Today, Smart Eye's Automotive Solutions are embedded in next-generation vehicles, leading the way towards safer and human-centric mobility. We offer road-ready Driver Monitoring Systems and advanced Cabin Monitoring solutions.

Our current driver drowsiness estimation is frame-based, meaning that each prediction is somewhat independent. This leads to a noisy output signal that can rapidly switch between different drowsiness levels.

The goal of master thesis is to improve continuous estimation driver drowsiness level by post-processing drowsiness signal using memory and/or attention based neural networks (LSTM, transformers and similar). The expectation is that such networks can employ context of predicted drowsiness levels beyond what can be achieved by a simple running window smoothing thus improving the signal overall.

Requirements:

Python
Deep Learning

Contact:

raimondas.zemblys@smarteye.se
henrik.lind@smarteye.se, Tel 0708-444898