

INTERNET OF THINGS: A CHALLENGE OR TECHNOLOGICAL FETISHISM

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IoT concept (1)

- ✓ No standard definition of IoT
 - ✓ technological aspects
 - ✓ uses and features
- ✓ Novelty of the IoT concept: association of various technologies as
 - ✓ nanotechnologies
 - ✓ radiofrequency
 - ✓ Internet
- ✓ This association facilitates the development of intelligent things

IoT concept (2)

- ✓ Characteristics of these intelligent things
 - ✓ analyze their environment
 - ✓ communicate with one another



- ✓ Ambient intelligence brings IoT potentialities to light
- ✓ Problematic

To keep IoT potentialities mechanisms that establish confidence and territorial-oriented strategies must implement together

IoT potentialities (1)

- ✓ **A considerable challenge**
 - ✓ 2 connected things / average user
 - ✓ 7 within 3 years
 - ✓ 25 billion of wireless devices around the world
- ✓ **Technological factors**
 - ✓ generalized communication abilities
 - ✓ geo-localized databases
 - ✓ planning tools



Hybridization between the real world and the virtual world

IoT potentialities (2)

- ✓ IoT potentialities come from the creation of virtual worlds
 - ✓ reproduction of physical/real worlds
 - ✓ immersion
 - ✓ interaction in real time
 - ✓ Redefinition of information concept
&
 - ✓ Transformation of its communication media
 - ✓ Ambient information whose characteristics are
 - ✓ augmented human
 - ✓ sensitive environment
- ➔
- ✓ Centralization of information
 - ✓ Reduction of information asymmetries
 - ✓ Reduction of uncertainty/risks

Not only a **technological** approach
But a **technicist, fetishist** approach

Because this approach forgets uses and then individuals
= **technological fetishism**

✓ 3 conceptions of IoT

- ✓ the uses depend on packaging
 - ✓ the contents justify the technological choice
 - ✓ matching between technology, things and uses.
- ✓ To outdo this kind of approach we must
- ✓ change our conception
 - ✓ adopt **a cross-disciplinary approach**

Confidence in IoT (1)

- ✓ IoT leads to collect more information in individual environment

→ fears
because of risks of intrusion in the private life



Problem of the confidence in the IoT

- ✓ To establish confidence → Need to surpass fetishist approach
- ✓ Different approaches of confidence
 - ✓ conventionnal
 - ✓ psychological
 - ✓ sociological

→ Importance of cooperation and coordination

2 conditions to allow confidence in IoT

1) Rules definition about

- ✓ standard that establishes interoperability and technological convergence
- ✓ the enactment of rules about private life protection

2) The question of uses and contents

- ✓ the representation of the world
- ✓ the identification with virtual space
- ✓ the mediation with different audiences

Reconsideration of approach angle



the local level is the relevant scale for IoT

Because appropriation processes can only emerge at local level

Closeness relations



3 coordination mechanisms

Local strategies (2)

- ✓ That is at this level that “new” public strategies can develop
- ✓ Because of driving effects due to
 - ✓ infrastructure expansion
 - ✓ externalities
- ✓ Example of smart cities: a real economic development core for territories in favour of
 - ✓ open innovation (living labs)
 - ✓ needs, expectations and expressions of citizenship

➔ Big Push gamble

- ✓ But if there is no overall vision innovations can be counterproductive

Conclusion

- ✓ IoT must not only concern a new form of use induced by technological evolution
- ✓ IoT conception supposes a new approach in the definition of
 - ✓ object
 - ✓ subject
 - ✓ actor
 - ✓ and agent

THAT IS THE CHALLENGE