

## **ABSTRACT**

User authentication is required for the security of data on the use of the Internet or digital devices. In authentication, we recognize text password, graphical password, fingerprint, retina, and others. Graphical Password itself has many schemes, for examples, cued-click points, passpoints, draw-a-secret, captcha, and many others.

Graphical password is an authentication method that uses images as a password and many methods have been found. In this thesis, using passpoints scheme. This scheme itself using pixel coordinates of the image that will be the password and pay attention to the order of pixel coordinates when clicking pictures.

In this thesis focused to analyze level of accuracy and effectiveness of the system and whether the system can be penetrated by SQL-Injection or not. The test results on a system that has been built shows that this system has a value of recall, precision, and accuracy of 100% and the error rate of 0%. Execution Time system gained an average time of 0.042448387 ms for 32 trials (one user). Then obtained the average login time of 65.673 seconds to 5 users who tested for 3 days. And the system also shows the response can not be penetrated by SQL-Injection.

Key word : Graphical Password, Passpoints, Accuracy, Effectiveness, SQL-Injection