

# Clustering with Expectation Maximization in Web Usage Mining System

**Lei Mon Than, Zaw Tun**

University of Computer Studies, Yangon

[leimonthan89@gmail.com](mailto:leimonthan89@gmail.com), [zawtun78@gmail.com](mailto:zawtun78@gmail.com)

## **Abstract**

*Web usage mining algorithms have been widely utilized for modeling user web navigation behaviour. This system introduces a model for mining of user's navigation pattern. The model makes user model navigation pattern. The model makes user model based on expectation maximization (EM) algorithm. An EM algorithm is used in statistics for parameters in probabilistic models, where the model depends on unobserved hidden variables. The log probability converges toward lower values and probability of the largest cluster will be decreased while the number of the clusters increases in each treatment. The experimental results represent that by decreasing the number of clusters when the number of sessions decreased.*