COMMUNICATION SATISFACTION, EMPLOYEE ENGAGEMENT, JOB SATISFACTION, AND JOB PERFORMANCE IN HIGHER EDUCATION INSTITUTIONS

Pongpipat Pongton

A Dissertation Submitted in Partial

Fulfillment of the Requirements for the Degree of

Doctor of Philosophy (Management)

International College,

National Institute of Development Administration

2018

COMMUNICATION SATISFACTION, EMPLOYEE ENGAGEMENT, JOB SATISFACTION, AND JOB PERFORMANCE IN HIGHER EDUCATION INSTITUTIONS
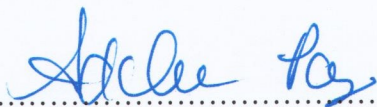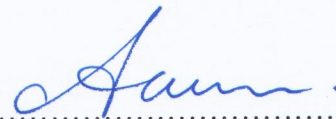
Pongpipat Pongton

International College,

National Institute of Development Administration
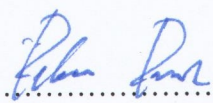
Assistant Professor…………………………………….……… Major Advisor

(Sid Suntrayuth, Ph.D.)

The Examining Committee Approved This Dissertation Submitted in Partial Fulfillment of the Requirements for the degree of Doctor of Philosophy (Management).

Assistant Professor…………………………………….……… Committee Chairperson

(Adchara Panthanuwong, Ph.D.)

Assistant Professor…………………………………….……… Committee

(Sid Suntrayuth, Ph.D.)

Associate Professor…………………………………….……… Committee

(Aweewan Panyagometh, Ph.D.)

Associate Professor…………………………………….……Dean

(Piboon Puriveth, Ph.D.)

December 2018

ABSTRACT

Title of Dissertation	Communication Satisfaction, Employee Engagement, Job Satisfaction, and Job Performance in Higher Education Institutions
Author	Mr. Pongpipat Pongton
Degree	Doctor of Philosophy (Management)
Year	2018

The purpose of this research is to find the correlation between communication satisfaction, job satisfaction, employee engagement, and job performance among faculty's members and academic staff in higher education institutions in Thailand. The paper examines overall communication satisfaction dimensions which consist of seven constructs: horizontal communication, organization perspective, media quality, communication climate, organization integration, supervisory communication, and personal feedback. Job satisfaction focuses on overall constructs of fringe benefits, promotion, pay, contingent rewards, operating procedures, co-workers, supervision, nature of work, and communication. Employee engagement includes the context of social engagement, intellectual engagement, and affective engagement. Job performance concentrates on work performance at the individual level which is based on contextual performance, task performance, counterproductive work behavior, and adaptive performance. The sample size is 400 respondents who are faculty members and staff in higher education institutions in Thailand. The data were collected by questionnaires based on the Communication Satisfaction Questionnaire (CSQ), Job Satisfaction Survey (JSS), Intellectual, Social, and Affective engagement scale (ISA), and Individual Work Performance Questionnaire (IWPQ) through a simple random sampling method. Correlation, simple regression and multiple regression analysis was done on the data gathered from the questionnaires which based on a 95% confidence level. The findings of the regression analysis in this research showed that there was

statistically significant correlation (p < 0.01) between communication satisfaction and job satisfaction, communication satisfaction and employee engagement, job satisfaction and employee engagement, job satisfaction and job performance, and employee engagement and job performance. However, there is no statistically significant correlation (p > 0.01) between communication satisfaction and job performance. The research model suggests that communication satisfaction and job satisfaction can predict employee engagement at 50.4%, communication satisfaction, job satisfaction, and employee engagement can predict job performance at 30.4%, and communication satisfaction predicts job satisfaction at only 5.2%. It implies that administrators should firstly focus on job satisfaction and communication satisfaction of employees in order to increase employee engagement. Then supervisors should concentrate on engagement and job satisfaction to increase job performance. The research results suggest that administrators should keep lines of communication open and receive feedback from subordinates by applying an open door policy to build positive relationships and create better engagement. Not only communication factors but administrators also create job satisfaction which leads to better engagement of employees. Communication satisfaction cannot create better performance because job satisfaction and engagement are the major causes of job performance. The research results suggest administrators in Thai higher education institutions should firstly concentrate on job satisfaction and communication satisfaction to increase employee engagement. Then the next step is to focus on employee engagement and job satisfaction to create better job performance. The research has benefits for high education institutions in Thailand in terms of developing organization mechanisms, policy settings, and human relations in workplace.

ACKNOWLEDGEMENTS

TABLE OF CONTENTS

Page

LIST OF TABLES

LIST OF FIGURES

Figure   **Page**

CHAPTER 1

INTRODUCTION

This chapter provides information on the research background, significance of the study, and the statement of the problem. Additionally, it includes the objectives of the research, scope of the study, and identifies the benefits and academic contributions. The final part focuses on limitations of the research and the outline of the chapters in this study.

1.1 Research Background

Communication plays a substantial role in business development for every organization. Effective communication in a company leads to business success. Robson and Tourish (2005) showed that there is now a substantial body of literature suggesting that organizational communication helps to improve the likelihood of an organization being successful. In particular, internal communication is a set of interactive processes (Mazzei, 2014). Organizations come alive because of communication and when all individuals take part (Weick, 1977; Heath, 1994). Therefore, understanding the communication actions of employees is crucial.

Orozco and Allison (2008) and Qian and Daniels (2008) said that communications in higher education institutions are different than in other business organizations. The reasons are the nature of the university environment and that faculty roles, tasks, and responsibilities are dissimilar. Orozco and Allison (2008, p. 66) stated that "the university environment has long represented democratic ideals of free speech, unbridled and creative research in the search for truth, and a distinctly independent autonomy directed by faculty as they exercise two sacred academic principles". These include academic freedom and shared governance. Faculty have earned the right, based on scholarly expertise, to express critical ideas, questions, and pursue new things. Additionally, shared governance is information exchange, opinion,

mediation, consultation, reflection, and compromise. Smith and Wolverton (2010) stated that faculty members maintain a powerful voice in decisions made by higher education institutions. In such organizations, open communication, transparency, and tolerance are necessary in order to communicate internally. Therefore, higher education institutions are different to other organisations, especially in terms of organization setting and communication satisfaction (Jenkins & Jensen, 2010).

In terms of communication satisfaction, one of the most important factors is communication with supervisors such as chairpersons, deans, and administrators. Research has found that supervisor communication styles influence organizational commitment, job satisfaction, and job performance (Vries, Roe, & Taillieu 1998, Breckenridge, 2000). According to Spangler and House (1991), Kirkpatrick and Locke (1996), Den Hartog and Verburg (1997), Awamleh and Gardner (1999), Frese, Beimel, and Schoenborn (2003), Riggio, Riggio, Salinas, and Cole (2003), Towler (2003), Terek, Glusac, Nikolic, Tasic, and Gligorovic (2015) communication is central to leadership. They illustrated that the effect of leadership styles relates to effective communication skill and interpersonal communication with subordinates (Fairhurst, 1993; Quick & Macik-Frey, 2004). Batsis (1987) said effective communication among leaders in an organization has to build two-way patterns of communication, which are formal and informal channels. The purpose is to flow the communication direction freely in all levels. Obviously, successful supervisors must have a realistic view of communication (Terek et al., 2005). They must understand the complexity of communication in an organization (Clampitt, 2005).

On the other hand, other research has suggested that communication in an organization includes symmetrical communication. It is communication which emphasizes trust, openness, integrity, relations, reciprocity, horizontal communication, network symmetry, feedback, sufficiency of information, tolerance of disagreement, employee centered style, and negotiation (Grunig, 1992). It concerns two-way communication which facilitates discussion between an organization and its employees (Men, 2014). Asymmetrical communication, however, is one direct way communication or a top-down approach designed to control employee behavior based on management requirements (Grunig, Grunig, & Dozier, 2002).

For reasons mentioned clearly above, communication flows in general business organizations and educational institutions are totally different because of the nature of the organization, organizational structure, and communication style. This research is investigates communication satisfaction which lead to employee engagement, job satisfaction, and job performance of faculty members and staff in Thai higher education institutions.

1.2 Significance of the Study

Communication in an organization is central to any study of the time supervisors devote to interacting with their subordinates (Tourish & Hargie, 2004). Studies have found that managers spend more than 60 percent of their working time communicating and meeting with people (Schermerhorn, 1996). Most activities are embedded in a network of communication and relationships with internal employees. Tourish and Hargie (2004) stated that managers spend most of their working time communicating, interacting, and determining the organizational climate. Effective management is based on open communication and supportiveness, candor, warmth, and a commitment to dialogue rather than monologue. Effective Communication is also a key element of business success. Many research findings have suggested that effective management of the communication process brings large-scale organizational benefits. Clampitt and Downs (1993) claimed that improving the quality of internal communication leads to productivity improvement, absenteeism reduction, higher quality of products and services, increasing innovation level, fewer strikes, and cost reduction. With these benefits, the study of communication in an organization is worthy of research. This research will focus on organizational communication, communication satisfaction, job satisfaction, engagement, and performance. These may lead to better performance of faculty members in Thai higher education institutions.

Most previous studies have focused on leadership style, organizational culture, organizational commitment, and organizational effectiveness. Few studies have concentrated on communication satisfaction and employee engagement (Terek et al., 2015). Hunt, Tourish, and Hargle (2000) noted that there are numerous studies about

communication in organizations, however, literature which combines research into communication satisfaction, employee engagement, job satisfaction, and job performance is limited.

1.3 Statement of the Problem

Education is very important. It contributes to the development of countries and the main players in education are educators. This research aims to explore the communication satisfaction, job satisfaction, employee engagement, and job performance of faculty members in higher education institutions in Thailand. Satisfaction among educators directly affects their performance (Demirtas, 2010). It contributes to effective communication which enables people to better understand and connect with people in the university (Ali & Haider, 2012). It involves the exchange of ideas, and building respect and satisfaction. In contrast, dissatisfaction creates negative attitudes among employees towards their job, miscommunication, and leaving the organization. Higher education management should develop a good communication environment for educators in order to improve engagement, job satisfaction, and performance. Therefore, this research will focus on communication satisfaction, job satisfaction, engagement, and performance.

1.4 Objectives of the Study

The primary objectives of this study are:

1) To investigate the communication satisfaction towards employee engagement, job satisfaction, and job performance of faculty members and staff in higher education institutions.

2) To understand and to examine the variables which have a relationship with communication satisfaction.

3) To provide recommendations for improving communication satisfaction in higher education institutions.

Therefore, this study attempts to help bridge some of the gaps in the literature between communication satisfaction, employee engagement, job satisfaction, and job

performance of faculty members and staffs in higher education institutions in Thailand.

1.5 Scope of the Study

This research primarily focuses on faculty members and staff who work in higher education institutions in Thailand. The respondents are from public and private universities in Thailand. The research will investigate literature, related journals, and various textbooks on the subject of communication satisfaction, employee engagement, job satisfaction, and job performance. The scope of the study focuses on all dimensions of the Communication Satisfaction Questionnaire (CSQ) was developed by Down and Hazen (1977), the Job Satisfaction Survey (JSS) was developed by Spector and Wimalasiri (1986), the Intellectual engagement, Social engagement, and Affective engagement scale (ISA) was developed by Soane, Truss, Alfes, Shantz, Rees, and Gatenby (2012), and the Individual Work Performance Questionnaire (IWPQ) was developed by Koopmans, Bernaards, Hildebrandt, Van Buuren, Van Der Beek, and De Vet (2012). A questionnaire survey was distributed in the attempt to understand work satisfaction, engagement, and performance.

1.6 Benefits of the Study

The following benefits will be derived from this study:

1) To expand the studies of communication satisfaction in relation to employee engagement, job satisfaction, and job performance.

2) To establish a report that aims to provide recommendations on how to improve and manage the communication satisfaction in organizations which brings to employee engagement, job satisfaction, and job performance.

Therefore, this study provides a valuable academic contribution to in higher education institutions in relation to communication satisfaction, job satisfaction, employee engagement, and job performance of faculty members and staff.

1.7 Outline of the Dissertation

The outline of this dissertation is as follows.

Chapter 1: The first chapter provides information on the research background, significance of the study, statement of the problem, objectives of the research, scope of this study, research benefits, and limitations of the study.

Chapter 2: The second chapter reviews the overall literature of higher education institutions, communication in organizations, communication satisfaction, job satisfaction, employee engagement, and job performance. In addition, it reviews various aspects and dimensions of communication satisfaction, job satisfaction, employee engagement, and job performance in an organizational context.

Chapter 3: The third chapter outlines the research methodology which consists of research design, hypothesis testing, research approach, unit of analysis, population, measurement, validity and reliability analysis, data collection, and data analysis.

Chapter 4: The fourth chapter illustrates the research result and data analysis of this study for example; demographic data, descriptive statistics, hypotheses testing, and significance of the research model.

Chapter 5: The fifth chapter is the discussion and conclusion part. It discusses the research findings from the previous chapter and the research contributions. In addition, the conclusion section presents the overall results found in this study. It includes the research summary, academic implications, managerial implications, and research limitations.

CHAPTER 2

THEORETICAL FRAMEWORK AND A PROPOSED MODEL FOR ANALYSIS

This second chapter examines the overall concept and reviews the literature. The literatures focus on higher education, higher education in the Thai context, communication in higher education institutions, communication satisfaction, job satisfaction, employee engagement, and job performance in Thai higher education institutions.

2.1 Higher Education

Education is a crucial aspect of human life. It is incontrovertible that education contributes to ensuring the development of every country. Education systems must be purposefully and logically deliberated to generate the best results for all concerned. The main people in education systems are the educators who are responsible for education for the next generation (Awang, Ahmad, & Zin, 2010). Higher education is education beyond the secondary level, especially in colleges or universities. It is an optional final stage of education. Universities can be classified into two types: private and public. Private universities are supported by tuition fees and private funds while public universities are state-funded and usually larger in size than private universities.

Higher education institutions are different from other types of business organizations in many ways. Orozco and Allison (2008) claimed that universities have long demonstrated democratic ideals of free speech, unbridled search for the truth, and autonomy unlike other business workplaces. Additionally, faculty have academic freedom to communicate, question, and share ideas. These differences make universities different in terms of communication satisfaction than other organizations.

Based on communication theory, people learn to feel more comfortable when they are able to explain the situation they are in and able to predict the behavior of

others and events. Commonly, lack of information and communication may result in high levels of dissatisfaction. This may create tension and anxiety. Faculty members in higher education institutions have an opportunity to participate in the development and transformation of humans. The greatest outcome for educators is to prepare individuals so ongoing social development can occur. Effective instructors must retain employment and therefore faculty members' engagement, job satisfaction, and performance must ensure this (Abdullah & Hui, 2014; Wetherell, 2002). The importance of instructors cannot be ignored in order to maintain high quality education (Demirtas, 2010).

2.2 Higher Education in Thailand

In Thailand, the Office of the Higher Education Commission (OHEC) is directed by the Thai Higher Education Commission. The Ministry of Education is responsible for all Thailand's higher education institutions in both undergraduate and postgraduate. The commission is to manage and to promote higher education development on the basis of academic freedom and excellence. Its commissions are to formulate policies, recommendations, and development plans, set standards, provide recommendations on resource allocation frameworks, and monitor and evaluate outcomes. In addition, the board members of OHEC consider the issue of criteria, regulations, and official orders as deemed necessary. According to the Thai Association of Governing Boards of universities and colleges (TAGB), there are 180 universities and colleges in Thailand which includes both of public and private universities (Appendix A). The structures of higher education institutions in Thailand are slightly different based on their policies and employment rate. Most public universities have more supporting staff than private universities. However, the role, function, and responsibilities of faculty members in public and private university are similar as are supporting staff roles.

2.3 Communication in Higher Education

Communication plays a central role in all management functions (Carriere & Bourque, 2009). It links people together and creates relationships (Duncan & Moriarty, 1998). Schwartzman (1989) and Cooren (1999) both stated that communication in an organization involves informing, organizing, coordinating, arranging, and subordinating. Thus, communication is more than just providing information. In fact, it has a vital role in the success or failure of any organization (Zhu, May, & Rosenfeld, 2004; Orpen, 1997). Mintzberg (1973) and Klemmer and Snyder (1972) said supervisors spend more than 75 percent of their work time engaged in communication. Communication is a two-way process which conveys meaning to another. It involves transmission of verbal and non-verbal messages. It involves a sender, a channel of communication, and a receiver. Important aspects of communication include the purpose of communication, seeking understanding of other parties, and completing a process with a consistent follow-through. These things are important for building trust and satisfaction among all parties. In business, communication is a key aspect of management because a company cannot operate effectively without appropriate communication between employees, levels, and departments.

Well-organized communication in higher education institutions is a key instrument for survival and growth (Bordia, Hobman, Jones, Gallois, & Callan, 2004; Schweiger & DeNisi, 1991; Wanberg & Banas, 2000). Developing, measuring, and analyzing instruments of communication in educational firms is therefore important (Downs, DeWine, & Greenbaum, 1944). Organizational communication is the process of information exchange between everyone in an organization under an organizational climate and atmosphere. It requires two-way communication and internal communication tools to make subordinates understand their roles. The benefits of organizational communication are decreasing uncertainty, understanding responsibility, and cooperating with internal units effectively.

Furthermore, communication is central to any study of what supervisors do. Schermerhorn (1996) noted that supervisors spend much of their time interacting with employees and most of that communication is face-to-face. It is also task-related

rather than personal in content. High performance work organizations are characterized by good communication (Tourish & Hargie, 2004). Therefore, operative communication in an organization is the glue which helps employees deepen connections to others and improves teamwork, decision-making processes, and problem-solving ability. It enables people to communicate effectively although negative or difficult messages create conflict or destroy trust.

Consequently, understanding communication flows in higher education institutions is important. Communication in an organization includes vertical communication which means sending and receiving messages between different hierarchy levels, downward or upward. Downward communication means communicating messages from more powerful to less powerful levels. It includes instructions, policy statements, notifications, announcements, briefings, and mission statements. These messages are generally transmitted by notices, memos, and emails. Upward communication is from lower hierarchy levels to higher ones. It conveys data from customers and data about day-to-day operations of an organization. In some cases, it may be more crucial than downward communication. Upward communication can be a cause of creative ideas and problem-solving since subordinates at lower hierarchy levels are closer to specific problems and more aware of practical resolutions. Horizontal communication, or lateral communication, is the exchange of information between departments or units at the same hierarchy level. Richmond and McCroskey (2009) claimed that there is more horizontal or lateral communication than vertical communication on a daily basis in an organization because there are more subordinates than supervisors and because employees at the same level feel more comfortable communicating and sharing with each other than with people at different hierarchy stages. Diagonal communication is communication between employees who share and communicate information among different levels of an organizational hierarchy. It occurs in large organization with matrix or project-based structures. Wilson (1992) argued that, in low-performing organizations, workers tend to use diagonal communication to find information about job procedures whereas, in high-performing organizations, workers use diagonal communication to seek information to solve work-related complications.

2.4 Social Penetration Theory

Social penetration theory was developed to show how information exchange functions in interpersonal relationships. It identifies as the procedure of linking separateness into intimacy (Taylor & Altman, 1987). Social penetration can happen in many different relationships such as colleagues, friends, and social groups. The process of social penetration can be successful through self-disclosure and willingness to disclose or to communication one's information to others. Self-disclosure is an important process of communication especially in an organization. Information can be descriptive or evaluative and include thought, aspiration, feeling failure, goal, fear, success, like, and dislike. The model of onion is a metaphor to explain social penetration theory with people peeling away their external appearance to their core self over time. The first peeling represents primary information to show their desire. The middle peeling is a perspective of society and politics. The last one presents their soul, secrets, fears, and imagination. For development of relationships and communication in an organization, there has to be exchange of data. The stages of social penetration theory include orientation, exploratory affective exchange, and stable exchange. Self-disclosure passes through the number of phases as an interpersonal affiliation progress. Beyond these phases, the social penetration theory forms part of social exchange theory. There are several factors that can affect the amount of disclosure such as gender, partner, race, and background (Taylor & Altman, 1975; Taylor & Altman, 1987).

In addition, social penetration theory can be described in terms of breadth and depth. Breadth is the number of topics. Depth is the degree to which people penetrate the inner personality. The more people know each other as persons, the more interpersonal their communication becomes. The role of communication is to move people from non-intimate levels to deeper, more personal ones. In contrast, when a relationship begins to deteriorate, the breadth and depth will reverse themselves. The social penetration theory has strong linkages with organizational communication and communication satisfaction. The reasons are everyone in a workplace has to communicate and disclose to each other in order to increase communication satisfaction (Downs & Hazen, 1977). Therefore, self-disclosure plays crucial roles in

the maintenance and development of personal relationships in organizations (Altman & Taylor, 1973). It is an important part of interpersonal communication or dyadic communication where people communicate most in a company in order to exchange and share information. Altman and Taylor (1973) and Rains, Brunner, & Oman (2016) claimed that superficial disclosures have considerable consequences in human relationships. Information flows upward, downward, and horizontally within organizational communication systems and the flow of communication unmistakably depends on the structure of an organization and information management (Pincus, 1986).

2.5 Communication Satisfaction

Communication satisfaction has received considerable attention because improving communication satisfaction can improve employee performance. Some researchers have studied the crucial role of communication satisfaction in organizations; however, there is a lack of research focusing on higher education institutions. Communication satisfaction in higher education institutions can be defined as an outcome of an individual who is satisfied with different features of communication in interpersonal, group, and organizational contexts (Hecht, 1978).

Much communication audit research concentrates on communication satisfaction which is important to organizational well-being and functioning (Downs & Hazen, 1977; Downs & Adrian, 2004; Zwijze-Koning & Jong, 2007). The communication satisfaction concept covers communication and feedback between administrators and subordinates, vertical and horizontal communication, work-related information, and communication among different departments (Engin & Akgoz, 2013). It measures how well the available information fulfils the individual's request for the task-role (Putti, Aryee, & Phua, 1990). Generally, communication satisfaction conveys personal meaning. In the same department and conditions, each worker may have different thoughts and opinions. It sometimes considered as a criteria and theory underlying the concept of improved communication skills (Engin & Akgoz, 2013). It measures on how well the available information fulfills the individual's request for the task-role (Putti et al., 1990). Generally, communication satisfaction conveys

personal meaning. It is also an emotional response which focuses on social events (Hect, Sereno, & Spitzberg, 1984). However, Thayer (1969) claimed that communication satisfaction is a personal satisfaction experienced when communicating successfully to a person. It is defined as an individual's satisfaction with different aspects of communication in an organization (Crino & White, 1981).

Communication satisfaction can be defined as the summary of an individual's satisfaction with information flows and relationship variables (Downs & Hazen, 1977). Downs (1988) claims that it is an aspect of information exchange and meaning transmission throughout an organization and the way to measure communication satisfaction is to judge the climate and health of the organization. Hecht (1978) said communication satisfaction occurs when positive expectations and ambitions of a social interaction are met. Some describe it as enjoyment and fulfilling expectations through ongoing communication involvement, interaction, and perception. Punyanunt-Cater (2008) concluded that communication satisfaction can reflect high-quality relationships and result in relational satisfaction, closeness, and relational maintenance. It is the linkage of communication competence and satisfaction with close relationships.

