

The Analysis of Human Resource Management Performance during Work from Home using Human Resource Scorecard Method

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Abstract

The pandemic of COVID-19 spreading in Indonesia has forced the government to create an issue; work from home (WFH) policy. WFH changed the organization's work system which was originally face-to-face to become virtually. Changes in the work system are considered to be able to affect organizational performance. Indirectly, the implementation of WFH has an impact on the performance of the organization and its human resources. This study aims to analyze the performance of the management of PT. X especially in human resources during WFH implemented by the company. Results based on the strategic objectives obtained 7 KPIs. The results of the HR Scorecard method are that there are 4 perspectives, including financial perspective, customer perspective, internal business process perspective and learning and growth perspective. By using the Analytical Hierarchy Process (AHP) method, priority performance indicators were found, namely the percentage change in performance before and after training and employee satisfaction scores. Measurement of performance indicators against supervisory targets using the Traffic Light System (TLS) gives results if there are 2 assessment indicators that meet the target and 5 assessment indicators that have not reached the target. The indicator that experienced a decline was employee training. Using the 5 whys analysis method is known to cause a decrease in employee assessment indicator; the assessment that cannot be implemented virtually.

Keywords: Analytical hierarchy process; covid-19; human resource; work from home

1. Introduction

The world is currently suffering the COVID-19 pandemic. Various regulation are applied by every country around the world to suppress the spread of the COVID-19 virus [1]. The regulations applied affect almost all aspects of life, especially human activities that require gathering and activities in one place. Companies and organizations as a place where people gather to carry out an activity are really impacted by the regulations implemented during the pandemic [2].

The government is working to develop various policies to break the chain of transmission of the Covid-19 virus. These policies are being implemented in every industrial sector. The government then issued a circular from the Director General of Manpower Supervision and Occupational Safety and Health Number 5/193/AS.02.02/III/2020 concerning Preparedness in Facing the Spread of Covid-19 in the Workplace, which outlines preventative measures that can be taken.. The change in the work environment from a company or

facility such as a work area outside the company (workspace) to being at home suddenly requires its own mental readiness to maintain productivity. This is because there is no longer a connection between the work area and the personal or family area. According to [3], this change has a huge impact on one's productivity. Research in [4] identified a significant decrease in performance after the implementation of WFH.

Work productivity is a very crucial aspect in determining the sustainability of a company. Ohno stated in [5] that business continuity and competitiveness is highly dependent on the human resources. Many businesses have been impacted by the COVID-19 pandemic, both small and large. Therefore, companies need to immediately review performance and productivity of their employees so that the business can survive from the crisis in this pandemic era.

Employee performance and productivity can be measured using several methods developed in the field of human resource management. Human Resource Scorecard (HR Scorecard) is a performance measurement method that considers organizational dynamics [6]. HRSC uses

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various indicators that represent the organization's overall strategy, operational process, customer perception, and finance to evaluate the effectiveness of human resource initiatives. HRSC provides a means to monitor workforce indicators, analyze workforce statistics, diagnose workforce problems, calculate negative impacts from financial aspects, formulate solutions, and identify performance improvements [7]. Based on the above explanation, this study aims to examine employee productivity during WFH through performance measurement using the human resource scorecard method, analytical hierarchical process, traffic light system and analysis method using 5 why analysis.

2. Literature review

Performance is defined as act or process of carrying out or completing a task. According to Bateman & Snell in [8], performance is an individual's work achievement obtained by trying to gain meaning and benefit from his work. Fundamentally, according to [9], performance consists of two aspects; aspect of behavior and aspect of outcome. The behavioral aspect is shown through a person's actions to complete a job, while the outcome aspect includes the consequences of individual work behavior. In performance management, individual performance is expected to be in line with organizational policies [10]. An effective employee performance management system is crucial for an organization. The effectiveness of the employee performance management system can be achieved through the full utilization of human resources to increase organizational success [11].

