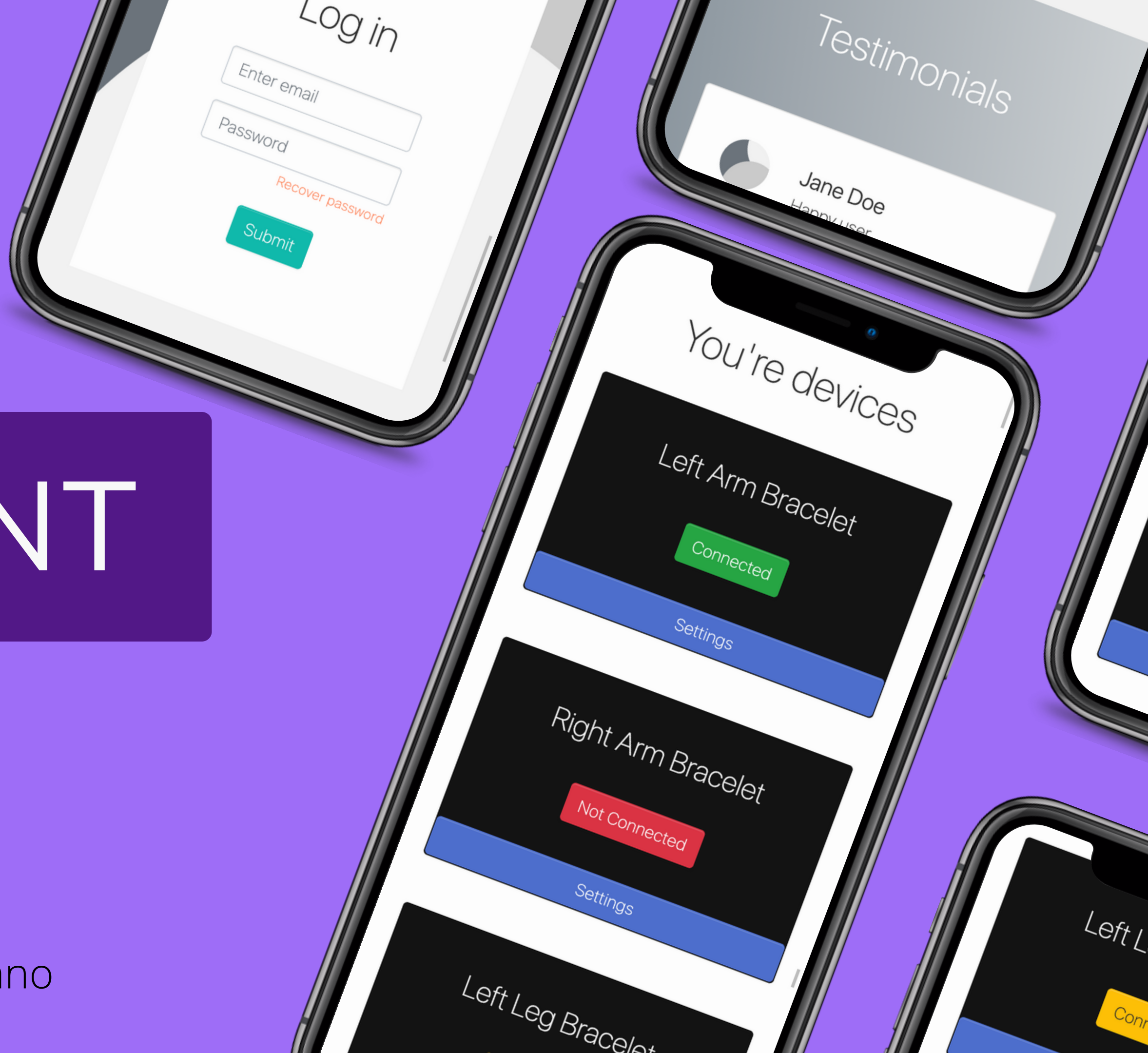# ASSISTENT

Author: Oscar Gal

