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A STUDY ON WORKFORCE INNOVATION SKILLS TOWARDS
PERFORMANCE IMPROVEMENT: A CASE STUDY AT SONY EMCS
(MALAYSIA) SDN. BHD. IN PRAI, PENANG

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JUNE 2015

"I admit that this report is the result of my own work except summaries and excerpts
that each of them I have explained the source"

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Date : 3 / 7 / 2015

DEDICATION

This Final Year Project is dedicated to my parents for their love, endless support, encouragement, and prayers.

ACKNOWLEDGEMENT

Bismillahirrahmanirrahim,

Alhamdulillah. Thanks to Allah SWT, whom with His willing giving me the opportunity to complete this Final Year Project which is the title of a study on workforce innovation skills towards performance improvement: a case study at Sony EMCS (Malaysia) Sdn. Bhd. in Prai, Penang. This final year project report was prepared for Fakulti Pengurusan Teknologi dan Teknousahawan, Universiti Teknikal Malaysia Melaka (UTeM), basically for student in final year to complete the undergraduate program that leads to the degree of Bachelor of Technology Management and Innovation.

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Deepest thanks and appreciation to my parents, family and special mate of mine for their cooperation, encouragement, constructive suggestion and also thanks to all of my friend that have been contributed by supporting my work and help myself during the final year project progress till it is fully completed.

ABSTRACT

This study is about the workforce innovation skill towards performance improvement. The focus area of the research is at Sony EMCS (Malaysia) Sdn. Bhd in Prai, Penang. First, the researcher define the workforce skill needed at Sony EMCS (Malaysia) Sdn. Bhd. Second, investigate the factor that influence the development of workforce skill in Sony EMCS (Malaysia) Sdn. Bhd such as individual factor, team factor, and organization factor. Third, study the program or incentives done by the industries to improve the workforce skill. Thus, the finding of the research will effect by improve the performance and enhance the innovation skill in Sony EMCS (Malaysia) Sdn. Bhd. It is because the innovation skill is a key determinant of the success or failure of any organization. The method that the researcher use in this research is case study by distribute questionnaire to the top management of Sony EMCS (Malaysia) Sdn. Bhd. The questionnaire was distribute to 113 of respondents and the data was analyzed using correlation analysis, simple linear regression, and multiple linear regression. Based on the result, there is a positive relationship between individual skill factor, team skill factor, and organization with the performance improvement (dependent variable). All the independent variables have significant one to one relationship with dependent variable. However, multiple linear analysis shows that only team skill and organization have significant relationship with dependent variable. The result of this research is it generalize to represent to the entire of Sony Sdn. Bhd industry in Malaysia. Sony EMCS (Malaysia) Sdn. Bhd are recommends to improve the individual skill in future. It generates a lot of skills such as communication skills, and creative thinking skill. Thus it will give the big impact of performance improvement towards the Sony EMCS (Malaysia) Sdn. Bhd.

