Abstract

Higher education is a place to produce superior human resources and think, no wonder many universities are asked to produce students who are superior and able to compete in the world of work. However, the fact is that as many as 45% of students feel wrong in choosing the right study program, and as many as 92% of high school students or equivalent feel confused to determine their future. Therefore it is necessary to have a system to recommend study programs, to reduce the phenomenon. The method used to provide study program recommendations is a hybrid recommendation. This hybrid recommendation method was chosen because it can study user profiles, by developing the naive bayes method to classify study programs by processing value data, while to consider student interests using item-based collaborative filtering by calculating the similarity of study program choices provided by students. Combining these two methods will produce a program that is by the values and interests of students to choose study programs. The results of this study indicate that data processing with naive bayes produces an accuracy of 88.7%, while processing the similarity of student choices in the form of rating with item-based collaborative filtering has an MAE of 0.2%.

Keyword :recommendation system, naive bayes, item-based collaborative filtering, hybrid recommendation