# **Button box Game: by, Hunter Hannula & Cameron Kerley**

* A game played on a NeoTrellis Feather LED game board built with CircuitPython and model from a project by The Ruiz Brothers:

1. Model from a project by The Ruiz Brothers: https://learn.adafruit.com/neotrellis-box-game
2. NeoTrellis Feather LED game board: https://github.com/adafruit/Adafruit\_Learning\_System\_Guides
3. CircuitPython:

https://learn.adafruit.com/welcome-to-circuitpython

* Game Logic:

1. generate a pattern at the start of the game
2. if the pattern generated at the start of the game matches the a pressed button light it up green
3. if wrong show visual flash or color that input is wrong.
4. After a set amount guesses reset and gen a new pattern.

* Sudo code for main project

-Programflow:

Load pattern

Display pattern start

Open user input

User button press ->

If wrong increase wrongAnswers by one and flash button red

If wrongAnswers is too high show lose game visual sequence and reset game

If right flash button green

If not last answer then advance nextRightAnswer

Else show win visual sequence and load new pattern

methods:

loadPattern

checkButtonPress(pressedButton) //check if board update event is correct

timedFlash(time, color)

getNextRightAnswer

loseGame //all squares blink red three times

winGame //all squares blink green three times

drawBoard