

# EMERGENCY QUEST

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# SYSTEM CREATED FOR IMPROVING THE QUALITY OF LIVE OF :

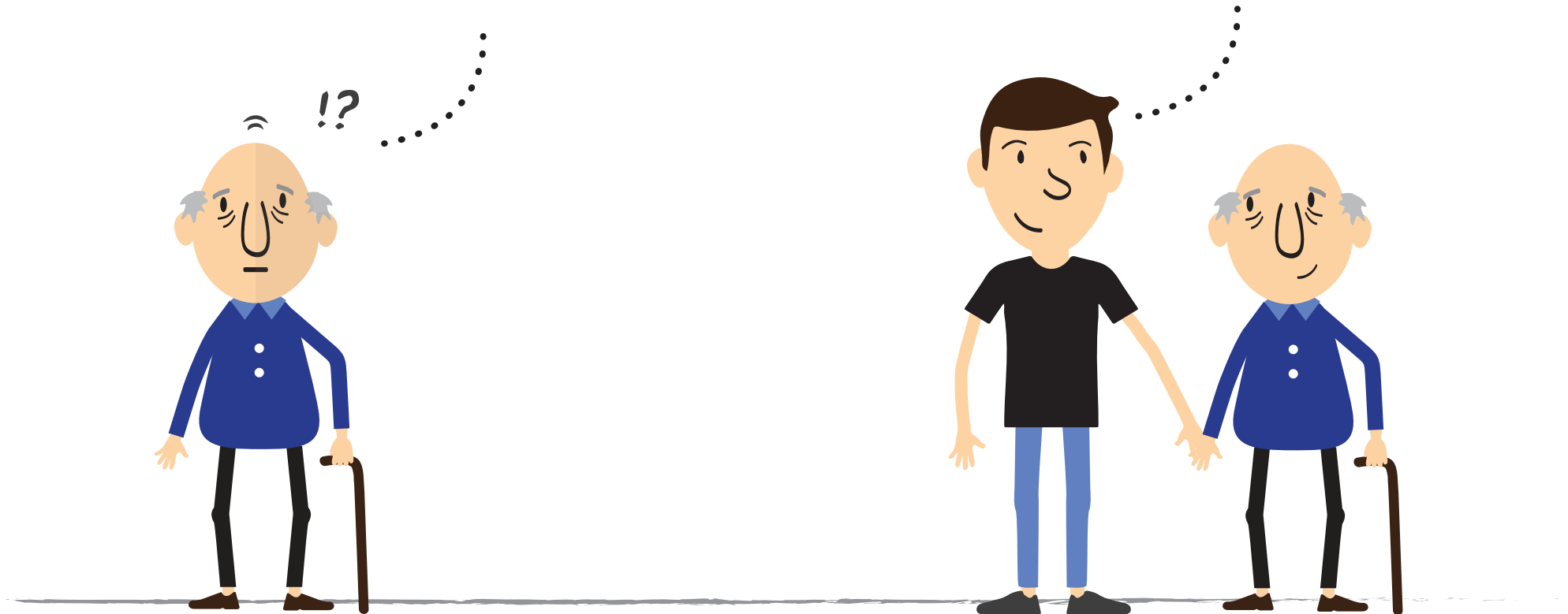
People with

**DEMENTIA / ALZHEIMER**

&

their

**CAREGIVERS**



# MONITOR HEALTH.

In case of  
agitation



Play music



Relax the  
patient

Change Illumination



# CARRYING OUT EVERYDAY ACTIVITIES

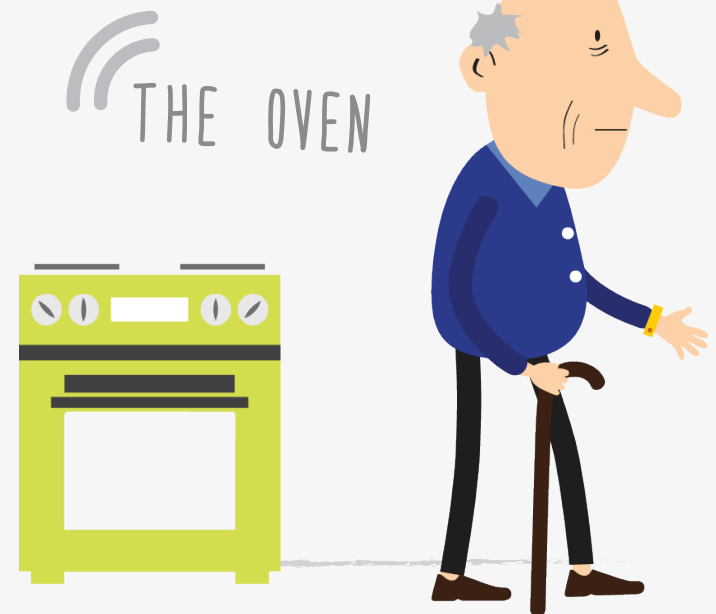
Movement in  
dangerous  
places



pre-recorded  
messages



Alert the  
patient to go  
back





# ENHANCE SAFETY

Patient leaves  
a defined area



send  
notification  
to app

Notify the  
caregiver



IMPROVE  
PATIENT LIFE



by

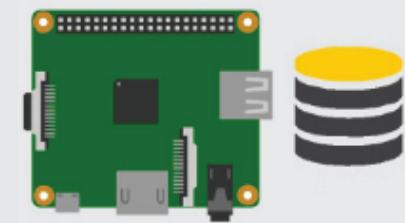
smart  
house



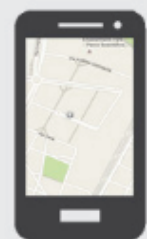
monitoring  
bracelet



main server



room station



mobile  
App

## SENSING

GPS location



motion and  
agitation

## REASONING

Differentiate between



agitation  
problems



motion  
problems

## ACTING



pre-recorded  
messages



modify the  
environment

## INTERACTING

APP accesible  
for both users



- track patient movement
- store sensor data

# ROOM STATION

## HARDWARE

Single board computer  
