Abstract

Japan language is one of the most difficult language to learn because is complicated structure. although Japanese letters have their own uniqueness, there are many japanese letters that have identical form. It become a challenge to make automated system for recognize Japanese letters

In this final project built Hiragana character recognition system using Directional Element Feature and LVQ Ensembles method. Directional Element Feature used for feature extraction method and LVQ Ensembles for classification method. In the test results indicate the number of features, learning rate and the number of LVQ can give effect to LVQ Ensembles accuracy. From the results of testing, LVQ Ensemble is better than 1 LVQ. The best accuracy of hiragana character recognition system using Directional Element Feature and LVQ Ensembles method is 95.20%.

Keywords : Hiragana, *Directional Element Feature*, *LVQ Ensembles*