ENGINE

Teaching online electronics, microcontrollers and programming in Higher Education

Output 2: Online Course for Microcontrollers: syllabus, open educational resources

Open project leaflet: Module_2-9 SevenSegmentDisplay

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Declaration

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Executive summary

This file contains open project.

Chapter 1: **Open project 1**

Create a real time clock with 7segment display

Write a program for the PIC18F4550 microcontroller with which 3 seven segment displays will act as a real-time clock. The system will work as follows:

• Initially the indication will be 12:00. The indicator will be done in two phases. For one second the hour will be displayed and for one second the minutes will be displayed.

• In order to be able to separate the indication between hours and minutes, when the indication on the two rightmost indicators is the hour, the leftmost indicator should show the “H”, while when the indication is the minutes, the leftmost indicator should have the indication “h”.

Use timer0's overflow interrupt method to measure time