Organizational communication satisfaction is defined as the overall degree of satisfaction which subordinates experience in their total communication environment in an organization (Redding, 1978). Downs (1988) found that there is a statistically positive relationship between communication satisfaction and job satisfaction. Carriere and Bourque (2009) showed that internal communication or organizational communication is significantly positively correlated with job satisfaction and that communication satisfaction mediated the relationship between perception of employee communication systems and level of job satisfaction. Pincus (1986) and Gregson (1987) showed a positive relationship between communication satisfaction and organizational effectiveness, organizational commitment, and turnover.

Employee communication satisfaction involves employees communicating with supervisors and fulfilling interpersonal needs for inclusion and pleasure (Madlock, 2008a). Madlock (2008b) stated employee communication satisfaction has task and relational dimensions. Additionally, employee communication satisfaction helps determine organizational effectiveness. Poor employee communication

satisfaction results in low commitment from employees, a high level of absence, increased operative turnover, and decreased efficiency. There is a strong association between communication satisfaction and job satisfaction as shown by Miles, Patrick, and King (1996). It is also related to organizational performance (Gilley, 2001).

Many researchers have developed communication satisfaction scales, for example: the Communication Satisfaction Questionnaire was developed by Downs and Hazen (1977) and the Organizational Communication Scale was developed by Robert and O'Reilly (1979). Crino and White (1981) claimed that the concept of communication satisfaction includes an individual's satisfaction with many aspects of communication in an association while Putti et al. (1990) also argued that an individual's communication satisfaction in an organization accompanies the amount of information communicated to them. Employees take part in communication interactions with subordinates and superiors to satisfy interpersonal needs for inclusion and pleasure (Anderson & Martin, 1995).

Downs and Hazen (1977) developed eight factors of communication satisfaction and these factors were confirmed by Crino and White (1981), Downs (1988), and Varna (1996). They are as follows.

1) Horizontal communication or co-worker communication concerns the degree to which informal communication is accurate and free flowing. It comprises perceptions of grapevine communication. Horizontal informal communication essentially occurs between peers or co-workers (Clampitt & Downs, 1993; Downs & Hazen, 1977). This communication is important for team building because it convinces peers to build connections.

2) Subordinate communication emphases on both downward and upward communication with subordinates. They respond to downward communication and initiate upward communication. Abdullah and Hui (2014) called it a relationship with subordinates which are only completed by supervisors. It is the receptivity of workers to downward communication and their willingness to provide good information upward to supervisors.

3) Media quality is the extent to which meetings in an organization are well-organized and written directives are clear and short. Employee satisfaction with media quality is about the effectiveness and use of media for communication purposes

(Mustamil, Yazdi, Saw, & Ali, 2014). Hence, "It reflects the degree to which employees perceive major forms of company media as functioning effectively" (Down & Hazen, 1977, p. 67). Employee perceptions include an assessment of whether directives and memorandums are clear, publications in an organization are useful, and meetings are well-organized (Clampitt & Downs, 1993). Abdullah and Hui (2014) said it looks at the communication as it goes through several channels, for instance; organization publications, memorandums, and meetings. It is also the degree to which the amount of communication is about right.

4) Organizational perspective or corporate information mentions to all the information about an organization. It contains notifications, policies, and goals of an organization. Mustamil et al. (2014) said that satisfaction with organizational perspectives can reflect employee satisfaction with information in overall organizational functions. Clampitt and Downs (1993) mentioned it relates to information about an organization as a whole. It also contains knowledge about external events, for example; new government policies, changes, and financial standing that affect an organization.

5) Organizational integration includes the degree to which individuals obtain information about their immediate work environment, for example; job requirements, personal news, department plans and policies, and division updates (Akkirman & Harris, 2005; Mustamil et al., 2014; Down & Hazen, 1977). It involves information which employees receive about their work and it includes what is happening presently and what departments are doing (Abdullah & Hui, 2014).

6) Communication climate is the extent to which communication in an organization stimulates and motivates subordinates in order to meet organization goals. It is network of personal relationships in an organization. It is that atmosphere that people feel at the workplace. Information will flow more freely if there is a positive communication climate. In contrast, information may not flow at all if there is a negative communication climate (Downs & Hazen, 1977). Clampitt and Downs (1993) indicated that communication climate reflects communication at two levels: organizational and personal. According to Bartels, Pruyn, Jong, and Joustra (2006), at the organizational level it relates to the employee's perception of the quality of mutual relationships and communication in the organization. Akkirman and Harris (2005)

stated that communication climate at the organizational level applies to the extent to which employees feel supported and encouraged by the organization to meet organizational goals. Clampitt and Downs (1993) said that at the personal level, communication climate refers to an employee's attitude towards communicating within an organization. Communication climate is a crucial factor when exploring employee communication satisfaction. It measures the general response to the workplace on both organizational and personal levels.

7) Personal feedback is information about how subordinates are being judged and how their performance is being evaluated (Akkirman & Harris, 2005). Downs and Hazen (1977) mentioned that personal feedback is communication about personal achievement and work. It based on how employees are appraised and evaluated (Clampitt & Downs, 1993).

8) Supervisory communication is the downward and upward perspective regarding communication with supervisors (Downs & Hazen, 1977; Gray & Laidlaw, 2002). Akkirman and Harris (2005) stated that it reflects satisfaction with how supervisors are open to ideas, pay attention, and offer guidance for solving problems. Supervisory communication reflects three principles. These include ability to listen effectively, openness to new ideas, and provision of guidance for problem solving. Dirks and Ferrin (2002) found that subordinates are more satisfied with their supervisors when they see them as participants in decision-making processes not only as observers. In addition, superiors who listen to their subordinate's feedback and are open to new ideas can create more employee engagement.

Communication satisfaction has been proved to influence employee engagement and job satisfaction (Gregson, 1990; Mathieu & Zadjac 1990; Orpen, 1997; Petit, Goris, & Vaught, 1997; Varona, 1996; Zwijze-Koning & Jong, 2007). Iyer and Israel (2012) found that organizational communication satisfaction has a positive impact on employee engagement. Various studies established a positive relationship between communication satisfaction, employee engagement, and job satisfaction (Pincus, 1986; Petit et al., 1997; Varona, 1996). Watson (2008) claimed that companies which communicate effectively are likely to have higher levels of employee engagement than companies which communicate less effectively. Argenti (1998) said employees want more communication with their managers. Therefore, this

research aims to establish the impact of communication satisfaction on employee engagement. Additionally, Miles (1996), Falcione (1974a), Falcione, (1974b), Duke (1981), Varona (1988), Clampitt and Downs (1993), Pettit et al. (1997), Muchinsky (1993), Nicholson (1980), Lee (1989), Ehlers (2003), Akkirman and Harris (2005), De Nobile and Mc Cormick (2005), Brunetto and Wharton (2006), Chen, Silverthorne, and Hung (2006), Zeffane and McLoughlin (2006), Carriere and Bourque (2009), Kumar and Giri (2009), and Wagenheim and Rood (2010), agreed that there is a positive relationship between communication satisfaction and job satisfaction. Moreover, Fisher (2003) claimed that satisfaction and happiness are positively related to better performance. Furthermore, Goris (2007) found that communication satisfaction affected job performance.

Table 2.1 Conclusions of Related Communication Satisfaction Studies

Study	Year	Conclusion
Downs and Hazen	1977-1988	The various dimensions of communication satisfaction can provide a barometer of organizational function, and the concept of communication satisfaction can be a useful tool in an audit of organizational communication.
Hecht	1978	Hecht reviewed various instruments used to assess communication satisfaction. His remarks on the communication satisfaction questionnaire were basically positive.
Crino and White	1981	For researchers to feel confident about using the instrument, additional information is needed to characterize more carefully the internal consistency and dimensionality of the instrument.
Hamilton	1987	The communication satisfaction provides a uniquely theoretical and empirically sound method of gathering information about organizational communication.

Table 2.1 (Continued)

Study	Year	Conclusion
Greenbaum, Clampitt, and Willihnganz	1988	It is a short and understandable instrument and has been used in a wide variety of organizations.
Meintjes and Steyn	2002-2006	The communication satisfaction research was found to be useful in the South African educational environment as it is brief and understandable. It can thus be used with confidence.
Iyer and Israel	2012	The various dimensions of communication satisfaction play a very crucial role in achieving engagement in organizations. It becomes relevant in the context of recent global organizations

Source: Adapted from Meintjes and Steyn, 2006.

2.6 Job Satisfaction

Job satisfaction has been defined in many ways, but normally it is considered an individual's perspective and emotional reaction to crucial facets of work conditions. Employee job satisfaction is how employees feel toward their work. It is a measure of workers' contentedness with their jobs (Madlock, 2008). Scheff (1967) defined employee satisfaction as the affective attitudes of individuals towards work. Locke (1976) defined it is a pleasurable or positive emotional state related to job experiences. It is the enjoyable attitude of employees towards their jobs (Steele & Plenty, 2015). It is the level of contentment a person feels regarding his or her work. Job satisfaction can be influenced by an employee's ability to complete required tasks, the level of communication in a company, and the way management treats subordinates. Employee satisfaction is the satisfaction of employees with their jobs and leaders. It is the degree to which both parties are satisfied with each other.

Moreover, Hang (2006) claimed that satisfaction is a favourable feeling about the other party. There are five indicators related to job satisfaction: trust, control, mutuality, commitment, and satisfaction. When workers are satisfied they commit to a long-term relationship with a company. Berman and Hellweg (1989) showed that employee job satisfaction through communication with supervisors is a key element of communication competence. They found a positive relationship between a supervisor's communication competency and an employee's satisfaction with his or her supervisor. Furthermore, the research of King, Lahiff, and Hatfield (1998) disclosed a relationship between communication and job satisfaction. Madlock's (2008c) research also found that supervisor communication competence is related to subordinate communication satisfaction.

Suker, Bir, Engin, and Akgoz (2016) mentioned that employee satisfaction affects employee commitment towards the company and influences employee performance and business success; it is also highly correlated to organization success. Additionally, Pincus (1986) found communication satisfaction affected job performance and Suker et al. (2016) said employee communication and job satisfaction both affect performance. However, it is also influenced by other factors such as leadership style, communication quality with leaders, and an employee's personal circumstances (Sempane, Rieger, & Roodt, 2002). Suker et al. (2016) claimed that increasing the effectiveness of supervisor and subordinate communication can strengthen employee satisfaction.

Taylor (1970) said that employee satisfaction relates to the highest possible earnings with the least amount of fatigue. Lock (1976) saw job satisfaction as a pleasure or positive emotional state from job evaluation experiences. There are differing factors mediating employee job satisfaction (Madlock, 2008). These factors include supervisors' displays of nonverbal immediacy, humor, communication satisfaction, effects of gender, and supervisors' communication style (Richmond, McCroskey, Davis, & Koontz, 1980; Richmond & McCroskey, 2000; Madlock, 2006a; Madlock, 2006b; Avtgis & Taber, 2006).

Job satisfaction and organizational communication are concepts important to management and researchers because communication and job satisfaction define work-life balance (Bulutlar & Kamasak, 2008; Pettit et al., 1997). Alhassan, Ghazali,

and Isha (2017) explored the relationship between communication satisfaction and job satisfaction. They showed that there was a strong positive correlation between communication satisfaction and job satisfaction and there were statistically positive correlations among six communication factors: personal feedback, organizational integration, supervisory communication, communication climate, horizontal communication, and media quality.

Abraham (2012) indicated that job satisfaction is related to cognitive aspects of employee engagement. Job satisfaction is an antecedent of, and leads to, employee engagement. Brunetto, Teo, Shacklock, and Farr-Wharton (2012), showed that the path from job satisfaction to employee engagement was positive and statistically significant and that employee engagement is predicted by well-being and job satisfaction.

Moynihan and Pandey (2007), Valaei and Rezaei (2016) demonstrated the relationship between job satisfaction and job performance. An organization should ensure job satisfaction among workers and know the causal relationship with job performance, Markovits, Boer, and Van Dick (2014) and Yang and Hwang (2014) supported this. However, some research suggests that there is no causal relationship between job satisfaction and job performance. Miller, Kerr, and Ritter (2008), Gu and Chai Sen Siu (2009), Wood, Van Veldhoven, Croon, and de Menezes (2012), Singh and Das (2013), Barakat, Lorenz, Ramsey, and Cretoiu (2015), and Trivellas, Kakkos, Blanas, and Santouridis (2015) found a positive relationship between job satisfaction and job performance while Veloutsou and Panigyrakis (2004), Janssen and Van Yperen (2004), Shaikh, Bhutto, and Maitlo (2012), Robbins, Judge, Millett, and Boyle (2013) reported a reverse positive relationship. Brown and Peterson (1994) and Riketta (2008) reported there is no statistically significant relationship between job performance and job satisfaction while Yang and Hwang (2014) suggested that job satisfaction and job performance influence each other reciprocally and positively.

2.7 Employee Engagement

Employees are an important asset for every organization. Employee engagement is the key to organizational success (Bhuvanaiah & Raya, 2014). Robinson, Perryman, and Hayday (2004) defined employee engagement as a positive attitude held by employees towards the organization. Engaged employees can improve their performance. Balakrishnan and Masthan (2013) said employee engagement is crucial and explains an employee's emotional and intellectual commitment to an organization. Engagement was conceptualized by Kahn (1990). It harnesses workers' roles in the organization. Employee engagement means people speaking positively about an organization, staying in the organization, and striving to perform more than minimal requirements for the organization. "Engaged employees are not just committed but passionate about their work" (Balakrishnan & Masthan, 2013, p. 2). Engaged employees are more profitable, productive, focused, enjoy their work, and are less likely to leave an organization.

Vazirani (2007) claimed that employee engagement is the level of commitment and involvement which employees have towards an organization. It is the extent to which workers put discretionary effort into their work and apply their efforts to the company's goals. Iyer and Israel (2012) concluded that organizations with higher levels of employee engagement are able to retain their valued employees. Additionally, employee engagement results in better employee performance, organizational success, and financial outcomes (Harter, Schmidt, & Hayes, 2002; Bates, 2004).

Organizational communication plays a significant role in employee engagement (Iyer & Israel, 2012). Iyer and Israel (2012) confirmed that clear, concise, and honest communication is a significant tool for employee engagement because lack of communication or poor communication leads to distrust, dissatisfaction, doubtfulness, and employee turnover. Argenti (1998) indicated employees want more communication with managers in order to know the overall plans of an organization. Additionally, various studies have found a positive relationship between communication satisfaction and employee engagement and job satisfaction (Pincus, 1986; Petit et al., 1997; Varona, 1996). Companies which can "communicate

effectively are four times as likely to report high levels of employee engagement as firms that communicate less effectively" (Watson, 2008 cited in Iyer & Israel, 2012, p. 53).

The number of studies showing a positive relationship between employee engagement and job performance is increasing. Rich, Lepine, and Crawford (2010) extended the Kahn (1990) theory and mentioned that engagement serves as a crucial mechanism through which the antecedents of engagement affect job performance. Their research results suggested engagement among employees can enhance job performance. Halbesleden and Wheeler (2008) showed that engagement is positively associated with job performance. This result is confirmed by many studies of engagement (Salanova, Agut, & Peiro, 2005; Saks, 2006; Bakker, Schaufeli, Leiter, & Taris, 2008). Markos and Sridevi (2010) agreed that engagement impacts performance. The studies have found a positive relationship between employee engagement and organizational performance. Zahrah, Hamid, Rani, and Kamil (2017) argued that engaged employees have a key role in contributing to excellent job performance. Employee engagement strongly influences organizational success through outstanding job performance. This illustrates the significant relationship between employee engagement and job performance. In addition, engagement leads to positive performance outcomes.

2.8 Job Performance

Job performance has been a major area of study in the field of organizational research (Jalakamali, Ali, Hyun, & Nikbin, 2016). It is one of the most crucial dependent variables and has been studied for a long time (Jankingthong & Rurkkhum, 2012). Job performance is a key factor which organizations aim to improve to achieve their goals (Kahya, 2007; Jankingthong & Rurkkhum, 2012). It is the way employees perform their work. Generally, an employee's performance is measured during job performance reviews where a supervisor takes into account factors such as time management, organizational skills, and productivity to analyse each employee. Zahrah et al. (2017) defined job performance as any kind of employee behaviour be it aggressive, committed, lazy, or dissatisfied. Additionally, numerous studies have

defined performance as the outcome of effort, commitment, engagement, and involvement by employees.

Job performance assesses whether an employee performs task well. It has been conceptualized as the actions and behaviours which fit organizational goals (Rotundo & Sackett, 2002). Motowidlo, Borman, and Schmit (1997) defined job performance as the overall expected value from an employee's behavior in a set period of time. It is a set of behavior with evaluative elements (Borman & Motowidlo, 1997). Motowidlo (2003) stated that job performance is the effectiveness of an employee's contributions towards organizational goals. Chen (2006) said job performance contains results, values, and achievements from an employee's work. In a narrow sense, it is defined as employee productivity; in contrast, it is also defined as the combination of efforts, skills, and results. In addition, job performance can be further described as multi-dimensional concepts which include task performance, contextual performance, adaptive performance, and counterproductive work behaviour. Jankingthong and Rurkkhum (2012) described it as the behaviors or actions that are relevant to the organization's goals in final-stage evaluation.

Research into job performance among university teachers by Yusoff, Ali, and Khan (2014) found that job performance is a significant factor for an effective organization. Colquitt, Lepine, Wesson, and Gellatly (2010) said the success of an organization is dependent on the good performance of its employees, especially in education. It is totally dependent on educators' job performance. Therefore, effective job performance by educators is important for improvement of the education system as a whole (Yusoff et al., 2014).

2.9 The Current Study's Contribution to Higher Education

Chancellors, presidents, deans, chairpersons, faculty members, and supporting staff in higher education institutions are important for leading the organizational environment. They are the key people to support and educate the next generation and faculty members are role models for students. Clearly, there is a need for research in the areas of communication satisfaction, engagement, job satisfaction, and job performance in order to develop these four areas in Thai higher education institutions

with competency and proficiency. This study focuses on faculty members and supporting staff in both public and private higher education in Thailand.

Conceptual Model:
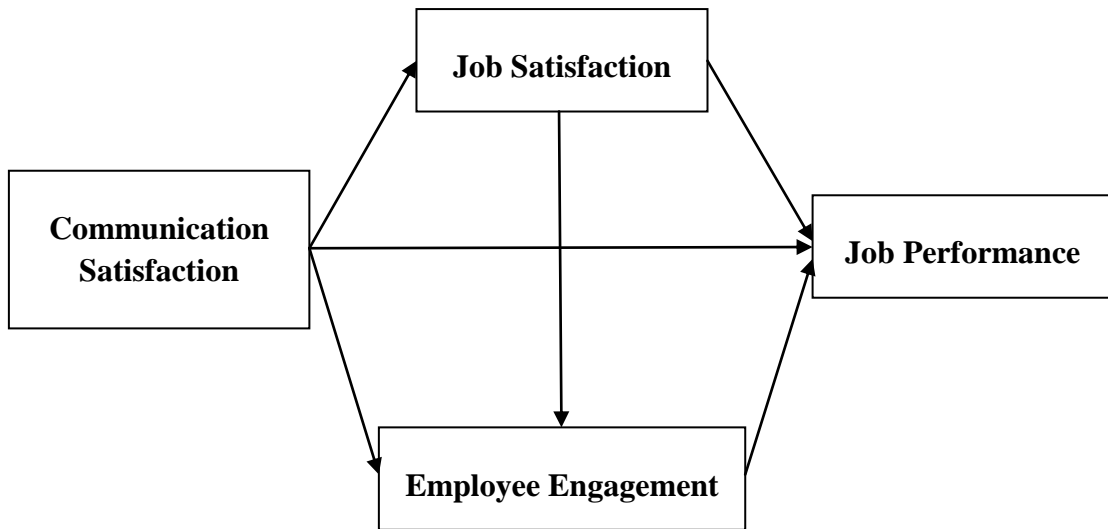
Figure 2.1 Research Conceptual Model

        H1: Communication satisfaction has a positive impact on employee engagement.

        H2: Communication satisfaction has a positive impact on job satisfaction.

        H3: Communication satisfaction has a positive impact on job performance.

        H4: Employee engagement has a positive impact on job performance.

        H5: Job Satisfaction has a positive impact on employee engagement.

        H6: Job Satisfaction has a positive impact on job performance.

CHAPTER 3

RESEARCH METHODOLOGY

This chapter describes the research methodology, which includes research design, unit of analysis, and research procedures. It includes data collection and data verification methods. It also discusses the appropriate quantitative approach for understanding the effectiveness of organizational communication. In addition, it establishes the criteria for measuring the communication in an organization.

3.1 Research Design and Approach

This research uses positivism which means "working with an observable social reality and that the end product of such research can be law-like generalisations similar to those produced by the physical and natural scientists" (Remenyi, Williams, Money, & Swartz, 1998, p. 32 as cited in Saunders, Lewis, & Thornhill, 2009, p. 113).

The deductive method will be utilized in this research because it is appropriate for the objective of the study. The deductive theory illustrates the nature of the relationship between theory and research (Bryman & Bell, 2011). This approach is to explain causal connections between variables (Saunders et al., 2009). The deductive approach and positivism can be utilised because the research mainly focuses on the literature of communication in a business enterprise.

The objectives of the research are: to investigate communication satisfaction towards employee engagement, job satisfaction, and job performance of faculty members and staff in higher education institutions; to understand and to examine the variables that have relationships with communication satisfaction; and to provide recommendations for improving communication satisfaction in higher education institutions.

3.2 Research Hypothesis

Hypotheses can be formed based on the research objectives and the literatures review. It is defined an informed consideration. It was set up to test possible relationship and effect between two or more variables. Hypotheses are unproven statements and must be tested empirically to confirm that there are true or not (Saunders et al., 2009). The following hypotheses have been formed for this study:

H1: Communication satisfaction has a positive impact on employee engagement.

H2: Communication satisfaction has a positive impact on job satisfaction.

H3: Communication satisfaction has a positive impact on job performance.

H4: Employee engagement has a positive impact on job performance.

H5: Job Satisfaction has a positive impact on employee engagement.

H6: Job Satisfaction has a positive impact on job performance.

3.3 Quantitative Approach

Quantitative methods were applied in this research based on positivism and a deductive approach. It focuses on the measurement and analysis of the causal relationships among four main variables. The positivism is used to explain quantitative research with the view that social researchers should adopt in the scientific method. The methods illustrate the hypotheses testing. In this particular research, the quantitative approach is set to be the main approach of analysis due to it They are useful for addressing specific questions about relatively well-defined phenomena and stronger empirical evidence than other research methods. The quantitative approach emphasizes the measurement and analysis of the relationships among independent and dependent variables, unlike the qualitative approach, which searches for how social experiences are created. The research set only the quantitative approach to be the main approach of the analysis. On the further section, the component of the approach will be explained in details.

3.3.1 Unit of Analysis

The unit of analysis is the major entity which generalizes in this research. By this study will focus on faculty members and staff in higher education institutions in

Thailand. According to Office of the Higher Education Commission Statistics (2017) found that there are approximately 200,000 instructors and staff in both public and private universities in Thailand (Higher Education Commission, 2016). The research decided to choose 400 instructors and staff as a sample size of the entire population which based on Taro Yamane's formula with the acceptable sampling error at 0.05.

