

ABSTRACT

JAHIMUDIN LA ASA CHARGE CONTROLLER SYSTEM USING ARDUINO UNO

Keywords: Charge Control System, Using Arduino Uno

(x+53+attachment)

Today's technological advances are very rapid and cover all disciplines, including electrical energy. Electrical energy is energy that is used for daily purposes, especially in portable electronic equipment such as cellphones, laptops and so on. Portable equipment of course requires resources to operate the equipment. The resource used is the battery. Constraints that often occur in batteries are the high price and the age of the battery that is not able to last long or is not in accordance with the age limit that has been applied from the factory. So that the damage that often occurs to the battery is caused by overcharging (Overcharging). Therefore, to overcome the occurrence of overcharging, an automatic disconnect device is made, namely a charge control system that is used to charge the battery, when the battery is fully charged, it will automatically cut off electricity to the battery. Based on the test results obtained, the full battery voltage is set at a value of 11 volts which is set in the script program. In order to be able to disconnect the filling, and carry out the loading process. The specified low voltage is below 10 volts in order to carry out the charging process. The results of the measurement and analysis of the calculations carried out, the current that enters the battery is 0.012 A, and the time it takes to fully charge the battery is 12 hours 30 minutes.