

OPTIMALISASI PRODUKSI KAYU GERGAJIAN DI KESATUAN BISNIS MANDIRI INDUSTRI KAYU CEPU

Lidya Desita Kanza¹

Prof. Dr. Ir. Wahyu Andayani, M.S.²

Abstrak

Kesatuan Bisnis Mandiri Industri Kayu (KBM IK) Cepu memproduksi lebih dari sepuluh jenis sortimen kayu gergajian, diduga sortimen kayu gergajian yang diproduksi belum optimal berdasarkan realisasi saat ini. Jenis-jenis sortimen yang dimaksud antara lain BBI *veneer stock*, BBI *lamela*, BBI *component*, BBI *flooring*, BBI *finger joint laminating*, BBI *garden furniture*, RST *garden furniture*, RST *housing component*, RST *flooring*, RST *decking*, RST *lamparquet*, RST *listoni*, RST *skirting*, RST *parquet block*, RST *parquet stock*, RST *reng*, RST *list*, dan *jeblosan*. Jenis-jenis sortimen yang diproduksi tahun 2017 antara lain BBI *veneer stock*, RST *garden furniture*, RST *housing component*, RST *finish flooring*, RST *decking*, RST *parquet block*, RST *parquet stock*, RST *reng*, dan RST *list*. Oleh karena sortimen yang diproduksi atas dasar pesanan konsumen, maka industri tidak memproduksi sesuai dengan kaidah-kaidah efisiensi dan efektivitas untuk mendapatkan pendapatan maksimum. Penelitian ini bertujuan untuk menemukan diversifikasi produk-produk kayu gergajian untuk menghasilkan pendapatan maksimum KBM IK Cepu. Metode yang digunakan adalah programasi linier/ *linear programming* dengan menggunakan kendala, yaitu bahan baku, biaya produksi per jenis yang diproduksi, dan permintaan konsumen. Penelitian yang mengambil data satu tahun periode produksi, yaitu tahun 2017 menghasilkan informasi sebagai berikut : (1) pendapatan maksimum sebesar Rp 5.463.684.232,-/tahun yang mengalami kenaikan sebesar Rp 313.883.865,-/tahun (5,75%); (2) jenis sortimen yang diproduksi RST *garden furniture* 15,88%; RST *housing component* 4,49%; RST *decking* 1,38%; BBI *veneer stock* 30,59%; RST *finish flooring* 40,74%, RST *parquet block* 6,58%; dan RST *reng* 0,32%; (3) analisis pasca optimal dengan mengubah kendala permintaan menghasilkan pendapatan sebesar Rp. 6.339.848.560,- dengan jenis-jenis sortimen yang diproduksi RST *garden furniture* 15,88%; RST *housing component* 29,98%; RST *decking* 1,38%; BBI *veneer stock* 5,42%; RST *finish flooring* 40,74%; dan RST *parquet block* 6,58%.

Kata kunci: *linear programming*, diversifikasi, dan kayu gergajian

¹ Mahasiswa Fakultas Kehutanan, Universitas Gadjah Mada

² Dosen Fakultas Kehutanan, Universitas Gadjah Mada

OPTIMIZATION OF SAWN TIMBER PRODUCTION AT KESATUAN BISNIS MANDIRI INDUSTRI KAYU CEPU

Lidya Desita Kanza¹

Prof. Dr. Ir. Wahyu Andayani, M.S.²

Abstract

Kesatuan Bisnis Mandiri Industri Kayu (KBM IK) Cepu produces several types of sawn timber assortments. Based on the current realization data, it is assumed that the sort of sawn timber produced is not optimal. The types of assortments mentioned above include: BBI veneer stock, BBI lamela, BBI component, BBI flooring, BBI finger joint laminating, BBI garden furniture, RST garden furniture, RST housing component, RST flooring, RST decking, RST lamparquet, RST listoni, RST skirting, RST parquet block, RST parquet stock, RST *reng*, RST list, and *jeblosan*. The assortments produced in 2017 were: BBI veneer stock, RST garden furniture, RST housing component, RST finish flooring, RST decking, RST parquet block, RST parquet stock, RST *reng*, and RST trim. Because sawn timber assortments were produced based on consumers' orders, KBM IK Cepu did not produce in accordance to the rules of efficiency and effectiveness to obtain maximum income. This study aims to find diversified sawn timber products that are able to generate maximum income at KBM IK Cepu. The method used in this research was *Programasi Garis* or Linear Programming addressing on constraints namely industrial raw materials, production costs per sortimen produced and consumer demand. The research, that took one year data of production, that is, in 2017, produced information as follows: (1) Maximum income of Rp. 5,463,684,232/annually, which increased annually by Rp. 313,883,865 (5.75%); (2) the types of assortments produced include RST garden furniture 15.88%; RST housing component 4.49%; RST decking 1.38%; BBI veneer stock 30.59%; RST finish flooring 40.74%; RST parquet block 6.58%; and RST *reng* 0.32%; (3) Post-optimal analysis by changing the demand constraints generated revenue of Rp. Rp.6,339,848,560 with the type of assortments produced include RST garden furniture 15.88%; RST housing component 29.98%; RST decking 1.38%; BBI veneer stock 5.42%; RST finish flooring 40.74%; and RST parquet block 6.58%.

Keyword : linear programming, diversification, and sawn timber assortment

¹ Student of Faculty of Forestry, Universitas Gadjah Mada

² Lecturer of Faculty of Forestry, Universitas Gadjah Mada