

# The Effect of Information Technology and Innovation on the Quality of Human Resources and Business Performance (An Exploratory Study of Typical and Traditional Culinary Typical of Makassar Famous)

Iwan Perwira<sup>1</sup>, Murdifin Haming<sup>2</sup>

<sup>1</sup>Associate Lecturer in STIM Lasharan Jaya Makassar

<sup>2</sup>Professor of Management Science in Muslim University of Indonesia

## -----ABSTRACT-----

*This research was motivated by official establishment of ASEAN Economic Community (AEC) on December 31, 2015. The establishment of ASEAN Economic Community (AEC) became a crucial milestone to develop various quantity and quality of economy of Indonesia in ASEAN region. In welcoming ASEAN Economic Community (AEC), the Mayor of Makassar city, represented by the Tourism Office of Makassar proposed to set local cuisine as local wealth of Makassar to Ministry of Tourism of Indonesia to have an Intellectual Property Right in order to be competitive (i.e. Coto Makassar, Pisang Ijo, Pallubasa, Sop Saudara, Konro Bakar, Pallumara, Pisang Epe, Mie Kering, Jalangkote and Konro). This research was conducted to figure out the problems faced by local cuisine entrepreneurs as follow (a) the influence of information technology and innovation on the quality of human resources, (b) the influence of human resources on business performance, (c) the influence of information technology and innovation on business performance, (d) the influence of information technology and innovation on business performance through the quality of human resources. The population of this research was 1.193 employees and 174 respondents as a sample. The sample was taken by using purposive sampling method and analyzed with structural equation model as well as AMOS 21. The result of the research found out the influence of information technology, direct innovation, positive and significant on the quality of human resources, the influence of the quality of human resources, positive and significant on business performance, the influence of direct information technology, positive and insignificant on business performance and the influence of information technology, indirect innovation, positive and insignificant on business performance through the quality of human resources*

**Keywords:** *Information technology, innovation, quality of human resources and business performance*

Date of Submission: 09-08-2017

Date of Publication: 25-09-2017

## I. INTRODUCTION

The management of local cuisine is the valuable heritage from the first generations which created culinary foods. Now it has been preserved by second or third generations, where the average culinary foods are more than 25 years. However, the culinary favor, layout of the room and services have not been changed much, the same like first time it launched. Although, it only modified the building and dining room broader. From the researcher's observation, local culinary foods of Makassar can be properly improved. By continuously intensifying the promotions via information technology, creating kinds of innovation, improving the management, also enriching style and unique design of the rooms' layout are the ways to make local culinary foods become more burgeoned. Moreover, mental revolution is needed to start a business of local cuisine of Makassar in the current era of information technology. The main factors which have to be absolutely fixed are to upgrade the management performance into comprehensive and integrated ways. The management performance becomes as a must in order to achieve the better products, management, and sustainable efforts and have to be implemented from the top management to lower management until operator (employee of service operations).

Performance is a whole display of the company during the specific period of time, is the result of the achievements influenced by the operational activity of the company in utilizing the resources they have (Helfert, 2004; cited in Srimindarti, 2004; 53). Business performance can be discerned from financial and no financial and non-financial which is measured by using four perspectives: financial perspective, customer perspective, internal business perspective, and learning and growth perspective (Kaplan and Norton, 1996; cited in Mulyadi, 2001: 19). Information technology is also required. According Buhalis (2003: 204) mastery of information

technology become business strengths and tools for organizations that provide benefits to the promotional aspects and competitiveness.

The indicators of information technology are: perception of benefits, organizational readiness and external pressures. Besides information technology, local cuisine entrepreneurs should also improve their competitiveness as creative and innovative industries (Adams et al., 2006; Lyu, et al., 2009). The major characteristic for entrepreneurs is the ability to innovate (Larsen P and Lewis A, 2007: 6). The indicator of innovation used is product innovation, process innovation, market innovation. The quality of Human Resources became originality variable in this research (Faris, 2013: 27). According Ndraha (1997) human resources is resource which is able to create not only comparative value, but also the competitive value - generative - innovative by using mind such as intelligence, creativity, and imagination, using raw material energy such land, water, muscle, and so on. The quality of human resources are resources that meet the criteria of physical quality and health, intellectual qualities (knowledge and skills), and the quality of mental and spiritual (Danim, 1995).

