

ABSTRACT

Microcontroller is a microprocessor system which already exist inside the CPU, ROM, RAM, I / O, Clock and other internal tools that are mutually connected and organized with either by the manufacturer and packaged in a single chip that is ready to use. So we only program the ROM contents in accordance with regulations that made use of by the manufacturer.

In this final project design and realization of a writer tool to check a condition in Port I / O IC ATmega8535 AVR microcontroller is in good condition or damaged. This tool integrates two microcontrollers: the master and slave (microcontroller ICs to be tested). Master contains a program that will include to the slave (in this case a simulation program that is used to communicate with the master IC) and the program used to communicate with the microcontroller slave. From the second communication microcontroller master and slave can know how the microcontroller IC conditions tested (slave) is in good condition or damaged to be displayed on the LCD.

Keywords: AVR ATmega8535, master, slave