

FAKULTAS TEKNIK
UNIVERSITAS STIKUBANK (UNISBANK) SEMARANG
Program Studi Teknik Industri
Skripsi Strata 1 Teknik Industri
Semester 8 tahun 2020

Rasio OEE Dengan REE Pada Proses TPM Divisi UV Coating and Metalizing Dalam Upaya Countinuous Improvement Di PT. Techpack Asia (Studi Kasus PT. Techpack Asia Demak)

OEE to REE Ratio on The TPM Process UV Coating and Metalizing Division in Countinuous Improvement Efforts at PT. Techpack Asia (Case Study of PT. Techpack Asia Demak)

Syafiq Hilmi MZ
NIM: 16.04.51.0005

Abstrak

Menuju *zero reject* dan *zero accident* guna menjaga produktivitas dan efektivitas kinerja 14 operator di divisi *UV Coating and Metalizing* merupakan harapan PT. Techpack Asia. Waktu produksi yang padat menimbulkan permasalahan variasi hasil kinerja operator dan menjadi salah satu penyebab tingginya *downtime* di divisi *UV Coating and Metalizing*. Penelitian ini bertujuan untuk mengetahui tingkat efektivitas kinerja operator dengan membandingkan dua metode manakah yang lebih efektif pada proses *Total Productive Maintenance* dalam upaya *Countinuous Improvement* di PT. Techpack Asia.

Metode tersebut adalah *Overall Equipment Effectiveness* dengan *Run Equipment Effectiveness*. Dengan menghitung kedua metode tersebut, maka diperoleh hasil rata-rata tingkat efektivitas *Overall Equipment Effectiveness* sebesar 59,86% dan *Run Equipment Effectiveness* sebesar 89,83%. Dari rata-rata tingkat efektivitas kinerja operator tersebut maka diperoleh nilai rasio sebesar OEE 40% : 60% REE dari total 100%. Dari perhitungan tersebut metode *Run Equipment Effectiveness* lebih efektif dalam mengukur efektivitas kinerja dan sesuai standar *world class* yaitu $\geq 85\%$.

Dari hasil analisa beberapa aspek perhitungan pada metode REE dengan menggunakan diagram pareto, *fishbone chart*, dan tabel 5W + 1H, diperoleh beberapa aspek yang memiliki nilai terendah yaitu *downtime rate* dan *quality rate*. Faktor yang mempengaruhi rendahnya nilai *downtime rate* dan *quality rate* antara lain, tingginya *reject* dan *downtime* yang disebabkan oleh waktu *setting* terlalu lama dan masih *feeling touching*. Maka perlu adanya pelatihan berkala sebagai upaya *education and training* dan sarana evaluasi efektivitas kinerja operator. Selain itu perlu dibuat SOP dalam *setting* tidak hanya SOP pengoperasian, sehingga waktu *setting* tidak terlalu lama yang berakibat *downtime* dan banyaknya *reject*.

Kata Kunci : produktivitas, efektivitas kinerja, OEE,REE, TPM

Semarang, 17 Juli 2020
Pembimbing


(Eddi Indro Asmoro, S. T., M. T.)

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Abstract

Towards zero reject and zero accident to maintain the productivity and effectiveness of performance 14 operators the Division UV Coating and Metalizing is the expectation of PT. Techpack Asia. Over production time raises the problem of variation of operator performance and becomes one of the causes of high downtime in the division of UV Coating and Metalizing. This research aims to determine the level of effectiveness of operator performance by comparing two methods which are more effective in Total Productive Maintenance process in the effort of Countinuous Improvement at PT. Techpack Asia.

The method is Overall Equipment Effectiveness with Run Equipment Effectiveness. By counting both methods, the average result of Overall Equipment Effectiveness effectiveness is obtained by 59,86% and Run Equipment Effectiveness by 89,83%. From the average level of performance effectiveness of the operator then obtained the ratio value of OEE 40%: 60% REE from a total of 100%. From the calculation of the Run Equipment Effectiveness method is more effective in measuring the effectiveness of performance and according to the world class standards of $\geq 85\%$.

From the analysis of some aspects of calculation on REE method using pareto chart, fishbone chart, and table 5W + 1H, obtained some aspect that have the lowest value of the downtime rate and the quality rate. Factors that affect the low value of the downtime rate and the quality rate among others, the high reject and downtime caused by the setting too long and still feeling touching. It is necessary to have regular training as an effort to education and training and the means to evaluate the effectiveness of operator performance. In addition it needs to be made SOP in setting not only the SOP operation, so that the setting time is not too long that resulted in downtime and many rejects.

Keywords: productivity, performance effectiveness, OEE, REE, TPM

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