



NL Agency  
*Ministry of Economic Affairs, Agriculture and  
Innovation*

# SmartRegions

**Improving energy efficiency  
prospects of smart metering**

**Case study: Dutch learnings  
on collaboration and  
innovation**

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» *Focus on sustainability,  
innovation and international*



## Presentation Highlights

- Introduction SmartRegions project
- European Smart metering Landscape Report
- Case study: experiences in the Netherlands
- Learnings on collaboration and innovation



## SmartRegions (IEE-project)

### Rationale:

- Smart meters don't save energy
- No services, no savings

### Activities:

- Monitoring European smart metering landscape
- Enabling impact assessments
- Defining and promoting best smart metering services and exemplary SmartRegions

### Objective:

- Support implementation of smart metering services

### Target groups:

- energy utilities, the energy service developers and providers
- national and EU decision makers and authorities

More information on:  
[www.smartregions.net](http://www.smartregions.net)

SmartRegions



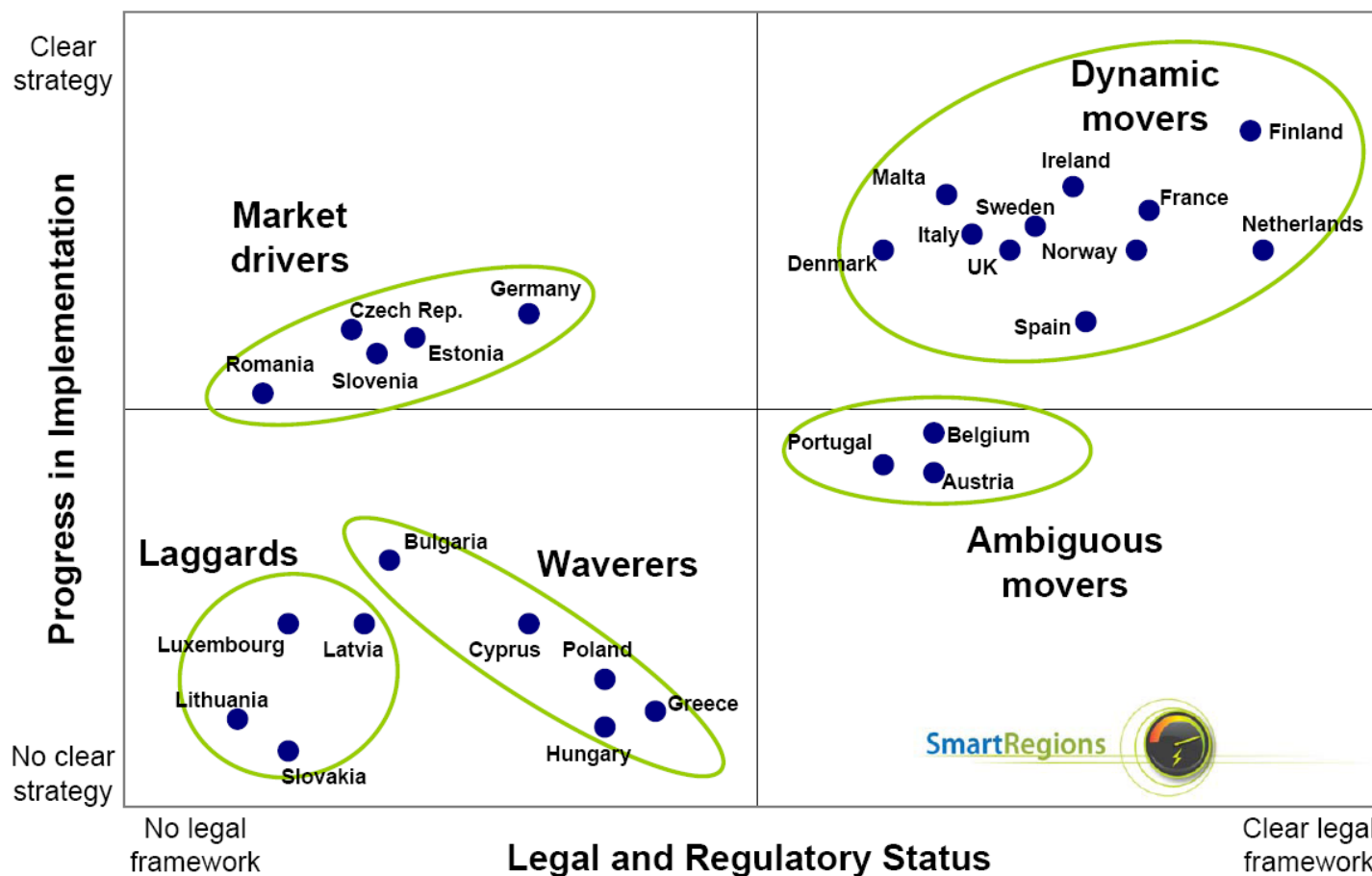


## European smart Metering landscape Report

- First project deliverable
- Review of development of smart metering and metering services in Europe
  - In-depth progress profiles of all EU Member States and Norway
- Results:
  - Highly dynamic and largely regulation driven
  - Majority of Member States: legal framework
  - Identifying 5 groups:
    1. Dynamic movers: rollout decision taken
    2. Market drivers: market/ utility driven rollouts
    3. Ambiguous movers: no clear situation on (legal) framework
    4. Waverers and Laggerds: no issue yet/ discussion just started
- Download report at: [www.smartregions.net](http://www.smartregions.net)



## Graphic overview results





## Case study: experiences in the Netherlands



Why?

- Illustration dynamic developments
- Importance of collaboration for public support
- Importance of innovation for energy savings



## Proposed law in 2008: mandated roll-out (top-down)

### Drivers for law proposal:

- Administrative problems after liberalization
- Market competition and consumer benefits