The development of both manufacturing and service industries is highly dependent on the quality of human resources [12]. There is no single organization, whether for-profit or non-profit, which is fully capable of providing services or producing products without human resources [13]. Therefore, humans are valued as an important resource and capital to carry out most commercial and non-commercial activities. Humans as resources in organizations with knowledge, skills, abilities, and other characteristics are at the forefront of consideration for employers. Every year, organizations around the world spend huge sums of money recruiting competent people to achieve success and maintain their business [14]. These organizations compete for superior human resources. The competitive environment then places work and people management at the center of organizational activity. Overall organizational decisions and activities related to human resources generally refer to the realm of human resource management (HRM) [15]. Human resource management is a strategic approach in managing human resources effectively and efficiently so that it can help businesses gain a competitive advantage [16]. HRM is designed to maximize employee performance in serving the strategic objectives of the employer. Beer stated that HRM involves all management decisions and actions that affect the nature of the relationship between an organization and its human resources [17].

The COVID-19 pandemic has brought significant changes to organizational activities. The most visible change is the shift from traditional work method, where all activities were previously centered in the office, to work

from home. This is conducted to reduce or stop the spread of the COVID-19 virus.

In academics also there is no consensus over one definition of WFH. WFH is often interchangeably used as Telework, however, there lie some inherent differences between the two [18]. WFH can be construed as a subset of Telework, as telework not only includes the work performed from home but also the work which can be performed while travelling. Along with the massive implementation of WFH in almost all business sectors, it is necessary to measure employee performance. This is to find out and evaluate the effectiveness of WFH, so that human resource management can still run as it should and adapt to the radical changes that are currently happening.

Measurement of employee performance in various organizations generally refers to the performance indicators set by each organization. Employee performance indicators or commonly called KPI (key performance indicator) must be in line with the objective and development of the organization. However, since wfh had been implemented, there has been no adjustment to key employee performance indicator (KPI) measurement. The company does not yet have KPI employee measurements relating to the implementation of telework. In addition, the current KPI measurement does not use the balanced scorecard method. Kaplan and Norton found a performance measurement that considers four aspects; finance, customer, internal business process and learning, and growth [19]. The approach is the Balanced Scorecard which provides a comprehensive framework that can translate the company's strategic objectives into the overall measurement of the company's performance. Balanced scorecard is a tool that allows management to track the result of financial performance and at the same time monitors the progress of the company's organization in general. Thus, this study recommends developing KPIs using a balanced scorecard.

3. Research methodology

This research was conducted at PT. X which is located in Makassar. Data retrieval is done virtually via WhatsApp. Data obtained from this research are:

- Primary data; this type of data is data obtained directly. Data of this study were obtained by using questionnaires and interviews with respondents.
- Secondary Data; this type of data is data obtained from the company. This research data includes the company's vision and mission, target, and company's target achievement in 2019 and during the WFH period.

The vision of the HR division is to find, select, place, and develop human resources in accordance with the expertise of the employees and the needs of the company. Then the missions of the HR division are:

- Selecting and placing workers based on skills, abilities and experience that are in accordance with the needs of the company.
- Improving the empowerment of the company's human resources according to high performance standards so as to encourage creativity, efficiency, effectiveness, and productivity of the company.

- Developing employee behavior that has integrity and ethics according to company standards and rules. Company data and company's target achievement can be seen in Table 1.

Table 1. HR division performance in 2019

No	Assessment Indicator	Target	Achievement
1	Percentage related to productivity change	100%	90%
2	Employee satisfaction score	5	4
3	Customer satisfaction score	5	4
4	Percentage of turnover	Max 1,5%	0,5%
5	Percentage of Recruitment standard	100%	100%
6	Employee competency score	100	75
7	Employee training	5	5

From the data, it is known that there are 4 assessment indicators that have not attained, meanwhile the other 3 targets have already achieved.

The research methods used in obtaining the data for this final project are:

1. Literature review

Literature study is a method used to gain knowledge and theoretical basis in analyzing data and problem through written works and other sources as consideration in writing this final project.

2. Field research

Field research is research conducted by collecting primary data through interviews and distributing questionnaires to respondent at PT. X [20]. Preparation of HRSC should be carried out by HR manager as they are considered to have the authority and significant role in developing HR. The additional criteria in the selection include:

- Respondents participate in deciding the assessment indicator,
- Have the capability to conduct performance appraisal

Respondent who meets these criteria is HR Division Manager.