Supervisor: s.l. dr. ing. Rajmond Jano
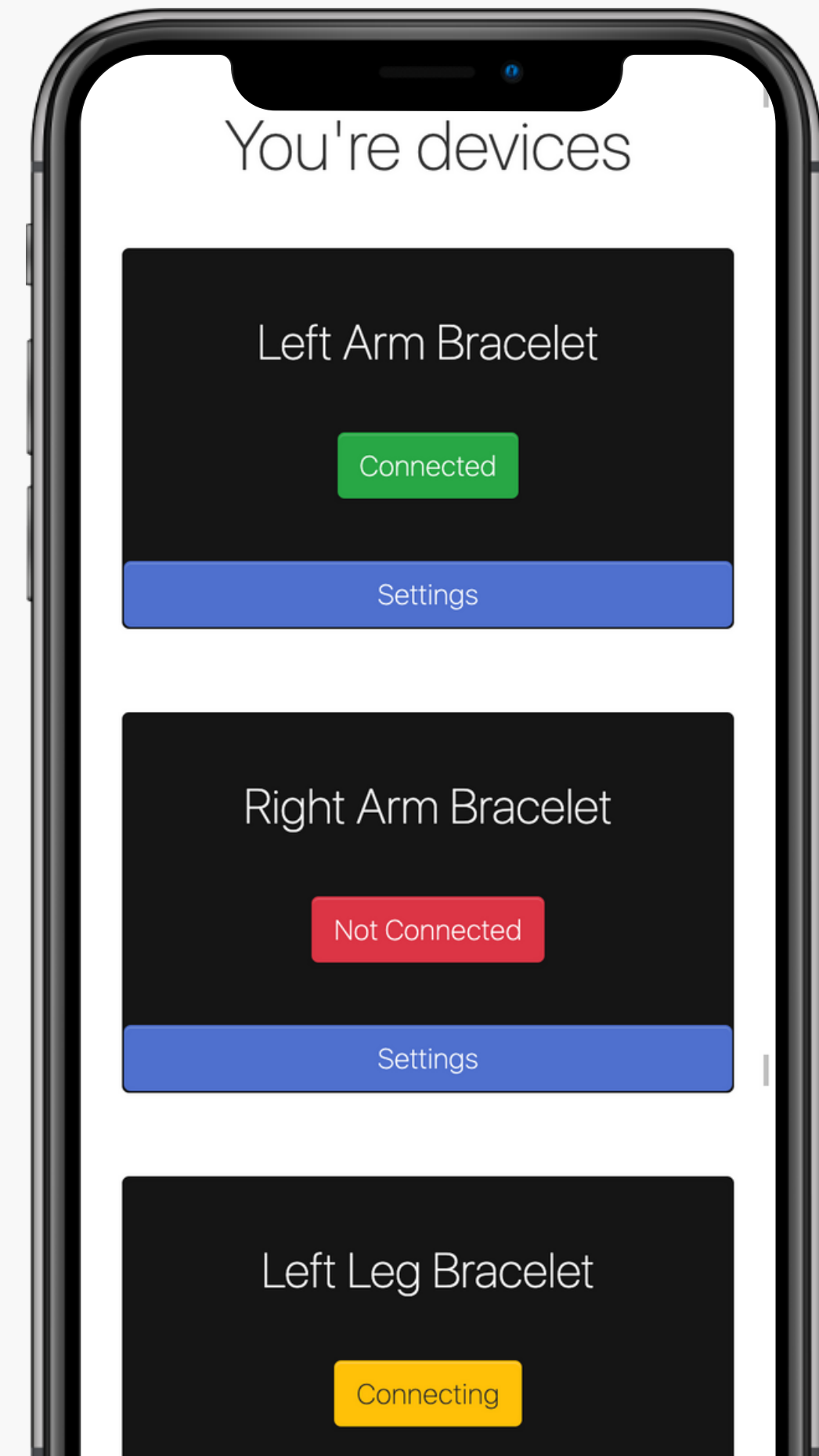