Abstract

Naive Bayes is one of the classification techniques in data mining that apply Bayes Theorem in its processing and provide optimal result when each attributes in dataset is independent. But generally, a dataset has numeric attributes and nominal attributes are dependence so that if considered independent, it can cause classification error problems. Therefore, it needs a method to minimize the error rate, the method is discretize strategy. Discretization is a method that maps some numerical values (X) into an interval of nominal value (X*) based on the frequency setting in one interval so it can get number of interval formed in one numeric attribute.

One of discretization method adopted in this Final Project is Optimal Flexible Frequency Discretization (OFFD) based on sequential search and wrapper based supervised for incremental learning. This method will be carried out wrapper feature selection to get optimal attributes based on its fMeasure parameter. Then, optimal dataset will de discrete in sequential search for the minimum frequency on each interval.

Keywords: wrapper based, *Feature Selection*, discretization, sequential search, *Naïve Bayes Classifier*, interval frequency, error rate