

# **ABSTRACT**

## **INFORMATION SYSTEM DESIGN OF MACHINE MAINTENANCE USING *RELIABILITY-CENTERED MAINTENANCE***

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*In the manufacturing industry, machine maintenance management is one of activity that has an important role for a company, the industrial world production activities could not be separated from the use of tools or machines as a supporter in operational. The machines will operate in accordance with proper standards when supported by proper operation and maintenance. So in an effort to improve the operations of a company's technical capability, then the company should establish a maintenance policy which aims to ensure that the machines can operate optimally to improve productivity and efficiency of the company.*

*Reliability Centered Maintenance (RCM) is a methodology in maintenance planning that aims to keep the overall system to function according to the desired level of performance. Efforts in maintaining the function of the equipment includes all the necessary requirements on care management, within the scope of the operation of equipment. In addition, the RCM method taking into account aspects of the possibility of a failure and its consequences are there if there is a failure. In this study, created an information system applications that will implement the RCM method. Application information system consists of a data-based programs (database programming) and the calculation of component reliability. Engine maintenance information system is expected to be made to support the planning process and make maintenance activities more effectively, thus increasing productivity. At the end of the engine facilities can be maintained. Based on the simulation results obtained maintenance activity and the average time of damage (MTTF) which serve as guidelines in determining the treatment time interval*

*Keywords :Information System, Reliability, RCM,*