3.3.2 Population and Sample Design

According to Vogt (2007), the degree of certainty of the generalizations from the sample size to the actual population depends on two main factors. First is the size of entire population and second is the representativeness of the sample. The sampling process involves choosing a group of respondents from an entire population, then examining the larger group. Generally, there are two main categories of sampling design. The first category is probability sampling and the second is non-probability sampling. The first is a method in which the researcher knows the population. Probability sampling consists of four major types: random sampling, stratified random sampling, systematic sampling, and cluster sampling. Non-probability sampling is where the researcher does not know the probability of selection or there is an unknown population. Non-probability sampling includes convenience sampling and purposive sampling. The target population consists of instructors and staff who work in higher education institutions in Thailand. However, it is impractical to survey the whole population due to time and budget constraints (Saunders et al., 2009). Thus, a sample must be selected. According to Bryman and Bell (2011), samples are almost invariably used in quantitative research and there are different methods of sampling. The selected sample should accurately reflect the population and must be representative. This study will investigate 400 participants who are faculty members and staff at universities.

A self-administered questionnaire survey was used to collect data. Samples were selected using probability sampling by simple random sampling. According to Office of the Higher Education Commission in 2017, the population of faculty members and staff are 200,000. Based on Taro Yamane's formula, with the acceptable sampling error at 0.05, yields a sample size of 400 faculty members and staff. However, 600 questionnaires were distributed to respondents and only 400

completed questionnaires were analysed. Participants were informed the survey was anonymous and that the information they provided would be treated with high confidentiality.

3.3.3 Operational Definition and Measurement

The development of the research model involved an extensive review of the existing literature. Based on the review, hypotheses were set in a testable format. It is crucial to define all variables and applied them to the research conceptual framework to a valid measurement. Therefore, the research model is shown below.
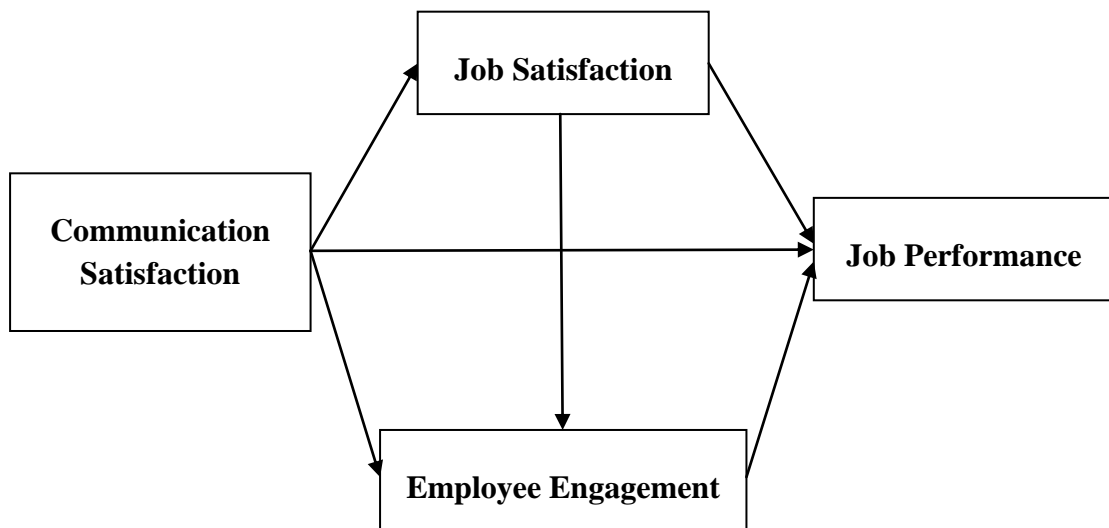
Figure 3.1 Research Conceptual Model

3.3.3.1 Dependent Variable

According to the research framework, the dependent variables are job satisfaction, employee engagement, and job performance of communication satisfaction. In addition, employee engagement is the dependent variable of communication satisfaction. Finally, job satisfaction is the dependent variable of communication satisfaction.

3.3.3.2 Independent Variable

The objective of this study was to identify the factors affecting job satisfaction, employee engagement, and job performance. According to the conceptual model, communication satisfaction is the first independent variable towards job satisfaction, employee engagement, and job performance. Secondly, job satisfaction is the independent variable to employee engagement and job performance. Lastly, employee engagement is the independent variable impacting job performance.

3.4 Questionnaire Design

The quantitative data for this research were collected by using survey questionnaires. The questionnaire in this research was built in accordance with the theories and framework in the previous chapter. The questionnaire in this study is divided into five parts. The first part consists of overall demographic data which are gender, age, job position, academic title, education, and number of years working in the higher education institution. The second part asks about communication satisfaction in eight dimensions: horizontal communication, media quality, organizational perspective, organizational integration, communication climate, personal feedback, and supervisory communication. The third part is about job satisfaction in nine dimensions. These consist of pay, promotion, fringe benefits, contingent rewards, supervision, co-workers, operating procedures, nature of work, and communication. The fourth section aims to measure employee engagement in the context of intellectual engagement, social engagement, and affective engagement. The fifth part asks about job performance in four main dimensions: task performance, contextual performance, adaptive performance, and counterproductive work behavior. The first part starts with the category questions. The second part to the fifth part uses a Likert scales. Likert scale is beneficial to this research because it can test the degree of each factor from particular participant. The measurements are classified on a five-point rating scale which, for communication satisfaction is: 1 = extremely dissatisfied, 2 = dissatisfied, 3 = neutral, 4 = satisfied, and 5 = extremely satisfied. For job satisfaction, employee engagement, and job performance, the scale is: 1 = strongly disagree, 2 = disagree, 3 = neutral, 4 = agree, and 5 = strongly agree.

Focusing in this research scales, all questions in this questionnaire are conducted from previous researches which have been proved and confirmed. The details are as follow;

Communication satisfaction was measured by 30 items from the Communication Satisfaction Questionnaire (CSQ) developed by Down and Hazen (1977). All items measured aspects of communication satisfaction using five-point Likert scales, from 1 (extremely dissatisfied) to 5 (extremely satisfied).

Job satisfaction was measured using 27 items modified from the Job Satisfaction Survey (JSS) developed by Spector and Wimalasiri (1986). All items were measured using five-point Likert scales, from 1 (strongly disagree) to 5 (strongly agree).

Employee engagement was measured using 9 items from the Intellectual, Social, and Affective engagement scale (ISA) developed by Soane et al. (2012). All items were measured using five-point Likert scales, from 1 (strongly disagree) to 5 (strongly agree).

Job performance was measured by 15 items from the Individual Work Performance Questionnaire (IWPQ) developed by Koopmans, Bernaards, Hildebrandt, Van Buuren, Van Der Beek, and De Vet (2012). All items were measured using five-point Likert scales, from 1 (strongly disagree) to 5 (strongly agree).

In addition, the questionnaire was entirely in English. Therefore, the researcher had to translate it into Thai for use in the Thai higher education context. The content validity was guaranteed by experts' consideration. The expert who proved questionnaire is the people who can understand both Thai and English language fluently and translator is a professor in language institute at the higher education institution in Thailand. Therefore, this can guarantee the translation correctly. Furthermore, the double check of questionnaire translation process and back up test was done from English to Thai and then Thai to English which has been approved by professionals in this related field.

3.4.1 Pilot Testing

A pilot test was conducted to ensure the reliability and validity of the questionnaire. This study utilizes a pilot testing to improve questionnaire before data

collection method. The purpose was to examine the validity and reliability of the questionnaire in order to avoid problems when respondents answered the questions (Saunders et al., 2009). Additionally, Bryman and Bell (2011) claimed pilot testing is necessary to certify and confirm that the whole research instrument functions well.

The number of participants in pilot testing relates to the sample size and target population (Saunders et al., 2009). The minimum number for a pilot test is 10% of the sample size (Churchill & Brown, 2004). In this case, 40 respondents were used due to the 400 sample size.

3.4.1.1 Reliability Analysis

Reliability analysis measures the extent to which the data collection techniques or analysis procedure yield consistent findings (Easterby-Smith, Thorpe, & Jackson, 2008). It is done to ensure that the questionnaires' questions are consistent and stable (Sekaran & Bougie, 2010). Pallant (2010) claimed that the main issue is internal consistency and the most generally used indicator is Cronbach's Alpha. The Cronbach's Alpha value should be above 0.7. However, the values are sensitive based on the number of items in the scale and vary by sample. In this study, the Cronbach's Alpha measures the reliability of the communication satisfaction scale, job satisfaction scale, employee engagement scale, and job performance scale. The table below shows the values are above 0.7. Generally, the Alpha values above 0.7 are considered acceptable and values above 0.8 are considered preferable (Pallant, 2010).

Table 3.1 Reliability Analysis after 40 Questionnaires or 10% of Respondents
were Collected

		N	%
Cases	Valid	40	100
	Excluded (a)	0	0
	Total	40	40
Construction		**Cronbach's Alpha Based on Standardised Item**	
		Cronbach's Alpha	**Number of Item**
Communication Satisfaction		.946	30
Job Satisfaction		.893	27
Employee Engagement		.717	9
Job Performance		.714	15

The table above shows the result of reliability analysis after pilot testing. The respondents are N = 40 or 10% of the sample size. All constructs, namely, communication satisfaction, job satisfaction, employee engagement, and job performance are above 0.7, which means accepted for further study. The communication satisfaction, job satisfaction, employee engagement, and job performance Cronbach's Alpha values are 0.946, 0.893, 0.717, and 0.714, respectively.

Table 3.2 Reliability after 400 Questionnaires or all Respondents were Collected

		N	**%**
Cases	Valid	400	100
	Excluded (a)	0	0
	Total	400	400

Construction	**Cronbach's Alpha Based on Standardised Item**	
	Cronbach's Alpha	**Number of Item**
Communication Satisfaction	.927	30
Job Satisfaction	.788	27
Employee Engagement	.817	9
Job Performance	.793	15

The table above shows the result of reliability analysis after all samples were collected. The respondents are N = 400. All constructs, namely, communication satisfaction, job satisfaction, employee engagement, and job performance are above 0.7 which means accepted for analysis. The communication satisfaction, job satisfaction, employee engagement, and job performance Cronbach's Alpha values are 0.927, 0.788, 0.817, and 0.793, respectively.

3.4.1.2 Validity Analysis

Validity refers to the relevance of the measurement of the questions investigated and appropriateness of questions to reach an accurate conclusion (Vogt, 2007). It has been suggested that validity are very important before conducting surveys and to pre-testing the questionnaires. One of the distinctions between reliability and validity is that validity is more related to judgment than statistics. In this research, content validity was guaranteed by experts' consideration. In addition, questionnaire translation process and back translation was approved by professionals in a related field. Vogt (2007) said that the typical assessment of validity is the

judgment of a panel of experts. The experts who review the questionnaire should be selected from a field related to the content.

3.5 Data Collection and Data Analysis

Data collection and data analysis are an important process of research method. It is the way which can be interpreted or analyzed to frame answers to the research objectives. The numerical or quantitative data for this research was collected using paper-based survey questionnaires. The data collection was done in a "one-shot" questionnaire approach.

A total of 400 questionnaires were collected and analysed using the SPSS program for statistical analysis in the social sciences. The statistical techniques applies were Pearson Correlation Analysis and Regression Analysis. Pearson Correlation Analysis is used to measure and determine the relationship between independent and dependent variables. Simple and multiple regressions are useful when the independent variables are correlated with one another and correlated with the dependent variable in varying degrees. Simple and multiple regressions allow the researcher to identify the independent variables simultaneously associated with the dependent variable, and to estimate the separate and distinct influence of each variable on the dependent variable (Nash and Carver, 2005). Therefore, Simple and Multiple Regression Analysis was also used to analyse the degree of the relationship between the independent and dependent variables.

3.5.1 Survey Methodology

The questionnaires were directly distributed to the respondents. The respondents were faculty members and staff in higher education institutions in Thailand. A total of 600questionnaires were delivered to two public universities and two private universities (150 each).

3.5.2 Data Collection Method

The survey took approximately 2 to 3 weeks from initial submitting. The data was collected from 12th February 2018 to 28th February 2018 at Assumption

University, Thammasat University, Ramkhamhaeng University and the University of the Thai Chamber of Commerce. These four universities were selected because of convenience and their similarity and this proportion is suitable for the collection. Furthermore, the communication context in higher education institutions in Thailand is similar. Therefore, it can be used for the data collection in this study. To certify a good rate of questionnaire return respondents were selected utilizing probability sampling by simple random sampling and given the questionnaires by hand.

Table 3.3 Data Collection

No.	University	Category	Questionnaires Collected
1)	Assumption University	Private University	110
2)	University of the Thai Chamber of Commerce	Private University	90
3)	Thammasat University	Public University	91
4)	Ramkhamhaeng University	Public University	109
Total			400

3.5.3 Response Rate

Researcher plans to distribute the questionnaire more than estimated response rate. Therefore, 600 questionnaires were distributed. The rate of the returned questionnaires was at 73.33% or 440 questionnaires. However, within a number of the returned questionnaires, some were found to be incomplete and missing. They could not be used for statistical analysis and were excluded from the data analysis. When the incomplete questionnaires were removed from the analysis, the 66.67% or 400 collected questionnaires were applied and considered to present in this study.

3.5.4 Data Analysis

The 400 questionnaires were analyzed by using the SPSS programme for statistical analysis in social science. The statistical techniques used were Pearson Correlation Analysis and Regression Analysis. Pearson Correlation Analysis is used to measure and determine the relationship between independent and dependent variables. The simple and multiple regressions are useful where the independent variables are correlated with one another and correlated with the dependent variable in varying degrees. Simple and multiple regressions allow the researcher to identify the independent variables simultaneously associated with the dependent variable and to estimate the separate and distinct influence of each variable on the dependent variable (Nash & Carver, 2005). Therefore, simple and multiple regression analysis were also used.

CHAPTER 4

FINDINGS AND DATA ANALYSIS

This chapter presents the data collected from questionnaires in higher education institutions in Thailand. The 600 questionnaires were distributed from 12th February 2018 to 28th February 2018. Then 400 questionnaires were valid and used for analysis. This analysis was based on the research objectives and hypotheses. The data analysis was divided into demographic profiles, descriptive statistics for communication satisfaction, job satisfaction, employee engagement, job performance, and hypotheses testing.

4.1 Demographic Profiles

In order to make the demographic data effective in this research, descriptive statistics were applied to display the frequency and percentage of the demographic characteristics of the respondents. The demographic factors in this study are gender, age, job position, and level of education.

Table 4.1 Demographic Profiles Result

Variables		Frequency	Percentage (%)
Gender:	Male	143	35.8
	Female	257	64.3
	Total	**400**	**100**
Age:	Below 30	117	29.3
	30-40	169	42.3
	41-50	93	23.3

Table 4.1 (Continued)

Variables		Frequency	Percentage (%)
	Above 50	21	5.3
	Total	**400**	**100**
Job	Supporting Staff	62	15.5
Position:	Staff Manager	44	11
	Full-Time Lecturer	266	66.5
	Head of Department	28	7
	Assistant/Associate Dean/ Dean	0	0
	Assistant/Vice President/ President	0	0
	Total	**400**	**100**
Education:	Bachelor's Degree	67	16.8
	Master's Degree	261	65.3
	Doctoral Degree	72	18
	Total	**400**	**100**

The valid and usable sample for the SPSS analysis was 400 completed questionnaires (n = 400). The 40 incomplete questionnaires were removed. From the table, the majority of the respondents were female (n=257, 64.3%) and 35.8% were male (n=143).

The target respondents are faculty members and staff who work in the higher education institutions in Thailand. Therefore, most of the sample were aged 30-40 years old (n=169, 42.3%) followed by below 30 years old (n = 117, 29.3%) and 41-45 years old (n = 93, 23.3%) respectively. The majority of the results are faculty members and staff which ages between 30 - 40 years old and the minority are ages above 50 years old.

Most of the respondents' job positions were full-time lecturer (n = 266, 66.5%) and supporting staff (n = 62, 15.5%) follow by staff manager (n = 44, 11%) and head of department (n = 28, 7%). People holding high administrative positions

such as dean, vice president, and president did not participate in the data collection (n= 0, 0%).

For the level of education, the results show that the majority of respondents held Master's Degree (n=261, 65.3%), followed by Doctoral Degrees (n=72, 18%) and Bachelor's Degrees (n=67, 16.8%), respectively.

4.2 Descriptive Statistics for Communication Satisfaction

Table 4.2 The Mean Score of the Sub-Components of Communication Satisfaction

Communication Satisfaction	Mean	Std. Deviation
Extent to which the grapevine is active in our organization	3.9675	.75357
Extent to which horizontal communication with other faculty members is accurate and free-flowing.	3.9875	.68448
Extent to which communication practices are adaptable to emergencies/crises	3.8875	.72190
Extent to which my work group is compatible	3.8700	.77109
Extent to which informal communication is active and accurate	3.9025	.72754
Extent to which the organization's publications are interesting and helpful (e.g. memo, newsletter, bulletin board, intranet)	4.0075	.69545
Extent to which our meetings are well organized	3.8350	.74442
Extent to which written directives and reports are clear and concise	3.7575	.74167

Table 4.2 (Continued)

Communication Satisfaction	Mean	Std. Deviation
Extent to which the amount of communication in the organization is about right	3.7775	.72409
Information about organization policies and goals	3.8400	.66747
Information about government action affecting my organization	3.8725	.72288
Information about relations with unions/faculty senate	3.9025	.72754
Information about my progress in my job	3.8525	.71556
Information you receive about personal news	3.8800	.68686
Information about departmental policies and goals	3.8950	.67462
Information about the requirements of job	3.7950	.68127
Information about employee benefits and pay	3.8050	.71642
Extend to which organization communication motivates and stimulates an enthusiasm for meeting its goals	3.8050	.74724
Extend to which the people in my organization have great ability as communicators	3.8925	.68346
Extend to which the organization's communication makes me identify with it or feel a vital part of it	3.8200	.69195
Extend to which I receive on time the information needed to do my job	3.8250	.71810
Extend to which conflicts are handled appropriately through proper communication channels	3.8300	.73991
Information about how I am being judged	3.6275	.73491
Recognition of my efforts	3.9850	.82248

Table 4.2 (Continued)

Communication Satisfaction	Mean	Std. Deviation
Feedback on how problems in my job are being handled	3.9475	.81940
Extent to which my administrator listens and pays attention to me	4.1275	.70887
Extent to which my administrator offers guidance for solving job related problems	4.0900	.74383
Extent to which my administrator trusts me	4.2075	.78165
Extent to which my administrator is open to ideas	3.9600	.73808
Extent to which the amount of administrator given to me is about right	3.9250	.71460
Total	**3.8959**	**.41164**

The results show that most respondents were satisfied with the communication in their organization. The overall mean score of communication satisfaction is at the satisfied level (Mean = 3.8959). In detail, the highest satisfaction mean score is found in the extent to which my administrator trusts me (Mean = 4.2075), followed by the extent to which my administrator listens and pays attention to me (Mean = 4.1275), and the extent to which my administrator offers guidance for solving job related problems (Mean = 4.09). The lowest satisfied score was found in the information about how I am being judged (Mean = 3.6275).

4.3 Descriptive Statistics for Job Satisfaction

Table 4.3 The Mean Score of the Sub-Components of Job Satisfaction

Job Satisfaction	Mean	Std. Deviation
I feel I am being paid a fair amount for the work I do.	3.6600	.76214
Raises are suitable.	3.6875	.77869
I feel appreciated by the organization when I think about what they pay me.	3.7925	.76871
Those who do well on the job stand a fair chance of being promoted.	3.4775	.87258
People get ahead as fast here as they do in other places.	3.7950	.85428
I am satisfied with my chances for promotion.	3.8050	.84780
I am satisfied with the benefits I receive.	3.5050	.68274
The benefits we receive are as good as most other organizations offer.	3.5800	.64392
There are benefits we have which we should have.	3.5275	.64830
When I do a good job, I receive the recognition for it that I should receive.	3.3675	.77067
I do feel that the work I do is appreciated.	3.8525	.72253
There are rewards for those who work here.	3.6525	.64637
My administrator is quite competent in doing his/her job.	3.8075	.75953
My administrator is fair to me.	3.7550	.92581
I like my administrator.	3.7825	.71867
I like the people I work with.	3.8800	.81686
I enjoy my co-workers.	3.6375	.94516
There is no bickering and fighting at work.	3.9325	.84245

Table 4.3 (Continued)

Job Satisfaction	Mean	Std. Deviation
Many of our rules and procedures support doing a good job.	3.7300	.72000
I have appropriate tasks to do at work.	3.8025	.78743
I have appropriate paperwork.	3.8650	.68039
I feel my job is meaningful.	3.6575	.72906
I like doing the things I do at work.	3.9125	.71493
I feel a sense of pride in doing my job.	3.8250	.78799
Communications seem good within this organization.	3.5125	1.00866
The goals of this organization are clear to me.	3.0300	1.07097
Work assignments are fully explained.	3.0650	1.07874
Total	**3.6629**	**.31645**

The results show that most respondents are satisfied with their job because the overall mean score of job satisfaction is 3.6629. The highest mean score is found in there is no bickering and fighting at work (Mean = 3.9325), followed by I like doing the things I do at work (Mean = 3.9125), and I have appropriate paperwork (Mean = 3.865). The lowest mean score was found in the goals of this organization are clear to me (Mean = 3.03).

4.4 Descriptive Statistics for Employee Engagement

Table 4.4 The Mean Score of the Sub-Components of Employee Engagement

Employee Engagement	Mean	Std. Deviation
I focus hard on my work.	3.7950	.74118
I concentrate on my work.	3.7475	.76499
I pay a lot of attention to my work.	3.6825	.82060
I share the same work values as my colleagues.	4.0375	.71229
I share the same work goals as my colleagues.	4.0350	.74172
I share the same work attitudes as my colleagues.	3.5575	1.09987
I feel positive about my work.	3.5275	1.07103
I feel energetic in my work.	3.5225	1.02817
I am enthusiastic in my work.	3.9625	.76653
Total	**3.7631**	**.55625**

The results shows that most respondents have high engagement with the organization they work for (Mean = 3.7631). The highest engagement was found in I share the same work values as my colleagues (Mean = 4.0375), followed by I share the same work goals as my colleagues (Mean = 4.035), and I am enthusiastic in my work (Mean = 3.9625). The lowest engagement was found in I feel energetic in my work (Mean = 3.5225).

4.5 Descriptive Statistics for Job Performance

Table 4.5 The Mean Score of the Sub-Components of Job Performance

Job Performance	Mean	Std. Deviation
The quality of your work is better than what it should have been.	3.6900	.83705
I managed to plan my work so that it was done on time.	4.0350	.85475
I kept in mind the results that I had to achieve in my work.	3.9800	.83447
I was able to perform my work well with minimal time and effort.	3.9575	.86751
I was able to fulfill my responsibilities.	4.0075	.78357
Collaboration with others went well.	4.0300	.79730
I came up with creative ideas at work.	3.9600	.82164
I worked at keeping my job knowledge up-to-date.	3.7300	.85670
I recovered fast after difficult situations or setbacks at work.	3.6400	.75287
I came up with creative solutions to new problems.	3.7250	.86675
I easily adjusted to changes in my work.	3.7750	.71810
I focused on the positive aspects of a work situation, instead of on the negative aspects.	3.7850	.74172
I spoke with colleagues about positive aspects of my work.	3.8725	.82337
I spoke with people from outside the organization about the positive aspects of my work.	3.7700	.76391
I harmonized with my colleagues, chairperson, or dean.	3.6675	.9658
Total	**3.8417**	**.41624**

The results show that most respondents perform well in their tasks. The overall mean score of job performance is 3.8417. The highest mean score is found in I managed to plan my work so that it was done on time (Mean = 4.035), followed by collaboration with others went well (Mean = 4.03), and I was able to fulfill my responsibilities (Mean = 4.0075). The lowest job performance score was found in I recovered fast after difficult situations or setbacks at work (Mean = 3.64).

