

Implementation of Competency-Based Human Resources Management on the Productivity of State Civil Apparatus in Medan City

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Abstract

This study aims to analyze the effect of competency-based human resource (HR) management implementation on the productivity of the State Civil Apparatus (ASN) in Medan City. The study employed a quantitative approach with an explanatory research design to examine the relationship between competency-based HR management and ASN productivity. The research was conducted within Regional Apparatus Organizations (OPD) of the Medan City Government. Data were collected through questionnaires distributed to ASN respondents using a five-point Likert scale and supported by documentation studies related to personnel management policies. The sampling technique used proportional random sampling, while data analysis was conducted using descriptive statistics and simple linear regression analysis. The findings indicate that the implementation of competency-based HR management in Medan City is categorized as good, particularly in aspects of HR planning, recruitment and selection, competency development, performance appraisal, and career development. In addition, ASN productivity was found to be relatively high in terms of work effectiveness, efficiency, quality of work results, and punctuality. The regression analysis revealed that competency-based HR management has a positive and significant effect on ASN productivity, with a determination coefficient showing that competency-based HR management contributes substantially to improving employee productivity. These findings confirm that the implementation of a competency-based HR management system can strengthen the professionalism, performance, and effectiveness of public sector employees. Therefore, local governments are encouraged to consistently enhance competency mapping, career development, and performance evaluation systems to support sustainable improvements in public service quality.

Keywords: Competency-Based Human Resource Management; ASN Productivity; Public Service Performance; Merit System, Medan City

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INTRODUCTION

The productivity of the State Civil Apparatus (ASN) is one of the key indicators of successful local government administration. ASN are expected not only to perform administrative duties but also to deliver effective, efficient, and citizen-oriented public services (Pae et al., 2024). In Indonesia, improving ASN productivity has become an important agenda within bureaucratic reform, particularly in enhancing the quality of governance and public service delivery. As one of the largest metropolitan cities in Indonesia, Medan faces increasingly complex administrative and social challenges that require highly competent and adaptive civil servants. Rapid social change, increasing public expectations, and regional competition have encouraged local governments to strengthen the capacity and professionalism of ASN (Sedarmayanti & Haryanto, 2017).

Human resource management (HRM) plays a strategic role in optimizing the performance and productivity of ASN. Ineffective HRM practices may lead to low employee performance, weak organizational effectiveness, and limited achievement of public service goals (Malayu & Hasibuan, 2017). Therefore, public organizations need a systematic and competency-oriented HRM approach to ensure that employees possess the skills, knowledge, and attitudes required to perform their duties effectively. One approach that has gained significant attention is competency-based human resource management. This approach emphasizes the alignment between employee competencies and job requirements, enabling employees to perform optimally according to organizational expectations (Spencer & Spencer, 2008).

Competency-based HRM includes several important aspects, such as workforce planning, recruitment and selection, training and development, performance appraisal, promotion, and career management (Wibowo, 2017). Through this system, organizations are expected to place the right employees in the right positions based on their competencies and professional qualifications. In line with this concept, the Indonesian government has promoted the implementation of the merit system in ASN management as part of bureaucratic reform policies. The merit system prioritizes professionalism, objectivity, competence, and fairness in personnel management processes (Sari et al., 2025). Consequently, competency-based HRM is considered highly relevant because it minimizes subjective and politically driven practices in government bureaucracy.

Despite these efforts, the implementation of competency-based HRM within government institutions has not always been fully effective. Several studies indicate that there are still gaps between policy formulation and practical implementation, particularly in competency mapping, career development, and performance evaluation systems (Amalia & Zalukhu, 2025). In the context of Medan City Government, various policies and programs related to competency development and merit-based management have been introduced. However, the productivity and performance of ASN remain important concerns, especially regarding work effectiveness, efficiency, and the quality of public services provided to the community (Kadarisman, 2019).

ASN productivity is influenced not only by individual competencies but also by organizational systems that support employee development and performance improvement. Factors such as leadership, organizational culture, work environment, and performance appraisal systems significantly affect employee productivity (Anwar Prabu, 2017). Competency-based HRM is expected to create a more professional, accountable, and performance-oriented bureaucracy. Employees whose competencies match their job requirements are more likely to demonstrate higher performance and contribute positively to organizational goals (Armstrong, 2014).

