ABSTRACT

The number of Telkomsel customers as of March 2018 is 196.3 million, of which 105.8 million are customers with active user data categories. Based on data from Telkomsel, it can be seen that the majority of Telkomsel customer data usage is dominated for the use of Communication, Social, and Video. So that if Telkomsel can do Clustering based on customer behavior and make a combination of data packages that match with the characteristics of each group, it will make it a new breakthrough for Telkomsel to increase data package purchases.

The purpose of this study was to determine the characteristics of kartuHALO customers and determine the number of clusters that match with the characteristics obtained. Then determine the right strategy for Telkomsel to increase the purchase of data packages for KartuHalo customers

The theory approach used in this research is Marketing Mix, Pricing Strategy, Market Segmentation, Customer Behavior, and Personalized Marketing.

Data collection method is done by using kartuHalo customer population data along with pre-defined variables that have been determined based on expert opinions which are then tested for significant variables using the Random Forest algorithm. Then from the variables chosen based on ranking used for cluster formation with the K-Means method. Analysis and processing of data is done using SPSS modeler software

Keywords: Clustering, K-Means**,** Personalized Marketing