Analytic Hierarchy Process Method for Supplier Selection Considering Green Logistics: Case Study of Aluminum Production Sector

Authors: H. Erbiyik, A. Bal, M. Sirakaya, Ö. Yesildal, E. Yolcu

Abstract : The emergence of many environmental issues began with the Industrial Revolution. The depletion of natural resources and emerging environmental challenges over time requires enterprises and managers to take into consideration environmental factors while managing business. If we take notice of these causes; the design and implementation of environmentally friendly green purchasing, production and waste management systems become very important at green logistics systems. Companies can adopt green supply chain with the awareness of these facts. The concept of green supply chain constitutes from green purchasing, green production, green logistics, waste management and reverse logistics. In this study, we wanted to identify the concept of green supply chain and why green supply chain should be applied. In the practice part of the study an analytic hierarchy process (AHP) study is conducted on an aluminum production company to evaluate suppliers.

Keywords: aluminum sector, analytic hierarchy process, decision making, green logistics

Conference Title: ICTKS 2016: International Conference on Technology, Knowledge and Society

Conference Location : Barcelona, Spain **Conference Dates :** August 11-12, 2016