Furthermore, competency-based HRM can enhance employee motivation and organizational commitment. Employees who receive continuous competency development opportunities and fair recognition tend to show stronger engagement and responsibility toward their work (Judge & Robbins, 2013). Therefore, examining the relationship between competency-based HRM and ASN productivity is important to provide empirical evidence regarding the effectiveness of this management approach within the public sector. The findings of this study are expected to contribute to the improvement of personnel management systems at the regional government level (Sugiyono, 2017).

This study is also relevant to the broader context of outcome-oriented bureaucratic reform, where local governments are required not only to comply with regulations but also to demonstrate measurable performance and high-quality public services (Osborne, 2010). In this regard, evaluating the implementation of competency-based HRM becomes essential to determine its influence on ASN productivity in Medan City. In addition, this study seeks to identify factors that support or hinder the successful implementation of competency-based HRM within local government institutions.

Based on the above explanation, the study entitled *"Implementation of Competency-Based Human Resources Management on the Productivity of State Civil Apparatus in Medan City"* is considered relevant and significant for supporting bureaucratic performance improvement and enhancing the quality of public services in local government administration.

RESEARCH METHODS

This study employed a quantitative research approach using an explanatory research design to examine the influence of competency-based human resource management on the productivity of the State Civil Apparatus (ASN) in Medan City. The quantitative approach was selected because it enables the researcher to measure relationships between variables objectively through statistical analysis and empirical testing (Sugiyono, 2017). The explanatory design was considered appropriate for identifying the causal relationship between competency-based HR management as the independent variable and ASN productivity as the dependent variable.

The research was conducted within Regional Apparatus Organizations (Organisasi Perangkat Daerah/OPD) under the Medan City Government. The selection of this location was based on the consideration that the Medan City Government has implemented merit-system policies and competency-based personnel management as part of bureaucratic reform efforts. These conditions provide a relevant context for analyzing the effectiveness of competency-based HR management practices in improving ASN productivity.

The population of this study consisted of all ASN employees working in the OPDs of the Medan City Government. Due to the relatively large population size, the study applied a probability sampling technique, specifically proportional random sampling, to ensure that every ASN had an equal opportunity to be selected as a respondent (Arikunto, 2019). The sample size was determined using the Slovin formula with a 5% margin of error to obtain representative research data that accurately reflect the population characteristics (Sugiyono, 2019).

This study involved two main variables. The independent variable was competency-based human resource management, while the dependent variable was ASN productivity. Competency-based HR management was measured through several indicators, including workforce planning, recruitment and selection, competency development, performance appraisal, and career development (Wibowo, 2017). Meanwhile, ASN productivity was measured using indicators such as work effectiveness, work efficiency, quality of work results, and punctuality in task completion (Sedarmayanti, 2018).

Data collection was conducted primarily through questionnaires distributed directly and online to ASN respondents. The questionnaire used a five-point Likert scale ranging from strongly disagree to strongly agree. In addition, supporting data were collected through documentation studies, including personnel regulations, government reports, and official documents related to ASN management within the Medan City Government (Sugiyono, 2017).

Before data collection, the research instrument underwent validity and reliability testing to ensure the accuracy and consistency of the measurement instrument. The validity test was conducted using Pearson Product-Moment correlation analysis, while the reliability test employed Cronbach's Alpha coefficient. Instruments were considered reliable if the Cronbach's Alpha value exceeded the acceptable reliability standard (Ghozali, 2018).

The collected data were analyzed using both descriptive and inferential statistical techniques. Descriptive statistical analysis was used to describe respondent characteristics and summarize responses related to competency-based HR management and ASN productivity.

Inferential statistical analysis was applied to test the research hypothesis and determine the influence of the independent variable on the dependent variable (Sugiyono, 2017).

Hypothesis testing was carried out using simple linear regression analysis to measure the extent to which competency-based HR management affects ASN productivity. Furthermore, the t-test was used to examine the significance of the regression coefficient, while the coefficient of determination (R^2) was used to identify the proportion of ASN productivity explained by competency-based HR management variables (Ghozali, 2018). All statistical analyses were processed using statistical software to improve the accuracy and objectivity of the research findings.

RESULTS AND DISCUSSION

Description of the Implementation of ASN Competency-Based Human Resources Management in Medan City

The findings of this study indicate that the implementation of competency-based human resource management (HRM) within the State Civil Apparatus (ASN) of Medan City is generally categorized as good. This result is reflected in the average scores obtained from several indicators, including HR planning, recruitment and selection, competency development, performance appraisal, and career development. Overall, respondents perceived that the ASN management system in Medan City has referred to competency standards and merit-based principles in personnel management. Nevertheless, several respondents noted that the implementation of competency mapping and competency development programs has not yet been fully optimal across all Regional Apparatus Organizations (OPDs).