## **II. LITERATURE REVIEW**

### **2.1. Information Technology**

The information technology has various interpretations, although each of definitions has the same gist. As stated by Bodnar and Hopwood (1995:11) that information technology can be mentioned as a series of hardware and software designed to transform the data into useful information. According to Robbins (2001:191) all of the organizations must have at least a technology that can change the financial resources, human, physics into a product or service. In general, the use of technology can be used to manage process, save, obtain, show, and send the data in various forms and methods to produce useful benefits for its users, so that the management can come into decision more quickly. Information technology can also be used for work integration vertically or horizontally (Martin et al. 1994). In Indonesia, the infrastructure is inadequate due to low average income of Indonesian citizen and cultural constraints (Hawk, 2004) become a factor that causes the low technological mastery in Small and medium size enterprises (SMEs). The research was conducted by Lefebvre, et al. (1991:170), there are four factors that determine the mastery of new technology by SMEs, namely: (1) the characteristics of SMEs, (2) the competition of business and management of SMEs, (3) the influence of internal and external in the process of decision making on adoption, and (4) the characteristics of the new technology that will be adopted. The indicators of Information technology are: the perception of benefits, organizational readiness and external pressures (Adams et al., 1992: 229).

### **2.2. Innovation**

According to Freeman (2005:3) innovation is the efforts of company to develop manufacture and market the new products to the industry or the public. In other words, innovation is the modification or the invention of idea for improvement and development of the products or business in order to fulfill customer needs. Innovation is one of the options and ways of entrepreneurs to face market competition and sustainable business management. Innovation is the ability to apply the creativity in solving the problems and opportunities to improve and enrich the business (Suryana, 2003: 10). One of the very important characters is the ability to innovate (Larsen, and Lewis, A, 2007: 6). According to Faris (2013: 27) indicators that will be used are product innovation, process innovation and market innovation.

### **2.3. Human Resources**

According to Ndraha (1997) the qualified human resources is human resources which is capable of creating not only a comparative value, but also the competitive value - generative - innovative by using the highest energy such as intelligence, creativity, and imagination, not solely exploit coarse energy such raw materials, land, water, muscle, and so on. As a comparison, the definition of quality of human resources as stated by Matindas (1997), quality of human resources is human resources which is not only having the ability to finish the job, but also to develop themselves and also encourage self-development of their colleagues or co-workers. Added by (Danim, 1995), indicators of the quality of human resources is who qualify the criteria of physical and health quality, intellectual quality (knowledge and skills), and mental and spiritual quality (will).

### **2.4. Business Performance**

Performance is a whole display of the company during the specific period of time, is the result of the achievements influenced by the operational activity of the company in utilizing the resources they have (Helfert, 2004; cited in Srimindarti, 2004; 53). Meanwhile, the performance measuring is measurement action that can be implemented on many activities in the company and had the main purpose to motivate the employees in achieving the organizational goals and to comply with the predetermined standards of behavior, so that attaining the actions and results expected. The balanced scorecard is a tool to measure the overall performance of the

company. Performance is viewed as financial and non-financial which is measured by using four perspectives, namely: the financial perspective, customer perspective, internal business perspective, and learning and growth perspective (Kaplan and Norton, 1996:23-25; cited in Mulyadi, 2001:353).

### III. METHODS

Collecting the data was conducted by using questionnaires, interview, observation and documentation. The data were analyzed with descriptive and inferential analysis.

1. Descriptive Analysis: used to analyze the data by illustrating or describing the collected data as it is without intending to make conclusion for the public.
2. Inferential analysis: used to test hypotheses 1 through 10 with the following equation:

$$Y = b_0 + b_1X_1 + b_2X_2 + b_3X_3 + e$$

$$Z = b_0 + b_1X_1 + b_2X_2 + b_3X_3 + b_4Y + e$$

While, on testing indirect influence through intervening variable is conducted by using Sobel test.

