

## **ABSTRACT**

### **SENTIMENT ANALYSIS OF NOKIA PRODUCTS IN YOUTUBE SOCIAL MEDIA USING DECISION TREE (CART)**

**By**

**MOHAMMAD AUFAR**

**1202160372**

Nokia is one of the companies in the telecommunications sector that was once the top communities choice and achieved its highest profit in 2007. In 2010 to 2013, Nokia had to suffer loss interest in the market and bankruptcy. In an effort to restore the market, Nokia currently uses various promotional methods, one of which is by using the Youtube application. Researchers would like to make Nokia's product on Youtube social media as the parameter object of this research, which is sentiment analysis. From the results of the analysis, the quality of the product from the views and opinions of the community is determined. Sentiments is classified as positive and negative labels. The algorithm used in analyzing sentiments is Decision Tree (CART). With the Decision Tree (CART) algorithm, researchers creates a classifier model that can be visualized from the sentiments of the product. In the process of doing the classification, researchers use the training and testing ratio of 80:20 because it has the highest accuracy of 94%, topping all other ratio. Prediction results resulting from the classification turned out to be more dominant for positive labels. In addition to classifying sentiment analysis, this study also measures the performance of the classifier model. The results showed that the Decision Tree algorithm (CART) has a weighted average value for precision, recall, and *f1-score* of 94%.

**Keywords:** Decision Tree (CART), Sentiment Analysis, Nokia, Youtube