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SET-Plan – Information System (SETIS)

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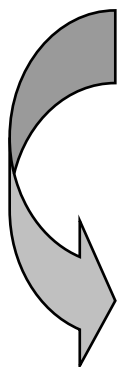


The Context



EU Energy and Climate Change policy

- greenhouse gas emissions
- security of energy supply
- competitiveness



The SET-Plan is the TECHNOLOGY PILLAR



**From 80% dependency on fossil fuels to 80% reduction
in GHG emissions in 40 years!**

**A reinvention of our energy system
...towards the 2050 system**



Governance

European Community Steering Group

**SET-Plan Information
System (SETIS)**



Implementation

Joint Planning, programming and execution:

- EU Industrial Initiatives (EII)
- European Energy Research Alliance (EERA)

Transition Planning



SETIS - MISSION & OBJECTIVES



*To support the **European Energy Technology Policy**, providing regularly, up-to-date and sound knowledge on energy technologies - a tool for decision making by the Steering Group of the SET-Plan*

- **Key-Objective 1:** To establish **a robust, open-access information system on energy technologies and their innovation aspects**, geared to supporting an effective strategic planning, monitoring and assessment of the *European Strategic Energy Technology Plan*.
- **Key-objective 2:** To develop an **integrated approach for information and data exchange** with the Member States, International Organisations and Energy Sectors, on energy technologies and capacities for innovation.

SETIS is led by the Commission, through its JRC



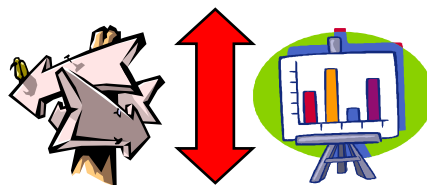
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SETIS approach



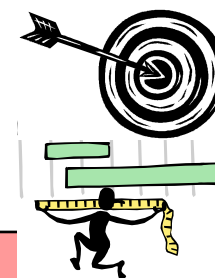
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European Community SET-Plan Steering Group



- ✓ **Technology & Capacity Maps**
 - ✓ Technology Portfolio (17)
 - ✓ Common Assessment Framework for Energy Technologies
 - ✓ Information exchange – Validation
- ✓ **Priorities, Roadmaps, KPIs**
- ✓ **Assess/build the case for new priority**
- ✓ **SETIS – web portal**

SETIS

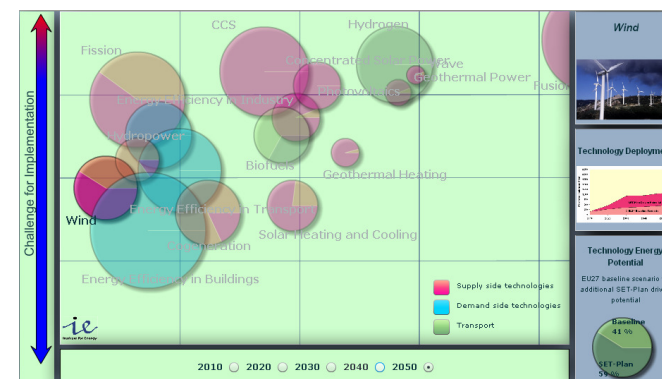


**Member States, EERA
Industry & Research Communities
(ETPs)
International Cooperation**

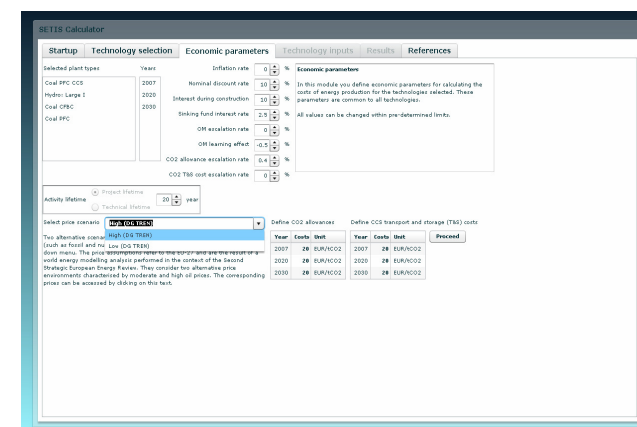
**European
Industrial Initiatives,
Joint Actions**