### IV. DATA ANALYSIS

The data of the research of local culinary business in Makassar City was conducted for 6 (six) months from June to December 2016. The scale of the questionnaire assessment used Likert scale 5-point, which represents Strongly Disagree (1), Disagree (2), Simply Agree (3), Agree (4) and Strongly Agree (5). The characteristics of respondents describe the identity of respondents like age, sex, marital status, education, occupation and years of service, which describe a correlation among the influence of information technology, innovation, and quality of human resources and business performance of local cuisine in Makassar.

**Table 1** Respondents

Respondents	Characteristics	Number of Respondents (N=174)	
		F	%
Gender	Male	111	63.79
	Female	63	36.21
Age (Years)	21-30	24	13.79
	31-40	85	48.85
	41-50	59	33.91
	> 50	6	3.45
Marital Status	Not Married	26	14.94
	Married	125	71.84
	widower / Widow	23	13.22
Level of education	Elementary	12	6.90
	Junior	53	30.46
	High School	107	61.49
	Universities	2	1.15
Position	Owner	10	5.75
	Manager	50	28.74
	Employee / staff	114	65.52
Work experience	10-15	17	9,80
	16-20	67	38,50
	21-25	82	47,12
	>25	8	4,60

The variable description is an interpretation of the results of each variable data based on indicators that have been calculated the percentage value and determined by the mean value. This analysis described the frequency or percentage of any indicators that establish the concept of overall research model.

**Table 2** Perception of information technology

Indicators	Scores										Mean
	1		2		3		4		5		
	f	%	f	%	f	%	f	%	f	%	
Benefit	12	6.9	19	10.9	25	14.4	62	35.5	56	32.2	3,74
Organizational Readiness	11	6.3	17	9.7	29	16.5	66	27.6	51	29.2	3,75
External pressure	8	4.6	14	8.1	32	18.4	68	38.9	52	29.9	3,83
Mean of Information Technology											3,77

From the table above, showed that the mean value for each variable of indicators of the information technology mastery. The benefits perception showed a mean value 3.74, the mean value of organizational readiness was 3.75 and external pressures which showed a mean value 3.83. It indicated that there were three indicators that provided different contributions to the information technology variables.

**Table 3** Perception of innovation

Indicators	Scores										Mean
	1		2		3		4		5		
	f	%	f	%	F	%	f	%	f	%	
Product innovation	8	4.5	17	9.7	21	12.1	72	41.4	56	32.2	3.89
Innovation Process	10	5.7	19	10.9	31	17.8	52	29.8	62	35.6	3.79
Market Innovation	13	7.4	17	9.8	35	20	60	34.5	49	28.1	3.66
Mean of innovation											3,78

From the table above, showed that the mean value for each variable of indicators of innovation. The mean value of product innovation was 3.74, the mean value of innovation process was 3.75 and market innovation showed a mean value 3.83. It indicated that there were three indicators that provided different contributions to innovation variables.

**Table 4** Perception of human resources

Indicators	Scores										Mean
	1		2		3		4		5		
	f	%	f	%	F	%	f	%	f	%	
Physical and health quality	17	9.7	24	13.8	8	4.6	60	34.4	65	37.3	3,77
Intellectual quality	9	5.2	13	7.5	1	0.6	71	40.7	80	46	4,15
Spiritual and mental quality	12	6.8	23	13.1	9	5.2	57	32.7	73	41.9	3,89
Mean of quality of human resources											3,94

The table showed that the mean value for each variable of indicators of human resources (HR). The mean value of physical and health quality was 3.77, the mean value of Intellectual quality was 4.15 and Spiritual and mental quality showed a mean value 3.89. It indicated that there were three indicators that provided different contributions to human resources variables.

