

ABSTRACT

PT Sinar Terang Logamjaya (PT STALLION) is a manufacture company that produce motorcycle spare parts. The component with the highest defect during the last 2 years is Guide Level KZI. The kind of defect on production process are pecah, cacat pada badan, ukuran out standar, and welding lepas. These defect was identifiicated from CTQ which assigned by STALLION. Improvement processes using Six Sigma are requied to reduce the number of defective product.

Six Sigma is a method that applied by 4 phase. There are Define, Measure, Analyze, and Improvement. In Define phase, CTQ and defective characteristics are identifiicated. In Measure phase, the capabilty process are measured by converting the value of DPMO into Level Sigma, and the result is 4,7095 Sigma. In Analyze, root cause of defective are defined using Fishbone Diagram and 5 Why's. There are 9 root cause of defective which determined based on RPN value on FMEA.

In Improve phase, there are improvement that proposed, like provide oil for machines, give intermetallic lubricant (Cu_3Sn) on the copper, make checksheet for inspection, redesign work instruction, using rag from majun, periodic control, and using PVC Strip curtain to cover raw material area.

Key Word : *Six Sigma, Critical To Quality, Defect, DMAIC, PT Sinar Terang Logamjaya*