Table 1. Description of Competency-Based HR Management Implementation

Competency-Based HR Management Indicators	Average Score	Category
HR Planning	3,98	Good
Recruitment and Selection	4,05	Good
Competency Development	3,87	Good
Performance Appraisal	4,02	Good
Career Development	3,90	Good
Overall Average	3,96	Good

The overall average score of 3.96 demonstrates that competency-based HRM practices have been implemented relatively effectively within the Medan City Government. These findings suggest that the majority of personnel management processes have emphasized the alignment between employee competencies and job requirements. Spencer and Spencer (2008) stated that competence is a fundamental characteristic of an individual that is directly related to effective or superior job performance. Therefore, the implementation of competency-based HRM serves as an important foundation for improving the professionalism and productivity of ASN.

The results also reveal that competency-based HR planning has contributed positively to improving the accuracy of workforce allocation and employee placement. Wibowo (2018) emphasized that effective HR planning should be based on competency analysis to ensure compatibility between employees and their positions. In the context of Medan City Government, competency-oriented HR planning has begun to be implemented, although there are still disparities in its application among different OPDs. This condition indicates the need for more consistent implementation and evaluation of competency mapping systems across all government institutions.

Recruitment and selection processes based on competency standards were also perceived positively by respondents. Competency-based recruitment allows organizations to select employees according to professional qualifications, knowledge, and skills required for specific positions. Armstrong (2014) argued that competency-based recruitment systems can produce employees who are more prepared to perform effectively and contribute to organizational

objectives. These findings are consistent with Kusuma (2024), who found that the implementation of merit-based systems in the public sector enhances objectivity and transparency in personnel management.

In addition, competency development through education, training, and professional capacity-building programs plays an important role in maintaining ASN performance and adaptability. Anwar Prabu (2017) explained that continuous competency development significantly contributes to improving employee performance quality and organizational effectiveness. The findings of this study reinforce the importance of sustainable investment in ASN competency development programs to ensure that employees remain capable of responding to organizational challenges and public service demands in a dynamic governance environment.

Productivity Level of the State Civil Apparatus in Medan City

The findings of this study indicate that the productivity level of the State Civil Apparatus (ASN) in Medan City is categorized as high. Based on respondents' perceptions, most ASN employees are considered capable of completing tasks effectively, meeting deadlines, producing quality work outcomes, and utilizing organizational resources efficiently. However, several respondents also indicated that unequal workload distribution among some Regional Apparatus Organizations (OPDs) still affects the effectiveness of work implementation in certain units.

Table 2. ASN Productivity Level

ASN Productivity Indicators	Average Score	Category
Work Effectiveness	4,10	Height
Work Efficiency	3,95	Height
Quality of Work Results	4,08	Height
Punctuality	4,12	Height
Overall Average	4,06	Height

The overall average score of 4.06 demonstrates that ASN productivity in Medan City has reached a relatively strong level. This condition reflects the ability of ASN employees to achieve organizational targets effectively and efficiently while maintaining the quality and timeliness of work completion. According to Sedarmayanti (2018), productivity refers to the comparison between outputs achieved and resources utilized, including time, energy, and operational costs. Therefore, high productivity indicates that employees are capable of maximizing available resources to support organizational performance.

The highest score was found in the punctuality indicator, showing that most ASN employees are able to complete their responsibilities within the predetermined timeframe. Timeliness in task completion reflects employee discipline, accountability, and organizational commitment. In addition, the high score in work effectiveness indicates that ASN employees are generally capable of achieving work objectives in accordance with organizational expectations. Robbins and Coulter (2005) explained that work effectiveness is closely associated with role clarity, competency alignment, and organizational support systems. These findings suggest that the majority of ASN in Medan City have a good understanding of their duties and responsibilities.

Work efficiency also emerged as an important aspect of ASN productivity. Efficiency in public sector organizations reflects the ability of employees to utilize organizational resources optimally without compromising service quality (Ulum, 2024). The results of this study indicate that ASN employees in Medan City are relatively efficient in carrying out their duties and responsibilities. These findings are consistent with the study conducted by Elazhari and Siregar (2025), which revealed that competency improvement among civil servants significantly contributes to higher work efficiency within local government institutions.

Furthermore, the quality of work results obtained a high average score, indicating that ASN employees are capable of producing reliable and satisfactory work outputs. High-quality performance reflects professional competence, work discipline, and employee commitment to organizational goals. Malayu and Hasibuan (2017) stated that employees who possess adequate



competencies and strong work discipline tend to demonstrate better performance quality and productivity. Therefore, the findings of this study reinforce the importance of competency development and effective HR management practices in improving ASN productivity and supporting the delivery of high-quality public services.