ABSTRAK

Kajian ini adalah mengenai kemahiran inovasi tenaga kerja ke arah peningkatan prestasi. Kawasan tumpuan kajian adalah di Sony EMCS (Malaysia) Sdn. Bhd di Prai, Pulau Pinang. Pertama, penyelidik menentukan kemahiran tenaga kerja yang diperlukan di Sony EMCS (Malaysia) Sdn. Bhd. Kedua, menyiasat faktor yang mempengaruhi perkembangan kemahiran tenaga kerja dalam Sony EMCS (Malaysia) Sdn. Bhd seperti faktor individu, faktor pasukan, dan faktor organisasi. Ketiga, mengkaji program atau insentif yang dilakukan oleh industri untuk meningkatkan kemahiran tenaga kerja. Oleh itu, dapatan kajian ini akan memberi kesan dengan meningkatkan prestasi dan meningkatkan kemahiran inovasi dalam Sony EMCS (Malaysia) Sdn. Bhd. Ia adalah kerana kemahiran inovasi adalah penentu utama kejayaan atau kegagalan mana-mana organisasi. Kaedah yang digunakan penyelidik dalam kajian ini adalah kajian kes dengan mengedarkan soal selidik kepada pihak pengurusan atas Sony EMCS (Malaysia) Sdn. Bhd. Soal selidik adalah diedarkan kepada 113 responden dan data yang telah dianalisis dengan menggunakan analisis korelasi, regresi linear mudah, dan regresi linear berganda. Berdasarkan keputusan itu, terdapat hubungan yang positif antara faktor individu kemahiran, pasukan faktor kemahiran, dan organisasi dengan peningkatan prestasi (pembolehubah bersandar). Semua pembolehubah bebas mempunyai satu kepada satu hubungan dengan pembolehubah bersandar. Walau bagaimanapun, analisis linear berganda menunjukkan bahawa hanya kemahiran pasukan dan organisasi sahaja mempunyai hubungan yang signifikan dengan pembolehubah bersandar. Hasil kajian ini adalah ia umum untuk mewakili kepada keseluruhan Sony Sdn. Industri Bhd di Malaysia. Sony EMCS (Malaysia) Sdn. Bhd disarankan untuk meningkatkan kemahiran individu pada masa akan datang. Ia menjana banyak kemahiran seperti kemahiran komunikasi, dan kemahiran berfikir kreatif. Oleh itu ia akan memberi kesan yang besar ke arah peningkatan prestasi Sony EMCS (Malaysia) Sdn. Bhd.

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CHAPTER 1

INTRODUCTION

1.1 BACKGROUND OF STUDY

The aim of this research is to review the role of individuals and teams in idea generation as part of the overall organizational creativity and innovation process. In this study, the researcher will discuss innovation skill to enhance the innovation in the manufacturing industry. Innovation skill is a key determinant of the success or failure of any organization. The innovation skill can be define and generated from the workers. It is because the main body of idea generation part of the creativity process is at the levels of the workers through the factors of individual, team and organization.

Based on Adams, K. (2005), it notes the factors in the literature that are creativity stimulants, and those that hinder creativity at each level. The aim of this research is to review the role of individuals and teams in idea generation as part of the overall organizational creativity and innovation process.

Based on Toner, P. (2011), by employing a multi-disciplinary approach to the topic of skills and innovation it is clear that the research is also more contested, and its results more nuanced, than often presented in many research reports or public policy documents. These more critical studies do not deny the overall link between higher skills and innovation but suggest, firstly, the link is less robust than that widely claimed and

secondly, there is no universal tendency for an increase in the demand for skills across all forms of innovation, industries and occupations.

Moreover, some studies argue that certain labor market developments, notably, the rise of non-standard forms of employment, such as casualization and self-employment, and some types of labor migration can have adverse effects on workforce capacity for innovation. These labor market developments have been argued to reduce the incentive of employers to invest in workforce training and for employees to participate in workplace training.

Skills development enhances both people's capacities to work and their opportunities at work, offering more scope for creativity and satisfaction at work. The future prosperity of any country depends ultimately on the number of persons in employment and how productive they are at work. In this study, the researcher choose to study at Sony EMCS (Malaysia) Sdn. Bhd because the researcher want to focus on the important of workers skill and investigate the factors that influence the development of workforce skill that can enhance the innovation and improve the performance.

1.2 PROBLEM STATEMENT

The skill and intention to use the skills in the manufacturing industry is still lacking. The researcher have found that problem from internal and external organization. From internal, the problem found in manufacturing industry based on the internship program. The problem are based on individual skill such as lack of creative thinking, based on organization such as lack of training conducted by the organization, and thus influence the lack of performance.

From the external, the researcher found the problem from the previous research. According to Mabonga. (2000), the research found that there are lack of human resources skill of creative thinking and state that the success or failure of any organization depends greatly on the type of human resources it. Human resources translate all other resources in an organization into visible products. Bearing that in

mind it is important that organizations pay extra attention to their workers in order to attain optimum efficiency and effectiveness at the workplace. Besides that, based on eDison. (2005), a survey of global employers in 2005 revealed that more than 50% of employees lack the motivation to keep learning and improving.

