Connected Objects

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Definition

- Connected Object: Physical objects or "things", embedded with electronics, software, sensors and network connectivity, which enable these objects to collect and exchange data.
- The definition of "connected objects" varies, as some people may consider that only objects that weren't originally designed with electronics,

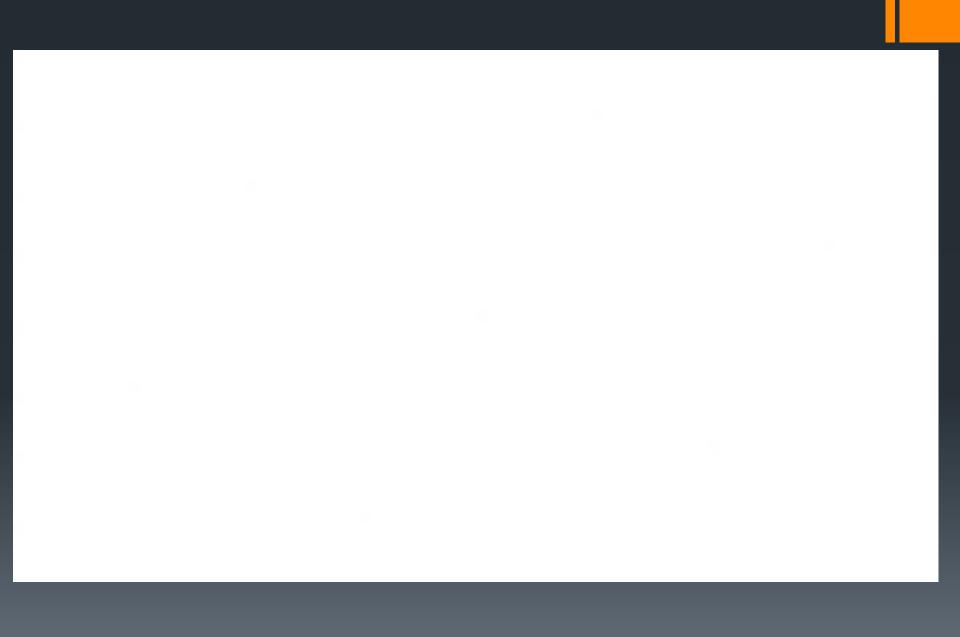
(I might call them "mechanical" objects) match the definition. We can then consider that a printing machine for example is not a connected object.



Name: Rhafi Haladjian

- Founder of FranceNet (1994) Bought in 2001 by British Telecom
- Pioneer of the Internet of Things
- Founder of Ozone (Community Wi-Fi provider) bought in 2007 by Neuf Telecom/SFR
- Cofounder of Violet (2003) with Olivier Mevel
- Founder of Sen.se (2010)
- Creator of the DAL lamp (2003) and the wireless-connected rabbit Nabaztag (on the picture) in 2005

The Smart Weighing Machine



The Adidas Smart Ball

WARNING: THE FOLLOWING PROGRAM CONTAINS FLASHING IMAGERY

VIEWER DISCRETION IS ADVISED

How can Africans take advantage of connected objects?



KINECT_for XBOX360







Kinect = RGB Video Camera+ 3D depth sensors + 4 Michrophones

The depth sensor is in fact composed by an infrared laser projector and an IR collector sensor.

The projector floods the room with infrared, up to a 6m2 distance. The IR collector "reads" the infrared as it comes back and a 3D depth image of the room is built.

Concretely, the Kinect does a full 3D mapping of the room



Preview of the Kinect sensor IR Projection



Project:

- Use a "kinect-like" technology to get rid of malaria
- We can design a prototype that will map the room, identify the mosquitoes and give an alert.
- The prototype could be linked to a smartphone app for more detailed data.
- * How can the prototype distinguish mosquitoes from flies and other insects?
- * Will it "kill" or just alert?
- * Is it actually useful?
- * what components shall we need to build it?
- * Is this project viable in our country?



Useful Links

- PrimeSense: https://plus.google.com/+primesense
- Source code for the PrimeSensor module (Read START_HERE first): https://www.dropbox.com/sh/ltul0t1aphi07j0/AABM1xYm0srkJ1lJ94U12 OYSa?dl=0
- Sen.se: https://sen.se/mother/
- Speaker: kevin.yanogo@gmail.com

Thank you for you Attention