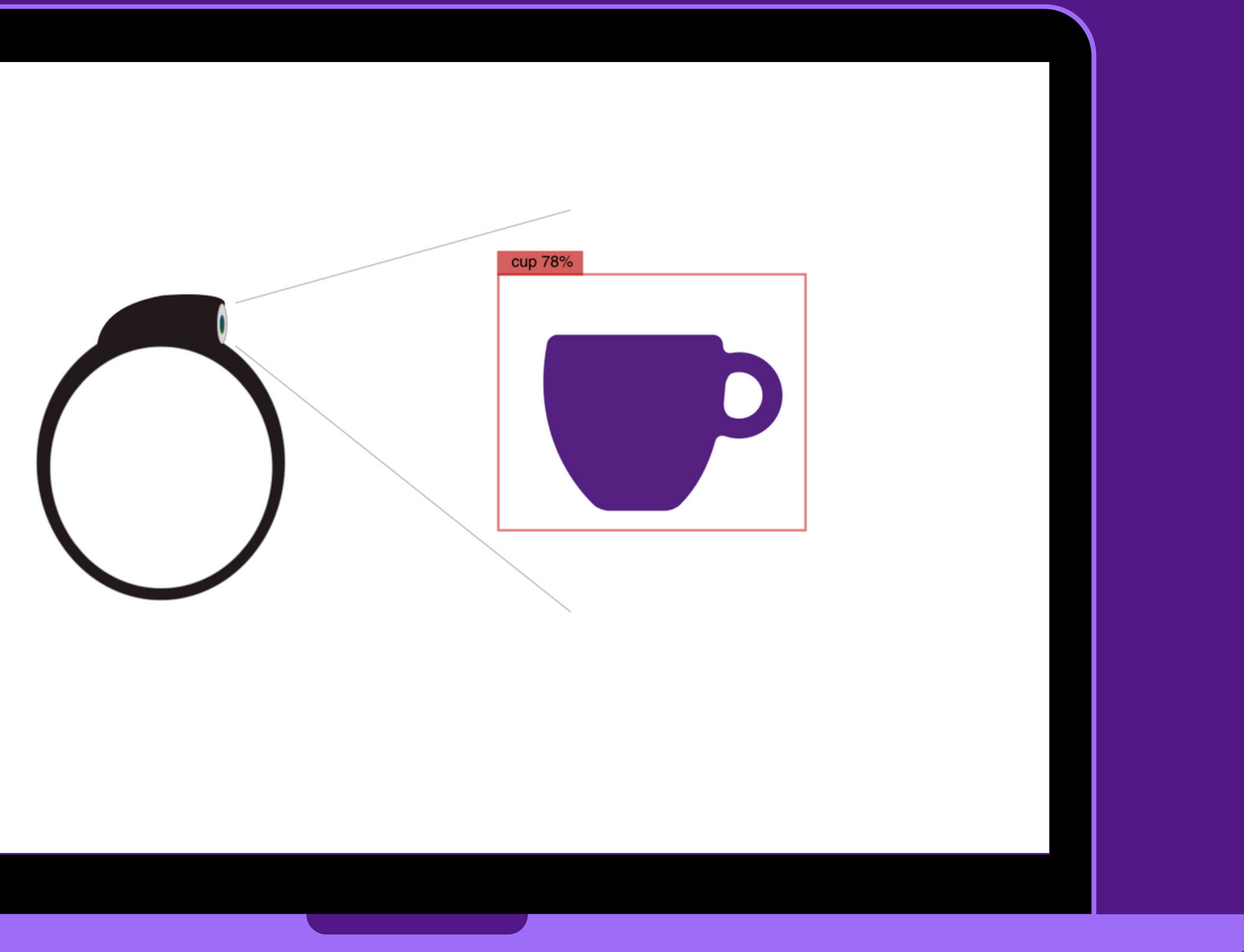
Globally, at least 1 billion people vision impairments