To implement the strategic objectives of the HR division towards measuring HR performance, there are 7 steps that need to be taken by the company:

1. Define business strategy clearly
2. Build a business case for HR as a strategic asset
3. Create a strategy map
4. Identify HR deliverables in the strategy map
5. Align HR "architecture" and HR deliverables
6. Design strategic HR measurement system
7. Implement management through measurement

A well-implemented HRSC will more than just meet the company's targets, but the measurement results will become the basis for managing HR as a company's strategic asset.

In the AHP method, the following steps must be taken:

1. Define the problem and determine the desired solution

2. Establish a hierarchical structure starting with the main goal
3. Create a pairwise comparison matrix
4. Define pairwise comparison so that the total number of assessors is $n \times [(n-1)/2]$ pieces, where n is the number of elements being compared.
5. Calculate Eigen value and test the consistency, if it is not consistent then the data collection should be repeated.
6. Calculate the value/weight for each criterion located in the lower triangle by dividing each element by the comparator in the upper triangle. Calculate the normalization matrix by:
 - a. Add up the values of each column in the matrix (column total).
 - b. Then divide the values for each column by the total value of the column, so that the value of each normalized matrix for each element is obtained.
 - c. Calculate the value of the priority vector by adding up the values of each row of the normalized matrix values and dividing by the number of the elements.
 - d. The next step is to measure the consistency to obtain consideration with low consistency (in this case, the consistency ratio value is 0.1). To measure consistency, the steps that must be taken are to calculate:

- Calculating Principal Eigen Value (λ_{max}), by adding up the product of the value in the Priority Vector column with normalized eigenvector value.
- Calculating the Consistency Index (CI) with equation:

$$CI = \frac{\lambda_{max} - n}{n - 1}$$

- Calculating Consistency Ratio (CR) value to determine the tolerance limit for inconsistency with the equation:

$$CR = \frac{CI}{RI_n}$$

Saaty in [21] has determined a scale to get the value of a Random Index (RI) according to the number of criteria used. The following are the values for RI:

Table 2. Random consistency index (R.I)

1	2	3	4	5	6	7	8	9	10
0	0	0.52	0.89	1.11	1.25	1.35	1.40	1.45	1.49

Traffic Light System is a method used to conceive the achievement of company performance according to 3 categories of color; red, yellow, and green. The limit of each color category is determined through discussion with the company. The color category can make it easier for the company to evaluate the company's whether it is in accordance with the target or not.

The 5 whys analysis is a structured approach which inquires why questions repeatedly to understand the root of the problem, and producing effective corrective action to reduce the causes of the problem. This method can prevent recurring problems.

The overall performance measurement framework adopted in this study is presented in Fig. 1.

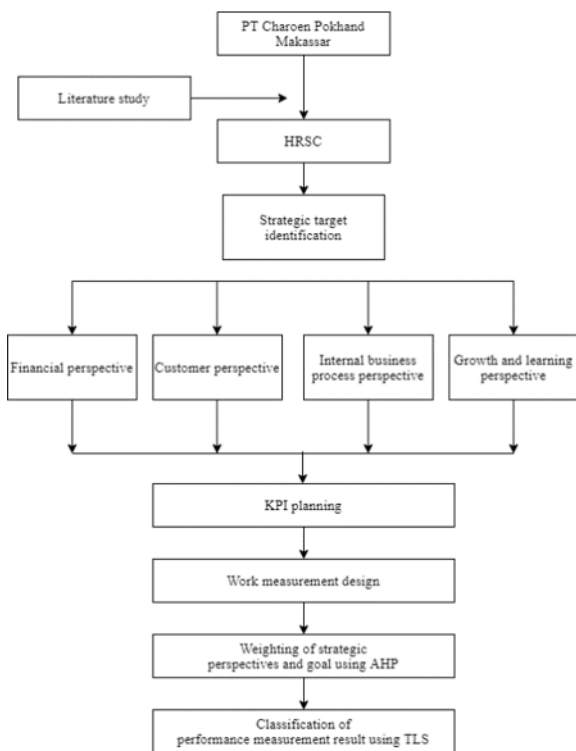


Figure 1. Framework

Performance scoring at PT. X uses the AHP method as well as Microsoft Excel software with the aim of giving scoring to perspective, strategic goal and KPI. This scoring is useful for selecting or deciding the priority perspective.

