RUNWAY ADDITION IN JUANDA INTERNATIONAL AIRPORT SURABAYA STUDY

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ABSTRACT

As one of the main gate of air transport, Juanda Airport continues have increased in volume of traffic. In last 3 years, the movement of aircraft at Juanda Airport is constantly increasing. This situation will continue to occur in coming years. Therefore, Juanda Airport should develop infrastructure to serve the increased of traffic volume.

This final project is to try evaluate the performance of the runway at Juanda Airport currently and next 5 years. The evaluation is to compare the capacity of the runway with aircraft movement during peak hours. For 2010, aircraft movement are obtained from historical data, while in 2015 obtained from forecasting. To calculate the capacity, based on the percentage of aircraft categories during peak hours.

In this final project is known that the existing runway is now produce capacity of 48 aircraft movements per hour, that ideal to serve the movements of aircraft during peak hours in 2010. But it is not able to serve the movement of aircraft during peak hours in 2015. With adding new runway so aircraft movement split on two, based on use of the passenger terminal. The new runway produce 48 movements per hour capacity to serve 44 movements during peak hours. While existing runway
produce 49 movements per hour serve 11 aircraft movement during peak hours.

Keywords: Runway, Exit taxiway, Taxiway