The researcher wants to study and identify the workforce skill needed in Sony EMCS (Malaysia) Sdn. Bhd. Besides that, the researcher want to investigate the factor that influences the development of workforce skill to improve the organization productivity in light of innovation skill. This research is important because the skill of innovation is a key determinant of the success or failure of any organization. So, the research will give the benefits to Sony EMCS (Malaysia) Sdn. Bhd to use the findings of the research and thus improve the skill in the organization and thus enhance the innovation and performance.

1.3 RESEARCH QUESTIONS

Nowadays, the identification of workforce skill is an important step to ensure that the generation of ideas will improve the skill of innovation in an organization. The Sony EMCS (Malaysia) Sdn. Bhd should consider the workforce skill that to enhance the innovation. Based on the reason above, the research question for this study area:

1. What are the workforce skills needed in Sony EMCS (Malaysia) Sdn. Bhd?
2. What are the factors that influence the development of workforce skill in Sony EMCS (Malaysia) Sdn. Bhd?
3. What are the programs/ initiatives done by Sony EMCS (Malaysia) Sdn. Bhd to improve the workforce skill?

1.4 RESEARCH OBJECTIVE

The objective of this research are to enhance the innovation in Sony EMCS (Malaysia) Sdn. Bhd. The objectives of this study are as below:

1. To define the workforce skills needed in Sony EMCS (Malaysia) Sdn. Bhd?
2. To investigate the factors that influence the development of workforce skill in Sony EMCS (Malaysia) Sdn. Bhd?
3. To study the programs/ initiatives done Sony EMCS (Malaysia) Sdn. Bhd to improve the workforce skill?

1.5 SCOPE AND LIMITATION

The scope in this research is the case study conducted at Sony EMCS (Malaysia) Sdn. Bhd in Prai, Penang. The company was chosen because it is a big company that are suitable to make a research about workforce innovation skill and the researcher could obtain and collect the data from the company. The researcher make a case study by use the method of distributing questionnaire to the 113 of respondent. The sample of the population are based on the Krejcie and Morgan table of determining sample size, as shown in table 1.1 below.

Table 1.1: Krejcie and Morgan table of determining sample size

Table for Determining Sample Size for a Given Population									
N	S	N	S	N	S	N	S	N	S
10	10	100	80	280	162	800	260	2800	338
15	14	110	86	290	165	850	265	3000	341
20	19	120	92	300	169	900	269	3500	346
25	24	130	97	320	175	950	274	4000	351
30	28	140	103	340	181	1000	278	4500	351
35	32	150	108	360	186	1100	285	5000	357
40	36	160	113	380	191	1200	291	6000	361
45	40	180	118	400	196	1300	297	7000	364
50	44	190	123	420	201	1400	302	8000	367
55	48	200	127	440	205	1500	306	9000	368
60	52	210	132	460	210	1600	310	10000	373
65	56	220	136	480	214	1700	313	15000	375
70	59	230	140	500	217	1800	317	20000	377
75	63	240	144	550	225	1900	320	30000	379
80	66	250	148	600	234	2000	322	40000	380
85	70	260	152	650	242	2200	327	50000	381
90	73	270	155	700	248	2400	331	75000	382
95	76	270	159	750	256	2600	335	100000	384

Note: "N" is population size
"S" is sample size.

Source: Krejcie & Morgan, 1970

The scope of company level of respondent is the top management. The limitation is focus on the Sony EMCS (Malaysia) Sdn. Bhd. The result will generalize to represent the entire of Sony industries in Malaysia.

1.6 KEY ASSUMPTIONS

The researcher assume respondent will be honest to answer the questionnaire. Besides that, the researcher assume the cooperation from respondent during the distribution of questionnaire. In addition, the researcher also assume this research is practical and useful for the company of Sony EMCS (Malaysia) Sdn. Bhd and for all Sony industries in Malaysia.

1.7 IMPORTANT OF STUDY

Understanding the workers skill is a good things, because it is important to enhance the innovation towards the industries. The individual and teams creativity is considerable and relatively distinct set of "idea generation. Companies which are successful innovators have a market orientation, a source of creative ideas, a receptive organization, and a means to process new ideas to innovate and improve the skill of innovation.

