Abstract

Churn prediction is one type of data mining tasks, namely classification which aims to predict the potential for customer churn. In this thesis used two methods of artificial neural networks to predict customer churn. The first algorithm is the Backpropagation algorithm, which algorithm has a high prediction accuracy. The second algorithm is an algorithm Kohonen Self Organizing Maps, where this algorithm is a good algorithm is used to klusterisasi data that can be used to classify data based on data patterns are studied. Based on the function of each of these algorithms, in this final SOM-BP algorithm where the algorithm is a combination of the two algorithms above. Data used in this thesis is the sample data Tournament. In this final accuracy of the resulting measured by three parameters namely the lift curve, the top decile and f-measure. For data undersampling, measurement of the lift curve is the best 10% customer can guess 59% SOM, measuring 10% of top decile SOM customer of 1.3 and the best measurement of f-measure of SOM-BP with a value of 0.3991.

keywords: *Artificial Neural Network, Backpropagation Network Algorithm, Self Organizing Maps Kohonen Algorithm, Churn Prediction, , Lift curve, Top Decile, f-measure.*