# PROTOTYPE OF INDONESIAN COIN SORTING AND COUNTER BASED ON ESP8266

## Ariyanto Sahadi

*Program Studi Teknik Elektro, Fakultas Sains & Teknologi*
*Universitas Teknologi Yogykarta*
*Jl. Ringroad Utara Jombor Sleman Yogyakarta*
*E-mail : ariys998@gmail.com*

## *ABSTRACT*

*Money is an object that can be exchanged for other objects so that it can be used to give value to other objects and can also be stored. Money can be interpreted as a legal tender and a medium of trade exchange. In general, the physical form of money consists of two types, namely paper money and coins. The existence of money makes transactions easier than bartering. The increasing globalization of the world economy today has resulted in a person's or society's need for convenience in transactions to increase. In transaction activities such as paying, exchanging, and saving, consumers make transactions with large-scale coins which cause coins to accumulate. This makes it difficult for employees to count money because it takes a long time so that sometimes employees make mistakes in counting coins due to too many elements of coins that must be counted. Based on the problems that have been found, it is necessary to build a machine that can sort and count coins to make sorting easier and reduce errors in coin counting. Because the banknote counting machine cannot be used to count coins, the researchers made a prototype of the eps8266-based coin sorter and counter using an IR (Infrared) sensor as a coin detector. The built machine sorts and counts the number of coins that have been sorted whose calculations are displayed on the LCD and Web Server. The machine to be built must be able to overcome the problems described above, namely being able to streamline the time of counting and sorting, as well as reducing errors in counting.*

*Keywords: ESP8266, LCD, Web Server, Coins, Infrared Sensor.*