The important of this research are also give the benefits and idea for the company of Sony EMCS (Malaysia) Sdn. Bhd on how to improve the individual and teams skill. It generates a lot of skills such as cognitive skills, communication skills, and creative thinking skill. It will practically use by the company of Sony EMCS (Malaysia) Sdn. Bhd. Thus, it can enhance the performance through the workforce skill of innovation.

1.8 SUMMARY

Innovation of workforce skill will succeed if the company of Sony EMCS (Malaysia) Sdn. Bhd focus on the factor to generate the idea from the individual and teams skill. It will give a big impact to the industries of enhance the productivity and innovation skill. Sony EMCS (Malaysia) Sdn. Bhd will use it as a main of important things to consider and focus to generate the creative thinking of innovation.

In this research, the main reason is to investigate the skill of workers in Sony EMCS (Malaysia) Sdn. Bhd. It consist of identifying what are the factor of innovation skill. So, from the research, the researcher will determine and identify the factors that need to have in the industries to innovate and investigate the impact of workers skill towards the industries to enhance the creative thinking of innovation. Figure 1.2 shows the flow chart of the three chapter from chapter 1, 2 and 3.

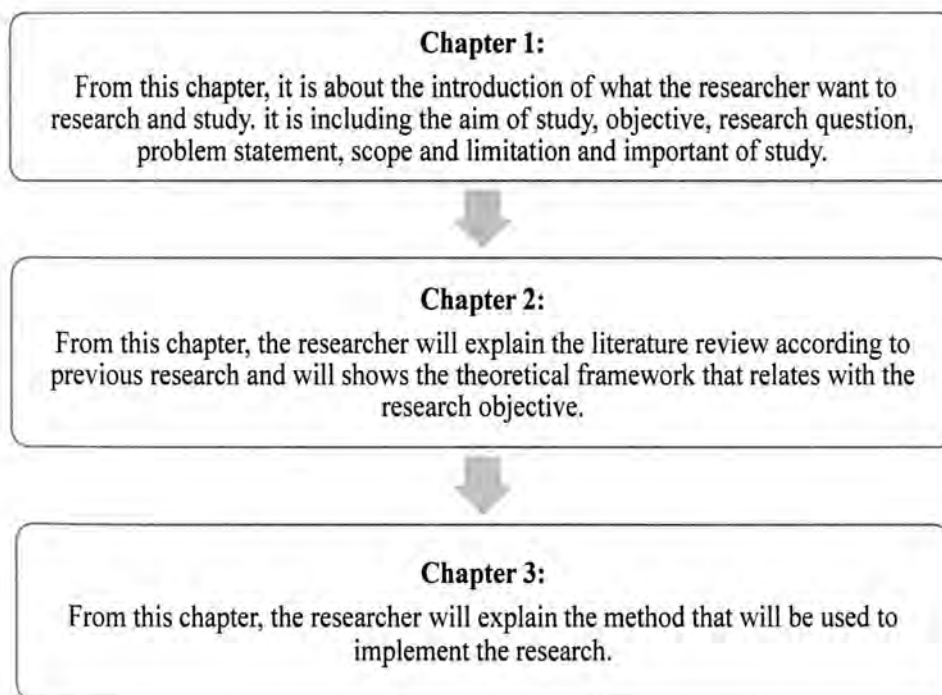


Figure 1.2: Flow Chart of chapter 1, 2, 3

CHAPTER 2

LITERATURE REVIEW

2.1 INTRODUCTION

Innovation is about helping organizations grow. Growth is often measured in terms of turnover and profit, but can also occur in knowledge, in human experience, skill and in efficiency and quality. Innovation is the process of making changes to something established by introducing something new for the organization that adds value to customers and contributes to the knowledge store of the organization. Figure 2.1.1 below shows that the types of innovation is incremental innovation and radical innovation. In this paper the researcher focus upon two categories of innovation that is incremental and radical.