4.6 Factor Analysis

Factor analysis was applied to explore the patterns among a set of correlated variables in this study. Factor analysis has been described as the process utilized to find the patterns in correlations among variables. Vogt (2007) said factor analysis is used to cluster the variables into proper groups, referred to as factors.

According to Vogt (2007), there are two major types of factor analysis: exploratory factor analysis (EFA) and confirmatory factor analysis (CFA). Exploratory factor analysis (EFA) emphasizes finding structures or correlations patterns from the data. Confirmatory Factor Analysis (CFA) helps researchers find patterns of correlation among data and explain the items. The main objective of this analysis is used to link variables together in factors. Those variables must be related to each other. It has been suggested that the correlation coefficients should be larger than 0.30 in social research and less than 0.50 is to be removed from further analysis. The study usually permitted a factor loading of 0.50 and above to be used in the analysis. In addition, any variables which are not related with other variables should be removed from the analysis. The researcher has to ensure that the correlation matrix does not possess the highly undesirable properties of multicollinearity or singularity. Multicollinearity implies a condition where the variables are very highly correlated. Singularity refers to the event of some variables being exactly linear. Kinnear and Gray (2004) said that communality is related to reliability and the factors emerging from the factor analysis.

Table 4.6 KMO and Bartlett's Test for Communication Satisfaction

Item : Communication Satisfaction	No. of item	KMO	Bartlett's Test
Organizational Integration	7		
Horizontal Communication	5		
Media Quality	4	0.898	0.000
Organizational Perspective	3		
Personal Feedback	2		
Supervisory communication	2		

Table 4.7 Results from Factor Analysis of Communication Satisfaction

Variable (a)	Name of Composite Variable/ Question No.	Communalities	Varimax Solution
Communication Satisfaction	(Alpha = 0.912)		
	Extent to which horizontal communication with other faculty members is accurate and free-flowing./Q6	0.653	0.768
	Extent to which communication practices are adaptable to emergencies/crises/Q7	0.648	0.753
	Extent to which my work group is compatible/Q8	0.599	0.602
	Extent to which informal communication is active and accurate/Q9	0.614	0.710

Table 4.7 (Continued)

Variable (a)	Name of Composite Variable/ Question No.	Communalities	Varimax Solution
	Extent to which the organization's publications are interesting and helpful (e.g. memo, newsletter, bulletin board, intranet)/Q10	0.586	0.595
	Extent to which our meetings are well organized/Q11	0.559	0.526
	Extent to which written directives and reports are clear and concise/Q12	0.697	0.579
	Extent to which the amount of communication in the organization is about right/Q13	0.718	0.668
	Information about relations with unions/faculty senate/Q16	0.537	0.567
	Information you receive about personal news/Q18	0.567	0.698
	Information about departmental policies and goals/Q19	0.557	0.674
	Information about the requirements of job/Q20	0.683	0.684
	Information about employee benefits and pay/Q21	0.586	0.708
	Extend to which organization communication motivates and stimulates an enthusiasm for meeting its goals/Q22	0.648	0.725

Table 4.7 (Continued)

Variable (a)	Name of Composite Variable/ Question No.	Communalities	Varimax Solution
	Extend to which the people in my organization have great ability as communicators/Q23	0.595	0.565
	Extend to which the organization's communication makes me identify with it or feel a vital part of it/Q24	0.539	0.646
	Information about how I am being judged/Q27	0.642	0.719
	Recognition of my efforts/Q28	0.789	0.814
	Feedback on how problems in my job are being handled/Q29	0.809	0.847
	Extent to which my administrator offers guidance for solving job related problems/Q31	0.772	0.838
	Extent to which my administrator trusts me/Q32	0.772	0.819
	Extent to which my administrator is open to ideas/Q33	0.704	0.725
	Extent to which the amount of administrator given to me is about right/Q34	0.772	0.794

Table 4.8 Factor Analysis for Communication Satisfaction

Communication Satisfaction	OI	HC	MQ	OP	PF	SC
Extend to which organization communication motivates and stimulates an enthusiasm for meeting its goals	0.725					
Information about employee benefits and pay	0.708					
Information you receive about personal news	0.698					
Information about the requirements of job	0.684					
Information about departmental policies and goals	0.674					
Extend to which the organization's communication makes me identify with it or feel a vital part of it	0.646					
Extend to which the people in my organization have great ability as communicators	0.565					
Extent to which horizontal communication with other faculty members is accurate and free-flowing.		0.768				
Extent to which communication practices are adaptable to emergencies/crises		0.753				
Extent to which informal communication is active and accurate		0.710				
Extent to which my work group is compatible		0.602				

Table 4.8 (Continued)

Communication Satisfaction	OI	HC	MQ	OP	PF	SC
Extent to which the organization's publications are interesting and helpful (e.g. memo, newsletter, bulletin board, intranet)		0.595				
Information about how I am being judged			0.719			
Extent to which the amount of communication in the organization is about right			0.668			
Extent to which written directives and reports are clear and concise			0.579			
Extent to which our meetings are well organized			0.526			
Extent to which the amount of administrator given to me is about right				0.794		
Extent to which my administrator is open to ideas				0.725		
Information about relations with unions/faculty senate				0.567		
Feedback on how problems in my job are being handled					0.847	
Recognition of my efforts					0.814	
Extent to which my administrator offers guidance for solving job related problems						0.838
Extent to which my administrator trusts me						0.819

Table 4.8 (Continued)

Communication Satisfaction	OI	HC	MQ	OP	PF	SC
Total Variance Explained	35.19%	8.39%	7.04%	5.43%	4.95%	4.41%

Note: **OI** means Organizational Integration

   HC means Horizontal Communication

   MQ means Media Quality

   OP means Organizational Perspective

   PF means Personal Feedback

   SC means Supervisory Communication

Table 4.9 KMO and Bartlett's Test for Job Satisfaction

Item : Job Satisfaction	No. of item	KMO	Bartlett's Test
Supervision	4		
Co-Worker	4		
Communication	3		
Operating Procedures	3		
Fringe Benefits	3	0.720	0.000
Contingent Rewards	3		
Promotion	3		
Pay	2		

Table 4.10 Results from Factor Analysis of Job Satisfaction

Variable (a)	Name of Composite Variable/ Question No.	Communalities	Varimax Solution
Job Satisfaction	(Alpha = 0.771)		
	I feel I am being paid a fair amount for the work I do./Q35	0.676	0.559
	Raises are suitable./Q36	0.730	0.836
	I feel appreciated by the organization when I think about what they pay me./Q37	0.745	0.847
	People get ahead as fast here as they do in other places./Q39	0.856	0.881
	I am satisfied with my chances for promotion./Q40	0.776	0.857
	I am satisfied with the benefits I receive./Q41	0.653	0.803

Table 4.10 (Continued)

Variable (a)	Name of Composite Variable/ Question No.	Communalities	Varimax Solution
	The benefits we receive are as good as most other organizations offer./Q42	0.665	0.787
	There are benefits we have which we should have./Q43	0.593	0.761
	When I do a good job, I receive the recognition for it that I should receive./Q44	0.647	0.752
	I do feel that the work I do is appreciated./Q45	0.728	0.823
	There are rewards for those who work here./Q46	0.726	0.708
	My administrator is quite competent in doing his/her job./ Q47	0.707	0.817
	My administrator is fair to me./ Q48	0.640	0.692
	I like my administrator. / Q49	0.680	0.760
	I like the people I work with./ Q50	0.618	0.707
	I enjoy my co-workers./Q51	0.543	0.596
	There is no bickering and fighting at work./Q52	0.695	0.776
	Many of our rules and procedures support doing a good job./Q53	0.638	0.677
	I have appropriate tasks to do at work./Q54	0.811	0.844

Table 4.10 (Continued)

Variable (a)	Name of Composite Variable/ Question No.	Communalities	Varimax Solution
	I have appropriate paperwork./ Q55	0.766	0.787
	I feel my job is meaningful./Q56	0.677	0.806
	I feel a sense of pride in doing my job./Q58	0.773	0.679
	Communications seem good within this organization./Q59	0.600	0.738
	The goals of this organization are clear to me./Q60	0.684	0.806
	Work assignments are fully explained./Q61	0.605	0.664

Table 4.11 Factor Analysis for Job Satisfaction

Job Satisfaction	SUP	COW	COM	OPE	FRI	CON	PRO	PAY
My administrator is quite competent in doing his/her job.	0.817							
I like my administrator.	0.760							
My administrator is fair to me.	0.692							
Many of our rules and procedures support doing a good job.	0.677							
I feel my job is meaningful.		0.806						
There is no bickering and fighting at work.		0.776						
I like the people I work with./Q50		0.707						
I enjoy my co-workers.		0.596						
The goals of this organization are clear to me.			0.806					
Communications seem good within this organization.			0.738					
Work assignments are fully explained.			0.664					
I have appropriate tasks to do at work.				0.844				

Table 4.11 (Continued)

Job Satisfaction	SUP	COW	COM	OPE	FRI	CON	PRO	PAY
I have appropriate paperwork.				0.787				
I feel a sense of pride in doing my job.				0.679				
I am satisfied with the benefits I receive.					0.803			
The benefits we receive are as good as most other organizations offer.					0.787			
There are benefits we have which we should have.					0.761			
I do feel that the work I do is appreciated.						0.823		
When I do a good job, I receive the recognition for it that I should receive.						0.752		
There are rewards for those who work here.						0.708		
People get ahead as fast here as they do in other places.							0.881	
I am satisfied with my chances for promotion.							0.857	
I feel I am being paid a fair amount for the work I do.							0.559	

57

Table 4.11 (Continued)

Job Satisfaction	SUP	COW	COM	OPE	FRI	CON	PRO	PAY
I feel appreciated by the organization when I think about what they pay me.								0.847
Raises are suitable.								0.836
Total Variance Explained	19.26%	10.51%	8.91%	8.17%	7.03%	5.39%	5.10%	4.54%

Note: **SUP** means Supervision

COW means Co-Worker

COM means Communication

OPE means Operating Procedures

FRI means Fringe Benefits

CON means Contingent Rewards

PRO means Promotion

PAY means Pay

Table 4.12 KMO and Bartlett's Test for Employee Engagement

Item : Employee Engagement	No. of item	KMO	Bartlett's Test
Affective Engagement	4	0.727	0.000
Intellectual Engagement	3		

Table 4.13 Results from Factor Analysis of Employee Engagement

Variable (a)	Name of Composite Variable/ Question No.	Communalities	Varimax Solution
Employee Engagement	(Alpha = 0.766)		
	I focus hard on my work./Q62	0.591	0.750
	I concentrate on my work. Q63	0.709	0.831
	I pay a lot of attention to my work. /Q64	0.564	0.747
	I share the same work goals as my colleagues./Q66	0.617	0.692
	I share the same work attitudes as my colleagues./Q67	0.650	0.780
	I feel positive about my work./ Q68	0.627	0.781
	I feel energetic in my work./Q69	0.629	0.792

Table 4.14 Factor Analysis for Employee Engagement

Employee Engagement	AE	IE
I feel energetic in my work.	0.792	
I feel positive about my work.	0.781	
I share the same work attitudes as my colleagues.	0.780	
I share the same work goals as my colleagues.	0.692	
I concentrate on my work.		0.831
I focus hard on my work.		0.750
I pay a lot of attention to my work.		0.747
Total Variance Explained	42.75%	19.91%

Note: **AE** means Affective Engagement

　　　　IE means Intellectual Engagement

Table 4.15 KMO and Bartlett's Test for Job Performance

Item : Job Performance	No. of item	KMO	Bartlett's Test
Adaptive Performance	4		
Task Performance	2		
Contextual Performance	2	0.583	0.000
Counterproductive Work Behavior	2		

Table 4.16 Results from Factor Analysis of Job Performance

Variable (a)	Name of Composite Variable/ Question No.	Communalities	Varimax Solution
Job Performance	(Alpha = 0.683)		
	I kept in mind the results that I had to achieve in my work./Q73	0.832	0.902
	I was able to perform my work well with minimal time and effort./Q74	0.775	0.843
	I was able to fulfill my responsibilities./Q75	0.735	0.831
	Collaboration with others went well./Q76	0.796	0.861
	I worked at keeping my job knowledge up-to-date./Q78	0.574	0.705
	I recovered fast, after difficult situations or setbacks at work./Q79	0.611	0.718
	I came up with creative solutions to new problems./Q80	0.674	0.684
	I easily adjusted to changes in my work./Q81	0.650	0.779
	I spoke with colleagues about positive aspects of my work./Q83	0.754	0.848
	I harmonized with my colleagues, chairperson, or dean./Q85	0.679	0.771

Table 4.17 Factor Analysis for Job Performance

Job Performance	AP	TP	CP	CWB
I easily adjusted to changes in my work.	0.779			
I recovered fast, after difficult situations or setbacks at work.	0.718			
I worked at keeping my job knowledge up-to-date.	0.705			
I came up with creative solutions to new problems.	0.684			
I kept in mind the results that I had to achieve in my work.		0.902		
I was able to perform my work well with minimal time and effort.		0.843		
Collaboration with others went well.			0.861	
I was able to fulfill my responsibilities.			0.831	
I spoke with colleagues about positive aspects of my work.				0.848
I harmonized with my colleagues, chairperson, or dean.				0.771
Total Variance Explained	27.42%	19.05%	14.06%	10.26%

Note: **AP** means Adaptive Performance

TP means Task Performance

CP means Contextual Performance

CWB means Counterproductive Work Behavior

The study used principle component extraction and the varimax rotation technique for factor analysis. The results of this factor analysis found both high and low loadings generated. Any factor which lowers than 0.5 was removed from the analysis. Only factor which value higher than 0.5 was kept in further analysis.

Therefore, some initial variables were removed and some required re-grouping to ensure the validity of factors. Cronbach's Alpha was utilized again to ensure the reliability of the revised variables (Kinnear & Grey, 2004).

After factor analysis of communication satisfaction, the Alpha value is 0.912. Then seven questions on communication satisfaction; Q5, Q14, Q15, Q17, Q25, Q26, Q30 were removed because of communalities and the varimax solution value being lower than 0.5. After that, there was re-grouping. Organization integration (OI) consists of seven composite variables, Horizontal Communication (HC) has five composite variables, Media Quality (MQ) consists of four composite variables, Organizational Perspective (OP) has three composite variables, Personal Feedback (PF) has two composite variables, and lastly Supervisory Communication (SC) consists of two composite variables. The total variance of OI, HC, MQ, OP, PF, and SC are 35.19%, 8.39%, 7.04%, 5.43%, 4.95%, and 4.41%, respectively.

The Alpha value of factor analysis of job satisfaction is 0.771. Two questions of job satisfaction, Q38 and Q57, were removed based on communalities and the varimax solution value being lower than 0.5. Then there was regrouping. Supervision (SUP) has four composite variables, Co-Worker (COW) consists of four composite variables, Communication (COM) has three composite variables, Operating Procedures (OPE) has three composite variables, Fringe Benefits (FRI) has three composite variables, Contingent Rewards (CON) has three composite variables, Promotion (PRO) has three composite variables, and finally Pay (PAY) has two composite variables. The total variance of SUP, COW, COM, OPE, FRI, CON, PRO, and PAY are 19.26%, 10.51%, 8.91%, 8.17%, 7.03%, 5.39%, 5.1%, and 4.54%, respectively.

Thirdly, the Alpha value of factor analysis for employee engagement is 0.766. Two employee engagement questions were removed based on communalities and the varimax solution value being lower than 0.5, Q65 and Q70. Then there was regrouping. Affective Engagement (AE) has four composite variables and Intellectual Engagement (IE) consists of three composite variables. The total variance of AE is 42.75% and IE is 19.91%.

Finally the Alpha value for job performance is 0.683. Five questions of job performance were removed based on communalities and the varimax solution value

being lower than 0.5. Q71, Q72, Q77, Q82, and Q84 were removed. After that, there was re-grouping. Adaptive Performance (AP) has four composite variables, Task Performance (TP) has two composite variables, Contextual Performance (CP) has two composite variables, and Counterproductive Work Behaviour (CWB) has two composite variables. The total variance of AP, TP, CP, and CWB are 27.42%, 19.05%, 14.06%, and 10.26% respectively.

Table 4.18 Initial and Revised Factors of Communication Satisfaction, Job Satisfaction, Employee Engagement, and Job Performance

Initial Factors	No. of Question	Revised Factors	No. of Question
Communication Satisfaction	30	Communication Satisfaction	23
Job Satisfaction	27	Job Satisfaction	25
Employee Engagement	9	Employee Engagement	7
Job Performance	15	Job Performance	10

The table above presents the initial and revised factors. There are four main factors which are communication satisfaction, job satisfaction, employee engagement, and job performance. At the beginning there were 81 questions about these four variables. Then 16 questions were removed based on principle component extraction and varimax rotation technique (Kinnear & Grey, 2004).

The initial factors of communication satisfaction were 30 items. After factor loading and analysis, seven questions were removed and only 23 items were used in further analysis. In the same way, two questions of job satisfaction were removed and only 25 items were used. For employee engagement, the initial factors were nine items then two of them were taken away and only seven questions were utilized. Lastly, the initial job performance factors were 15 items and five of them were deleted.

4.7 Correlations

In order to interpret the results of communication satisfaction, job satisfaction, employee engagement, and job performance by Person product moment correlation coefficient, it is important to understand the negative and positive signs and the size value of correlation. The sign of Pearson's Correlation indicates the direction of correlation between two variables: an independent variable and a dependent variable. If the sign is positive, it shows a positive correlation between two variables. On the other hand, if the sign is negative, it presents the negative correlation between both variables. The results of this study have only positive correlations. In addition, the size value indicates the strength of the relationships. A value between 0.10-0.29 shows a weak relationship, 0.30-0.49 means a medium relationship, and 0.50-1.0 presents a strong relationship (Pallant, 2010). The table below shows the relationship of communication satisfaction, job satisfaction, employee engagement, and job performance.

Table 4.19 Pearson's Correlation Coefficient

Variables	Mean	SD	Communication Satisfaction	Job Satisfaction	Employee Engagement	Job Performance
Communication Satisfaction	3.894	0.426	1			
Job Satisfaction	3.660	0.317	0.234**	1		
Employee Engagement	3.695	0.586	0.305**	0.697**	1	
Job Performance	3.839	0.423	0.198**	0.474**	0.538**	1

Note: *$p < 0.05$, ** $p < 0.01$

To examine the correlation between variables in this study, it is necessary to test that each variable is independent. The table above shows the Pearson's correlations for all the independent variables values are between 0.198 and 0.697. The values do not exceed 0.8; therefore, independence is confirmed (Cooper & Schindler, 2006).

The correlations of communication satisfaction, job satisfaction, employee engagement, and job performance are all significant at $p < 0.01$. The correlations of communication satisfaction and job performance have a weak relationship at $r = 0.198$, $p < 0.01$ and communication satisfaction and job satisfaction also have a weak relationship at $r = 0.234$, $p < 0.01$. In addition, the correlation of communication satisfaction and employee engagement, and job satisfaction and job performance have a relationship at a medium level at $r = 0.305$, $p < 0.01$ and $r = 0.474$, $p < 0.01$, respectively. Finally, the correlations of employee engagement and job performance, and job satisfaction and employee engagement have a strong relationship at $r = 0.538$, $p < 0.01$ and $r = 0.697$, $p < 0.01$, respectively. The weakest relationship was found between communication satisfaction and job performance ($r = 0.198$, $p < 0.01$). On the other hand, the strongest relationship was job satisfaction and employee engagement ($r = 0.697$, $p < 0.01$).

4.8 Hypotheses Testing

As mentioned previously, this research is treated as interval data. The table below illustrates the simple and multiple linear regression analysis of hypotheses testing in this study. Pallant (2010) claimed that if the significance value (p-value) is greater than 0.05, it statistically results in no significance. On the other hand, if the significance value (p-value) is 0.05 or lower than 0.05, it statistically proves significance.

In this research, there are six main hypotheses which must be tested. Firstly, the simple linear regression between communication satisfaction (independent variable) and job satisfaction (dependent variable) was tested. Secondly, multiple linear regressions were tested between communication satisfaction (independent variable) and job satisfaction (independent variable) toward employee engagement

(dependent variable). Thirdly, the multiple linear regressions of all independent variables, namely, communication satisfaction, job satisfaction, and employee engagement toward job performance were tested.

Table 4.20 Simple and Multiple Regression Analysis

Independent Variable		Dependent Variable		
		Model 1 **Job Satisfaction**	**Model 2** **Employee Engagement**	**Model 3** **Job Performance**
Communication Satisfaction	β	0.234**	0.150**	0.033
	SE	0.036	0.050	0.044
	t	4.802	4.133	0.744
Job Satisfaction	β		0.662**	0.191**
	SE		0.067	0.078
	t		18.243	3.284
Employee Engagement	β			0.394**
	SE			0.043
	t			6.632
Constant / Sig.		2.981 / 0.000**	-1.580 / 0.000**	1.728 / 0.000**
R Square		0.055	0.507	0.309
Adjusted R Square		0.052	0.504	0.304
SEE		0.309	0.413	0.353
F / Sig.		23.062 / 0.000**	203.744 / 0.000**	59.040 / 0.000**

Note: *$p < 0.05$, **$p < 0.01$

In the table above, Model 1 shows the simple regression analysis between communication satisfaction (independent variable) and job satisfaction (dependent variable). The results show there is a statistically significant impact of communication satisfaction towards job satisfaction ($p < 0.01$, $\beta = 0.234$, $t = 4.802$). Adjusted R Square is 0.052. It implies that communication satisfaction can predict job satisfaction at 5.2%. F was 23.062.

Equation1:

Job Satisfaction = 2.981 + 0.234** (Communication Satisfaction)
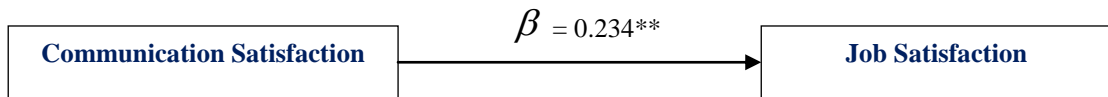
Figure 4.1 Research Model 1

Multiple regression analysis was done in Model 2 and Model 3. Model 2 presents the statistically significant impact of communication satisfaction (independent variable) and job satisfaction (independent variable) towards employee engagement (dependent variable) at $p < 0.01$. Communication satisfaction had a positive impact on employee engagement ($p < 0.01$, $\beta = 0.150$, $t = 4.133$) and job satisfaction had a positive impact on employee engagement ($p < 0.01$, $\beta = 0.662$, $t = 18.243$). Adjusted R Square is 0.504. It implies that communication satisfaction and job satisfaction can predict employee engagement at 50.4%. F was 203.744.

