***Comparative Analysis of Boiler Efficiency With Heat – Losses* Method During Initial Operation And After Overhaul At PT. POMI Paiton**

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ABSTRACT

The highest percentage value of heat loss in conditions during the initial operation and after the overhaul is obtained from the percentage of heat loss due to water evaporation which is formed due to the presence of hydrogen in coal which value at the beginning of operation is 4,207% and after the overhaul is 5,149%. The percentage value of boiler efficiency at the beginning of operation in 2012 was 87,257% and after the overhaul was 85,896%. The second result of this boiler efficiency has decreased by about 1,361%, the decrease in boiler efficiency is due to the unreachable fulfillment of coal quality. Efforts to increase the efficiency of this boiler are to clean the scale or solid objects attached to the boiler walls or those in the reheater and superheater tubes and choose coal with better quality than coal after the overhaul. Because with good quality coal the efficiency of the boiler can be stable and still maintain boiler work performance.

***Keywords* :** *Overhaul, Efficiency, Boiler, Heat Losses*.