

DESIGN 02

Listen Up!

Creativity takes courage

— Henri Matisse

due 07 oct 2019

This is an individual design assignment to help us begin materializing conversation. Starting in class, you will develop code on your Raspberry Pi using Google Cloud Speech. This code will trigger responses to keywords that you define to activate a series of RGB lights (i.e. NeoPixels). For example, “stop” could trigger one of the lights to turn on red, “more” could cause more lights to turn on red, “breathe” could result in the lights flashing in and out simulating a breathing pattern. In this assignment, you are asked to create a sequence of at least three words or phrases (using the Google Cloud Speech demonstrated in class and likely using regular expression matching) to create a series of thematically consistent interactions. This could be only using lights or it could use servos, the speaker, etc. However, it should be thematically consistent. Is this a “virtual pet” you are interacting with? Is it a gossipy device that listens to you and flags you when it hears inconsistent facts or lies? Is it a pedantic teacher that always flags or corrects your grammar?” Your approach may influence how you arrange and give form to the design and lights layout. The focus here is on helping you gain fluency using the Google Cloud Speech and the Raspberry Pi to generate responses. Document your work by uploading a PDF containing images of your final design with some text describing the interaction. A video may also help illustrate your interactivity. You can include a link to your video in your PDF document. Please make sure any such video is viewable by us for grading.

