

This week we began work on the algorithm that we will be using to recognize cracks in pavement. We found open-source code using PyTorch that is used to detect cracks and adapted it for our use. We were successfully able to begin training it on a local computer, but realized that it was going to be a very slow process when we need hundreds or thousands of images to correctly train it. Our attempts at getting it running on the High Performance Computers were initially unsuccessful as they require Python 3, and the HPC default to Python 2.7. However, we were able to figure out how to change the Python version it uses and verified that it began to train. The next few weeks we will spend refining the algorithm as we had some difficulties with PyTorch, as well as simplifying the program to make it easier to use.