The Effect of Competency-Based Human Resources Management on ASN Productivity

The results of the simple linear regression analysis indicate that competency-based human resource management has a positive and significant effect on the productivity of the State Civil Apparatus (ASN) in Medan City. The positive regression coefficient demonstrates that improvements in the implementation of competency-based HR management are followed by increases in ASN productivity. This finding suggests that the more effectively competency-based HR practices are implemented, the higher the level of employee productivity achieved within local government institutions.

Table 3. Simple Linear Regression Test Results

Independent Variables	Coefficient (β)	t-count	Sig.
Competency-Based HR Management	0,684	7,92	0,000
Konstanta	12,35	—	—

The regression coefficient value of 0.684 indicates a positive relationship between competency-based HR management and ASN productivity. In addition, the significance value of 0.000 is lower than the significance level of 0.05, meaning that competency-based HR management has a statistically significant influence on ASN productivity in Medan City.

Table 4. Coefficient of Determination

R	R Square	Adjusted R-Square
0,684	0,468	0,461

The coefficient of determination (R Square) value of 0.468 indicates that 46.8% of the variation in ASN productivity can be explained by competency-based HR management variables. Meanwhile, the remaining 53.2% is influenced by other factors outside the research model, such as leadership style, organizational culture, work environment, motivation, and reward systems.

The findings of this study strengthen the theory of human resource management, which emphasizes that competence is a key determinant of employee performance and productivity. Armstrong (2014) argued that competency-based HR management enables organizations to improve employee effectiveness by aligning individual capabilities with organizational needs. In the context of public sector organizations, competency-based HR management supports the creation of a more professional, accountable, and performance-oriented bureaucracy.

Furthermore, the relatively strong coefficient of determination demonstrates that competency-based HR management contributes substantially to improving ASN productivity. Wibowo (2018) stated that competency-based HR systems are capable of enhancing organizational performance through the continuous improvement of employee competencies, skills, and professionalism. The implementation of competency-oriented recruitment, training, performance appraisal, and career development systems enables employees to perform their duties more effectively and efficiently.

The results of this study are also consistent with previous empirical research concerning the implementation of merit systems in public organizations. Abadi and Abadi (2018) found that government institutions applying meritocratic principles tend to achieve better organizational performance compared to bureaucracies that rely heavily on administrative or hierarchical approaches. Merit-based systems encourage objectivity, fairness, and professionalism in personnel management, which ultimately contributes to improved employee productivity.

Nevertheless, competency-based HR management is not the sole factor affecting ASN productivity. Judge and Robbins (2013) emphasized that employee productivity is influenced by the interaction of various organizational and individual factors, including leadership quality, organizational culture, employee motivation, and compensation systems. Therefore, efforts to improve ASN productivity should not only focus on competency-based HR management but also involve broader organizational reforms aimed at strengthening institutional effectiveness and improving the overall quality of public sector governance.

CONCLUSION

Based on the findings of this study, it can be concluded that the implementation of competency-based human resource management within the Medan City Government is generally categorized as good and has a positive and significant effect on the productivity of the State Civil Apparatus (ASN). The implementation of competency-based HR management practices, including workforce planning, recruitment and selection, competency development, performance appraisal, and career development, has contributed to improving the effectiveness, efficiency, quality of work, and punctuality of ASN performance. These findings indicate that the alignment between employee competencies and job requirements plays an important role in enhancing employee productivity and supporting the achievement of organizational goals.

The results of this study also confirm that competency-based HR management serves as an effective strategy for strengthening professionalism and improving public sector performance. Through competency-oriented personnel management, ASN employees are better able to carry out their responsibilities efficiently and provide higher-quality public services. Furthermore, the significant influence of competency-based HR management on ASN productivity demonstrates the importance of implementing merit-based systems consistently within local government institutions.

Therefore, it is recommended that the Medan City Government continue to strengthen the implementation of competency-based HR management across all Regional Apparatus Organizations (OPDs), particularly in the areas of competency mapping, employee development, and career management. In addition, competency-based HR policies should be integrated with objective performance appraisal systems and supported by effective leadership practices to ensure sustainable improvements in ASN productivity and organizational performance. Future efforts should also focus on strengthening organizational culture, employee motivation, and institutional support systems to optimize the effectiveness of bureaucratic reform and public service delivery.

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