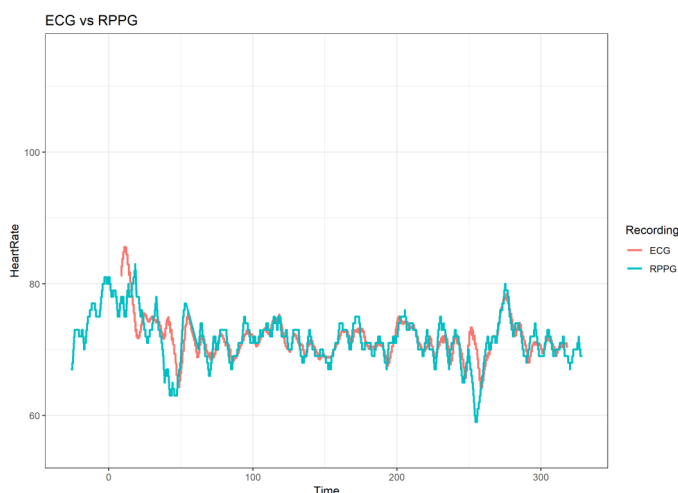
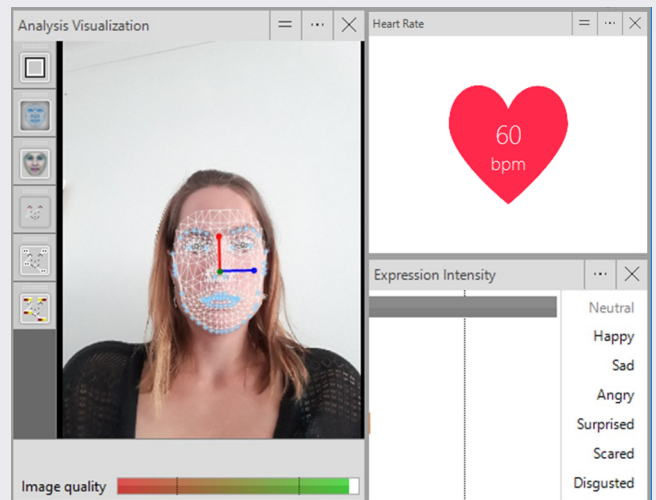


## A Healthy Heart with Automated Assistance


**INNOLABS**

VicarVision develops state of the art solutions and products for computer vision. We have a special interest in perceiving people's behavior. FaceReader™ is the premier product for automatically evaluating emotional expressions in the human face, and is used by over 700 institutes world wide.

In this project, we developed our current PC software into a new mobile application that can be used to measure emotions and heart rate unobtrusively. The funding from Innolabs was used to gather very valuable data for validation and development. The application can ultimately be beneficial to companies and people that want basic and easy insights into their health to thus motivate people to become healthier.



The results of the project show that we can accurately assess emotions and heart rate from mobile devices. On average, 83% of frames can be successfully analysed. Analysis show that 82% of the heart rate assessments (using remote PPG) were within 10 deviations of the ECG ground truth heart rate (see an example of one recording on the left).

Next steps are applying for additional funding to further develop this application as an ecological momentary assessment tool. We are also interested in finding research and health institutes that want to collaborate and use the application.