

## ABSTRACT

Retail business experienced rapid growth, it is marked increase in the number of retail. Generally every retail uses a computerized system in data storage sales and purchases that generate transaction data. The transaction data can be used as a source of information is important in maintaining the existence of the business. One of the efforts made to maintain the retail business is to increase and maintain the level of sales growth.

This study aims to build a shopping cart application analysis (market basket analysis) related to sales transaction data using association rules, identifying several types of association rules relating to sales transaction data that values the support and confidence, knowing combining of items -Item are frequently purchased together by the consumer. Research processed using Microsoft Office Excel 2010 software and software matlab 2013. Data were analyzed using a pincer-search algorithm that generates association rules with pattern "if-then".

Results of Application Analysis Shopping Cart is some rules that explain the tendency of customers to purchase items purchased at the same time, some rules will be used to determine the placement of items in order to maximize profits supermarket can be obtained supermarket, in this case study is Yomart.

Keywords: Market Basket Analysis, Pincer-search algorithm, Support, Confidence