Enabling technologies for developing innovative M2M IoT services

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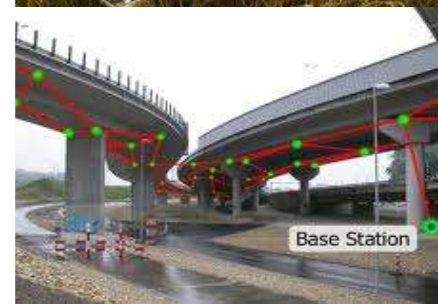
M2M and IoT services

- Key enabler of services across a broad range of **vertical markets**
  - Smart grids, smart cities, utilities, eHealth, banking, ITS, retails, security, agriculture…
- Disclose new intelligent services, markets and business models
- The sucessful design and deployment of M2M/IoT applications bring up "issues" requiring **different competences** and **synergy among stakeholders**
  - Issues → opportunities







Common Application Requirements

Quality of Service
- System performance
- Scalability
- Robstness

Security

Data privacy

Cost effectiveness

Fast/easy deployment and maintenance

Usability

Common Application Requirements	System Desiderata
Quality of Service ➢ System performance ➢ Scalability ➢ Robstness	Adaptability, reconfigurability ➢ To effectively cope with failures and variations ➢ To better manage limited resources ➢ To meet customer requirements and offer more accurate services
Security	Context-awareness
Data privacy	Dynamic trade-offs
Cost effectiveness	System modularity
Fast/easy deployment and maintenance	Simplicity
Usability	

Big data analytics

- Transform **row data** into knowledge
  - **Automatize** data processing and provide **quality guarantees**
- Innovative ways to harness data
  - Examples: automatize processes, enhance QoS and decision-making, forecast (predictive analytics), provide new services for customers, create new sources of revenue…
- Some technical challenges
  - Effectively manage/analyze at real-time big data
  - Ensure data privacy and provide data quality
  - Manage data across different databases and systems

Other relevant components

- Interoperability across heterogeneous devices and system spread over a large geographic area
- Standards and compliance to regulations
- Cost effectiveness
- Definition of new markets and business models
- Business partnerships…

Session outline

- **Partnering to provide seamless Global M2M services**, Angel David Garcìa Barrio, M2M World Alliance
- **The key differentiator in the M2M market,** Sammy Yahiaoui, Telit Wireless Solutions
- **Enabling new business: succeed in your business with Eurotech IoT building blocks,**Tiziano Modotti, Eurotech
- **On Demand Connectivity**, Holger Lenz, Gemalto M2M
- **Internet of Things: challenges and opportunities for IT security,** Alfredo Cusin, Endian
- **COMMUNICATIONS & SERVICES, The Key To A Successful M2M Deployment**, Iain Maclachlan, Wyless
- **Roaming In Critical Connectivity Applications,** Christian Eriksson, CSL DualCom
- **How to build Complex IOT projects without complexity. Success stories are analyzed on projects from Smart Grid to Smart Cities**, Miguel Castillo, Carriots
- **Context is the key differentiator in the Internet of Things**, Magnus Melander, Wbird