

Daily Log

Monday October 28

I wasn't at school on Monday.

Tuesday October 29

Spent most of the time working on making the presentation and writing a script for it. Also continued writing OpenPose code but didn't make that much progress because of a few silly errors.

Thursday October 31

Gave presentation and received feedback. Continued researching potential architectures - spent a lot of time looking at ConvLstms. These could work well if I could find some interesting way to represent people in space in an image. Maybe have 4 channels (R,G,B) + one other channel with pose representations on it.

Wednesday November 6

Finished writing code that runs OpenPose and generates dataset of poses marked as either violent or non-violent.

Thursday November 7

Settled on using a convlstm architecture after doing some more research. Tried understanding the math behind them by looking at a few sources, but also noticed that there's a lack of documentation surrounding it. Tried making a convlstm just in general (like an example) so I understood how it worked. Will start making real architecture next week after everything else is figured out.

Timeline

Date	Goal	Met
Today minus 2 weeks	Review OpenPose code and determine best statistical representation for poses.	Completed
Today minus 1 week	Run OpenPose code through dataset of frames marked as violent or non-violent.	Paused - want to work on finding best architecture first
Today	Come up with architecture for machine learning system	Still in progress.
Today plus 1 week	Write code that loads new dataset, preprocesses it, and gets it ready as input data for the network	
Today plus 2 weeks	Run network, refine model.	

Reflection

I actually learned a pretty significant amount about what things to include / exclude while giving a presentation. I was sort of surprised that our presentation needed more text in the PowerPoint because I've always thought that its best to keep slides minimalist. Anyways, I learned things from watching other people's presentations too and that'll all definitely help in improving our own. In terms of finishing writing the code, that was a pretty straightforward thing. I think next week I'm going to focus on choosing an architecture, and then finally starting to get into the meat of the project.