**Table 5** Perception of business performance

Indicators	Scores										Mean
	1		2		3		4		5		
	f	%	f	%	f	%	f	%	f	%	
Financial perspective	17	9.8	22	12.6	18	10.3	66	37.8	51	29.3	3,64
Customer's perspective	1	0.6	46	26.3	15	8.6	69	39.6	43	24.7	3,52
Internal processes perspective	15	8.6	24	13.8	27	15.5	58	33.3	50	28.7	3,59
Learning and Growth Perspective	8	4.6	25	14.4	21	12.1	56	32.1	64	36.8	3,80
Mean of business performance											3,64

The table 4 showed that the mean values of each indicators of business performance variables. The mean value of the financial perspective was 3.64, the mean value of the customer's perspective was 3, 52, internal business perspective was 3, 59 mean values, and learning and growth perspective mean value was 3, 80. It indicated that the four indicators that have different contribution on performance variables. The table below was the result of test validity and reliability. The result of the research showed the test of the questionnaires. It assured that the instrument of the research was accurate, trusted and reliable. The table was as follows:

**Table 6** Validity Test

Instrument	Corrected Item Total Correlation	r-Product Moment r-table (n=174; $\alpha=0.05$ )	annotation
X <sub>11</sub>	0.709	0.170	Valid
X <sub>12</sub>	0.655	0.170	Valid
X <sub>13</sub>	0.708	0.170	Valid
X <sub>21</sub>	0.698	0.170	Valid
X <sub>22</sub>	0.754	0.170	Valid
X <sub>23</sub>	0.744	0.170	Valid
Y <sub>11</sub>	0.698	0.170	Valid
Y <sub>12</sub>	0.522	0.170	Valid
Y <sub>13</sub>	0.588	0.170	Valid
Y <sub>21</sub>	0.747	0.170	Valid
Y <sub>22</sub>	0.725	0.170	Valid
Y <sub>23</sub>	0.745	0.170	Valid
Y <sub>24</sub>	0.651	0.170	Valid

The result of reliability test was as follows:

**Table 7** Reliability Test

Variables	Cronbach's Alpha If Item Deleted	r-Product Moment r-table (n=174; $\alpha=0.05$ )	annotation
X <sub>1</sub>	0.887	0.149	Reliable
X <sub>2</sub>	0.896	0.149	Reliable
Y <sub>1</sub>	0.879	0.149	Reliable
Y <sub>2</sub>	0.875	0.149	Reliable

The analysis of the results of the research used Structural Equation Model (SEM) with Confirmatory Factor Analysis (CFA) of Analysis Moment of Structure (Arbuckle, 1997). Confirmatory Factor Analysis is used to test how well the measured variables represent the number of constructs. The analysis of the indicators which

is used to specify the number of factors required in the data and which measured variable is related to which latent variable or confirmed constructs.

Based on the method of determining the values in the model, so the first models of variables test are grouped into exogenous variables and endogenous variables. The exogenous variable is a variable whose value is determined outside the model, whereas the endogenous variable is a variable whose value is determined through the equation or from the established relationship model. Included in the group of exogenous variables are information technology and innovation, while variables which are classified as endogenous are the quality of human resources and performance. The result of model test is based on the goodness of fit indices with the criteria model as well as the suitability of the data with its critical value.

The result of model evaluation from SEM showed that from eight criteria of goodness of fit indices, the Chi-Square value was good enough but the overall criterion was not suitable with specified cut off value, so that the model was modified by conducting correlation between errors of indicators in accordance with the instruction of modification indices. The result of evaluation model test was based on goodness of fit. After conducting model modification, so in the final step showed there were seven that qualified the criteria of goodness of fit indices. Therefore, it could be deemed as fit to the criteria of cut off value. One criteria of goodness of fit indices that did not meet that is the AGFI. AGFI is not criteria used as main standard, so that the model could be said suitable with the criteria of goodness of fit indices to analyze.

The study was continued on testing hypotheses which proposed through coefficient test on the structural equation model. The hypothesis test can be determined with *p*-value, if the *p*-value is smaller than 0.05 then the correlation between variables are significant. Besides that, it also explains the direct effect. It means that there is a direct positive influence between the variables, while indirect effects which means there is a positive indirect effect between the variables, and the total effect is accumulation of direct and indirect effect. In testing of indirect effect through intervening variable is tested by using Sobel Test. The criteria of test was significant if *z*-value in absolute value > 1,96 or level of statistical significance *z* (*p*-value) < 0,05, it means that indirect effect or indirect effect of independent variable to dependent variable through mediator, significant at 0,05 significance level (Preacher and Hayes, 2004).