1. Defining business strategy

At this stage, respondents determine strategic target based on the vision of HR division. The strategic objectives are based on 4 perspectives;

2. Building a business case for HR

The business case referred here is why and how HR can support the company's strategy. This is in the form of the role of HR in supporting company's strategy as written in Table 3.

Table 3. The role of HR towards strategic goal

No	Strategic Target	HR Role
1	Improvement of Employee Productivity	Employees work diligently and are highly disciplined.
2	Improvement of employee satisfaction	Using office facilities and infrastructure.
3	Customer Service Orientation competency improvement	Applying the training result obtained
4	Increase of employee loyalty	Have integrity towards the company and responsibility.
5	Improvement of recruitment standard	Meet the qualification of employee set by the company
6	Integrity and ethics enhancement	Have responsible, honest and moral behavior.
7	Employee training	Participate in training both in improving hard skills and soft skills.

3. Designing strategic map

The strategic map as shown in Fig. 2 illustrates the interrelationships between strategic objectives marked by using arrow lines.

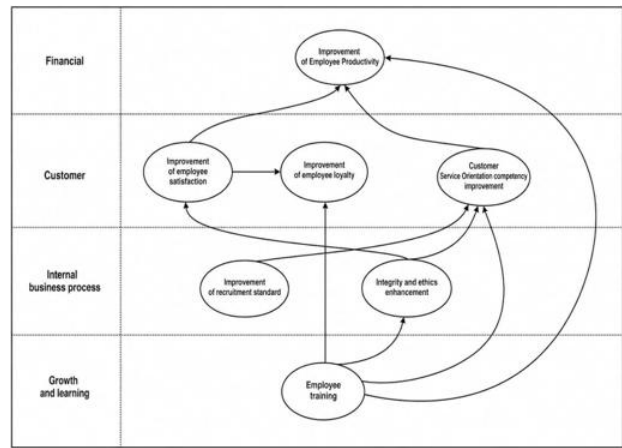


Figure 2. Strategic map PT. X

4. Identify HR deliverables in strategy map
 HR Deliverables include 2 categories; performance drivers and HR enablers (which enable performance to take place).

Table 4. HR deliverables

Strategic target	Performance Driver	HR Enablers
Improvement of Employee Productivity	Provide guidance and training	Training according to employee needs
Improvement of employee satisfaction	Improving the quality of office facilities and infrastructure. Appropriate salary and benefit.	How managerial lines work
Customer Service Orientation competency improvement	Provide guidance and training	Competency evaluation results
Employee loyalty increase	Provide employee right and reward fairly.	Good management skills.
Improvement of recruitment standard	Setting recruitment qualification standard according to company needs.	Determination of competency dictionary
Integrity and ethics enhancement	Provide rewards to employees whose performance meet targets, respects each other's opinions exemplified at meetings and apply company values.	Evaluation of employee performance and work behavior
Employee training	Provide training and guidance in accordance with the needs of employees.	HR division performance evaluation

5. Aligning HR "Architecture" and HR deliverables

In the HR architecture there are 3 value chains; HR function, HR system and HR behavior. In step 4, HR Deliverables have been described which will be linked to the HR architecture.

First, the HR function is a role that will be carried out by employees. Based on HR deliverables, employees are expected to work more actively and efficiently, especially after receiving training and guidance.

Second is HR systems, which are the policies that will be implemented by employees. Based on HR deliverables, the intended policy is the use of recruitment standard based on the competency dictionary and following the performance evaluation of the HR division.

Lastly, HR behavior is intended to support the achievement of HR function and system. HR behavior such as participating in training held by the company, respecting opinion among employees and using the facilities provided by the office.

- At this stage, KPI is determined for each strategic target used in improving performance of HR division. The KPI for each perspective can be seen in Table 5.

