

Classes: LED, Button, SPI, Potentiometer, Buzzer

LED & Buzzer

- Functions that allow them to flash/buzz when Arcade Button is pressed
- Functions that allow them to flash/buzz for one second (dot) or for three seconds (dash) when they flash/buzz message received

Button

- Detects pressed length
- Detects whether it is pressed

Potentiometer

- Calculates voltage value
- Scale the durations of pauses and dots & dashes based on voltage

SPI

- Display letters based on dots and dashes
- Display space based on pauses (if the length of pause is greater than or equal to 7 seconds, then it adds a space after the letter)

Transmission software

- Link PocketBeagle to Wifi so that it can communicate with a phone's text message or email
- Read the message displayed on the SPI screen and turn this message into a text message to be transmitted

Reception software

- PocketBeagle reads the phone's text message once the user sends the text
- Display this message on the SPI screen
- Prompt LED/buzzer to flash/buzz based on the message