The test results are presented in the following table:

**Table 8** Hypotheses testing

Variable			Direct	Indirect	Total	P-Value
exogenous	Intervening	endogenous				
Information technology (X <sub>1</sub> )	-	Human resources quality (Y <sub>1</sub> )	0,825	-	0,825	0,043
Innovation (X <sub>2</sub> )	-	Human resources quality (Y <sub>1</sub> )	0,988	-	0,988	0,049
Human resources quality (Y <sub>1</sub> )	-	Business performance (Y <sub>2</sub> )	0,056	-	0,056	0,007
Information technology (X <sub>1</sub> )	-	Business performance (Y <sub>2</sub> )	0,002	-	0,002	0,992
Innovation (X <sub>2</sub> )	-	Business performance (Y <sub>2</sub> )	0,365	-	0,365	0,048
Information technology (X <sub>1</sub> )	Human resources quality (Y <sub>1</sub> )	Business performance (Y <sub>2</sub> )	0,002	0,046	0,048	0,109
Innovation (X <sub>2</sub> )	Human resources quality (Y <sub>1</sub> )	Business performance (Y <sub>2</sub> )	0,365	0,055	0,420	0,111

Based on hypothesis test result could be seen four hypothesis gave direct positive and significant influence, one hypothesis direct positive influence and insignificant. While the two hypotheses showed an indirect, positive and insignificant influence. Interpretation of test results could be explained that information technology directly had a positive and significant impact on the quality of human resources. The results of the test in accordance with the

hypothesis which proposed and the same with the findings by several researchers (Buhalis, 2003; Haag et al. 1998). Innovation directly had the positive and significant influence on the quality of human resources. The results of the test were suitable with hypotheses which were proposed and the same with the precise researches finding (Suryana, 2003; Larsen P and Lewis, 2007; Sebahattin et al. 2014).

The quality of human resources directly had positive and significant effect on business performance. The results of the test were fit to hypothesis which submitted and the same with the finding of several researches (Salim, 1996; Danim, 1995; Ndhara, 1997; Matindas, 1997). Information technology had positive influence and insignificant toward business performance. The result of the test is in line with the research conducted by Mudji Astuti et al. (2014) who stated that there was no significant effect between technology content and productivity. But in contrast to the research stated there was significant influence between information technology on business performance (Adam et al. 2006; Lyu et al. 2009; Adeosun et al. 2008; Arif Rahmana, 2009; Moorthy et al. 2012; Cofriyanti and Hidayanto, 2013). Innovation had positive and significant influence on business performance.

The results of the test were suitable with hypothesis which was submitted and the same with research by Freeman (2005), information technology indirectly had positive and insignificant influence on business performance through the quality of human resources (Soleh, 2008; Rosli and Sidek, 2013). The results of the test was like the research conducted Mudji Astuti et al. (2014) stated that there was no significant influence between human resources on productivity through information technology, the empirical evidence is denied by other researchers (Buhalis, 2003; Haag et al. 1998; Salim, 1996; Danim, 1995; Ndhara, 1997; Matindas, 1997). Innovation implicitly had positive and insignificant influence on business performance through quality of human resources. The results of the test were identical with the research conducted by Fatmariansi (2011) there was no significant influence between adopted information technologies with innovation on business performance of SMEs.

## **V. CONCLUSION**

Information technology among the local culinary food entrepreneurs in Makassar had a strong influence on the development of human resources quality. But directly and indirectly did not show sufficient influence on business performance of culinary food entrepreneurs. Innovation among the local culinary entrepreneurs in Makassar had strong influence on the development of human resources quality. This could be seen in the creativity of all local culinary entrepreneurs to create the products with various flavors, without leaving its identities behind as Makassar cuisine.