PRESENTED SOLUTION

We came with the solution of combining the latest technologies in AI, hardware and software, creating a product that could help people with vision impediments.
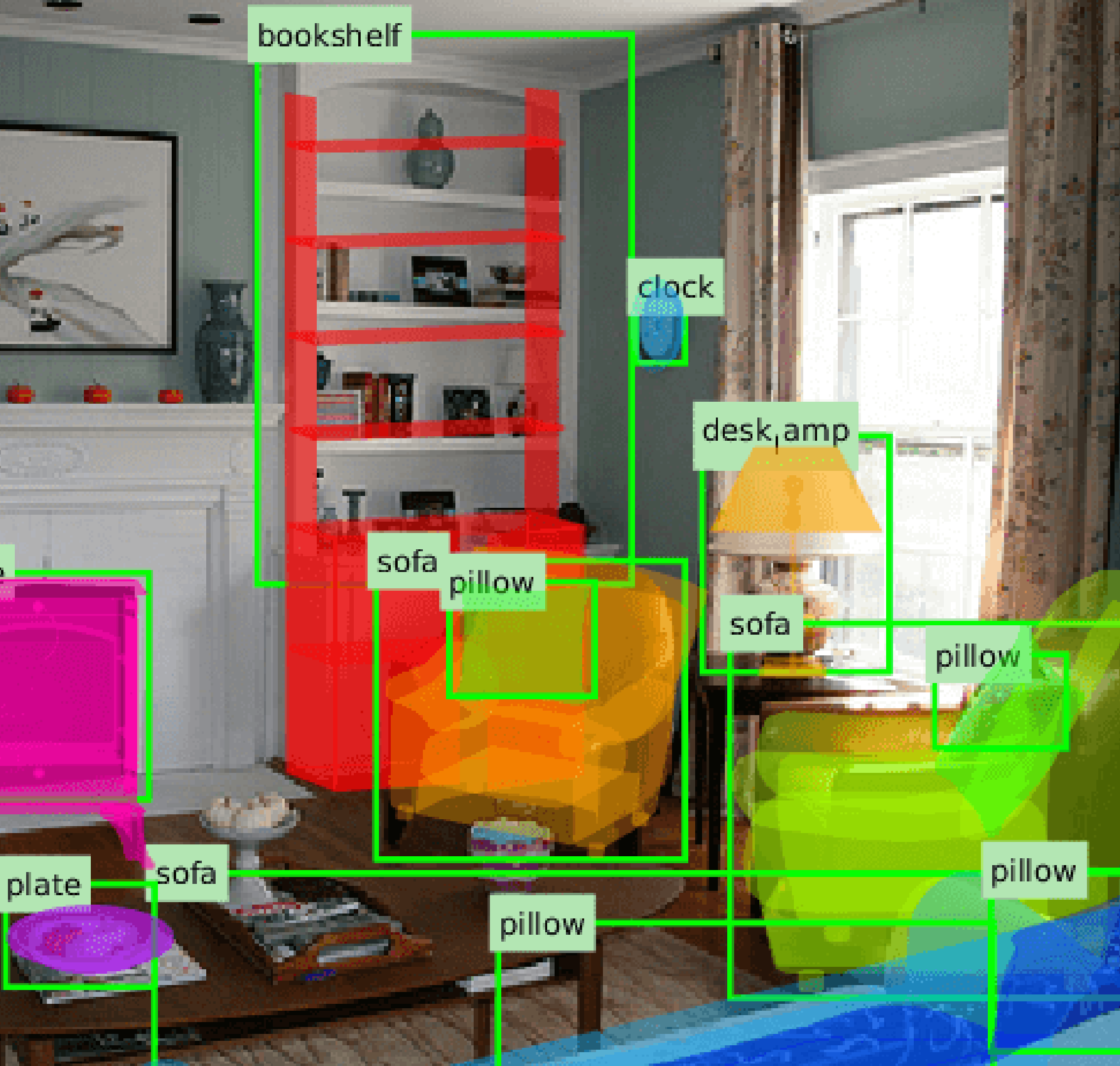
Simply put, we've started from the ideea of having bracelets capable of "seeing" and we combined it with software that can predict object in images.

