## **ABSTRACT**

Traffic signs is one of the important part that becomes a media of information to the public as users of the highway. Traffic signs may include special symbols that have specific meaning. However, not many people really understand the purpose of each traffic signs are there. This causes a lot of traffic violations that led to the accident. To solve these problems author developed a prototype system that is able to detect traffic signs and automatically gives information about the meaning of each sign are often encountered on the highway.

In this thesis, the detection of traffic signs using CamShift algorithms and recognition of signs that have been tracked with features derived from Gabor Filter. There is a database of symbols traffic signs which will then be identified for compliance with the video images recorded using KNN method. The system is made using moving images as input, in the form of video files (.avi). Output of this system is a form of text which bears the name beacon detection results.

From the tests, the system designed was produces an average accuracy obout 77.78% with an average computation time of 12.7 second. The system is still not perfect because there are said to be low accuracy at the time and under certain conditions.

Keywords: Traffic signs, camshift algorithm, gabor filter.