However, it did not directly and indirectly show sufficient influence on local culinary business performance. The quality of human resources as an intervening variable was meaningfulness, because it had positive mathematical sign. Thus, the variables of human resources quality enlarged the influence of exogenous variables toward endogenous variables of the research. The most significant and influential way was: Partnership - Quality of Human Resources - The Business Performance of Local Cuisine. It means, in order to optimize the service to customers, the local culinary entrepreneur must be able to maintain, even increase affectivity collaboration with the suppliers and improve the skills for all employees. The ability to keep cooperating with business partners, especially suppliers are an important factor to ensure the quality of local culinary foods.

There were some limitations that hampered this research, they are (1). Demographically, the characteristics of respondents in this research focused on owners, managers and employees who worked over 10 years, and it has not conducting the research on consumers yet. (2). Geographically, the respondents were still limited only townspeople of Makassar, while there were still many local culinary entrepreneurs in town or other regency in South Sulawesi province which have not observed yet. It could be concluded that the improvement of business performance through the improvement of information technology could upgrade information technology equipments and the improvement of its human resource skills in the usage of information system. The improvement of business performance through the improvement of innovation could be aimed to ongoing efforts to find brand new ideas in processing and presentation of culinary foods with while maintaining uniqueness of the favors.

The support from the institutions or departments in developing creative economy was highly expected, from Local Government, Department of Tourism and Creative Economy, Department of Trade and Industry, Education Office, Office of Manpower, Department of Cooperatives and SMEs, nongovernmental organizations (NGOs), Institute of Research in university, Small-medium enterprise association to synchronize the efforts in fostering and developing creative economy, especially in local culinary field.

## **REFERENCES**

- [1]. Adams, D. A., Nelson, R. R., & Todd, P. A. (1992). Perceived usefulness, ease of use, and usage of information technology: A replication. *MIS quarterly*, 227-247.