Equation 2:

Employee Engagement = -1.580 + 0.150** (Communication Satisfaction) + 0.662** (Job Satisfaction)
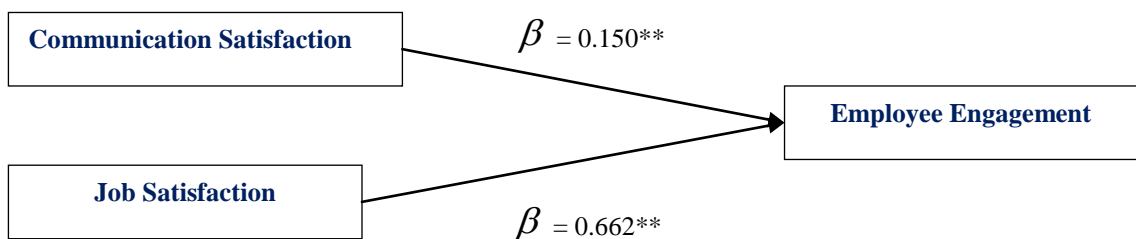
Figure 4.2 Research Model 2

Model 3 applied multiple regression analysis of all independent variables, namely, communication satisfaction, job satisfaction, and employee engagement towards job performance. However, not all independent variables are statistically significant. Job satisfaction and employee engagement are statistically positive

significant with job performance at p < 0.01. In contrast, communication satisfaction was not statistically positively significant because the p-value is above 0.05. Communication satisfaction had no positive impact on job performance (p > 0.05, β = 0.033, t = 0.744). Job satisfaction had a positive impact on job performance (p < 0.01, β = 0.191, t = 3.284) and employee engagement had a positive impact on job performance (p < 0.01, β = 0.394, t = 6.632). Adjusted R Square is 0.304. It implies that communication satisfaction, job satisfaction, and employee engagement can predict job performance at 30.4%. F was 59.040.

Equation 3:

Job Performance = 1.728 + 0.033 (Communication Satisfaction) + 0.191** (Job Satisfaction) + 0.394** (Employee Engagement)
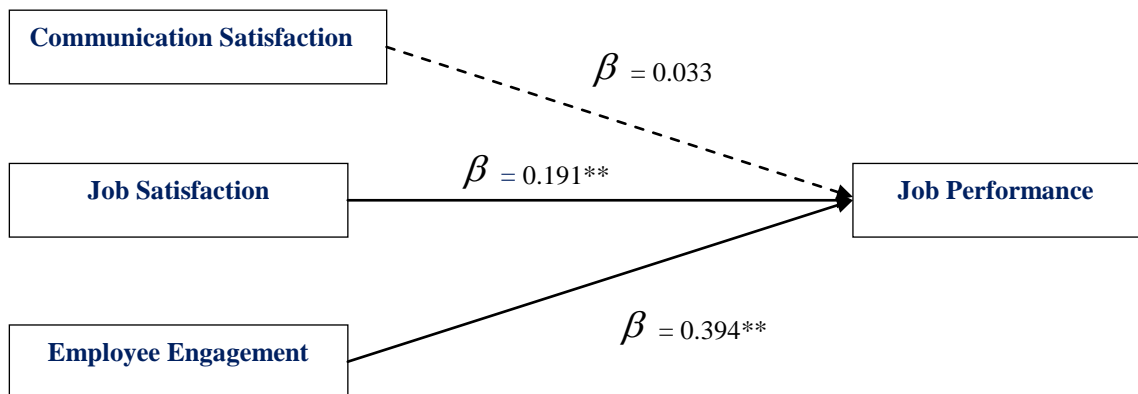
Figure 4.3 Research Model 3

Table 4.21 Hypotheses Summary

	Hypotheses	Result
H1:	Communication satisfaction has a positive impact on employee engagement.	Accept
H2:	Communication satisfaction has a positive impact on job satisfaction.	Accept
H3:	Communication satisfaction has a positive impact on job performance.	Reject
H4:	Employee engagement has a positive impact on job performance.	Accept
H5:	Job Satisfaction has a positive impact on employee engagement.	Accept
H6:	Job Satisfaction has a positive impact on job performance.	Accept

From the table which presented above, there are six hypotheses in this study. It can be concluded that five of six hypotheses in this research are supported. The hypothesis 1, 2, 4, 5, and 6 are accepted ($p < 0.01$). However, only hypothesis 3 was rejected ($p > 0.01$).

4.9 Significant Factors in Research Model
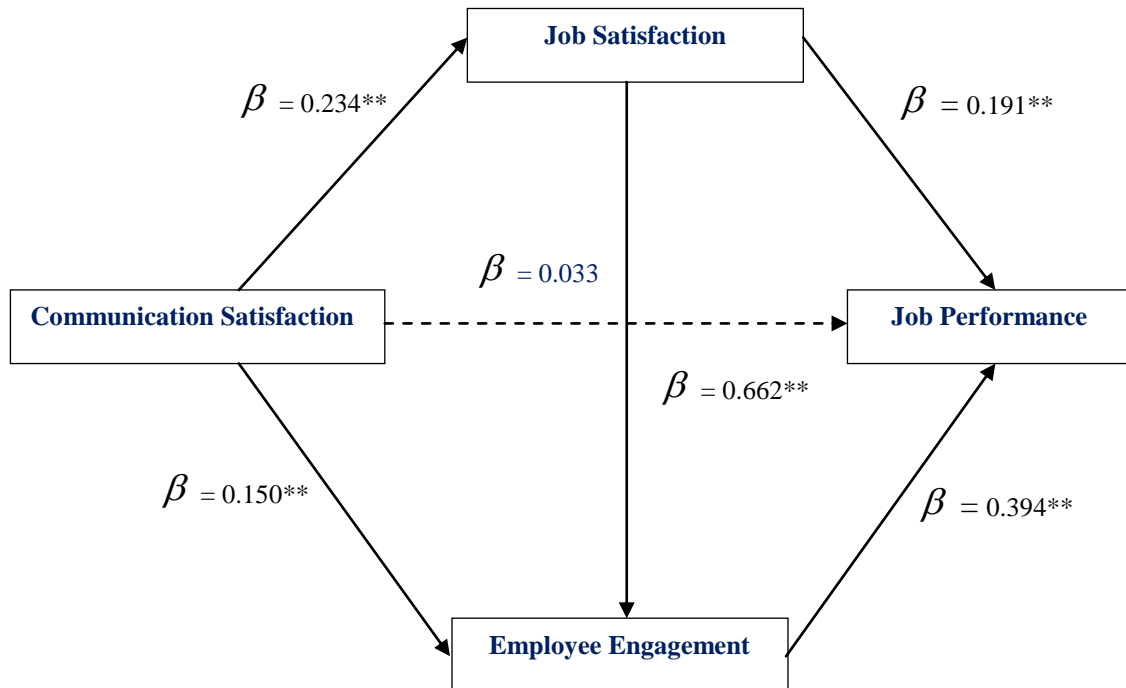
Figure 4.4 Research Model

Note: *p < 0.05, **p < 0.01

- - - - - - ▸ Means reject the hypothesis

─────────▸ Means accept the hypothesis

CHAPTER 5

DISCUSSION AND CONCLUSION

From the previous chapter, it can be seen that the data analysis which researcher generated are the useful information to achieve the research objectives. This section purposes to discuss the data analysis. In this chapter, the demographic data of faculty members and staff in higher education institutions will be described. Then communication satisfaction, job satisfaction, employee engagement, and job performance will be discussed. The results of hypotheses testing will also be analyzed.

5.1 General Discussion

The result illustrated that the majority of the respondents in the analysis were female. It shows that most of the faculty members and staff who work in Thai higher education institution are female rather than male. The result is supported by the data of Higher Education Commission statistics in 2017. Then focusing on the age group of participants in this study, the target respondents are faculty members and staff who work in the higher education institution in public and private university in Thailand which aged 30-40 or below 30. Only one in four was 41-50 years old or above 50. Most of the respondents were full-time lecturers follow by supporting, staff managers, and heads of department. All of them had Master's Degrees, Doctoral Degrees, or Bachelor's Degrees.

Focusing on communication satisfaction, the research found that faculty members and staff were satisfied with communication in their organization. This communication satisfaction includes overall dimension of horizontal communication, media quality, organizational perspective, organization integration, personal feedback, and supervisory communication. The highest communication satisfaction level was found in the extent to which employees trust to communicate with their

administrators. This implies that faculty members and staff give importance to trust and reliability when they have to communication to people in higher positions in their workplace such as department chairperson, dean, and president. Generally, trust is a social context which has several connotations. It typically refers to one party being willing to reply to the action of another party. It contributes to relationships between people. Uncertainty situation involves when the risk of failure or harm to the employee if administrator does not behave to believe what employees communicate. Another point to concern is the extent to which administrator listens and pay attention to employee and the extent to which administrator offers guidance for solving job related problems. It has proved that faculty members and staff give importance to vertical communication which means sending and receiving messages correctly between different hierarchy levels, downward or upward. This may be because of people who work in higher education institutions are professionals. Therefore, they concern on share governance and trust of communication between hierarchy levels. In contrast, the lowest satisfied score was found with the information about how they are being judged. Feedback is very sensitive for faculty members and staff in Thai higher education institutions. This makes communication in education organizations different from other organization.

Additionally, the result presented that faculty members and staff are also satisfied with their duties in term of supervision, co-workers, communication, operating procedures, fringe benefits, contingent rewards, promotion, and pay. However, the lowest satisfaction was found with the goals of the organization being clear to employees. This may be because of changes in Thai higher education institution in the last ten years. The most satisfaction was found with there being no bickering and fighting at work and doing things they like to do at work.

Concerning on employee engagement, they also had strong engagement with their organizations. This includes affective engagement and intellectual engagement. It is an active stage associated with high level of cognitive activities and efforts. Affective engagement includes the extent to which one experience states positive affect relating to one's work role. Intellectual engagement defines as the extent to which one is intellectually pay attention in work and always think about how to improve work. The highest engagement in the study was found in sharing the same

work values with colleagues, sharing same work goals, and being enthusiastic at work. More engaged employees will perform the better in their jobs. Moreover, employee engagement generates a positive cycle of cognition and emotion which improves work performance. These positive emotions are likely to interact with personal intent, actions, and behavior within the workplace.

Respondents had high performance levels for adaptive, task, contextual performance, and counterproductive work behavior. The research focuses on individual work performance across occupational sectors. The highest score for job performance level was found in managing and planning work to be done on time, then collaboration with others went well, and was able to fulfill all responsibilities. It shows the high responsibilities, well design, and skillfully planning of faculty members and staff who work in higher education institution in Thailand. Effective performance of educators is crucial for improving the education system as a whole. In fact, it is the outcome which every organization expects from employees and it has proved that job satisfaction and employee engagement lead to job performance.

The research shows the correlations of four main factors: communication satisfaction, job satisfaction, employee engagement, and job performance. They are all correlated. Each variable is independent.

5.2 Discussion of Hypotheses Testing and Model Significance

The results from the previous chapter showed the statistical significant and insignificant data of hypotheses testing and research model. This section explains the links and correlations apparent in this study. The research provided regression analysis of communication satisfaction, employee engagement, job satisfaction, and job performance where communication satisfaction was assigned to be the independent variable towards job satisfaction (Model 1), then communication satisfaction and job satisfaction were considered to be independent variables towards employee engagement (Model 2), and finally communication satisfaction, employee engagement, and job satisfaction were applied to be independent variables towards job performance (Model 3). The hypotheses in the model claim communication satisfaction has a positive impact on employee engagement, communication

satisfaction has a positive impact on job satisfaction, communication satisfaction has a positive impact on job performance, employee engagement has a positive impact on job performance, job satisfaction has a positive impact on employee engagement, and job satisfaction has a positive impact on job performance.

The research results show that there is a statistically positive impact from communication satisfaction on employee engagement. Communication satisfaction in Thai higher education institutions leads to increased employee engagement. It can be analyzed that if people in the same organization communicate and understand each other, both at the same and different levels of hierarchy, it can improve engagement between employees. Iyer and Israel (2012) supported the same result that organization communication satisfaction has a positive impact on employee engagement because communication plays an important part in ensuring employee engagement. It has been established that honest, clear, and concise communications are crucial tools for employee engagement. This means lack of communication and poor communication leads to dissatisfaction, distrust, skepticism, doubtfulness, and unwanted employee turnover. Additionally, managerial communication can reduce the negative effects of downsizing. It becomes very important for employees to believe in their organization. Carriere and Bourque (2009) also proved that communication satisfaction and employee engagement are positively related. Goris (2007) said that higher level of communication satisfaction leads to higher employee satisfaction. Moreover, Pincus (1986), Gregson (1987) indicated a positive relationship between communication satisfaction and organizational effectiveness, organizational commitment, and turnover level.

The research suggests a statistically positive impact of communication satisfaction on job satisfaction. It can be inferred that when people in an organization communicate satisfactorily with all hierarchy levels, it increases job satisfaction. Open communication between employees and management makes a better working environment (Pettit et al., 1997). The better the supervisor communicates, the more informed and satisfied employees are, and the greater the productivity. Failure in communication seems to create negative side effects. According to Downs (1988), communication satisfaction and job satisfaction are positively correlated. Berman and

Hellweg (1989), King, Lahiff, and Hatfield (1998), Carriere and Bourque (2009), and Alhassan, Ghazali, and Isha (2017) also supported this result.

In contrast, this research shows that there is no evidence to support a positive impact of communication satisfaction on job performance. This result contradicts some former research by Pincus (1986), Miles, Patrick, and King (1996), and Gilley (2001). They claimed that poor employee communication satisfaction leads to low commitment from employees, high levels of absenteeism, increased employee turnover, and decreased productivity. This could arise from differences in terms of organizational context. Academic organizations are totally dissimilar to other business organizations (Orozco & Allison, 2008). The result may also be because the effect is not big enough to be anything other than a chance finding. Secondly, communication satisfaction does not play a key role in supporting job performance in the investigated organizations. This is because faculty members and staff already know well what they have to do (Alsayed, Motaghi, & Osman, 2012). Therefore, communication satisfaction does not affect their performance as professionals.

The research results also show a positive impact of employee engagement on job performance. This can mean that when employees engage with the organization, they tend to perform better in their tasks. Rich, Lepine, and Crawford (2010) mentioned that employee engagement serves as a crucial mechanism through which the antecedents of engagement affect job performance and that engagement among employees can enhance performance. Engaged employees perform better. Hakanen, Schaufeli, and Ahola (2008) said that engagement led to better innovativeness through greater personal initiative. Therefore, engagement can influence organizational success through outstanding job performance.

A statistically positive impact from job satisfaction was found on employee engagement. It suggests that, when employees are satisfied with their tasks, it creates engagement with their organization. Satisfaction is generally about happiness with the company and benefits. Engagement occurs after employees feel a profound connection to their company. Ni (2007) said when employees are satisfied with their work they are likely to commit to a long-term relationship with an organization. A sense of accomplishment and a willingness to go above and beyond with the

organization occurs as a result of commitment. Thus the engagement of an employee can be predicted by well-being and job satisfaction.

Finally, the analysis shows a positive impact from job satisfaction on job performance. Performance is influenced by various factors especially job satisfaction. Thus, job performance is a crucial parameter in the academic profession as in other professions (Kahya, 2007) and this phenomenon is extensively observed (Nabirye, Brown, Pryor, & Maples, 2011). Satisfied workers take actions to attain higher performance and eliminate lower performance. Dissatisfied employees will have low levels of performance, be demotivated, and be less productive. Platis, Reklitis, and Zimeras (2015) said performance depends on level of satisfaction and Suker et al. (2016) also mentioned that employee satisfaction is a key factor influencing employee performance and organization success.

5.3 Managerial Implications

The results from this research have managerial implications for Thai higher education institutions management regarding interventions to enhance the work competencies of their faculty members and staff. The implication can be classified in as follows.

5.3.1 Communication Satisfaction towards Job Satisfaction

Educational organization should utilise communication satisfaction concepts as strategic options to deliver messages to segmented employees in order to make them highly satisfied with their duties. Administrators should keep lines of communication open and receive feedback from employees by applying an open-door policy for employees. They should build positive relationships and create organizational integration in all hierarchy levels by using appropriate media for messages. This would reduce uncertainty in the minds of employees about their work, increase job satisfaction, and reduce attrition of faculty members and staff. Communication in an organization is built on interpersonal trust and it can impact overall employee satisfaction. The results suggest that communication satisfaction is a

key competency that they need to develop to enhance job satisfaction of faculty members and staff.

5.3.2 Communication Satisfaction and Job Satisfaction toward Employee Engagement

Communication satisfaction and job satisfaction are crucial factors in employee engagement. Job satisfaction should be the main focus for administrators to create higher employee engagement. The policy build up for job satisfaction in higher education in Thailand is suggested to cover all dimensions of pay, promotion, fringe benefits, contingent rewards, supervision, co-workers, operating procedures, and nature of work. Employee satisfaction needs to be treated with both short and long term measures because it is directly link to employee and organization match and it is important for employees to perceive workplace in positive attitude since the early years of employment. It classifies as an important part of an employee's lifecycles and motivation to maintain loyalty to an organization. Communication satisfaction in all hierarchy levels in higher education institutions needs to be developed to make employees stay longer with organizations and feel satisfied with their tasks, for example; build personal relationships, encourage feedback, and foster team communication.

5.3.3 Job Satisfaction and Employee Engagement toward Job Performance

Job satisfaction and employee engagement leads to job performance. Job satisfaction and employee engagement should be the focus of increasing job performance of faculty members and staff in Thailand. Generally, performance is influenced by various factors but research suggests that employee engagement is one of the most crucial factors. If administrators can increase engagement among faculty members and staff, higher education institution will perform better and improve the academic system in Thailand. These implications aim to develop capacity of work, operating mechanisms, organizational development, and human relations. These create the key process to support employees to come together and take effective action for better performance. People who are satisfied with their work and have well-

being of engaging to other colleagues tend to be more productive than who are not. Therefore, developing faculty members and staff satisfaction and increasing engagement brings organizational success.

5.4 Academic Implications

The study sought to respond to a number of research questions and hypotheses related to how knowledge of communication satisfaction, job satisfaction, employee engagement, and job performance is understood, performed and enacted in everyday working practices in higher education institutions in Thailand. The main aim of this study was to address the almost total lack of academic research evidence. The study, therefore, serves as a means of empirically validating the understanding of concepts and theories expressed in various literatures from Thai higher education institutions. With the associated resources reorganization in term of communication especially in the education sectors, it will become imperative for organizations to guarantee that their most valued personnel are fully engaged (Wetherell, 2002; Iyer & Israel, 2012; Abdullah & Hui, 2014; Demirtas, 2010). The research underlines the significance academic implication of social penetration theory. The social penetration concept suggested that employee should disclose more information and to obtain greater stability and relationship satisfaction. It is the process of relationship development in an organization and the communication satisfaction starts from this point of self-disclosure and relationship development. In addition, communication satisfaction is built on a sense of willingness to communicate to exchange idea, organizational commitment, and achieve organizational objectives and goals.

Accordingly, the first major practical contribution of the research is that it provides much needed empirical data on the actual satisfaction and performance of faculty members and staff in Thai higher education institutions. The research results were tested and proved existing theories about social penetration, the linkage of communication satisfaction, job satisfaction, employee engagement, and job performance. A second important academic implication of this study derives the finding on the uniqueness of work satisfaction in education institutions. When developing an academic organization, it is important for faculty members and staff to

understand about the evolving, changing workplace and the skills needed to be successful.

5.5 Research Limitations

Even though this research has revealed some of the crucial issue of communication satisfaction, employee engagement, job satisfaction, and job performance in higher education institution in Thailand, there were some limitations which researcher did not explore during this study. Some of those limitations were mainly because the restrictions in resources during the research process which included time constraints and budget limitations.

Furthermore, this research covered only four higher education institutions in Thailand. The research does not cover every university in Thailand. Additionally, another limitation of this study was due to the scope of the research itself, which did not include every university in Thailand.

5.6 Recommendations for Further Studies

As mentioned previously, the study of quantitative methods have various limitations. The target of this research only included faculty members and staff at Thai public and private universities. In order to make the research more accurate and generalizable, a larger sample size should be drawn.

To further study deeply, it is necessary to better understand communication satisfaction in other factors. Further studies should also be conducted with a focus on other factors such as type of human communication, communication direction, and communication in organizational culture. Additionally, this research focuses only on Thai public and private universities. Further research should expand the scope of the study in different context in order to gain wider points of communication satisfaction which lead to employee engagement, job satisfaction, and job performance. This will be advantages to understand more about organization internally. Furthermore, further research could be in different countries and organizations.

5.7 Research Conclusions

The major objectives of this research were to investigate the importance of communication satisfaction, employee engagement, job satisfaction, and job performance in higher education institutions in Thailand. Moreover, the research was an attempt to apply the theory of social penetration and human communication. All the factors of communication satisfaction, employee engagement, job satisfaction, and job performance are necessary for organizational development especially in higher education institutions. The research developed a model which was derived from social penetration theory, communication satisfaction, employee engagement, job satisfaction, and job performance concepts. The information was gained from faculty members and staff in Thailand. The research methodology employed quantitative methods which investigated the relationships and impacts among variables. The research results revealed that five of the hypotheses were accepted. It proved that communication satisfaction impacts job satisfaction, communication satisfaction and job satisfaction impact employee engagement, and job satisfaction and employee engagement impact job performance. In contrast, there is no evidence that communication satisfaction impacts job performance. These results contribute to well-being of human relations, work satisfaction, engagement, performance, and organizational development in higher education institutions.

BIBLIOGRAPHY

Aaker, D. A., Kumar, V., & Day, G. S. (2001). *Market research* (7th ed.). New York NY: John Wiley & Sons.

Abdullah, Z., & Hui, J. (2014). The relationship between communication satisfaction and teachers' job satisfaction in the Malaysian primary school. *Asian Journal of Humanities and Social Sciences (AJHSS)*, *2*(2), 58-71.

Abraham, S. (2012). Job satisfaction as an antecedent to employee engagement. *SIES Journal of Management,* 8(2), 27-36.

Akkirman, A. D., & Harris, D. L. (2005). Organizational communication satisfaction in the virtual workplace. *Journal of Management Development,* 24(5), 397-409.

Alhassan, M. A., Ghazali, Z., & Isha, A. N. S. (2017). Relationship between organizational communication and job satisfaction in temporary work environment: An empirical study of plant turnaround workers. *Global Business and Management Research: An International Journal, 9*(1), 73-84.

Ali, A., & Haider, J. (2012). Impact of internal organizational communications on employee job satisfaction-case of some Pakistani banks. *Global Advanced Research Journal, 1,* 38-44.

Altman, I., & Taylor, D. (1973). Social penetration: The development of interpersonal relationships. New York, NY: Holt, Rinehart and Winston.

Alsayed, A. K., Motaghi, M. H., & Osman, I. B. (2012). The use of the multifactor leadership questionnaire and communication satisfaction questionnaire in Palestine: A research note. *International Journal of Scientific and Research Publications*, *2*(11), 1-9.

Anderson, C. M., & Martin, M. M. (1995). The effects of communication motives, interaction involvement, and loneliness on satisfaction: A model of small groups. *Small Group Research, 26,* 118-137.

Argenti, P. A. (1998). Strategic employee communication. *Human Resource Management, 37*(3-4)*,* 199-206.

