

## ABSTRACT

*This research is done in Refractory Company. Material that produced in this company is chromite sand. One of machine that used in production process is Magnetic Separator. Based on production report in period July - December 2019 known that Magnetic Separator only can achieve 93.32% production volume form the production target. Therefore the analyzing process is done by using Pareto Diagram, Overall Equipment Effectiveness (OEE) and Six Big Losses calculation. The cause of unachieved target is searched by using 5 Whys Analysis method. Then, based on analyzing process known that the cause of unachieved production target is high intensity of machine breakdown. It's caused by less skill of operator, misalign of bucket shaft because of a worn out part of machine, too big material flow, incomplete inspection process, and dust that plug up the part. After solve the problem we get OEE value increase about 8.70%, form 75.83% to 84.53%.*

**Keywords :** *Magnetic Separator, Overall Equipment Effectiveness (OEE), chromite sand, Pareto Diagram, Six Big Losses , 5 Whys Analysis.*

