



### **Future Cities Living Lab in Porto**

Smart Cities and Use Cases

4<sup>th</sup> EU Summit on the Future Internet
Aveiro, Portugal

Ana Aguiar, FEUP/ Instituto de Telecomunicações











### Future Internet is...

- Internet of Things
  - Machine to machine communications: the fabric
- Streaming media, gaming, augmented reality
  - Converged networks: fiber, cellular, wifi, device-todevice
- Big data, machine learning
  - Cloud computing: efficient sharing for scale









### **Smart City Use Cases**

**Sharing Economy** 

Mobile Health

Lifecycle Assessment

**Energy Efficiency** 

**Participatory Citizenship** 

**Intelligent Mobility** 

**Smart Factories** 

**Smart Environments** 



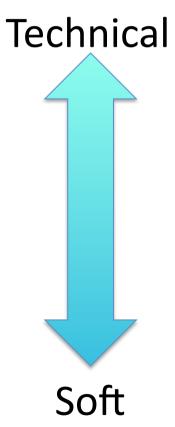






### Challenges

- Connectivity and response time
- Security and privacy
- Interoperability
- Usability
- Data access
- Interdisciplinary collaboration
- Business models
- Stagnating economy









# FUTURE CITIES PROJECT EU



#### U. PORTO

### **Mobility and VANET**

- Taxis, buses, harbour trucks
  - Vehicular communication
  - Equipped with sensors
  - Remotely managed



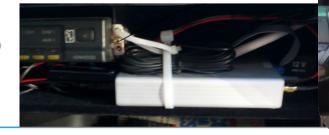




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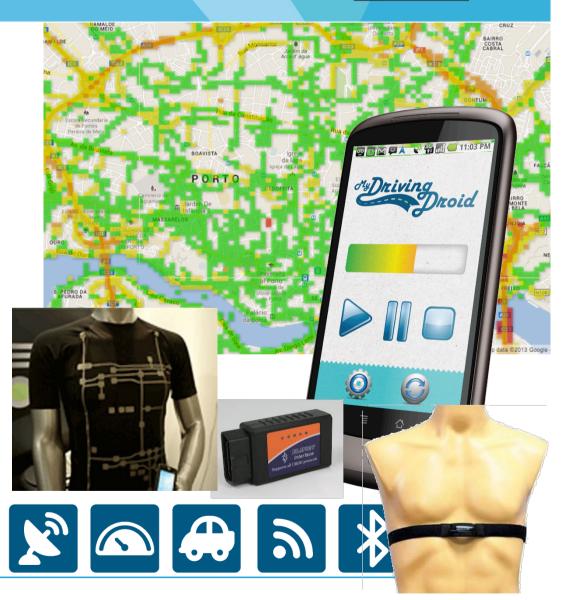




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## SenseMyCity

- Crowd-sensing platform
  - Location, activity
  - Heart wave, CAN bus
  - Emotion questionnaires
- End user trust
  - Firemen, policemen, bus drivers
  - Citizens in general







# Porto – Our Living Lab for Future Cities