Performance scoring at PT. X uses the AHP method as well as Microsoft Excel software with the aim of giving scoring to perspective, strategic goal and KPI. This scoring is useful for selecting or deciding the priority perspective.

Table 5. Perspective weight

Perspective	Scoring
Financial	0.42
Customer	0.42
Internal Business Process	0.11
Learning and Growth	0.06

Table 6. Strategic goal scoring

Strategic Goal	Scoring
Improvement of Employee Productivity	1
Improvement of employee satisfaction	0.4
Customer Service Orientation competency improvement	0.2
Employee loyalty increase	0.4
Improvement of recruitment standard	0.33
Integrity and ethics enhancement	0.67
Employee training	1

TLS indicator is presented in three colors; green as the color with the highest score or when the target is achieved, yellow if the score is moderate or the achievement is close and red is the indicator for the lowest score or achievement is far below the target. The company can determine the range of the indicator value. The indicator limit that have been determined by the company are red with a percentage of 0-50%, yellow with a percentage of 51%-80% and green with a percentage of 81%-100%. Through the use of TLS method, the result of performance measurement can be seen in Table 7.

Table 7. Traffic light system result

No	WFH assessment indicator
1	Percentage of change in productivity
2	Employee satisfaction score
3	Customer satisfaction score
4	Turnover percentage
5	Recruitment standard percentage
6	Employee competency score
7	Realized employee training

The result obtained in the performance measurement is compared with the result of the measurement in the previous year or when WFH has not been implemented. Here is the assessment comparison.

Table 8. Comparison of assessment indicator in 2019 and during WFH

2019 assessment indicator	WFH assessment indicator
Percentage of change in productivity	Percentage of change in productivity
Employee satisfaction score	Employee satisfaction score
Customer satisfaction score	Customer satisfaction score
Turnover percentage	Turnover percentage
Recruitment standard percentage	Recruitment standard percentage
Employee competency score	Employee competency score
Realized employee training	Realized employee training

Based on Table 8 there is a change in achievement in indicator 7-realized employee training. In this study, the “realized employee training” indicator is identified as not being achieved after WFH. To solve this problem, the 5 whys analysis method is used. The following is the result of the analysis using the 5 whys analysis method:

- Employee training has not reached the target
- Employee training is not realized
- Cannot be conducted virtually
- Practical training
- Improvement recommendation; redesign the form of training and make it more flexible

According to results of the analysis using the 5 whys method, the factors that affect the non-achievement of the number of training targets are due to the training is practical and cannot be conducted virtually. The recommendation for improvement proposed in this research is to redesign the form of the practical training so that it can be implemented virtually.

4. Conclusion

Based on the results of this study, it can be concluded that the key performance indicators (KPIs) were developed through the identification of strategic objectives within the Human Resources (HR) division. This process resulted in seven KPIs, namely the percentage change in employee performance before and after training, employee satisfaction score, customer satisfaction score, employee turnover rate, percentage of recruitment completed within 60 days, employee competency score based on knowledge, skills, and attitudes, and the number of training programs successfully implemented.

The weighting of perspectives, strategic objectives, and KPIs was carried out using the Analytic Hierarchy Process (AHP) with Microsoft Excel. The analysis showed that the highest-priority strategic objectives were improving employee productivity and employee training, each receiving a priority score of 1.00. Integrity and ethics enhancement ranked next with a score of 0.67.

Furthermore, the performance measurement conducted using the Human Resources Scorecard (HRSC), AHP, and Traffic Light System (TLS) methods at PT. X revealed that only two of the seven performance indicators achieved their predetermined targets, while the remaining

five indicators failed to meet the expected performance levels.

Among the underperforming indicators, employee training experienced the most significant decline. The findings indicate that this issue was primarily caused by the inability to effectively implement certain training programs in a virtual environment during the Work From Home (WFH) period. Therefore, the study highlights the need for organizations to develop more adaptive and effective digital training strategies to ensure continuous employee competency development and maintain organizational performance under remote working conditions.

Acknowledgments

This research was funded by the LBE Research Grant of the Faculty of Engineering, Hasanuddin University 2021.

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