

## **Avionics system for a sounding rocket:**

**Description:** To calculate the height and GPS coordinates of a sounding rocket in real-time and transfer the data to the base station using wireless communication. The system was also designed to eject two parachutes one at apogee and another 1000 ft above ground.

**Hardware Used:** Arduino nano, XBee Pro S3B, Adafruit BME280 pressure temperature and humidity sensor, black powder, E-match, Adafruit Ultimate GPS v3.

**Software Used:** Arduino IDE (C++), XCTU