connected to the Internet  
via Wi-Fi

Motion sensor

Bracelet: heart rate and  
respiration sensor

Patient's smartphone to  
track his position

Active speaker

Controllable lights

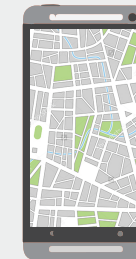
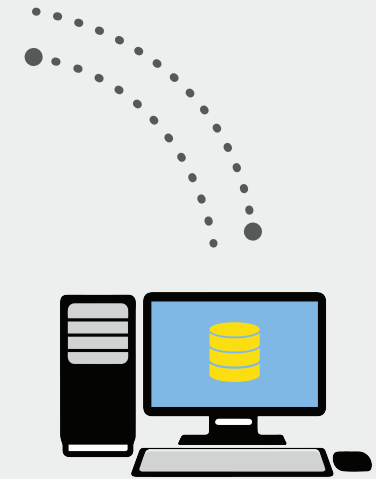
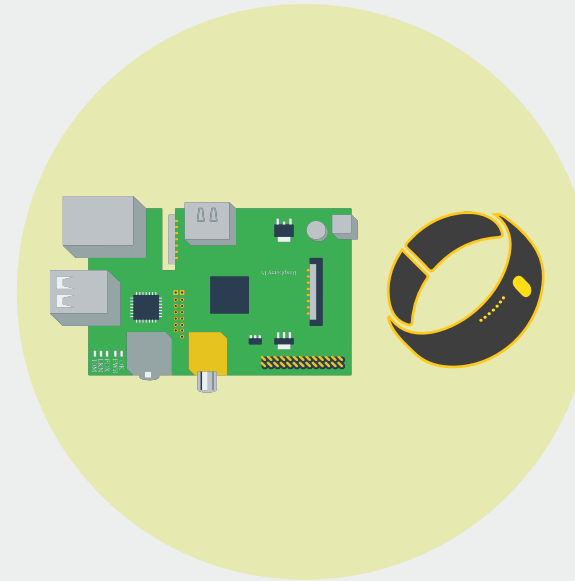
## SOFTWARE

Station, sensors  
and actuators

process sensed data

process GPS patient's  
position

change the environment



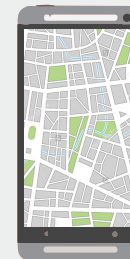
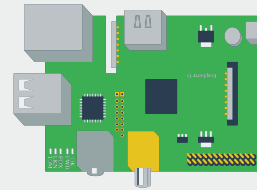
# MAIN SERVER

## HARDWARE

computer  
connected to the  
Internet via LAN.

## SOFTWARE

store previous user data  
send notifications to the  
app  
receive and store  
appointments  
process notifications  
provide a map within the  
mobile app

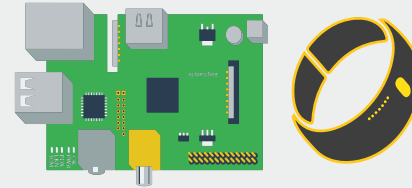


# MOBILE APP

## HARDWARE

### USER'S CELLPHONE

used to access to the system front-end from the mobile application.



## SOFTWARE

create a new user to start using it

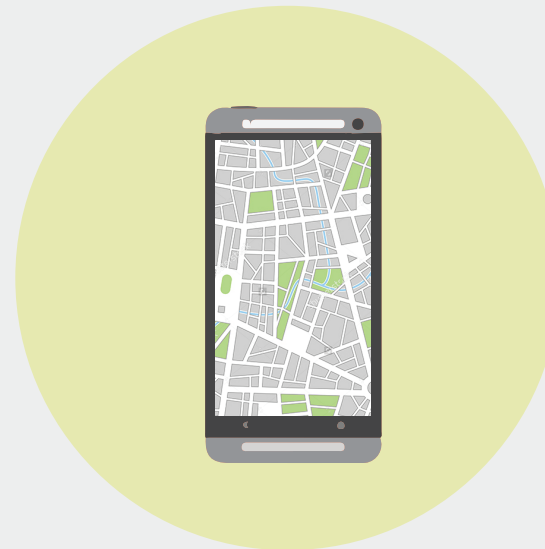
show patient's current position

set preferences

receive notification messages

patient history

set appointments with playing messages



THANK YOU  
FOR YOUR ATTENTION.

