

CS331: Microprocessor Systems
Assigned: Thursday 9th Nov, 2017
Due: Sunday 12th Nov, 2017

Assignment 5

Temperature warning system

Use the LM35 to measure the current air temperature and print the readings in Centigrade (°C) on the LCD screen.

If the temperature exceeds certain limit (30°C for example), a buzzer should turn on and the LCD should print a warning message 'WARNING!! High Temperature'.

NOTE: In order for you to increase the surrounding temperature use any heating device that doesn't use flames. (Hairdresser for example or any similar device).

IMPORTANT:

If you are using the LCD shield then the correct codes are available in this link: https://www.dfrobot.com/wiki/index.php/Arduino_LCD_KeyPad_Shield_(SKU: DFR0009) However, if you are using the LCD module then the correct wiring is the one availabel in the lab notes.

Delivery Policy

- Late delivery = -25% for each day of delay.
- Same groups as the spreadsheet.
- Represent the requirements using components (LCD Screens, LM35, buzzer, wiring, etc....) and code.
- The deadline is: Sunday 12th November.