- **Baseline for monitoring progress in developing low carbon energy technologies**
 - Technological state of the art and anticipated developments for 17 energy technologies
 - Status of the corresponding industry and its potential
 - Barriers to their large scale deployment
 - Needs of the industrial sector to realise their goals
 - Synergies with other sectors
- **Analysis of the impact of the proposed SET-plan efforts on policy goals, using a systemic approach (focus on the power sector)- To be published in coming months**



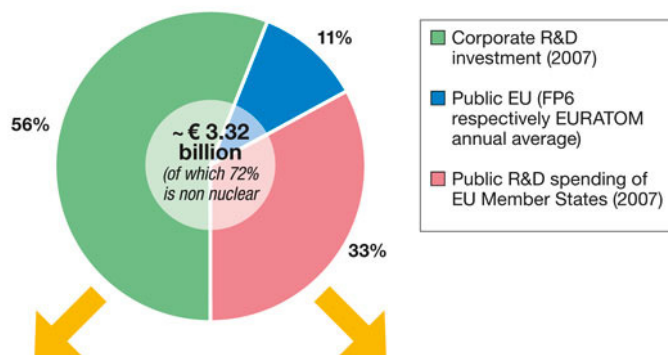
SETIS, 2009



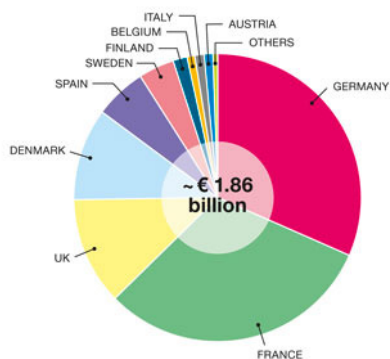
SETIS, 2009



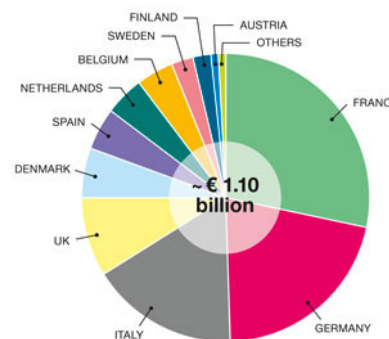
Total estimated R&D investments in SET-P priority energy technologies



Distribution of corporate R&D investments in SET-P priority technologies across the EU Member States in 2007 (location of company headquarters)



Distribution of public R&D investments in SET-P priority technologies across EU Member States in 2007





SETIS Support to the SET-Plan Effective Implementation



- Identification of priority technologies of the SET-plan
- **Development of Technology Roadmaps**
- Current R&D investments in Europe on the SET-Plan priority technologies
- **Costing of the roadmaps – Financial gap**
- Key performance indicators – Monitoring and review

Close cooperation with the Stakeholders



Trans-European energy networks and systems of the future



“....To plan and develop future infrastructures and policies, it is essential to have a good understanding of the full implications and logistics of new energy technology options.”

The Commission proposes to initiate in 2008 an action on European energy infrastructure networks and systems transition planning. It will contribute to optimise and harmonise the development of low carbon integrated energy systems across the EU and its neighbouring countries. It will help the development of tools and models for European level foresight”