You're devices

Left Arm Bracelet

Connected

Settings

Right Arm Bracelet

Not Connected

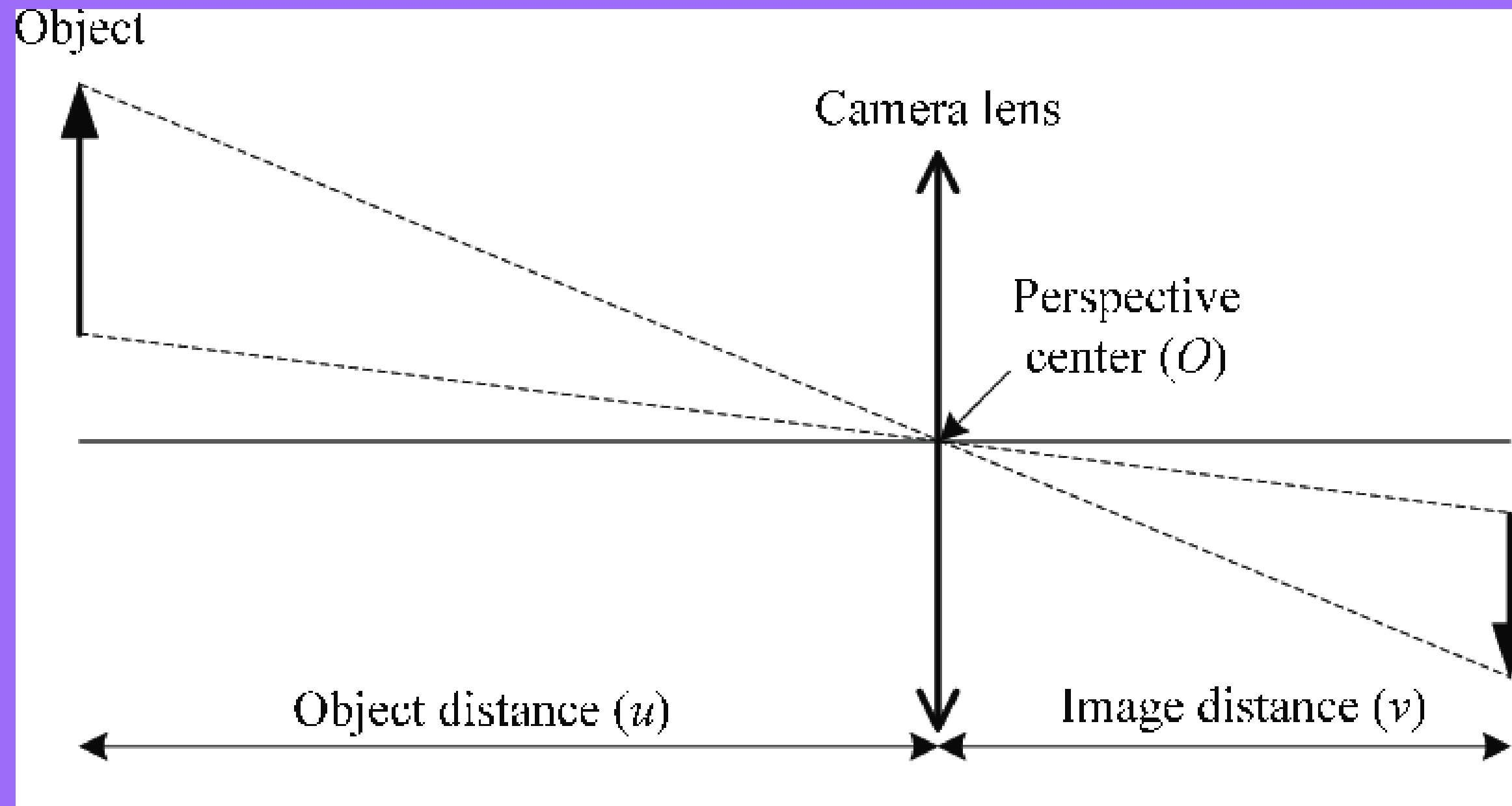Settings

Left Leg Bracelet

Connecting

HOW IT WORKS

The app will centralise the data gathered from all the bracelets, this way being able to predict potholes, objects and distances

We are going to use object recognition with deep learning in order to figure out what object is in each image

Object

Camera lens

Perspective center (*O*)

Object distance (*u*)

Image distance (*v*)

Also we will use specific algorithms to determine the aproximate distance to an object

THANK YOU FOR YOUR ATTENTION

Let's fight for a better tomorrow