- Operational efficiency energy retailers and network operators
- Energy savings and home generation
- Requirements article 13 ESD
- Voluntary roll-out: only 30% penetration
  - > bad for business case

### Law proposal elements:

- Smart meter for all households
- DSO's: responsible for smart meter (funded from -unchanged- tariff)
- Retailers: responsible for consumer processes and bi-monthly cost statements
- Regulation of tariffs
- Regulation of requirements



€ 17,000 fine or 6 months in prison ...



Vigorous campaigning by National Consumers Organizations, privacy watchdog groups and on national television

Key issues:

- Insight in habits and living patterns
  - Surveillance technology
  - Refusal: 6 months in prison or € 17.000 fine
- Energy saving is not obvious





## Compromise law in 2011: voluntary rollout

### Key elements for DSO's and energy retailers

- Obligation to offer a standard smart meter for DSO's
- Obligation to offer a standard smart metering service (bi-monthly cost statements) for energy retailers
- Two-year trial-period for testing standard smart meter and standard smart metering service

### Key elements for consumers

- Freedom to accept a smart meter for consumers:
  1. No smart meter at all
  2. Smart meter:
    - no data transfer
    - limited data transfer
    - full data transfer
- Contract permission needed for personal data use



## Learnings on collaboration and innovation

- Lack of support for mandated rollout
  - Underestimating sensitivity for privacy and security
  - Violation European Convention of Human Rights
    - > No pressing societal need
      - » Energy savings not proven
    - > 15 minute meter readings do not follow from ESD
- Switch from top-down to collaborative rollout
  - Involving privacy and consumers' organizations
- Lack of proof for promising energy savings
  - Ambivalent government position
    - » Energy saving benefits main rationale for mandated rollout
    - » Market responsible to fulfil
  - Political pressure for innovative smart metering services
- Switch from direct to trial-based introduction of smart meters
  - Monitoring energy savings and market development of services
  - Reconsideration in 2013