

**ANALISIS TINGKAT PENERAPAN *GREEN SUPPLY CHAIN*
MANAGEMENT DAN KELAYAKAN EKONOMI LINGKUNGAN
PADA KOPERASI SUSU DI KABUPATEN SLEMAN**

Christian Bryan Elfin Siburian

22/505706/PT/09533

INTISARI

Penelitian ini bertujuan untuk menganalisis tingkat penerapan *Green Supply Chain Management* (GSCM) serta menguji kelayakan ekonomi lingkungan pada koperasi susu di Kabupaten Sleman, Daerah Istimewa Yogyakarta. Penelitian dilaksanakan di Koperasi Samesta dan Koperasi Saroni Makmur. Pengukuran tingkat penerapan GSCM menggunakan skala interval indeks dan kelayakan ekonomi lingkungan menggunakan metode *Net Present Value* (NPV), *Internal Rate of Return* (IRR), dan *Benefit per Cost Ratio* (BCR). Hasil penelitian menunjukkan bahwa tingkat penerapan GSCM Koperasi Samesta tergolong tinggi di semua dimensi, sementara untuk tingkat penerapan GSCM Koperasi Saroni Makmur tergolong tinggi pada tiga dimensi yaitu *green procurement*, *green manufacture*, dan *green distribution*, sementara tergolong sedang untuk dimensi *reverse logistics*. Berdasarkan analisis kelayakan ekonomi lingkungan Koperasi Saroni Makmur menghasilkan NPV sebesar Rp. 5.086.727.007, IRR 45%, dan BCR 1,07, sedangkan Koperasi Samesta menghasilkan NPV sebesar Rp. 4.976.069.158, IRR 72%, dan BCR 1,09. Meskipun penerapan GSCM pada kedua koperasi tinggi dan layak secara investasi untuk diusahakan, tetap diperlukan koordinasi dengan pemerintah dan dinas untuk pengadaan sarana dan prasarana yang dapat menjamin kelangsungan usaha.

Kata Kunci: *Benefit per Cost Ratio*, *Green Supply Chain Management*, *Internal Rate of Return*, Kelayakan Ekonomi Lingkungan, *Net Present Value*.

GREEN SUPPLY CHAIN MANAGEMENT IMPLEMENTATION AND ENVIRONMENTAL ECONOMIC FEASIBILITY ANALYSIS A CASE STUDY OF DAIRY COOPERATIVES IN SLEMAN REGENCY

Christian Bryan Elfin Siburian

22/505706/PT/09533

ABSTRACT

This study aims to analyze the implementation level of *Green Supply Chain Management* (GSCM) and evaluate the environmental-economic feasibility of dairy cooperatives in Sleman Regency, Special Region of Yogyakarta. The research was conducted at the Samesta Cooperative and the Sarono Makmur Cooperative. The measurement of the GSCM implementation level was carried out using an interval index scale, while the environmental-economic feasibility was assessed using the Net Present Value (NPV), Internal Rate of Return (IRR), and Benefit-Cost Ratio (BCR) methods. The results showed that the GSCM implementation level at the Samesta Cooperative was categorized as high across all dimensions. Meanwhile, the GSCM implementation level at the Sarono Makmur Cooperative was high in three dimensions namely Green Procurement, Green Manufacture, and Green Distribution but was categorized as moderate for the Reverse Logistics dimension. Based on the environmental-economic feasibility analysis, the Sarono Makmur Cooperative generated an NPV of IDR 5.086.727.007, an IRR of 45%, and a BCR of 1.07. On the other hand, the Samesta Cooperative generated an NPV of IDR 4.976.069.158, an IRR of 72%, and a BCR of 1.09. Although the GSCM implementation in both cooperatives is high and the investments are economically feasible to pursue, coordination with the government and local agencies remains necessary for the procurement of facilities and infrastructure to ensure business sustainability.

Keywords: Benefit-Cost Ratio, Economic Feasibility, *Green Supply Chain Management*, Internal Rate of Return, Net Present Value.