

Demokratizálhatja-e az AI a Driver Monitoring megoldásokat?

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PROBLEM

Fatal accidents caused

by human distraction



ROAD SAFETY IN THE EU



135,000 seriously injured people

roboGaze SOLUTIONS



- 1. Recognition: 99,38% accurate face recognition
- 2. Fatigue: Multi-factor driver drowsiness tracking
- 3. Responsibility: Real-time driver alertness detection



USP-Democratization of DMS





LOW COST, ONBOARD

Algorithms can operate in low resource environment (low resolution camera, Raspberry Pi + Movidius)

AI DRIVEN

Analytics and predictions are supported by deep learning algorithms



REAL-TIME

Cutting edge technology offers real-time solution fit for IoT

AUTOMOTIVE GRADE

roboGaze platform matches automotive industry standards



State Of The Al enables DMS broader usage

New, easier ways to implement and teach - Tensorflow - Adanet

No need to reinvent the wheel

Full training databases, well pretrained models

Clever ordering of components – edge advantage

Easy to prototype ideas



Mature Al frameworks enable faster go2market

No need for maintenance old solution

Smaller team is enough to handle the development

Cost efficient development coast

Can benefit the agile - lean way

Faster more iterative development



Our solution

Using cascade detection & neural network simultaneously

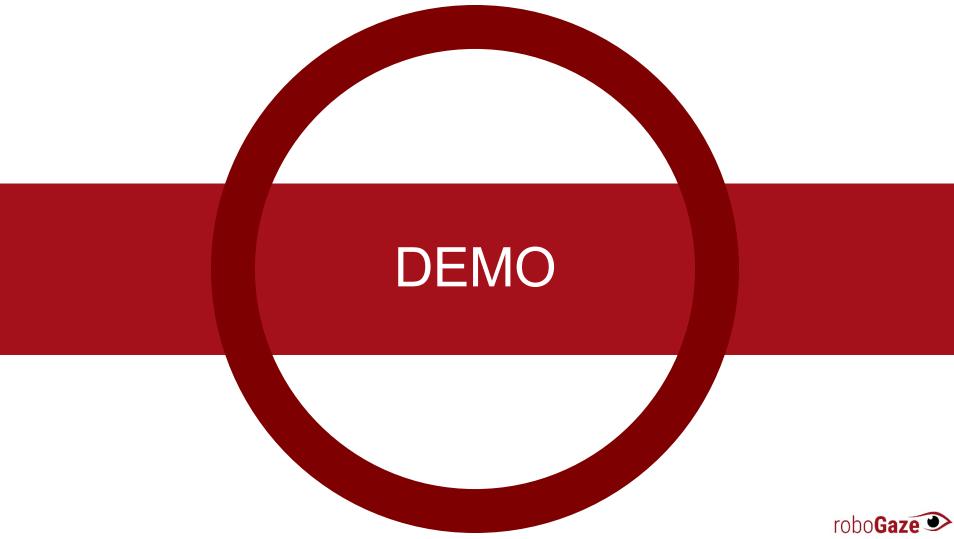
OpenVINO for the hardware optimization

Running on a Raspberry Pl or equal

No need for special camera



THANK YOU FOR YOUR ATTENTION!



EU REGULATION



European Commission is set to revise the General Safety Regulation 661/2009 and the Pedestrian Protection Regulation 78/2009 in 2018. These regulations represent the most direct and effective measures the EU has in order to further reduce road deaths and injuries.

PRIORITY TECHNOLOGIES THAT ETSC REQUIRES

- Distraction and fatigue
- Alcohol Interlocks
- Seatbelt Reminder
- Intelligent Speed Assistant
- Lane Keeping Assistance
- Automated Emergency Braking
- Event Data Recorders

Gaze tracking and real-time computer vision technology supports numerous use cases

