

Lab 9: Quadrature Encoder

Click [here](#) to refer to documentation related to the quadrature encoder.

1. Declare a global variable named `q_enc`. This variable will store the current value of the quad encoder and ***must be updated in real-time and used inside your programming.***
2. Write a program that...
 - a. Turns on the flashlight only when the value of the quad encoder reaches 400 in either direction.
 - b. Turns on the LED only when the value of the quad encoder reaches 500 in either direction.
3. Write a program that...
 - a. Spins the right motor forward at full speed until the value of the encoder reaches 550 in either direction.
 - b. Spins the left motor in reverse at half speed until the value of the encoder reaches 700 in either direction.