Avtgis, T. A., & Taber, K. R. (2006). I laughed so hard my side hurts, or is that an ulcer?" The influence of work humor on job stress, job satisfaction, and burnout among print media employees. *Communication Research Reports, 23*(1), 13-18.

Awamleh, R., & Gardner, W. L. (1999). Perceptions of leader charisma and effectiveness: The effects of vision content, delivery, and organizational performance. *The Leadership Quarterly, 10*(3), 345-373. doi: 10.1016/S10489843(99)00022-3

Awang, Z., Ahmad, J. H., & Zin, N. M. (2010). Modelling job satisfaction and work commitment among lecturers: A case of UiTM Kelantan. *Journal of Statistical Modeling and Analytics, 1*(2), 45-59.

Bakker, A. B., Schaufeli, W. B., Leiter, M. P., & Taris, T. W. (2008). Work engagement: An emerging concept in occupational health psychology. *Work & Stress, 22*(3), 187-200.

Balakrishnan, C., & Masthan, D. (2013). Impact of internal communication on employee engagement: A study at Delhi International Airport. *International Journal of Scientific and Research Publications, 3*(8), 1-13.

Barakat, L. L., Lorenz, M. P., Ramsey, J. R., & Cretoiu, S. L. (2015). Global managers: An analysis of the impact of cultural intelligence on job satisfaction and performance. *International Journal of Emerging Markets, 10*(4), 781-800.

Bartels, J., Pruyn, A., Jong, M. D., & Joustra, I. (2006). Multiple organizational identification levels and the impact of perceived external prestige and communication climate, *Journal of Organizational Behavior, 28*(2), 173-190.

Bates, S. (2004). Cetting Engaged. *HR Magazine,* 49(2), 44-51.

Batsis, T. M. (1987). Characteristics of excellent principals. *Paper presented at the annual meeting of the National Catholic Educational Association,* New Orleans.

Beri, G. C. (2008) *Marketing research* (4th ed.). New Dheli: Tata Mc-Graw Hill.

Berman, S., & Hellweg, S. (1989). Perceived supervisor communication competence and supervisor satisfaction as a function of quality circle participation. *Journal of Business Communication, 26*(2), 103-122.

Bhuvanaiah, T., & Raya, R. P. (2014). Employee engagement: Key to organizational success. *SCMS Journal of Indian Management, 11*(4), 61-71.

Bordia, P., Hobman, E., Jones, L., Gallois, C., & Callan, V. (2004). Uncertainty during organizational change: Types, consequences and management strategies. *Journal of Business and Psychology, 18*(4), 507-532.

Borman, W. C., & Motowidlo, S. J. (1997). Task performance and contextual performance: The meaning for personnel selection research. *Human Performance, 10*(2), 99-109.

Breckenridge, M. B. (2000). *An exploration of the factors that influence leadership effectiveness in a corporate environment.* Indiana, PA: Indiana University of Pennsylvania.

Brown, S. P., & Peterson, R. A. (1994). The effect of effort on sales performance and job satisfaction. *The Journal of Marketing, 58*(2), 70-80.

Brunetto, Y., & Farr-Wharton, R. (2006). The importance of effective organizational relationships for nurses: A social capital perspective. *International Journal of Human Resource Development and Management, 6*(2), 232-247.

Brunetto, Y., Teo, S. T. T., Shacklock, K., & Farr-Wharton, R. (2012). Emotional intelligence, job satisfaction, well-being and engagement: Explaining organisational commitment and turnover intentions in policing. *Human Resource Management Journal, 22*(4), 428-441. doi: 10.1111/j.1748-8583.2012.00198.x

Bryman, A., & Bell, E. (2011). *Business research methods* (3rd ed.). New York: Oxford University Press.

Bulutlar, F., & Kamaşak, R. (2008). The relationship between organizational communication and job Satisfaction: An empirical study of blue collar workers. *Dumlupınar Üniversitesi Sosyal Bilimler Dergisi*, *22*(2), 129-141.

Carriere, J., & Bourque, C. (2009). The effects of organizational communication on job satisfaction and organizational commitment in a land ambulance service and the mediating role of communication satisfaction. *Career Development International, 14*(1), 29-49. doi: 10.1108/13620430910933565

Chen, J., Silverthorne, C., & Hung, J. (2006). Organization communication, job stress, organizational commitment, and job performance of accounting professionals in Taiwan and America. *Leadership & Organization Development Journal, 27*(4), 242-249.

Churchill, G. A., & Brown, T. J. (2004). *Basic Marketing Research.* 5th edn. Ohio: Thomson, South-Western.

Clampitt, P. G. (2005). *Communicating for managerial effectiveness.* Thousand Oaks, CA: Sage.

Clampitt, P. G., & Downs, C. W. (1993). Employee perceptions of the relationship between communication and productivity: A field study. *The Journal of Business Communication, 30*(1)*,* 5-28.

Colquitt, J., Lepine, J. A., Wesson, M. J., & Gellatly, I. R. (2011). *Organizational behavior: Improving performance and commitment in the workplace*. New York: McGraw-Hill Irwin.

Cooper, D. R., & Schindler, P. S. (2006). *Business research methods* (11th ed.). Homewood, III: Irwin.

Cooren, F. (1999). *The organizing property of communication.* Amsterdam: John Benjamins.

Crino, M. D., & White, M. C. (1981). Satisfaction in communication: An examination of the Downs-Hazen Measure. *Psychological Reports, 49*(3), 831-838.

De Nobile, J. J., & McCormick, J. (2005). Job satisfaction and occupational stress in Catholic primary schools. *Paper Presented at the Annual Conference of the Australian Association for Research in Education.Sydney, November 27th-December 1st*.

Demirtas, Z. (2010). Teachers' job satisfaction levels. *Procedia Social and Behavioral Sciences*, *9,* 1069-1073.

Den Hartog, D. N., & Verburg, R. M. (1997). Charisma and rhetoric: Communicative techniques of international business leaders. *The Leadership Quarterly*, *8*(4), 355-391. doi: 10.1016/S1048-9843(97)90020-5

DeVellis, R. F. (2003). *Scale development: Theory and applications* (2nd ed.). California: Sage.

Dirks, K. T., & Ferrin, D. (2002). Trust in leadership: Meta-analytic findings and implications for research and practice. *Journal of Applied Psychology, 87*(4), 611-628.

Downs, C. W. (1988). *Communication audits.* Glenview, IL: Scott, Foresman.

Downs, C. W., & Adrian, A. D. (2004). *Assessing organizational communication.* London: Guilford.

Downs, C. W., & Hazen, M. D. (1977). A factor analytic study of communication satisfaction. *Journal of Business Communication, 14*(3), 63-73.

Downs, C. W., DeWine, S., & Greenbaum, H. H. (1994). Measures of organizational communication. In R. B. Rubin, P. Palmgreen, & H. E. Sypher (Eds.), *Communication Research Measures* (pp. 57-78). New York: Guilford Press.

Duke, P. O. (1981). *Communication satisfaction of business education teachers in an urban school system* (Unpublished doctoral dissertation). Vanderbilt University, Nashville.

Duncan, T., & Moriarty, S. E. (1998). A communication-based marketing model for managing relationships. *Journal of Marketing, 62*(2), 1-13.

Easterby-Smith, M., Thorpe, R., & Jackson, P. R. (2008). *Management research* (3rd ed.). London: Sage.

Ehlers, L. N. (2003). *The relationship of communication satisfaction, job satisfaction, and self-reported absenteeism* (Unpublished master's thesis). Miami University, Coral Gables.

Engin, E., & Akgoz, B. E. (2013). The effect of communication satisfaction on organizational commitment. *British Journal of Arts and Social Sciences, 14*(2), 109-124.

Fairhurst, G. T. (1993). The leader-member exchange patterns of women leaders in industry: A discourse analysis. *Communication Monographs*, *60*(4), 321-351. doi: 10.1080/03637759309376316

Falcione, R. L. (1974a). Communication climate and satisfaction with immediate supervisor. *Journal of Applied Communication Research, 2*(1)*,* 13-20.

Falcione, R. L. (1974b). Credibility: Qualifier of subordinate participation. *Journal of Business Communication, 11*(3), 43-54.

Fink, A. (2003) *The survey handbook* (2nd ed.). California: Sage.

Fisher, D. C. (2003). Why do lay people believe that satisfaction and performance are correlated? Possible sources of a commonsense theory. *Journal of Organizational Behavior, 24*(6), 753-777.

Frese, M., Beimel, S., & Schoenborn, S. (2003). Action training for charismatic leadership: Two evaluations of studies of a commercial training module on inspirational communication of a vision. *Personnel Psychology, 56*(3), 671-697. doi: 10.1111/j.1744-6570.2003.tb00754.x

The Gallup Organization, (2005). *Employee engagement: The employee side of human sigma equation.* Retrieved from https://www.coursehero.com/file/ p5v7or8/Gallup-2005-Employee-Engagement-The-Employee-side-of-the-Human-Sigma-Equation/

Gallup. (2008). Gallup study: Engaged employees inspire company innovation: National survey finds that passionate workers are most likely to drive organisations forward. Retrieved from http://gmj.gallup.com/content/ 24880/Gallup-Study-Engaged-Employees-Inspire-Company.aspx.

Gilley, J. W. (2001). Taming the organization. *Human Resource Development International*, *4*(2), 217-233.

Goris, J. R. (2007). Effects of satisfaction with communication on the relationship between individual-job congruence and job performance/satisfaction. *Journal of Management Development, 26*(8), 737-752.

Gray, J., & Laidlaw, H. (2002). Part-time employment and communication satisfaction in an Australian retail organization, *Employee Relations, 24*(2), 211-228.

Greenbaum, H. H., Clampitt, P., & Willihnganz, S. (1988). Organisational communication: An examination of four instruments. *Management Communication Quarterly*, *2*(2), 245-282.

Gregson, T. (1987). *An empirical investigation of the relationship between communication satisfaction, job satisfaction, turnover, and performance for public accountants* (Unpublished doctoral dissertation). University of Arkansas, Fayetteville.

Gregson, T. (1990). The separate constructs of communication satisfaction and job satisfaction. *Educational and Psychological Measurement, 51(*1), 39-48.

Grunig, J. E. (1992). Symmetrical systems of internal communication. In J. Grunig (Ed.), *Excellence in public relations and communication management* (pp. 531-576). Hillsdale, NJ: Lawrence Erlbaum.

Grunig, L. A., Grunig, J. E., & Dozier, D. (2002). *Excellent public relations and effective organizations: A study of communication management in three countries.* Mahwah, NJ: Lawrence Erlbaum.

Gu, Z., & Chi Sen Siu, R. (2009). Drivers of job satisfaction as related to work performance in Macao casino hotels: An investigation based on employee survey. *International Journal of Contemporary Hospitality Management*, *21*(5), 561-578.

Gülnar, B. (2007). The relationship between communication satisfaction and job satisfaction: A survey mmong Selcuk unıversity research assistants. *Fifth International Symposium Communication in The Millenium, May 16-18 2007*, Bloomington-United States of America: Indiana University School of Journalism.

Hakanen, J. J., Schaufeli, W. B., & Ahola, K. (2008). The job demands-resources model: A three-year cross-lagged study of burnout, depression, commitment, and work engagement. *Work & Stress*, *22*(3), 224-241.

Halbesleben, J. R. B., & Wheeler, A. R. (2008). The relative roles of engagement and embeddedness in predicting job performance and intention to leave. *Work and Stress, 22*(3), 242-256.

Hamilton, S. (1987). *A communication audit handbook.* New York: Pitman.

Harter, J. K., Schmidt, F. L., & Hayes, T. L. (2002). Business-unit-level relationship between employee satisfaction, employee engagement, and business outcomes: a meta-analysis. *Journal of Applied Psychology*, *87*(2), 268-279. doi: 10.1037//0021-9010.87.2.268

Heath, R. L. (1994). *Management of corporate communication.* Hillsdale, NY: Lawrence Erlbaum Associates.

Hecht, M. L. (1978). Measures of communication satisfaction. *Human Communication Research, 4*(4), 350-368.

Hecht, M. L., & Sereno, K. K. (1985). Interpersonal communication satisfaction: Relationship to satisfaction with self and other. *Communication Research Reports*, *2*(1), 141-148.

Hilgermann, R. H. (1998). *Communication satisfaction, goal setting, job satisfaction, concertive control, and effectiveness in self-managing teams* (Doctoral dissertation). University of Maine, Orono.

Hung, C. J. F. (2006). Toward the theory of relationship management in public relations: How to cultivate quality relationship? In E. L. Toth (Ed.), *The future of excellence in public relations and communication management* (pp. 443-476). Mahwah, NJ: Lawrence Erlbaum.

Hunt, O., Tourish, D., & Hargle, O. (2000). The communication experiences of education managers: Identifying strengths, weaknesses and critical incidents. *International Journal of Educational Management*, *14*(3), 120-129. doi: 10.1108/09513540010322393

Iyer, S., & Israel, D. (2012). Structural equation modeling for testing the impact of organization communication satisfaction on employee engagement. *South Asian Journal of Management, 19*(1), 51-58.

Jalalkamali, M., Ali, A. J., Hyun, S. S., & Nikbin, D. (2016). Relationships between work values, communication satisfaction, and employee job performance. *Management Decision, 54*(4), 796-814. doi: 10.1108/MD-01-2015-0003

Jankingthong, K., & Rurkkhum, S. (2012). Factors affecting job performance: a review of literature. *Silpakorn University Journal of Social Sciences, Humanities, and Arts, 12*(2), 115-127.

Janssen, O., & Van Yperen, N. W. (2004). Employees' goal orientations, the quality of leader member exchange, and the outcomes of job performance and job satisfaction. *Academy of Management Journal, 47*(3), 368-384.

Jenkins, R., & Jensen, B. (2010). How to climb down from top-down leadership. *Academe, 96*(3), 24-27.

Kanokkan, Anukansai. (2001). *An analysis and synthesis of community business in Thailand* (Doctor dissertation). National Institute of Development Administration, Bangkok.

Kahn, W. A. (1990). Psychological conditions of personal engagement and disengagement at work. *Academy of Management Journal, 33*(4), 692-724.

Kahya, E. (2007). The effects of job characteristics and working conditions on job performance. *International Journal of Industrial Ergonomics, 37*(6), 515-523.

King, W., Lahiff, J., & Hatfield, J. (1988). A discrepancy theory of the relationship between communication and job satisfaction. *Communication Research Reports, 5*(1), 36-43.

Kinnear, P. R., & Gray, C. D. (2004). *SPSS 12 made simple.* New York: Psychology Press.

Kirkpatrick, S. A., & Locke, E. A. (1996). Direct and indirect effects of three core charismatic leadership components on performance and attitudes. *Journal of Applied Psychology*, *81*(1), 36-51.

Klemmer, E.T., & Snyder, F.W. (1972). Measurement of time spent communicating. *Journal of Communication, 22*(2), 142-158.

Koopmans, L., Bernaards, C., Hildebrandt, V., Van Buuren, S., Van Der Beek, A. J., & De Vet, H. C. (2012). Development of an individual work performance questionnaire. *International journal of productivity and performance management*, *62*(1), 6-28.

Kumar, B. P., & Giri, V. N. (2009). Examining the relationship of organizational communication and job satisfaction in Indian organizations. *Journal of Creative Communications, 4*(3), 177-184. doi: 10.1177/097325861000400303

Lee, Y. (1989). *A study of the relationship between communication and job satisfaction among faculty at the junior colleges of technology in Republic of China* (Unpublished doctoral dissertation). Drake University, Des Moines.

Locke, E. A. (1976). *The nature and causes of job satisfaction.* In M. D. Dunnette (Ed.), *Handbook of industrial and organizational psychology* (pp. 1297-1349). Chicago: Rand McNally.

Madlock, P. E. (2006). Do differences in displays of nonverbal immediacy and communicator competence between male and female supervisors affect subordinates, job satisfaction. *Ohio Communication Journal*, *44*(5), 61-77.

Madlock, P. E. (2006b). Supervisors'nonverbal immediacy behaviors and their relationship to subordinates'communication satisfaction, job satisfaction, and willingness to collaborate. *Paper Presented at the National Communication Association Convention,* San Antonio.

Madlock, P. E. (2008a). *Communication competence, the key to leadership, conflict management, and employee job satisfaction.* Retrieved from http://www.allacademic.com//meta/p_mla_apa_research_citation/2/4/5/3/1/pa ges245310/p245310-1.php

Madlock, P. E. (2008b). Employee satisfaction: An examination of supervisors' communication competence. *Human Communication, 11*(1), 87-100.

Madlock, P. E. (2008c). The link between leadership style, communicator competence, and employee satisfaction. *Journal of Business Communication, 45*(1), 61-78. doi: 10.1177/0021943607309351

Markos, S., & Sridevi, M. S. (2010). Employee engagement: The key to improving performance. *International Journal of Business Management, 5*(12), 89-96.

Markovits, Y., Boer, D., & Van Dick, R. (2014). Economic crisis and the employee: The effects of economic crisis on employee job satisfaction, commitment, and self-regulation. *European Management Journal, 32*(3), 413-422.

Mathieu, J. E., & Zadjac, D. M. (1990). A review and meta-analysis of the antecedents, correlates, and consequences of organizational commitment. *Psychological Bulletin, 108*(2), 171-194.

Mazzei, A. (2014). Internal communication for employee enablement: Strategies in American and Italian companies. *Corporate Communications: An International Journal*, *19*(1), 82-95. doi: 10.1108/CCIJ-08-2012-0060

Meintjes, C., & Steyn, B. (2006). A critical evaluation of the downs-hazen instrument (CSQ) by measuring employee communication satisfaction at a private higher education institution in South Africa. *Communicatio, 32*(1), 152-188. doi: 10.1080/02500160608537968

Men, L. R. (2014). Strategic internal communication: Transformational leadership, communication channels, and employee satisfaction. *Management Communication Quarterly, 28*(2), 264-284. doi: 10.1177/0893318914524536

Miles, E. W., Patrick, S. L., & King, W. C. (1996). Job level as a systemic variable in predicting the relationship between supervisory communication and job satisfaction. *Journal of Occupational and Organizational Psychology, 69*(3), 277-292.

Miller, W. H., Kerr, B., & Ritter, G. (2008). School performance measurement: Politics and equity. *American Review of Public Administration, 38*(1), 100-117.

Mintzberg, H. (1973). *The nature of managerial work.* New York, NY: Harper & Row.

Motowidlo, S. J. (2003). Job performance. In W. C. Borman, D. R. Ilgen, & R. J. Klimoski (Eds.), *Handbook of psychology: Industrial and organizational psychology* (Vol. 12, pp.39-53). New York, NY: Wiley.

Motowidlo, S. J., Borman, W. C., & Schmit, M. J. (1997). A theory of individual differences in task and contextual performance. *Human Performance, 10*(2), 71-83.

Moynihan, D. P., & Pandey, S. K. (2007). Finding workable levers over work motivation comparing job satisfaction, job involvement, and organizational commitment. *Administration & Society*, *39*(7), 803-832.

Muchinsky, P. M. (1993). *Psychology applied to work* (4th ed.). Pacific Grove: Brooks/Cole.

Mustamil, N., Yazdi, A. M. T., Saw, S. S., & Ali, M. A. M. (2014). A dimensional analysis of the relationship between communication satisfaction and turnover intention: The Mediating Role of Organizational Commitment, *International Journal of Business and Management, 9*(9), 75-85.

Nabirye, R. C., Brown, K. C., Pryor, E. R. & Maples, E. H. (2011) Occupational stress, job satisfaction, and job performance among hospital nurses in Kampala, Uganda. *Journal of Nursing Management*, *19,* 760-768.

Nash, J. G., & Carver, R. H. (2005). *Doing data analysis with SPSS version 12.0.* Belmont, CA: Thomson/Brooks/Cole.

Ni, L. (2007). Refined understanding of perspectives on employee-organization relationships: Themes and variations. *Journal of Communication Management, 11*(1), 53-70.

Nicholson, J. H. (1980). *Analysis of communication satisfaction in an urban school system* (Unpublished doctoral dissertation). University of Kansas, Man Huston.

Orozco, L., & Allison, B. (2008). Looking within: Examining positive relationships and healthy organizational cultures in departments of educational leadership. *Educational Leadership and Administration: Teaching and Program Development, 20,* 64-76.

Orpen, C. (1997). The interactive effects of communication quality and job involvement on managerial job satisfaction and work motivation. *The Journal of Psychology, 131*(5), 519-522.

Pallant, J. (2010). *SPSS, survival manual* (4th ed.). Berkshire: McGraw-Hill Education.

Parasuraman, A., Grewal, D., & Krishnan, R. (2004). *Marketing research.* Boston, MA: Houghton Mifflin Company.

Petit, J. D., Goris, J. R., & Vaught, B. (1997). An examination of organizational communication as a moderator of the relationship between job performance and job satisfaction. *The Journal of Business Communication, 34*(1), 81-98. doi: https://doi.org/10.1177/002194369703400105

Pincus, J. D. (1986). Communication satisfaction, job satisfaction and job performance. *Human Communication Research, 12*(3), 395-419. doi: 10.1111/j.1468-2958.1986.tb00084.x

Platis, C., Reklitis, P., & Zimeras, S. (2015). Relation between job satisfaction and job performance in healthcare services. *Procedia-Social and Behavioral Sciences*, *175*, 480-487.

Punyanunt-Carter, N. M. (2008). Using equity theory to examine relationship maintenance and satisfaction in father-daughter relationships. *Human Communication*, *11*(1), 161-176.

Putti, J. M., Aryee, S., & Phua, J. (1990). Communication relationship satisfaction and organizational commitment. *Group & Organizational Studies, 15*(1), 44-52.

Qian, Y., & Daniels, T. D. (2008). A communication model of employee cynicism toward organizational change. *Corporate Communications, 13*(3), 319-332. doi: http://dx.doi.org/10.1108/13563280810893689

Quick, J. C., & Macik-Frey, M. (2004). Behind the mask: Coaching through deep interpersonal communication. *Consulting Psychology Journal: Practice and Research, 56*(2), 67-74.

Rains, S. A., Brunner, S. R., & Oman, K. (2016). Self-disclosure and new communication technologies: The implications of receiving superficial self-disclosures from friends. *Journal of Social and Personal Relationships, 33*(1), 42-61.

Redding, W. C. (1978). *Communication within the organization.* New York, NY: Industrial Communication Council.

Remenyi, D., Williams, B., Money, A., & Swartz, E. (1998). *Doing research in business and management: An introduction to process and method.* London: Sage.

Rich, B. L., Lepine, J. A., & Crawford, E. R. (2010). Job engagement: Antecedents and effects on job performance. *Academy of Management Journal, 53*(3), 617-635.

Richmond, V. P., & McCroskey, J. C. (2000). The impact of supervisor and subordinate immediacy on relational and organizational outcomes. *Communication Monographs, 67*(1), 85-95.

Richmond, V. P., & McCroskey, J. C. (2009). *Organizational communication for survival: making work, work,* Boston, MA: Pearson/Ally & Bacon.

Richmond, V. P., McCroskey, J. C., Davis, L. M., & Koontz, K. A. (1980). Perceived power as a mediator of management style and employee satisfaction: A preliminary investigation. *Communication Quarterly, 28*(4), 37-46.