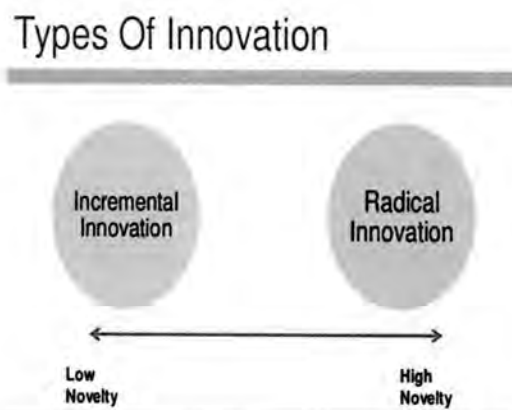


Figure 2.1: Types of Innovation

Incremental innovation is the improvements within a given frame of solutions which is; “doing better what already do”. Incremental product innovation refers to the small changes in a product that helps improve its performance, lower its costs, and enhance its desirability or simply to announce a new model release. Most successful products undergo continual incremental innovation, lowering their costs, and enhancing effectiveness.

Whereas, radical innovation is a change of frame which is; “doing what we did not do before”. Most of the writing on innovation within the design community focuses upon radical innovation. Radical innovation is the center of attention of design studies, where it is taught in design schools, and advocated by people discussing innovation and “design thinking.” So, based on the research, it is an incremental innovation because the researcher want to enhance the innovation skill and improve performance at Sony EMCS (Malaysia) Sdn. Bhd.

2.1.1 Innovation and Creativity

Creativity is regarded as a key building block for innovation. It is because creativity entails a level of originality and novelty that is essential for innovation. Although creativity is a fundamental part of innovation, it is wrong to interchange the terms. Innovation encourages the further processing of the output of the creative process (the idea) so as to allow the exploitation of its potential value through development.

Besides that, innovation is the successful implementation of creative ideas within an organization. In this view, creativity by individual and teams is starting point for innovation. Successful implementation of skill and innovation depends on other factors which is it can stem not only from the technology but also from ideas that generate by the individual and teams of workforce in the organization. The contemporary approach to creativity research assumes that all human with normal capacities are able to produce at least moderately creative work in some domain, some of time and can influence the creative behavior towards the individual and teams.

In literature review, researcher will tells about workforce skill that provide in Sony EMCS (Malaysia) Sdn. Bhd. It was introduced to improve the skill of individual and teams to enhance the innovation. The flow of the theory that related to this study will be explains as shown at diagram below.

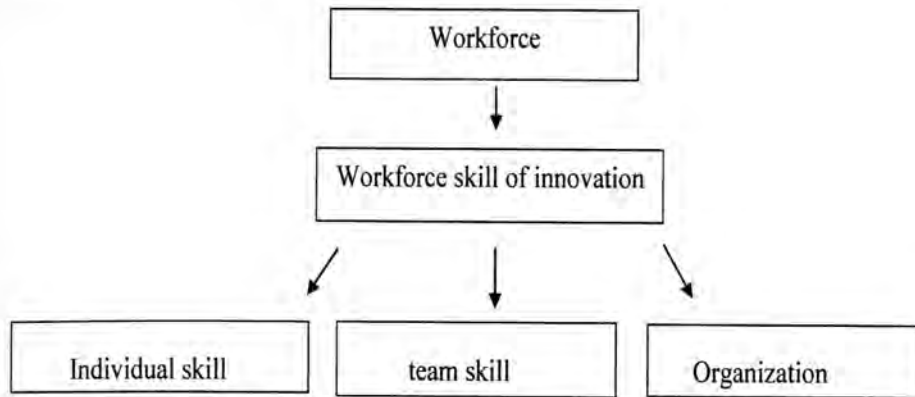


Figure 2.1: flows of related theory

2.2 WORKFORCE

Workforce are the people engaged in or available for work, either in a country or area or in a particular firm or industry. The term generally excludes the employers of management, and can imply those involved in manual labor. It may also mean all those that are available for work.

2.3 WORKFORCE INNOVATION SKILL

Workforce innovation skill identifies the skills requirements critical to effective and competitive businesses and industry as well as individuals. At the national and industry level workforce development is the strategic application of planning and skilling policy to support economic and industrial growth. At the next level, workforce development is the application of programs and plans to support businesses, communities and regions build and maintain the skilled workforces needed to meet productivity objectives.