

APPLICATION OF MAHALANOBISTAGUCHI SYSTEM ON ELECTRICAL & ELECTRONIC INDUSTRY

M.Y. Abu ^{a*}, N.N. Nik Mohd Kamil ^a, N.F.Zamrud ^a, F.L.Mohd Safeiee ^a, Muchamad Oktaviandri ^{a,b}

a Faculty of Manufacturing Engineering, Universiti Malaysia Pahang, 26600, Pekan, Pahang, Malaysia

b Fakultas Teknologi Industri, Universitas Bung Hatta, Padang, 25143, Indonesia

Abstract:

Most of Malaysia's activities in Electrical & Electronic (E&E) Industry more focused in manufacturing industry. The E&E Industry is one of Malaysia's leading industries that has 24.5 percent in manufacturing sector production. With a rapid expansion of E&E Industry with a continuous innovation, there is no methodological that show the optimization procedure for a process that concern on E&E product in production area. The aim of this work is to develop the optimization parameter for a process of E&E product based on Mahalanobis-Taguchi System (MTS). In methodology, the optimization parameter will develop by using four stages which are construction Mahalanobis Space (MS), validation of Mahalanobis Space (MS), identify the useful characteristic, and predict and future diagnosis. The production in the industry can reduce the rejected product in parameter in a process. Consequently, significant parameters can be identified for E&E product. Keywords: Electrical & Electronic Industry, mahalanobis-taguchi system, optimization.

Keywords : Continuous Innovation; Electrical & Electronic (E&E); Mahalanobis-Taguchi System (MTS)

ACKNOWLEDGMENT

This research is fully supported by RDU1703157 and RDU1803102. The authors fully acknowledged Universiti Malaysia Pahang for the approved fund which makes this important research viable and effective.