- [2]. Adeosun, O. O., Adeosun, T. H., Adetunde, I. A., & Adagunodo, E. R. (2008, December). Strategic application of information and communication technology for effective service delivery in banking industry. In Computer and Electrical Engineering, 2008. ICCEE 2008. International Conference on (pp. 135-140). IEEE.
  - [3]. Buhalis, D. (2004). eAirlines: strategic and tactical use of ICTs in the airline industry. *Information & Management*, 41(7), 805-825.
  - [4]. Cofriyanti, E., & Hidayanto, A. N. (2013). The relationship among organisations' factors, information technology, innovation and performance: an Indonesian SMEs study. *International Journal of Innovation and Learning*, 14(3-4), 422-443
  - [5]. Farisi, R. A. (2013). Influence Of Innovation And Creativity Of Entrepreneurs To Business Success: Survey on Entrepreneurs in Rajut Binong Jati Bandung (Doctoral dissertation, Universitas Pendidikan Indonesia)
  - [6]. Fatmarini, (2011). The Influence Of Open Source Information Technology Adoption To The Performance Of SMEs With Factor Factor Technology Acceptance Model (TAM) As Moderating Variable, Vol. 1 No. 1, *Journal of Technology and Infomratika, STMIK PalCom Tech Palembang*.
  - [7]. Freeman, G. T. (2005). The library as place: Changes in learning patterns, collections, technology, and use.
  - [8]. George, B. H., & Hopwood, S. (1995). William. *Accounting Information System*, Indonesian edition, by Amir Abadi Jusuf and Rudi M Tambunan, book one of the sixth editions. Publisher Salemba Empat, Jakarta.
  - [9]. Haag, S., Cummings, M., & Dawkins, J. (1998). *Management information systems for the information age*. McGraw-Hill.
  - [10]. Hawk, S. (2004). A Comparison of B2C e-commerce in Developing Countries. *Electronic Commerce Research*, 4, 181-199.
  - [11]. Helfert, E. A. (2004). *Financial Analysis Technique: A Practical Guide to Managing and Measuring Company Performance*. Language translation by Herman Wibowo, Eighth Edition Jakarta: Erlangga
  - [12]. Larsen, P., & Lewis, A. (2007). How award-winning SMEs manage the barriers to innovation. *Creativity and innovation management*, 16(2), 142-151.
  - [13]. Lefebvre, L. A., Harvey, J., & Lefebvre, E. (1991). Technological experience and the technology adoption decisions in small manufacturing firms. *R&D Management*, 21(3), 241-249.
  - [14]. Martin, E. W., Brown, C. V., Hoffer, J. A., Perkins, W. C., & DeHayes, D. W. (1998). *Managing information technology: What managers need to know*. Prentice Hall PTR.
  - [15]. Matindas, R. (1997). *Quality of Human Resources*. Jakarta. Pustaka Utama
  - [16]. Mcleod Jr., R. (1995). *Management information system: Study computer-based information system*. Jakarta: Bhuana Computer Science
  - [17]. Mohammad Jafar Hafisah, (1999). *Business Partnership Conception and Strategy*. Jakarta. Pustaka Sinar Harapan
  - [18]. Moorthy, M. K., Tan, A., Choo, C., Wei, C. S., Ping, J. T. Y., & Leong, T. K. (2012). A study on factors affecting the performance of SMEs in Malaysia. *International journal of academic research in business and social sciences*, 2(4), 224.
  - [19]. Mudji Astuti, Hana Catur W, Wiwik Sulistiyowati, Udisubakti C, Putu Dana K. (2014). *Spectrum Indonesia*. Vol 12, No. 1, 1-112, ISSN: 1963-6590, ITS Surabaya
  - [20]. Mulyadi, B. S. (2001). *A Contemporary Management Tool for Multiplying the Company's Financial Performance*. Jakarta: Salemba Four.
  - [21]. Ndraha. (1997). *Introduction to Human Resource Development Theory*. Jakarta. Publisher Rineka Cipta
  - [22]. Preacher, K. J and Hayes, A. F., 2004. *SPSS and SAS Procedures for Estimating Indirect Effects in Simple Mediation Models. Behavior Research Methods, Instruments, & Computers*, 36 (4), 717-731. Psychonomic Society, Inc.
  - [23]. Rahmana, A. (2009). The role of information technology in improving the competitiveness of small and medium enterprises. *National Seminar on Information Technology Application 2009*. Yogyakarta
  - [24]. Robbins, S.P. (2001), *Organizational Behavior*, Ninth Edition, Prentice Hall International, Inc.
  - [25]. Rosli, M. M., & Sidek, S. (2013). The Impact of Innovation on the Performance of Small and Medium Manufacturing Enterprises:: Evidence from Malaysia. *Journal of Innovation Management in Small & Medium Enterprises*, 1.
  - [26]. Salim, Emil. (2006) *Mental Attitudes Aspect in Human Resource Management*, Bogor. Ghalia Indonesia.
  - [27]. Soleh, M. (2008). *Analysis of innovation strategy and its impact on company performance (Case study: manufacturing SMEs in Semarang city)* (Doctoral dissertation, Diponegoro University Graduate program).
  - [28]. Srimindarti, C. (2004). *Balanced Scorecard As an Alternative to Measuring Performance*. *Economic Focus*, 3 (1), 52-64.
  - [29]. Sudarwan, D. (1995). *Human Resources Transformation*. Jakarta: Bumi Aksara.
  - [30]. Tiyara, Sari, (2011). *Utilization of Information Technology Mastery And Its Influence On Performance Of UMKM (Small And Medium Enterprises) In Surabaya Region*. Perbanas,
- Note:
- [31]. Since Camera Ready copy of the paper is final one, no further modification is entertained. So please make sure that the contents and format is fit for the Journal.
  - [32]. Mail the Camera Ready paper in MS-Word format to [thejjes@submitmails.com](mailto:thejjes@submitmails.com)

Iwan Perwira. "The Effect of Information Technology and Innovation on the Quality of Human Resources and Business Performance (An Exploratory Study of Typical and Traditional Culinary Typical of Makassar Famous)." *The International Journal of Engineering and Science (IJES)*, vol. 6, no. 9, 2017, pp. 05–12.