Riggio, R. E., Riggio, H. R., Salinas, C., & Cole, E. J. (2003). The role of social and emotional communication skills in leader emergence and effectiveness. *Group Dynamics: Theory, Research, and Practice, 7*(2), 83-103.

Riketta, M. (2008). The causal relation between job attitudes and performance: A meta-analysis of panel studies. *Journal of Applied Psychology, 93*(2), 472-481. doi: 10.1037/0021-9010.93.2.472.

Robbins, S., Judge, T. A., Millett, B., & Boyle, M. (2013). *Organisational behavior.* Midland, AU: Pearson Higher Education.

Roberts, K. H., & O'Reilly, C. A. (1979). Some correlations of communication roles in organizations, *Academy of Management Journal, 22*(1), 42-57.

Robinson, D., Perryman, S., & Hayday, S. (2004). *The drivers of employee engagement.* Retrieved from https://www.employment-studies.co.uk/system/files/resources/files/408.pdf

Robson, P., & Tourish, D. (2005). Managing internal communication: an organizational case study. *Corporate Communications: An International Journal*, *10*(3), 213-222. doi: 10.1108/13563280510614474

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*, *87*(1), 66-80.

Saks, A. M. (2006). Antecedents and consequences of employee engagement. *Journal of Managerial Psychology, 27*(7), 600-619.

Salanova, M., Agut, S. & Peiro´, J. M. (2005). Linking organizational resources and work engagement to employee performance and customer loyalty: The mediation of service climate. *Journal of Applied Psychology, 90*(6), 1217-1227.

Saunders, M., Lewis, P., & Thornhill, A. (2009). *Research methods for business students* (5th ed.). Essex: Prentice Hall.

Scheff, T. (1967). Toward a sociological model of consensus. *American Sociological Review, 32*(1), 32-46.

Schermerhorn, J. R. (1996). *Management and organizational behavior.* New York: Wiley.

Schwartzman, H. B. (1989). *The meeting: Gatherings in organizations and communities.* New York: Plenum.

Schweiger, D. M., & Denisi, A. S. (1991). Communication with employees following a merger: A longitudinal field experiment. *Academy of Management Journal*, *34*(1), 110-135.

Sekaran, U., & Bougie, R. (2010). *Research methods for business* (5th ed.). West Sussex: John Wiley and Sons.

Sempane M., Rieger H. S., & Roodt G. (2002). Job satisfaction in relation to organizational culture, *Journal of Industrial Psychology, 28*(2), 23-30.

Shaikh, M. A., Bhutto, N. A., & Maitlo, Q. (2012). Facets of job satisfaction and its association with performance. *International Journal of Business and Social Science, 3*(7), 322-326.

Silayoi, P., & Speece, M. (2007). The importance of packaging attributes: A conjoint analysis approach. *European Journal of Marketing, 41*(11), 1495-1517.

Singh, R., & Das, G. (2013). The impact of job satisfaction, adaptive selling behaviors and customer orientation on salesperson's performance: Exploring the moderating role of selling experience. *Journal of Business & Industrial Marketing, 28*(7), 554-564.

Smith, Z. A., & Wolverton, M. (2010). Higher education leadership competencies: Quantitatively refining a qualitative model. *Journal of Leadership & Organizational Studies, 17*(1), 61-70. doi: 10.1177/1548051809348018

Soane, E., Truss, C., Alfes, K., Shantz, A., Rees, C., & Gatenby, M. (2012). Development and application of a new measure of employee engagement: The ISA Engagement Scale. *Human Resource Development International*, *15*(5), 529-547.

Spangler, W. D., & House, R. J. (1991). Presidential effectiveness and the leadership motive profile. *Journal of Personality and Social Psychology, 60*(3), 439-455.

Spector, P. E., & Wimalasiri, J. (1986). A cross-cultural comparison of job satisfaction dimensions in the United States and Singapore. *Applied Psychology*, *35*(2), 147-158.

Steele, G. A., & Plenty, D. (2015). Supervisor-subordinate communication competence and job and communication satisfaction. *International Journal of Business Communication, 52(3),* 294-318. doi: 10.1177/2329488414525450

Suker, I. K., Bir, C. S., Engin, E., & Akgoz, B. E. (2016). Employee satisfaction: communication competence and leadership oriented approach. *International Journal of Innovative Research & Development, 5*(5), 194-202.

Taylor, D. A., & Altman, I. (1975). Selfdisclosure as a function of reward-cost outcomes. *Sociometry*, 38(1), 18-31.

Taylor, D. A., & Altman, I. (1987). Communication in interpersonal relationships: Social penetration processes. In M. E. Roloff & G. R. Miller (Eds.), *Interpersonal processes: New directions in communication research* (pp. 257-277). Thousand Oaks, CA: Sage.

Taylor, F. W. (1970). What is scientific management? In H. F. Merrill (Ed.), *Classics in management* (pp. 67-71). New York: American Management Association.

Terek, E., Glusac, D., Nikolic, M., Tasic, I., & Gligorovic, B. (2015). The impact of leadership on the communication satisfaction of primary school teachers in Serbia. *Educational Sciences: Theory & Practice*, *15*(1), 73-84. doi: 10.12738/estp.2015.1.2511

Thayer, L. (1969). *Communication and communication systems.* Homewood, I11: Richard D. Irwin.

Tourish, D. (2000). Management and managerialism: Mis/managing Australian Universities?, *New Horizons in E*ducation*, 103,* 20-42.

Tourish, D., & Hargie, O. (2004). *Key issues in organizational communication.* New York, NY: Routledge.

Towler, A. J. (2003). Effects of charismatic influence training on attitudes, behavior, and performance. *Personnel Psychology*, *56*(2), 363-381. doi: 10.1111/j.1744-6570.2003. tb00154.x

Trivellas, P., Kakkos, N., Blanas, N., & Santouridis, I. (2015). The impact of career satisfaction on job performance in accounting firms: The mediating effect of general competencies. *Procedia Economics and Finance, 33*(1), 468-476.

Valaei, N., & Rezaei, S. (2016). Job satisfaction and organizational commitment: An empirical investigation among ICT-SMEs. *Management Research Review, 39*(12), 1663-1694. doi: 10.1108/MRR-09-2015-0216.

Varona, F. (1996). Relationship between communication satisfaction and organizational commitment in three Guatemalan organizations. *The Journal of Business Communication, 33*(2), 111-140.

Varona, F. (1988*). A comparative study of communication satisfaction in two Guatemalan companies* (Unpublished master's thesis). University of Kansas, Lawrence.

Vazirani, N. (2007). *Employee engagement. SIES College of Management Studies,* Working Paper Series. Retrieved from http://www.siescoms.edu/images/pdf/ research/working_papers/employee_engagement.pdf

Veloutsou, C. A., & Panigyrakis, G. G. (2004). Consumer brand managers' job stress, job satisfaction, perceived performance and intention to leave. *Journal of Marketing Management, 20*(1-2), 105-131.

Vogt, L., Gröger, T., & Zimmermann, R. (2007). Automated compound classification for ambient aerosol sample separations using comprehensive two-dimensional gas chromatography-time-of-flight mass spectrometry. *Journal of Chromatography A*, *1150*(1-2), 2-12.

Vries, R. E., Roe, R. A., & Taillieu, T. C. B. (1998). Need of supervision: Its impact on leadership effectiveness. *The Journal of Applied Behavioral Science, 34*(4), 486-501. doi: 10.1177/0021886398344015

Wagenheim, M., & Rood, A. S. (2010). The relationship between employee satisfactions with organizational communication and customer orientation. *Managing Leisure,* 15(1), 83-95.

Wanberg, C. R., & Banas, J. T. (2000). Predictors and outcomes of openness to changes in a reorganizing workplace. *Journal of Applied Psychology, 85*(1), 132-142.

Watson Wyatt (2008), *Communication ROI study, secrets of top performers: How companies with highly effective employee communication differentiate themselves.* Retrieved from http://www.watson'wyatt.com

Weick, K. E. (1977), Enactment process in organizations. In B. M. Stow (Ed.), *New Directions in organizational behavior* (pp. 267-301). Chicago, IL: St. Clair Press,

Wetherell, K. M. (2002*). Principal leadership style and teacher job satisfaction* (Unpublished doctoral dissertation). Seton Hall University, Maplewood.

Wilson, D. O. (1992). Diagonal communication links within organization. *Journal of Business Communication, 29*(2), 129-143.

Wood, S., Van Veldhoven, M., Croon, M., & de Menezes, L.M. (2012). Enriched job design, high involvement management and organizational performance: The mediating roles of job satisfaction and well-being. *Human Relations, 65*(4), 419-445.

Yamane, T. (1967). *Statistics, introductory analysis of problems* (3rd ed.). New York: Harper & Row.

Yang, C. L., & Hwang, M. (2014). Personality traits and simultaneous reciprocal influences between job performance and job satisfaction. *Chinese Management Studies, 8*(1), 6-26.

Yusoff, R. B. M., Ali, A. M., & Khan, A. (2014). Assessing reliability and validity of job performance scale among university teachers. *Journal of Basic and Applied Scientific Research, 4*(1), 35-41.

Zahrah, N., Hamid, S. N. B. A., Rani, S. H. B. A., & Kamil, B. A. B. M. (2017). The mediating effect of work engagement on the relationship between Islamic religiosity and job performance. *Global Business and Management Research: An International Journal, 9*(1), 271-280.

Zeffane, R., & McLoughlin, D. (2006). Cooperation and stress: Exploring the differential impact of job satisfaction, communication and culture. *Management Research News, 29*(10), 618-631.

Zhu, Y., May, S. K., & Rosenfeld, L. B. (2004). Information adequacy and job satisfaction during merger and acquisition. *Management Communication Quarterly, 18*(2), 241-270.

Zwijze-Koning, K., & Jong, M. D. (2007). Evaluating the communication satisfaction questionnaire as a communication audit tool. *Management Communication Quarterly, 20*(3), 261-282.

APPENDICES

APPENDIX A

THE LIST OF THAI PUBLIC AND PRIVATE UNIVERSITIES

THE LIST OF THAI PUBLIC AND PRIVATE UNIVERSITIES

1. Chulalongkorn University
2. Chiang Mai University
3. Thaksin University
4. King Mongkut's University of Technology Thonburi
5. King Mongkut's University of Technology North Bangkok
6. Suranaree University of Technology
7. Burapha University
8. University of Phayao
9. Mahidol University
10. Mae Fah Luang University
11. Walailak University
12. King Mongkut's University of Technology Ladkrabang
13. Mahachulalongkornrajavidyalaya University
14. Mahamakut Buddhist University
15. Princess Galyani Vodhana Institute of Music, Thailand
16. Kasetsart University
17. Khon Kaen University
18. Thammasat University
19. Nakhon Phanom University
20. Princess of Naradhiwas University
21. Naresuan University
22. Mahasarakham University
23. Maejo University
24. Ramkhamhaeng University
25. Srinakharinwirot University
26. Silpakorn University
27. Prince of Songkla University
28. Sukhothai Thammathirat Open University

29. Ubon Ratchathani University

30. Pathumwan Institute of Technology

31. National Institute of Development Administration

32. Kanchanaburi Rajabhat University

33. Kalasin Rajabhat University

34. Kamphaeng Phet Rajabhat University

35. Chandrakasem Rajabhat University

36. Chaiyaphum Rajabhat University

37. Chiang Rai Rajabhat University

38. Chiang Mai Rajabhat University

39. Thepsatri Rajabhat University

40. Dhonburi Rajabhat University

41. Nakhon Pathom Rajabhat University

42. Nakhon Ratchasima Rajabhat University

43. Nakhon Si Thammarat Rajabhat University

44. Nakhon Sawan Rajabhat University

45. Bansomdejchaopraya Rajabhat University

46. Burirum Rajabhat University

47. Phranakhon Rajabhat University

48. Phranakhon Si Ayutthaya Rajabhat University

49. Pibulsongkram Rajabhat University

50. Phetchaburi Rajabhat University

51. Phetchabun Rajabhat University

52. Phuket Rajabhat University

53. Rajabhat Maha Sarakham University

54. Yala Rajabhat University

55. Roi Et Rajabhat University

56. Rajabhat Rajanagarindra University

57. Rambhaibarni Rajabhat University

58. Lampang Rajabhat University

59. Loei Rajabhat University

60. Valaya Alongkorn Rajabhat University

61. Sisaket Rajabhat University

62. Sakon Nokhon Rajabhat University

63. Sangkhla Rajabhat University

64. Suan Dusit Rajabhat University

65. Suan Sunandha rajabhat University

66. Suratthani Rajabhat University

67. Surindha Rajabhat University

68. Muban Chombueng Rajabhat University

69. Udon Thani Rajabhat University

70. Uttaradit Rajabhat University

71. Udon Ratchathani Rajabhat University

72. Rajamangala University of Technology Krungthep

73. Rajamangala University of Technology Tawan – ok

74. Rajamangala University of Technology Thanyaburi

75. Rajamangala University of Technology Phra Nakhon

76. Rajamangala University of Technology Rattanakosin

77. Rajamangala University of Technology Lanna

78. Rajamangala University of Technology Srivijaya

79. Rajamangala University of Technology Suvarnabhumi

80. Rajamangala University of Technology Isan

81. Bangkok University

82. Bangkok Thonburi University

83. The Eastern University of Management and Technology

84. Krirk University

85. Kasem Bundit University

86. Christian University

87. Chaopraya University

88. Shinawatra University

89. St. John's University

90. Mahanakorn University of Technology

91. Thonburi University

92. Dharakij Pundit University

93. North Bangkok University

94. North Chiang Mai University

95. Stamford International University

96. Asia – Pacific International University

97. Pathumthani University

98. Payap University

99. The Far Eastern University

100. University of Central Thailand

101. North – Eastern University

102. Nation University

103. Rangsit University

104. Rattana Bhudit University

105. Ratchathani University

106. Vongchavalitkul University

107. Webster University Thailand

108. Western University

109. Sripatum University

110. Siam University

111. University of the Thai Chamber of Commerce

112. Huachiew Chalermprakiet University

113. Hatyai University

114. Assumption University

115. Yala Islamic University

116. Eastern Asia University

117. Asian University

118. Southeast Asia University

119. Phitsanulok University

120. Tapee University

121. Kantana Institute

122. Learning Institute for Everyone

123. Thai – Nichi Institute of technology

124. Panyapiwat Institute of Management

125. Institute of Technology Ayothaya

126. Chulabhorn Graduate Institute

127. Rajapark Institute

128. Arsomsilp Institute of the Arts

129. Mahachai Institute of Automotive Technology

130. Bangkok Suvarnabhumi University

131. Chalermkarnchana University

132. Chiang Rai College

133. Saint Louis College

134. Southeast Bangkok College

135. Dusit Thani College

136. Thongsook College

137. Phanomwan College of Technology

138. Southern College of Technology

139. Siam Technology College

140. Nakhonratchasima College

141. St. Theresa International College

142. College of Asian Scholars

143. Pitchayabundit College

144. International Buddhist College

145. Rajapruk University

146. Lumnamping College

147. Srisophon College

148. Santapol College

149. Saengtham College Thailand

150. Lampang Intertech College

151. Trat Community College

152. Tak Community College

153. Narathiwat Community College

154. Nan Community College

155. Burirum Community College

156. Pattani Community College

157. Phang Nga Community College

158. Phichit Community College

159. Phrae Community College

160. Mukdahan Community College

161. Mae Hong Son Community College

162. Yasothon Community College

163. Yala Community College

164. Ranong Community College

165. Songkhla Community College

166. Satun Community College

167. Samut Sakhon Community College

168. Sa Kaeo Community College

169. Nong Bua Lamphu Community College

170. Uthai Thani Community College

171. Bangkok Community College

172. Institute of Physical Education

173. Civil Aviation training Center (Thailand)

174. Bunditpatanasilpa Institute

175. Asian Institute of Technology

176. Chulachomklao Royal Military Academy

177. Royal Police Cadet Academy

178. Royal Thai Naval Academy

179. Navaminda Kasatriyadhiraj Royal Thai Air Force Academy

180. Army Non Commissioned Officer School

APPENDIX B

INTERNAL/ORGANIZATIONAL COMMUNICATION TOOLS

INTERNAL/ORGANIZATIONAL COMMUNICATION TOOLS

In every enterprise, the internal communication tools are more than essential. It is a part of communicating and developing a company solid plan between managers and subordinates. Therefore, utilizing appropriate communication vehicles leads to avoid misunderstanding, job dissatisfaction, and poor performance (Thornton, 2014).

Employee Publications (paper/electronic)

Employee publications keep employees informed of business information, direction, progress, and goals. Encourage quality improvement, increased efficiency, improved service, and greater social responsibility information about company programs and initiatives. Recognize employees' achievements/successes.

Employee Intranet

Employee intranet is a document philosophy, values, guiding principles, history, awards, founders, organizational successes. It provides information about benefits, pension, profit sharing, safety, recreation programs, training, policies and procedures. Sometimes it uses for new employee orientation.

E-mail

Electronic mail is an ongoing day-to-day communication. Supervisor always updates on important issues or changes, especially in crisis communications.

Memos/Letter

Memo or letter applied when a company has important announcements or employment agreements or documentation of policy or procedural or other significant changes about the company.

Inserts/Enclosures

Inserts or enclosures are important notices regarding changes in benefits or procedures or other significant changes such as payroll stuffer or insert in publication.

Small Group Meeting

Small group communication occurs when a company requires creating team building, work planning and employee relations (internal relations).

Large Group Meeting

Large group communication is used for communicating with amount of employees in an enterprise and often use as creating company culture.

Bulletin Board

Bulletin board is utilized for updated upcoming events, notices about changes, and promotion of company programs.

Social Media

In globalization era, social media is an up-to-date communication tools to promote company brand, reputation, and profile. Additionally, it purposes for urgent and important announcement such as issue and crisis communications.

Grapevine

Grapevine communication is fast and effective way to disseminate information about company happenings and issues. It is often inaccurate.

Video

Video is utilized for promoting brand of major organizational initiatives, training and orientation, and celebrating milestones such as company anniversaries.

PowerPoint Slides

PowerPoint Slides consider as internal communication tools. It generally utilizes as employee training instrument for major organizational initiatives. It purposes to communicate about the company vision, mission, and goals.

Vodcasts/Podcasts

Vodcast communication is a video on demand multicasting technology while podcast is a digital audio only. Both vodcasts and podcasts are able to broadcasting over the internet and usually inform organization's vision, mission, and goals.

Webinars

Webinar is a new initiatives program. It uses for information session and group meeting with workers in an organization.

Face to Face

Face to face communication is a human communication which reinforce of all communications.

Display/exhibits

Display and exhibition is used to highlight a company information or updated program information to generate inquiries for all information to employees and then to get feedback. Sometime, it used to recruit personnel.

APPENDIX C

QUESTIONNAIRE IN ENGLISH VERSION

QUESTIONNAIRE IN ENGLISH VERSION

ICO NIDA
International College

QUESTIONNAIRE

Dear Participant,

I am conducting this survey as a part of the requirement of my Doctoral's Degree in Management at the International College of National Institute of Development Administration (ICO NIDA). The following questions are designed to collect the information about communication satisfaction, employee engagement, job satisfaction, and job performance in higher education institution in Thailand.

Your response in this survey will be entirely treated with strict confidentiality and anonymous. All information provided will be used for academic purpose only and will not be shared with any third party.

I would be grateful if you could take out your precious time completing this survey. If you have any question, please do not hesitate to contact me at my email: pongpipat_tu@hotmail.com

Kind Regards,

Pongpipat Pongton, PhD. (Candidate)

Section A: Please complete the following details for the purpose of the study by ticking (✓) in the box for the details that is appropriate for you.

1. Gender: ☐ Male ☐ Female
2. Age: ☐ below 30 ☐ 30-40 ☐ 41-50 ☐ above 50
3. Job Position: ☐ Supporting Staff ☐ Staff Manager
☐ Full-time lecturer ☐ Head of Department/Chairperson
☐ Assistant /Associate Dean/ Dean ☐ Assistant/Vice President/
President
4. Education: ☐ Bachelor's Degree ☐ Master's Degree ☐ Doctoral Degree

Section B: Communication Satisfaction

Listed below are several kinds of information often associated with a communication satisfaction in Higher Education Institution (HEI). Please indicate how satisfied you are with the amount and/or quality of each kind of information by circling (O) the appropriate number at the right.

No.	Item	Extremely Dissatisfied	Dissatisfied	Neutral	Satisfied	Extremely Satisfied
5.	Extent to which the grapevine is active in our organization	1	2	3	4	5
6.	Extent to which horizontal communication with other faculty members is accurate and free-flowing.	1	2	3	4	5
7.	Extent to which communication practices are adaptable to emergencies/crises	1	2	3	4	5
8.	Extent to which my work group is compatible	1	2	3	4	5
9.	Extent to which informal communication is active and accurate	1	2	3	4	5

No.	Item	Extremely Dissatisfied	Dissatisfied	Neutral	Satisfied	Extremely Satisfied
10.	Extent to which the organization's publications are interesting and helpful (e.g. memo, newsletter, bulletin board, intranet)	1	2	3	4	5
11.	Extent to which our meetings are well organized	1	2	3	4	5
12.	Extent to which written directives and reports are clear and concise	1	2	3	4	5
13.	Extent to which the amount of communication in the organization is about right	1	2	3	4	5
14.	Information about organization policies and goals	1	2	3	4	5
15.	Information about government action affecting my organization	1	2	3	4	5
16.	Information about relations with unions/faculty senate	1	2	3	4	5
17.	Information about my progress in my job	1	2	3	4	5
18.	Information you receive about personal news	1	2	3	4	5
19.	Information about departmental policies and goals	1	2	3	4	5
20.	Information about the requirements of job	1	2	3	4	5
21.	Information about employee benefits and pay	1	2	3	4	5
22.	Extend to which organization communication motivates and stimulates an enthusiasm for meeting its goals	1	2	3	4	5
23.	Extend to which the people in my organization have great ability as communicators	1	2	3	4	5
24.	Extend to which the organization's communication makes me identify with it or feel a vital part of it	1	2	3	4	5

No.	Item	Extremely Dissatisfied	Dissatisfied	Neutral	Satisfied	Extremely Satisfied
25.	Extend to which I receive on time the information needed to do my job	1	2	3	4	5
26.	Extend to which conflicts are handled appropriately through proper communication channels	1	2	3	4	5
26.	Extend to which conflicts are handled appropriately through proper communication channels	1	2	3	4	5
27.	Information about how I am being judged	1	2	3	4	5
28.	Recognition of my efforts	1	2	3	4	5
29.	Feedback on how problems in my job are being handled	1	2	3	4	5
30.	Extent to which my administrator listens and pays attention to me	1	2	3	4	5
31.	Extent to which my administrator offers guidance for solving job related problems	1	2	3	4	5
32.	Extent to which my administrator trusts me	1	2	3	4	5
33.	Extent to which my administrator is open to ideas	1	2	3	4	5
34.	Extent to which the amount of administrator given to me is about right	1	2	3	4	5

Section C: Job Satisfaction

Listed below are several kinds of information often associated with a job satisfaction in Higher Education Institution (HEI). Please indicate how satisfied you are with the amount and/or quality of each kind of information by circling (O) the appropriate number at the right.

