INCREASING PRODUCTIVITY OF MEDIUM VOLTAGE CABLE BY IMPROVING OVERALL EQUIPMENT EFFECTIVENESS (OEE) IN PT. XYZ

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STATEMENT BY THE AUTHOR

I hereby declare that this submission is my own work and to the best of my knowledge, it contains no material previously published or written by another person, nor material which to a substantial extent has been accepted for the award of any other degree or diploma at any educational institution, except where due acknowledgement is made in the thesis. Farhan Prianggara Student Date Approved by: Dr. Eng. Aditya T. Pratama, M.T. Thesis Advisor Date Ir. Triarti Saraswati, M.Eng Thesis Co-Advisor Date Dr. Maulahikmah Galinium, S.Kom, M.Sc. Dean of Faculty of Engineering & IT Date

ABSTRACT

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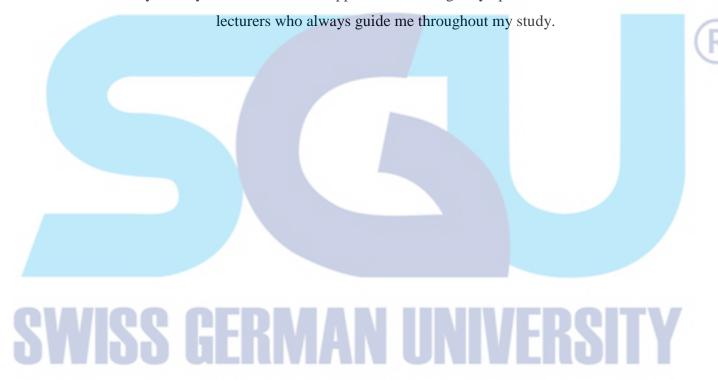
This research is based on the case study in production process at PT. XYZ. The objective of this thesis is to increase output from 6.000 meters to 10.000 meters. Based on data analysis, the problem has found in the setup time that makes the assembly process inefficient and the number of machines to produce more. There are 2 steps of improvements proposed in this thesis, the first step is using Single Minutes Exchange of Die as a method, and the purpose of this method is to reduce the setup time. Another methodology that support this problem in this thesis is using Overall Equipment Effectiveness as a method for analyzing the performance on machine to get know which machine has a problem. In the end, the initial and after improved condition will be compared by Tecnomatix Plant Simulation software. Based on the final simulation results, the company is able to increase their product output from 5.753 meters to 9.960 meters.

Keywords: Single Minutes Exchange of Die, Time Study, Overall Equipment Effectiveness, Tecnomatix Plant Simulation, Fishbone Diagram (use scientific terms).



DEDICATION

I dedicate this thesis works to my perfect family who always support me to finish my study. To my friends who have supported me through my ups and downs and to the



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