

## **ABSTRACT**

*Indonesian Aerospace (IAE) is a state-owned company engaged in the manufacture of aerospace that product components of aircrafts and helicopters. The production departement of Indonesian Aerospace requires a lot of machinery to support the production process. These machines should be able to complete all orders received by Indonesian Aerospace effectively and efficiently. But, in fact Machining department especially in the field of Medium Prismatic Machine (MPM) have difficult problem in controlling capacity which can make over/under capacity. Therefore, in this study created a capacity planning system using Capacity Requirement Planning (CRP) method that can show the condition of each engine capacity of each period and provide some alternative solutions in the decision to prevent shortage / excess capacity. CRP is a capacity planning with a detailed comparison of the capacity required in the Material Requirement Planning (MRP) with the available capacity.*

*The final goal of this research is a production capacity planning for the MPM area. A capacity planning system that can display the data data capacity planning processing in the form of Load Profile that can help Indonesian Aerospace especially the Machining departemen, the field of MPM making decisions in capacity planning. Alternative decision provided the additional capacity to perform overtime, subcontract, and move orders to other machines that still have the same characteristics.*

*Keywords: capacity planning, over/under capacity, the decision*