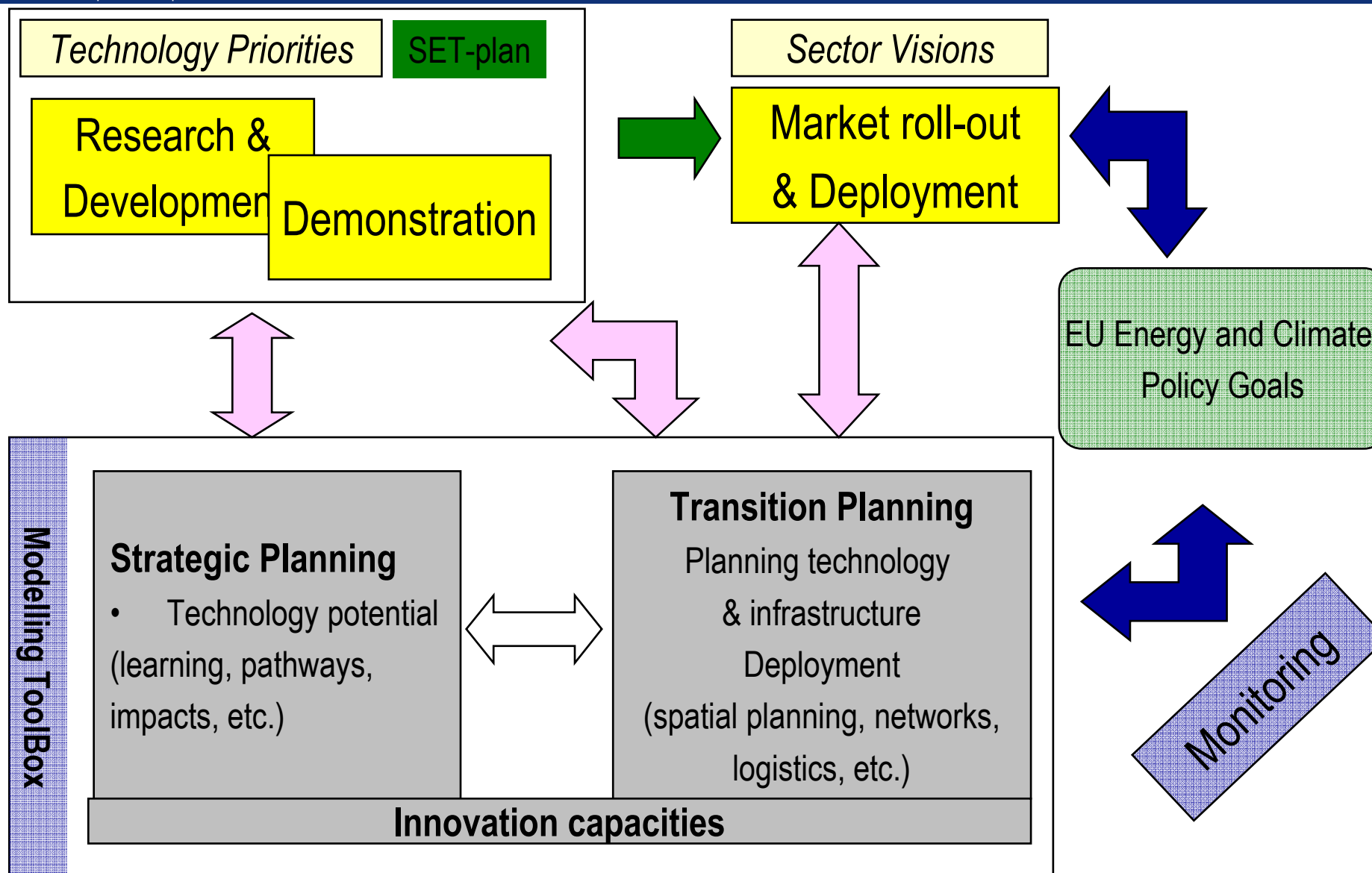
SET-Plan COMMUNICATION COM(2007)723



Modelling a key supporting technique for Decision Making



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- A tool-box development to support the decision-making – Good understanding of the full implications and logistics of new energy technology options:
 - What are the needs ?
 - Evaluation of existing tools to model the evolution of the European energy system
 - Development of a roadmap of activities that will be necessary to provide Europe with the tools necessary to plan and develop future infrastructures and policies;
- Key criteria
 - Scientific robustness, transparency and accessibility of the models and tools used
 - Capacity to analyze under a common frame, a diverse and large technology portfolio
 - Integrated approach with the main expertise on energy technologies in Europe and at international level



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