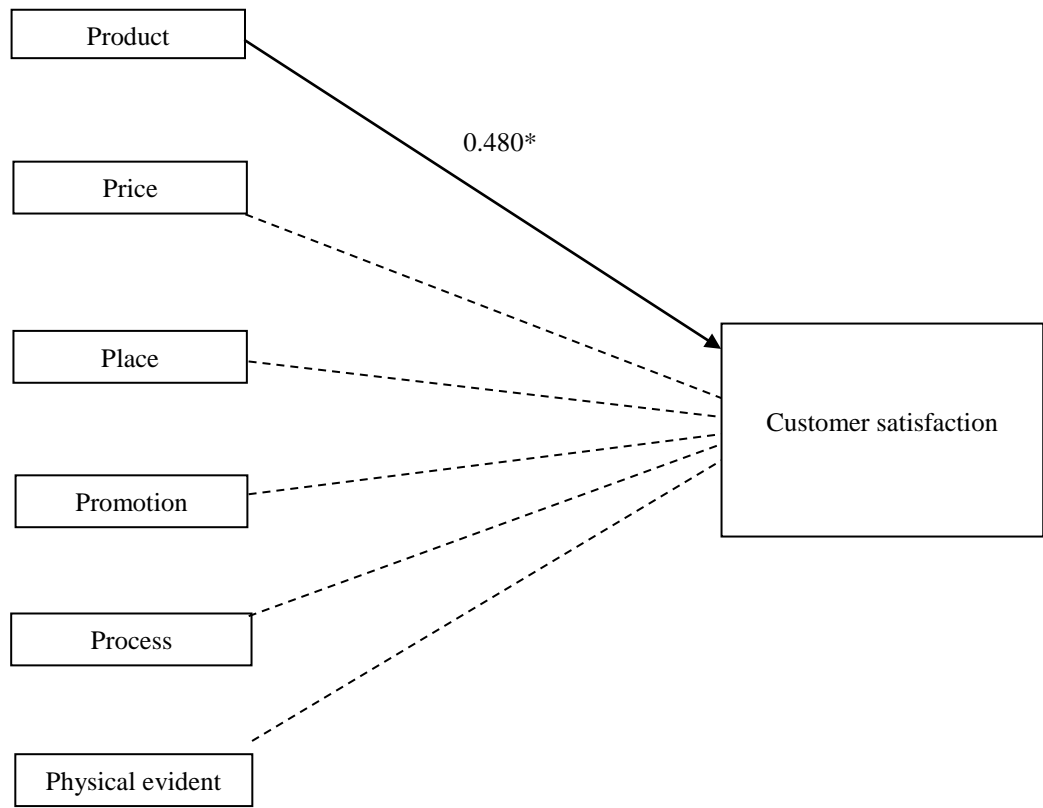
	Product	Price	Place	Promotion	Process	Physical evident	Customer satisfaction
Mean	4.558	3.842	2.989	3.092	4.425	4.278	4.294
S.D.	.3867	.6211	.5968	.5666	.3837	.3723	.3438
Product	1	.255	.028	.004	.568**	.123	.385*
Price	.255	1	.491**	.386*	.383*	.234	.071
Place	.028	.491**	1	.284	.059	-.106	.222
Promotion	.004	.386*	.284	1	-.126	.107	.344
Process	.568**	.383*	.059	-.126	1	.211	.086
Physical evident	.123	.234	-.106	.107	.211	1	.237
Customer satisfaction	.385*	.071	.222	.344	.086	.237	1
Adjusted R² = .415 SEE = .295							

* Correlation is significant at the 0.05 level

** Correlation is significant at the 0.01 level

From Table2was showed the relationship between the independent variables as the correlation coefficients(r) are less than 0.80 As Hair *et al.*[16]. Then, the Multicollinearity problem was not found in this research and next step can be tested by Multiple Regression Analysis, showed on figure 2

Figure 2
Research Results



*Standardized Coefficients is significant at the 0.05 level

The first hypothesis testing can explain that the marketing mix were affecting customer satisfaction to purchase goods from vending machine 41.5 % (Adjust R-square .415), at statistically significant level .05 and the second hypothesis testing found that, product factor of marketing mix was positive influence for the customer purchase goods from vending machine standard coefficients(β) .480 at statistically significant level .05

CONCLUSIONS AND FUTURE WORK

This research was mainly aimed to study the relationship between marketing mix and customer satisfaction to purchase goods from vending machine. The research can be concluded that the marketing mix had statistically positive influence on the customer satisfaction and purchase goods from vending machine in North east of Thailand. The most important factor affect to the customer satisfaction is product factor.

Based on research findings that guide the best strategies for retailers or vendors using vending machines. Entrepreneurs must focus on product factors such as product quality, good packaging, popularity of the product, etc. If the entrepreneurs were done business according to the results of this study, business can fight global changes (e.g. new technology, new life style, economy) and get more profits.

This research had limited to area in the study that was focused on the northeastern region of Thailand. Future research may extend to larger areas, such as the total area of Thailand, may be better.

REFERENCES

- [1] Kotler, Philip (2003). *Marketing Management*, Englewood Cliffs: Prentice Hall.
- [2] Magrath, A. J. (1986) When Marketing Services, 4Ps Are Not Enough, *Business Horizons* Vol. 29, pp. 45-50.
- [3] Oliver, R. (1997). *Satisfaction: A Behavioural Perspective on The Consumer*, New York, N.Y. McGraw-Hill.
- [4] Tse D.K., Peter, C. and Wiltan (1988). Models of Consumer Satisfaction Formation: An Extension, *Journal of Marketing Research*, 25 (May): 204-12.
- [5] Kotler, P. and Armstrong, G. (2008). *Principle of Marketing* .12th Ed., New Jersey: USA, Pearson Education Inc.
- [6] Walters, C.G. (1974). *Consumer Behavior: Theory and Practice*. Revised edition, R.D. Irwin.
- [7] Shiffman Leon G., Leslie Lazar Kanuk (1994). *Consumer Behavior*. 5th ed., New Jersey: Prentice-Hall, Inc.
- [8] Lavidge, R.C. & Steiner, G.A. (1961). A model for Predictive Measurements of Advertising Effectiveness. *Journal of Marketing*, 25, 59–62.
- [9] SAXENA, R. (2009). *Marketing Management*. 4th ed. New York: McGraw Hill.
- [10] <https://www.namanow.org/vending>
- [11] Ilzer, O. & PHILLIPS, R. (2012). *The Oxford Handbook of Pricing Management*. 1st ed. Oxford: Oxford university press.
- [12] Dupuis, M. (2000). Retail Innovation: Towards a Framework of Analysis, International EAERCD Conference on Retail Innovation, ESADE, Barcelona.
- [13] Dawson, J.A. (2001). Is there a New Commerce in Europe? *International Review of Retail, Distribution and Consumer Research*. 11 (3). pp. 287-299.
- [14] Musso, F. (2010). Innovation in Marketing Channels. *Emerging Issues in Management*, No. 1, pp. 23–42.
- [15] Yamane, Taro (1973). "Statistics: an introductory analysis." New York: Harper & Row.
- [16] Hair, J.F., Black, W.C., Babin, B.J., & Anderson, R.E. (2010). *Multivariate Data Analysis*. Seventh Edition. Prentice Hall, Upper Saddle River, New Jersey.