GEODE Position Paper on Smart Metering

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GEXXXDE

GEODE Smart Metering Position Paper

- GEODE
- Overview
- GEODE position



Who we are?

Independent Distributors

- Founded in 1991
- Represents more than 600 independent electricity and gas distribution companies from 12 European countries
- Our members are independent companies, public and private owned
- Our members supply more that 100 million people
- Countries represented:
 - Denmark

France

Germany

Italy

Norway

Spain

Sweden

Switzerland

Hungary

Slovenia

- Austria

United Kingdom



Overview

SMART METERING an issue addressed throughout the world:

- USA: California, Texas and others
- Australia
- Europe

Meter stock:

- 253 M electricity Meters in EU
 - >60% is in Germany, France, Italy, UK & Spain
- 109 M gas Meters in EU
 - >80% is in Germany, France, Italy, UK, NL, Poland & Spain

100 M SM to be installed in next 5 - 10 years in EU

Residential sector is second largest final user of energy

• 30% of total consumption

Drivers for Smart Metering

- Increasing Energy Efficiency
 - Main driver in Europe
 - Better informed customers will use less energy
- Improving billing accuracy
 - Main driver in Sweden
- Peak demand management
 - Main driver in USA, Australia
- Reducing losses due to fraud
 - Main driver in Italy
- Advancement of Smart Grids
- •Enabling Renewables, micro-generation, distributed generation connection to the network
- E-mobility



GEODE supports the advancement of SM

- Increased energy efficiency
- Improved customer service
- Increase efficiency in the value chain



Responsability for Metering

DSO is the suitable actor to be responsible for and to manage the SM infrastructure



Responsability for Metering

23 OUT OF 25

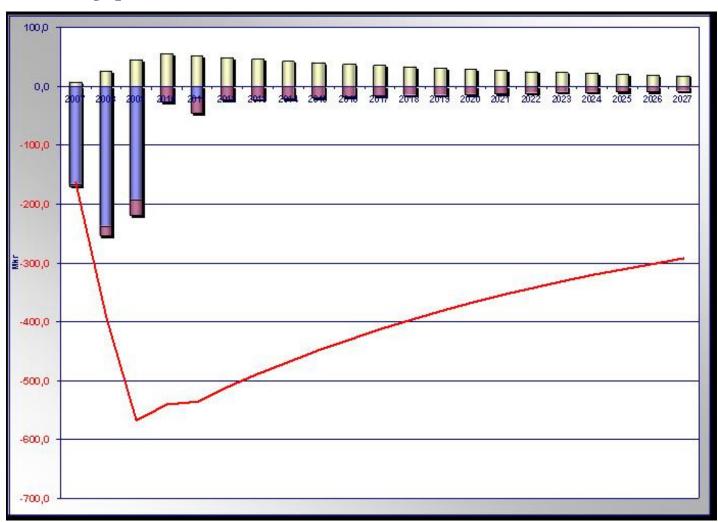


Cost of Smart Metering

DSO must be given financial allowances in order to recoup costs of investment of Smart Metering implementation



ROI – Typhical for DSO?



Functionalities

Important to define certain minimum Smart Meter functionalities across a country or EU.



Services

Functionality

Flows, levels, temperature, etc
Fire, assault, burglary, humidity, water etc.
Metering services in various entities

Customer demand, dialogue

Peak-load mgmnt, smart homes, cust. dialogue

Peak-load mgmnt, netoptimization, electricity quality

Customerweb, dialogue, planning, theft

Customer dialogue, Maintenance

Non-payments, moving

Maintenance, Failure mgmnt, Customer dialogue

Customer dialogue, investigations

Time of use tariffs, customer dialogue

Various forms of control

Monitoring and alarms

Metering of water, gas etc.

Meter value to customer system

Controlling customer appliances

Monitor power usage /voltage levels

Jsage statistics

Power failure real time alarm

Remote connect/disconnect

Power failure registration +statistics

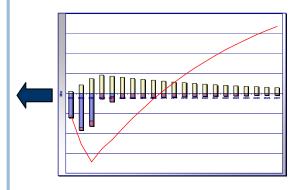
On demand readings

Hourly metering values

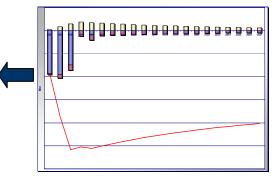
Invoicing, contracts, change of supplier

Monthly metering value

Return on EXTRA-investment – profitable



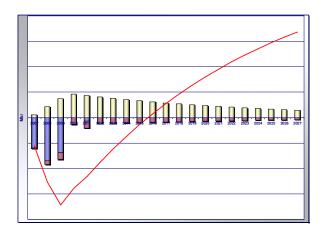
Return on **BASIC** investment– non-profitable



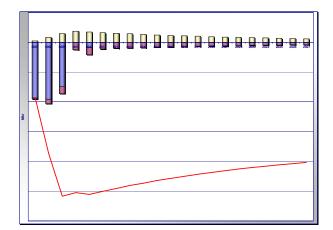


AMR to AMM to AMI

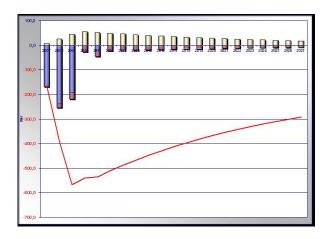
Return on BASIC investment– non-profitable



Return on EXTRA-investment – profitable







Standardisation

- Need of standardization on communication level
- GEODE supports the work being done by CENELEC (Commission's mandate)
- Procedures should speed up as much as possible



Customer concerns

Customer concerns over privacy issues, data handling and EMF must not be taken lightly and can increase costs or at worst stop installation or even roll-out of Smart Metering



Customer concerns



Psychotherapist

Incorrect metering EMF Privacy issues



Summary

- GEODE supports the implementation of Smart Metering
- GEODE holds that the DSO is the suitable actor to be responsible for and to manage the Smart Metering infrastructure
- **GEODE** stresses that the installation of Smart Metering Systems is a large investment for DSO. It is necessary that the DSO is given financial allowance in order to recover the cost.
- A minimum level of functionalities should be defined at national and European level, in order that all customers are given the same basic option of services.
- Standardisation at European level is needed and should be made on open communication level
- Customer concerns over privacy issues, data handling and EMF must not be taken lightly and can increase costs or at worst stop installation or even roll-out of Smart Metering

Thank you

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