GSoC Phase I : First Half
Project : AXIOM Remote - Bootloader improvement and extension

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Outline

Phase I

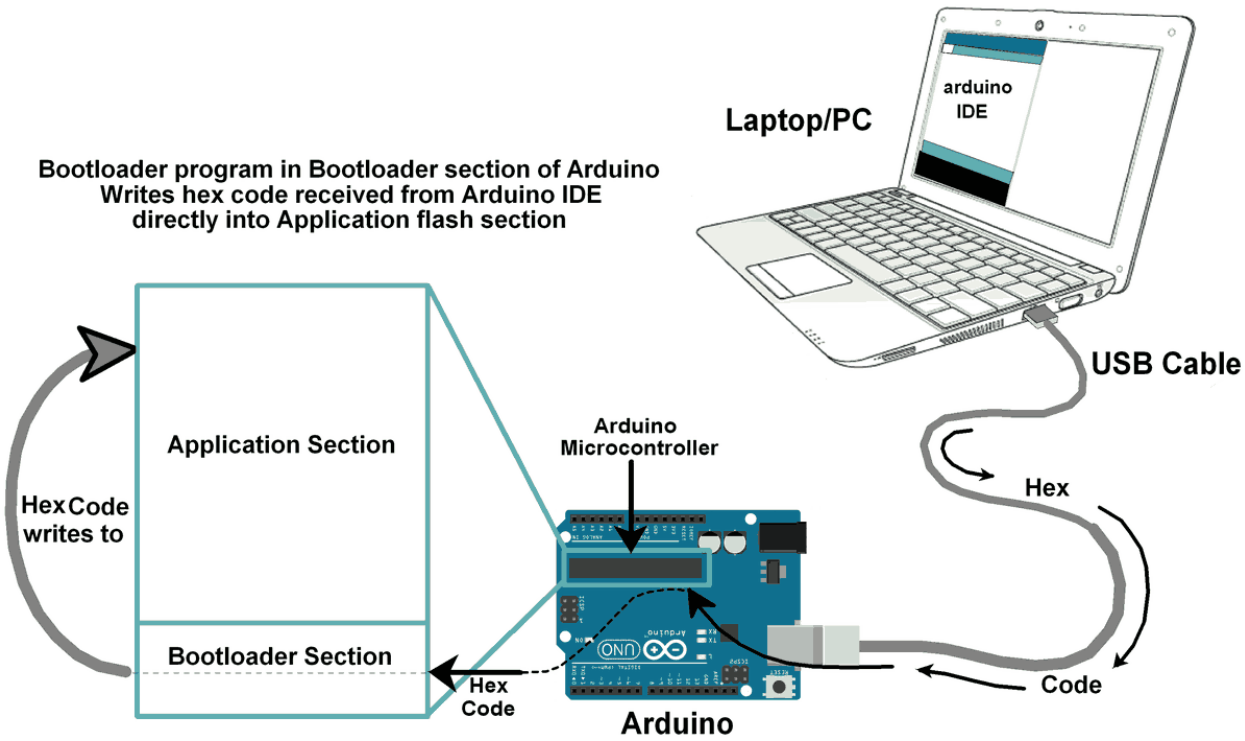
- Tasks
- Task1
- Task2
- Plans for upcoming weeks

Phase I

Tasks

- Task1: Flashing of firmware on PIC16s using PIC32
- Task2: PIC32 self-programming

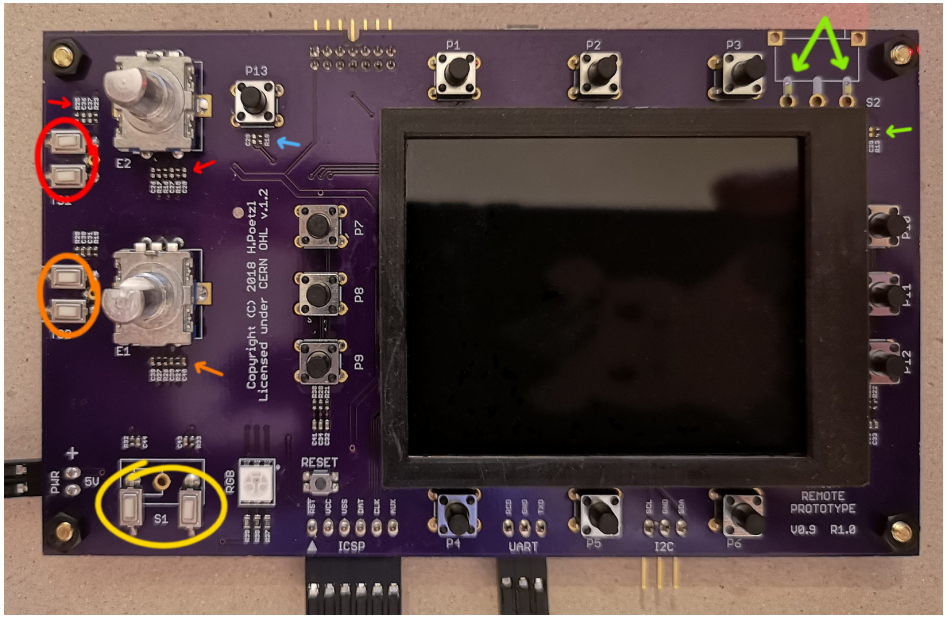
Task1: Flashing of firmware on PIC16s using PIC32

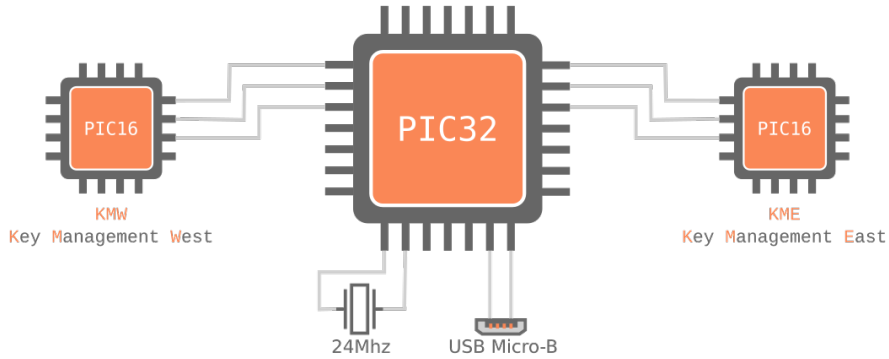


Host PC

- A python script will be used on the host PC (skeleton is ready)
- The features are:
  - It uses pySerial module
  - Command line arguments for operation, to select chip, to select UART port, to select HEX file
  - It communicates with the Bootloader using an ASCII based protocol

1 PICKit, 3 PICs? How?





Solution : ICSProgrammer class

- It replicates the functionality of a PICKit to communicate with the PIC16s (or KMs)
- It has all the ICSP commands defined there and simple read and write methods

Task2: PIC32 self-programming

- To flash the firmware with UI in the PIC32
- Same python script and the protocol to communicate with the BL will be used

Plans for upcoming weeks

- This week:
  - Create commands to read the data from Bootloader
- If above successful then develop for write also