ABSTRACT

Product selection affects the quality of the products of sale. This factor requires the Micro, Small, and Medium Enterprises (MSME) to select and assess the suppliers appropriately. Marta Frozen Food is an MSME engaged in retail that is located in Karangklesem, South Purwokerto. In order to meet the consumer demands everyday, them requires adequate product procurement. Therefore, the products needed must also be sufficient. Marta Frozen Food has several problems in the products procurement. The problems that often experienced by them are: supplier inaccuracy in bringing in the number of products, delays in delivery, and incompatibility of the products offered with predetermined business standards This research was conducted to determine the best supplier for Marta Frozen Food as MSME. There are five alternative suppliers that are provided in this research i.e. Supplier CF, supplier MF, supplier BM, supplier DF, supplier HM. The result shows that supplier B is the best alternative supplier with a weight of 0.131406 point. Sensitivity Analysis is conducted in order to monitor the alternatives ranking order which is able to change if the weight of the criteria changes according to conditions and circumstances by experimenting with each selected criteria.

Keyword: supplier selection, analytical network process, analyse sensitivity