

Embedded Systems

Assigned: Tuesday 28/02/2023

Due: Monday 06/03/2023

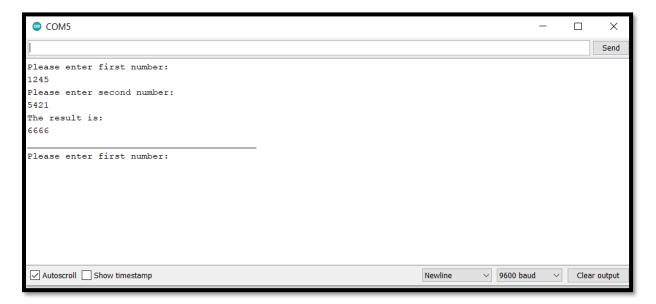
Lab Experiment 02

Objectives

Getting familiar with Arduino Serial Monitor. Getting familiar with Arduino Serial Plotter.

Part-01: Serial Monitor:

- You are required to use serial monitor in Arduino to perform a simple arithmetic operation.
- You should use the serial monitor to send an up to 4 digits unsigned number followed by a "newline" character to signal the end of input. Then you enter another up to 4 digits unsigned number followed by a "newline" character. The Arduino then must add these two numbers and outputs the result in the serial monitor. (Use the "newline" tab on serial monitor to send newline when pressing 'Enter').
- Every time you enter a number (4 digits) the Arduino must print this number on the screen.
- A sample run of the program should produce a similar image



Part-02: Serial Plotter:

You are required to plot a sin wave using Arduino serial plotter.

Delivery Policy

- Each group must send a 20-second video showing the Arduino setup and serial monitor/plotter for each part of the experiment.
- You should submit a report showing your observation in Part-02 and the challenges you faced (if any).
- You should submit the sketch source code (.ino file(s)) and also put your code in the report.
- You should cite any additional resources you used.
- Further details for the submission instructions will be posted later on MS Teams.

Good Luck