

EU Energy 2020

A Strategy for competitive, sustainable and secure energy

Directorate-General for Energy



Helsinki 17 February 2011 P-L Koskimäki

Contents

- What Europeans rate on energy?
- What is happening on energy demand and supply?
- Policy framework: Energy Strategy 2020
- News on energy efficiency
- Next Commission steps

Eurobarometer January 2011

Europeans' priorities on energy:

- (1) Stability of energy prices
- (2) Renewable energy
- (3) Guarantee of energy supply
- (4) Energy efficiency







Fourth priority: the contribution to energy savings especially in developing the energy efficiency



Energy demand stabilized but not on track to meet its target



- * Gross inland consumption minus non-energy uses
 - Projections from 2007
- Projections from 2009
- 20% energy saving objective

EUROPEAN COMMISSION



Fossil fuels represent up to 80% of our energy mix today. In a "business as usual" scenario, the share may still be 70% by 2030, but renewable sources are expected to account for an increasing proportion.

Dependence on imports is likely to grow

« Business as usual » scenario





Source: European Commission

Meeting our "20-20-20 by 2020" goals



Massive modernisation investment is needed



Directorate-General for Energy

Investments of over €1 trillion will be needed by 2020 to replace obsolete power plants, to modernise and adapt infrastructure to the latest technologies and to cater for demand for low carbon energy.



ENERGY STRATEGY 2020 5 PRIORITIES

- Efficient use of energy
- Integrated energy market
- Secure, safe and affordable energy
- Technological leadership
- Strong international partnership



ctorate-General for Energy

Priority 1: Achieving an Energy-Efficient Europe

- <u>Action 1</u>: Comprehensive national Energy Efficiency Actions plans
- <u>Action 2</u>: Tapping into the biggest energy saving potential buildings and transport
- <u>Action 3</u>: Reinforcing the competitiveness of our industry
- Action 4: Reinforcing efficiency in the supply side



Directorate-General

for Energy

Energy Efficiency has multiple benefits

Competitiven #55

Cut Europe's energy bill by about €200 billion / year in 2020
Lower households' bills by about €1000 per household / year
Create up to 2 million jobs by 2020
Boost R&D and create markets where EU can become a clobal leader

SECURITY OF SUPPLY

- Decrease our energy dependence
- Help balance our trade
- Alleviate the need for gas pipelines and grid investments

SUSTAINABILITY

- Help fight climate change: 740 Mt CO2 / year in 2020
- Limit environmental degradation



Directorate-General for Energy What improving energy efficiency means for a single family house from the 70s (150 m²)



State of Play: Already ambitious EU Energy Efficiency Policy Mix



Directorate-General

EUROPEAI COMMISSIO

for Energy

- ESD, CHP, EPBD, Eco-design and labelling of products, etc.
- Voluntary agreements (e.g. GPP, EMAS, eco-design for some products), and standards
- IEE (e.g. concerted actions, specific EE projects), Covenant of Mayors, Sustainable Energy Europe Campaign, ManagEnergy Network, BUILD UP
- FP7 (e.g. Concerto)
- IPEEC, bilateral MoU/dialogues
- Cohesion policy funds, ELENA, IFIs support, Reduced VAT rates, State Aid exemptions

Possible aspects of the new Energy Efficiency Plan (1)

- Leading role of the public sector: introducing energy efficiency requirements in public procurement, systematic use of energy performance contracting
- Reinforcing industrial competitiveness by making industry more efficient
 - Promotion of energy audits/ energy management
 - Benchmarking tool for SMEs
 - Dedicated support for SMEs in Member States to take advantage of energy audits
 - Additional ecodesign measures on industrial products
- Reinforcing efficiency in energy supply
 - Energy saving obligation scheme
 - Promotion of efficient generation
 - Promotion of cogeneration



Possible aspects of the new Energy Efficiency Plan (2)

- **Promoting energy efficiency in transport** (in line with white paper on Transport)
 - Stronger CO2 standards for cars/ new standards for other transport technologies
 - CO2 labelling of cars/ eco-driving
 - Better mobility in urban areas
- Triggering the refurbishment process of the existing building stock
 - Appropriate financing
 - Promoting ESCOs
 - Legal obstacles: owner/tenant split incentives
 - Training needs
- Empowering consumers
 - Ensure implementation of existing legislation (billing, right of individual meter, etc.)
 - Clear, precise and up to date information on energy consumption
 - Ensure consumer's interest in smart grid developments



Possible aspects of the new Energy Efficiency Plan (3)

- Making the most of National Energy efficiency Plans
 - Comprehensive benchmarking tool
 - Extend the scope to all energy use

• National energy efficiency targets

- 2 step approach
- In line with Europe 2020 headline targets



Significant global investments in renewables Investments in renewable energy at global level





Directorate-General

In 2009, investment in renewable energy fell in the EU by 10% in the context of the economic crisis, while it increased by more than 50% in China.

NEXT STEPS

New proposals from the Commission in 2011:

- Energy Efficiency Plan (March 2011)
- Infrastructure Instrument, with list of European priority infrastructure projects and analysis of needs and possible sources of finance for these projects (July)
- Communication on an external energy policy (3rd quarter 2011, public consultations)
- 2050 Energy Roadmap (complementary to lowcarbon and transport Roadmaps) (3rd quarter 2011)
- Proposal on smart grids for end 2011



Thank you for your attention