No.	Item	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
35.	I feel I am being paid a fair amount for the work I do.	1	2	3	4	5
36.	Raises are suitable.	1	2	3	4	5
37.	I feel appreciated by the organization when I think about what they pay me.	1	2	3	4	5
38.	Those who do well on the job stand a fair chance of being promoted.	1	2	3	4	5
39.	People get ahead as fast here as they do in other places.	1	2	3	4	5
40.	I am satisfied with my chances for promotion.	1	2	3	4	5
41.	I am satisfied with the benefits I receive.	1	2	3	4	5
42.	The benefits we receive are as good as most other organizations offer.	1	2	3	4	5
43.	There are benefits we have which we should have.	1	2	3	4	5
44.	When I do a good job, I receive the recognition for it that I should receive.	1	2	3	4	5
45.	I do feel that the work I do is appreciated.	1	2	3	4	5
46.	There are rewards for those who work here.	1	2	3	4	5
47.	My administrator is quite competent in doing his/her job.	1	2	3	4	5
48.	My administrator is fair to me.	1	2	3	4	5
49.	I like my administrator.	1	2	3	4	5
50.	I like the people I work with.	1	2	3	4	5
51.	I enjoy my co-workers.	1	2	3	4	5

No.	Item	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
52.	There is no bickering and fighting at work.	1	2	3	4	5
53.	Many of our rules and procedures support doing a good job.	1	2	3	4	5
54.	I have appropriate tasks to do at work.	1	2	3	4	5
55.	I have appropriate paperwork.	1	2	3	4	5
56.	I feel my job is meaningful.	1	2	3	4	5
57.	I like doing the things I do at work.	1	2	3	4	5
58.	I feel a sense of pride in doing my job.	1	2	3	4	5
59.	Communications seem good within this organization.	1	2	3	4	5
60.	The goals of this organization are clear to me.	1	2	3	4	5
61.	Work assignments are fully explained.	1	2	3	4	5

Section D: Employee Engagement

List below are a series of statement that represent possible feelings that individuals might have about the Higher Education Institution (HEI) for which you work. With respect to your own feelings about the organization for which you are now working, please indicate the degree of your agreement and disagreement with each statement by circling (O) one of five alternatives for each statement.

No.	Item	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
62.	I focus hard on my work.	1	2	3	4	5
63.	I concentrate on my work.	1	2	3	4	5
64.	I pay a lot of attention to my work.	1	2	3	4	5
65.	I share the same work values as my colleagues.	1	2	3	4	5

No.	Item	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
66.	I share the same work goals as my colleagues.	1	2	3	4	5
67.	I share the same work attitudes as my colleagues.	1	2	3	4	5
68.	I feel positive about my work.	1	2	3	4	5
69.	I feel energetic in my work.	1	2	3	4	5
70.	I am enthusiastic in my work.	1	2	3	4	5

Section E: Job Performance

List below are a series of statement about job performance that individuals might behave at the Higher Education Institution (HEI) for which you work. With respect to the fact about the organization for which you are now working, please indicate the degree of your agreement and disagreement with each statement by circling (O) one of five alternatives for each statement.

No.	Item	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
71.	The quality of your work is better than what it should have been.	1	2	3	4	5
72.	I managed to plan my work so that it was done on time.	1	2	3	4	5
73.	I kept in mind the results that I had to achieve in my work.	1	2	3	4	5
74.	I was able to perform my work well with minimal time and effort.	1	2	3	4	5
75.	I was able to fulfill my responsibilities.	1	2	3	4	5
76.	Collaboration with others went well.	1	2	3	4	5
77.	I came up with creative ideas at work.	1	2	3	4	5

No.	Item	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
78.	I worked at keeping my job knowledge up-to-date.	1	2	3	4	5
79.	I recovered fast, after difficult situations or setbacks at work.	1	2	3	4	5
80.	I came up with creative solutions to new problems.	1	2	3	4	5
81.	I easily adjusted to changes in my work.	1	2	3	4	5
82.	I focused on the positive aspects of a work situation, instead of on the negative aspects.	1	2	3	4	5
83.	I spoke with colleagues about positive aspects of my work.	1	2	3	4	5
84.	I spoke with people from outside the organization about the positive aspects of my work.	1	2	3	4	5
85.	I harmonized with my colleagues, chairperson, or dean.	1	2	3	4	5

---- Thank you for your time ----

APPENDIX D

QUESTIONNAIRE IN THAI VERSION

QUESTIONNAIRE IN THAI VERSION

แบบสอบถาม

เรียน ผู้ตอบแบบสอบถาม

แบบสอบถามนี้เป็นส่วนหนึ่งของการศึกษาในหลักสูตรปรัชญาดุษฎีบัณฑิต สาขาการจัดการ วิทยาลัยนานาชาติของสถาบันบัณฑิตพัฒนบริหารศาสตร์ โดยมีวัตถุประสงค์เพื่อรวบรวมข้อมูล เกี่ยวกับความพึงพอใจในการสื่อสาร ความพึงพอใจในการทำงาน ความผูกพันธ์ของพนักงาน และ ประสิทธิภาพการทำงานในสถาบันระดับอุดมศึกษาของประเทศไทย

คำตอบของท่านจะถูกเก็บรักษาไว้เป็นความลับ ไม่มีการเปิดเผยชื่อ และข้อมูลทั้งหมดจะถูก นำไปใช้เพื่อวัตถุประสงค์ทางวิชาการเท่านั้น ไม่มีการส่งต่อให้บุคคลที่สาม

ผู้วิจัยขอขอบพระคุณเป็นอย่างสูง ที่ท่านสละเวลาอันมีค่าในการทำแบบสอบถามนี้ หากท่านมี คำถามหรือข้อสงสัยประการใด โปรดติดต่อที่อีเมล: pongpipat_tu@hotmail.com

ขอแสดงความนับถือ

พงศ์พิพัฒน์ พงษ์ตน

   ผู้วิจัย

ส่วน A: โปรดตอบคำถามต่อไปนี้ โดยการทำเครื่องหมาย (✔) ในช่องสี่เหลี่ยมที่ตรงกับ
รายละเอียดของท่าน

1. เพศ: ☐ ชาย ☐ หญิง
2. อายุ: ☐ ต่ำกว่า 30 ☐ 30-40 ☐ 41-50 ☐ มากกว่า 50
3. ตำแหน่งงาน: ☐ พนักงานสายสนับสนุน ☐ ผู้จัดการพนักงาน
   ☐ อาจารย์ ☐ หัวหน้าสาขาวิชา
   ☐ ผู้ช่วย/รองคณบดี/คณบดี ☐ ผู้ช่วย/รองอธิการบดี/อธิการบดี
4. การศึกษา: ☐ ปริญญาตรี ☐ ปริญญาโท ☐ ปริญญาเอก

ส่วน B: ความพึงพอใจในการสื่อสาร

        ข้อความต่อไปนี้เป็นการสอบถามเกี่ยวกับความพึงพอใจในการสื่อสารในระดับสถาบันอุดมศึกษา โปรดทำเครื่องหมาย O ตัวเลขทางขวามือที่ตรงกับความพึงพอใจของท่านมากที่สุด

ข้อ	ระดับความพึงพอใจของท่านต่อ...	ไม่พึงพอใจมาก	ไม่พึงพอใจ	เฉยๆ	พึงพอใจ	พึงพอใจมาก
CSHO 5.	การสื่อสารแบบไม่เป็นทางการของบุคลากรภายในองค์กร	1	2	3	4	5
CSHO 6.	ความร่วมมือในการติดต่อสื่อสารแบบตรงไปตรงมา เป็นกันเองระหว่างเพื่อนร่วมงานระดับเดียวกัน	1	2	3	4	5
CSHO 7.	การสื่อสารที่สามารถนำมาปรับใช้กับสถานการณ์ต่างๆได้	1	2	3	4	5

ข้อ	ระดับความพึงพอใจของท่านต่อ...	ไม่พอใจอย่างมาก	ไม่พอใจ	เฉยๆ	พอใจ	พอใจอย่างมาก
CSHO 8.	ความราบรื่นในการติดต่อประสานงานและการทำงานเป็นทีม	1	2	3	4	5
CSHO 9.	ความรวดเร็วและถูกต้องของการสื่อสารแบบไม่เป็นทางการกับเพื่อนร่วมงาน	1	2	3	4	5
CSM 10.	การที่สื่อต่างๆขององค์กรมีความน่าสนใจและเป็นประโยชน์ (เช่น บันทึก จดหมายข่าว บอร์ดประชาสัมพันธ์ อินทราเน็ต)	1	2	3	4	5
CSM 11.	การจัดการประชุมที่มีการเตรียมการเป็นอย่างดี	1	2	3	4	5
CSM 12.	การสื่อสารเป็นลายลักษณ์อักษรมีความชัดเจนกระชับได้ใจความ	1	2	3	4	5
CSM 13.	ภาพรวมของการสื่อสารในองค์กรมีความถูกต้อง	1	2	3	4	5
CSOP 14.	การได้รับข่าวสารเกี่ยวกับนโยบายและเป้าหมายขององค์กร	1	2	3	4	5
CSOP 15.	การได้รับข่าวสารเกี่ยวกับนโยบายของภาครัฐที่ส่งผลกับองค์กร	1	2	3	4	5
CSOP 16.	การได้รับข่าวสารเกี่ยวกับความสัมพันธ์ภายในองค์กร	1	2	3	4	5

ข้อ	ระดับความพึงพอใจของท่านต่อ...	ไม่พึงพอใจมาก	ไม่พึงพอใจ	เฉยๆ	พึงพอใจ	พึงพอใจมาก
CSOI 17.	การได้รับข่าวสารเกี่ยวกับความก้าวหน้าในการทำงานของท่าน	1	2	3	4	5
CSOI 18.	การได้รับข่าวสารเกี่ยวกับการปฏิบัติหน้าที่ของท่าน	1	2	3	4	5
CSOI 19.	การได้รับข่าวสารเกี่ยวกับนโยบายและเป้าหมายของสาขาวิชาและ/หรือคณะของท่าน	1	2	3	4	5
CSOI 20.	การได้รับข่าวสารเกี่ยวกับข้อกำหนดเกี่ยวกับภาระงานของท่าน	1	2	3	4	5
CSOI 21.	การได้รับข่าวสารเกี่ยวกับค่าตอบแทนและสวัสดิการของบุคลากร	1	2	3	4	5
CSCC 22.	การสื่อสารในองค์กรที่สามารถสร้างแรงจูงใจ สร้างความกระตือรือร้นในการกำหนดเป้าหมายขององค์กร	1	2	3	4	5
CSCC 23.	การที่บุคลากรในองค์กรมีความสามารถในการสื่อสารเป็นอย่างดี	1	2	3	4	5
CSCC 24.	การสื่อสารในขององค์กรที่ทำให้บุคลากรรู้สึกเป็นส่วนหนึ่งขององค์กร	1	2	3	4	5

ข้อ	ระดับความพึงพอใจของท่านต่อ...	ไม่พึงพอใจมาก	ไม่พึงพอใจ	เฉยๆ	พึงพอใจ	พึงพอใจมาก
CSCC 25.	การที่ท่านได้รับข้อมูลข่าวสารอย่างเพียงพอและเหมาะสมกับงานที่ต้องทำ	1	2	3	4	5
CSCC 26.	การที่ท่านได้รับข้อมูลข่าวสารเมื่อเกิดความขัดแย้งขึ้นภายในองค์กร	1	2	3	4	5
CSPF 27.	การได้รับทราบข่าวสารเกี่ยวกับผลการปฏิบัติงานของท่านเสมอ	1	2	3	4	5
CSPF 28.	การได้รับทราบข่าวสารเกี่ยวกับการยอมรับในการทำงานของท่าน	1	2	3	4	5
CSPF 29.	การได้รับทราบข้อมูลเกี่ยวกับวิธีการแก้ปัญหาที่ถูกต้องในงานของท่าน	1	2	3	4	5
CSSup 30.	การที่ผู้บริหารรับฟัง และให้ความสำคัญในตัวท่าน	1	2	3	4	5
CSSup 31.	การที่ผู้บริหารอนุญาตให้เข้าพบเพื่อพูดคุย และ/หรือให้คำปรึกษา เกี่ยวกับปัญหาต่างๆ ที่เกี่ยวข้องกับการปฏิบัติงาน	1	2	3	4	5
CSSup 32.	การที่ผู้บริหารไว้วางใจในตัวท่าน	1	2	3	4	5

ข้อ	ระดับความพึงพอใจของท่านต่อ...	ไม่พึงพอใจมาก	ไม่พึงพอใจ	เฉยๆ	พึงพอใจ	พึงพอใจมาก
CSSup 33.	การที่ผู้บริการเปิดรับฟังความคิดเห็นต่างๆ จากท่าน	1	2	3	4	5
CSSup 34.	การที่ผู้บริหารให้เสรีภาพกับผู้ใต้บังคับบัญชาในการสื่อสาร	1	2	3	4	5

ส่วน C: ความพึงพอใจในการทำงาน

ข้อความต่อไปนี้เป็นการสอบถามเกี่ยวกับความคิดเห็น ความพึงพอใจในการทำงานใน ระดับสถาบันอุดมศึกษา โปรดทำเครื่องหมาย O ตัวเลขทางขวามือที่ตรงกับความคิดเห็นของท่าน มากที่สุด

ข้อ	ท่านคิดว่า...	ไม่เห็นด้วยอย่างยิ่ง	ไม่เห็นด้วย	เฉยๆ	เห็นด้วย	เห็นด้วยอย่างยิ่ง
JSPay 35.	ท่านได้รับค่าตอบแทนอย่างยุติธรรม เหมาะสมกับงานที่ท่านทำ	1	2	3	4	5
JSPay 36.	การขึ้นเงินเดือนในองค์กรของท่านนั้นเหมาะสม	1	2	3	4	5
JSPay 37.	ท่านรู้สึกดีกับองค์กร เมื่อท่านนึกถึงเรื่องเงินเดือนที่ได้รับ	1	2	3	4	5

ข้อ	ท่านคิดว่า...	ไม่เห็นด้วยอย่างยิ่ง	ไม่เห็นด้วย	เฉยๆ	เห็นด้วย	เห็นด้วยอย่างยิ่ง
JSPro 38.	ผู้ที่ทำงานในหน้าที่ได้อย่างดี ควรมีโอกาสได้รับเลื่อนตำแหน่งอย่างยุติธรรม	1	2	3	4	5
JSPro 39.	หลายคนในองค์กรมีก้าวหน้าอย่างรวดเร็ว เช่นเดียวกับที่องค์กรอื่นๆ	1	2	3	4	5
JSPro 40.	ท่านพึงพอใจกับโอกาสในการเลื่อนตำแหน่ง	1	2	3	4	5
JSFri 41.	ท่านพึงพอใจกับผลตอบแทนที่ท่านได้รับ	1	2	3	4	5
JSFri 42.	ผลตอบแทนที่ท่านได้รับดีเท่ากับที่องค์กรอื่นเสนอ	1	2	3	4	5
JSFri 43.	สวัสดิการที่ท่านได้รับนั้นเหมาะสม	1	2	3	4	5
JSCon 44.	เมื่อท่านทำงานได้ดี ท่านได้รับการยอมรับในงานที่ทำ	1	2	3	4	5
JSCon 45.	ท่านรู้สึกว่างานที่ทำนั้นมีคุณค่า	1	2	3	4	5
JSCon 46.	ท่านรู้สึกว่าการทำงานของท่านนั้นเหมาะสมกับผลตอบแทน	1	2	3	4	5
JSSup 47.	ผู้บริหารของท่านมีความสามารถในงานที่ทำ	1	2	3	4	5

ข้อ	ท่านคิดว่า...	ไม่เห็นด้วยอย่างยิ่ง	ไม่เห็นด้วย	เฉยๆ	เห็นด้วย	เห็นด้วยอย่างยิ่ง
JSSup 48.	ผู้บริหารของท่านยุติธรรมกับท่าน	1	2	3	4	5
JSSup 49.	ท่านชื่นชอบผู้บริหารของท่าน	1	2	3	4	5
JSCow 50.	ท่านชื่นชอบเพื่อนร่วมงานที่ท่านทำงานด้วย	1	2	3	4	5
JSCow 51.	ท่านมีความสุขกับเพื่อนร่วมงานของท่าน	1	2	3	4	5
JSCow 52.	ไม่มีการทะเลาะและการแข่งขันในที่ทำงาน	1	2	3	4	5
JSOpe 53.	กฎและข้อบังคับหลายๆข้อ ส่งเสริมให้การทำงานมีประสิทธิภาพที่ดี	1	2	3	4	5
JSOpe 54.	ท่านมีภาระงานที่ต้องทำอย่างเหมาะสม	1	2	3	4	5
JSOpe 55.	ท่านได้รับมอบหมายงานด้านเอกสารอย่างเหมาะสม	1	2	3	4	5
JSNat 56.	การทำงานของท่านมีความหมายต่อองค์กร	1	2	3	4	5
JSNat 57.	ท่านชอบงานที่ท่านทำอยู่	1	2	3	4	5
JSNat 58.	ท่านภูมิใจในการทำงานของท่าน	1	2	3	4	5

ข้อ	ท่านคิดว่า...	ไม่เห็นด้วยอย่างยิ่ง	ไม่เห็นด้วย	เฉยๆ	เห็นด้วย	เห็นด้วยอย่างยิ่ง
JSCom 59.	องค์กรของท่านมีบรรยากาศการสื่อสารดี	1	2	3	4	5
JSCom 60.	เป้าหมายขององค์กรมีความชัดเจน	1	2	3	4	5
JSCom 61.	ท่านได้รับการมอบหมายงานโดยได้รับการอธิบายอย่างชัดเจน	1	2	3	4	5

ส่วน D: ความผูกพันธ์ของพนักงาน

ข้อความต่อไปนี้เป็นการสอบถามเกี่ยวกับความคิดเห็น ความผูกพันธ์ของพนักงานใน
ระดับสถาบันอุดมศึกษา โปรดทำเครื่องหมาย O ตัวเลขทางขวามือที่ตรงกับความคิดเห็นของท่าน
มากที่สุด

ข้อ	ท่านคิดว่า...	ไม่เห็นด้วยอย่างยิ่ง	ไม่เห็นด้วย	เฉยๆ	เห็นด้วย	เห็นด้วยอย่างยิ่ง
EEI 62.	ท่านใช้สมาธิกับงานของท่านอย่างมาก	1	2	3	4	5
EEI 63.	ท่านเอาใจใส่งานของท่าน	1	2	3	4	5
EEI 64.	ท่านให้ความสนใจกับงานของท่านอย่างมาก	1	2	3	4	5

ข้อ	ท่านคิดว่า...	ไม่เห็นด้วยอย่างยิ่ง	ไม่เห็นด้วย	เฉยๆ	เห็นด้วย	เห็นด้วยอย่างยิ่ง
EES 65.	ท่านแบ่งปันคุณค่าของงานกับเพื่อนร่วมงานของท่าน	1	2	3	4	5
EES 66.	ท่านกับเพื่อนร่วมงานของท่านมีเป้าหมายในการทำงานร่วมกัน	1	2	3	4	5
EES 67.	ท่านกับเพื่อนร่วมงานของท่านมีทัศนคติในการทำงานเหมือนกัน	1	2	3	4	5
EEA 68.	ท่านรู้สึกดีเกี่ยวกับงานของท่าน	1	2	3	4	5
EEA 69.	ท่านรู้สึกกระตือรือร้นในงานของท่าน	1	2	3	4	5
EEA 70.	ท่านมีความสนใจต่องานของท่าน	1	2	3	4	5

ส่วน E: ประสิทธิภาพการทำงาน

ข้อความต่อไปนี้เป็นการสอบถามเกี่ยวกับความคิดเห็น ประสิทธิภาพการทำงานในระดับ
สถาบันอุดมศึกษา โปรดทำเครื่องหมาย O ตัวเลขทางขวามือที่ตรงกับความคิดเห็นของท่านมาก
ที่สุด

ข้อ	ท่านคิดว่า...	ไม่เห็นด้วยอย่างยิ่ง	ไม่เห็นด้วย	เฉยๆ	เห็นด้วย	เห็นด้วยอย่างยิ่ง
JPTP 71.	คุณภาพงานของท่านดีกว่าที่ควรจะเป็นในอดีตที่ผ่านมา	1	2	3	4	5
JPTP 72.	ท่านมีการวางแผนการทำงานของท่านเพื่อให้งานเสร็จทันเวลา	1	2	3	4	5
JPTP 73.	ท่านมุ่งถึงผลลัพธ์ที่ท่านต้องทำงานให้สำเร็จ	1	2	3	4	5
JPTP 74.	ท่านสามารถทำงานของท่านได้ดีในเวลาที่จำกัด	1	2	3	4	5
JPCP 75.	ท่านสามารถทำหน้าที่ของท่านได้อย่างสมบูรณ์	1	2	3	4	5
JPCP 76.	การทำงานร่วมกับผู้อื่นของท่านเป็นไปได้ด้วยดี	1	2	3	4	5
JPCP 77.	ท่านมีความคิดสร้างสรรค์ในที่ทำงาน	1	2	3	4	5
JPAP 78.	ท่านทำงานที่ทำให้ความรู้ของท่านนั้นทันสมัยอยู่เสมอ	1	2	3	4	5

ข้อ	ท่านคิดว่า...	ไม่เห็นด้วยอย่างยิ่ง	ไม่เห็นด้วย	เฉยๆ	เห็นด้วย	เห็นด้วยอย่างยิ่ง
JPAP 79.	ท่านฟื้นตัวได้รวดเร็วหลังจากประสบกับสถานการณ์ที่ยากหรือความล้มเหลวในการทำงาน	1	2	3	4	5
JPAP 80.	ท่านมีทางออกอย่างสร้างสรรค์กับปัญหาใหม่ๆ	1	2	3	4	5
JPAP 81.	ท่านสามารถปรับตัวให้เข้ากับการเปลี่ยนแปลงในงานของท่านได้ดี	1	2	3	4	5
JPCWB 82.	ท่านมุ่งความสนใจไปที่ด้านบวกของสถานการณ์การทำงานมากกว่าด้านลบ	1	2	3	4	5
JPCWB 83.	ท่านคุยกับเพื่อนร่วมงานแต่ด้านดีๆในงานของท่าน	1	2	3	4	5
JPCWB 84.	ท่านพูดคุยกับคนที่อยู่ภายนอกองค์กรเกี่ยวกับสิ่งดีๆในงานของท่าน	1	2	3	4	5
JPCWB 85.	ท่านลงรอยกับเพื่อนร่วมงาน และ/หรือหัวหน้างานของท่าน	1	2	3	4	5

---- ขอบพระคุณสำหรับการตอบแบบสอบถาม ----

BIOGRAPHY

NAME	Mr. Pongpipat Pongton
ACADEMIC BACKGROUND	Master of Science (Management) (Merit) 2012 University of Surrey, Guildford, United Kingdom
	Bachelor of Arts in Journalism (Mass Media Studies) (English Program) (Second Class Honours) 2010 Thammasat University, Bangkok, Thailand
PRESENT POSITION	Full-Time Lecturer Department of Public Relations Albert Laurence School of Communication Arts, Assumption University
EXPERIENCE	Visiting Lecturer Faculty of Journalism and Mass Communication, Thammasat University Institute of International Studies, Ramkhamhaeng University
	Advisor of the Office of Student Activities University of the Thai Chamber of Commerce