

Sustainable Marine And Road Transport, H₂ in Iceland

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Icelandic New Energy





Outcome from former projects

- All participants in the Hydrogen Bus Project were pleased with the outcomes of the project and its impacts in the Icelandic society in the form of support and broad interest.
- Therefore it was considered time to launch the next step in the three step plan to test hydrogen in Iceland. Former participants are still working with us.
- The FC hydrogen buses were according to demonstration plans parked in January '07, - in perfect order but insurance and financial support had run out. Bus operators will have the opportunity to buy up to date fcbuses soonish!
- The buses were dismantled and integrated into other buses as spare parts, the fuel cells sold as educational equipment and one bus given to a transport museum.

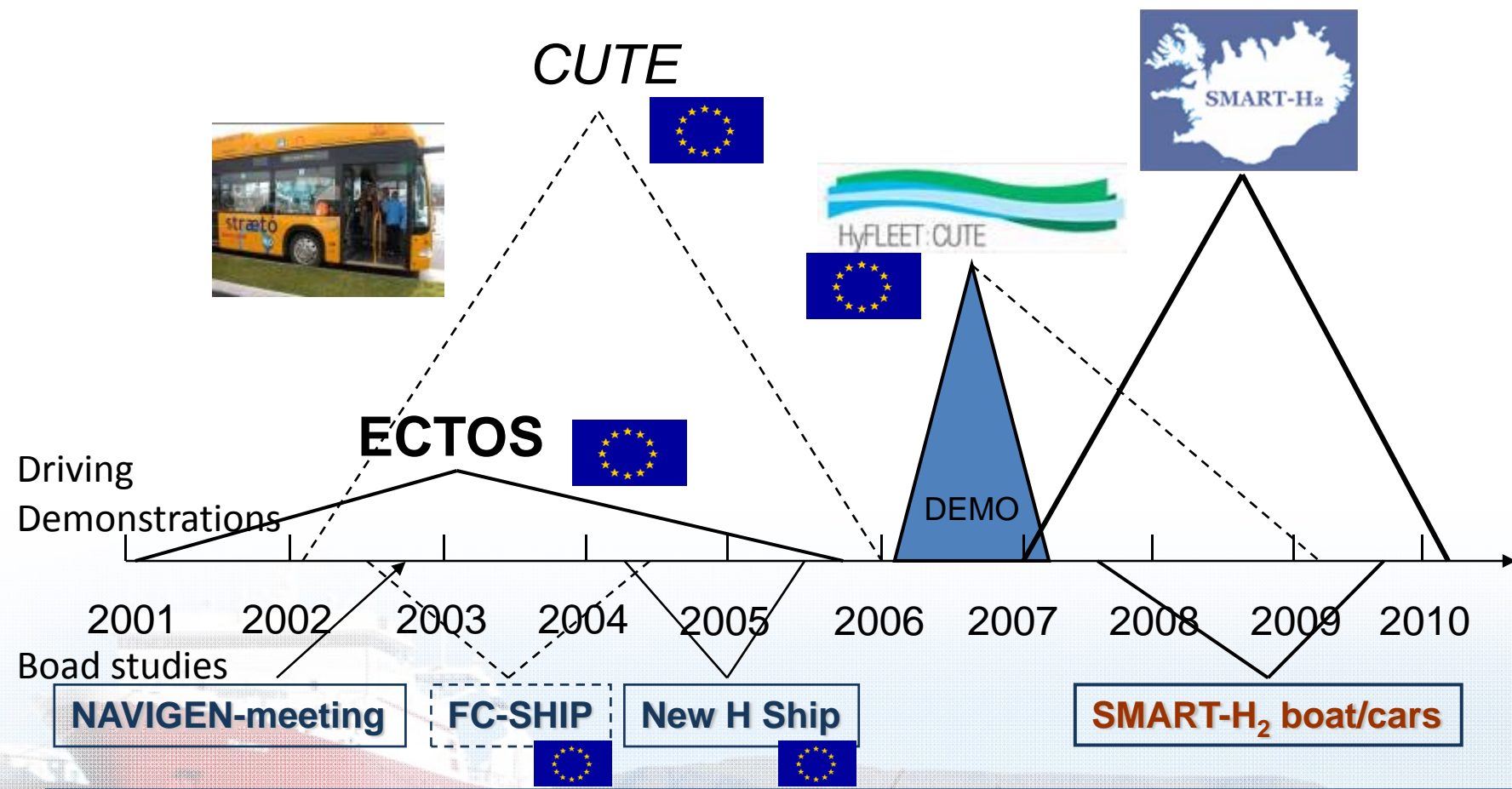


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The key demonstration projects of Icelandic New Energy



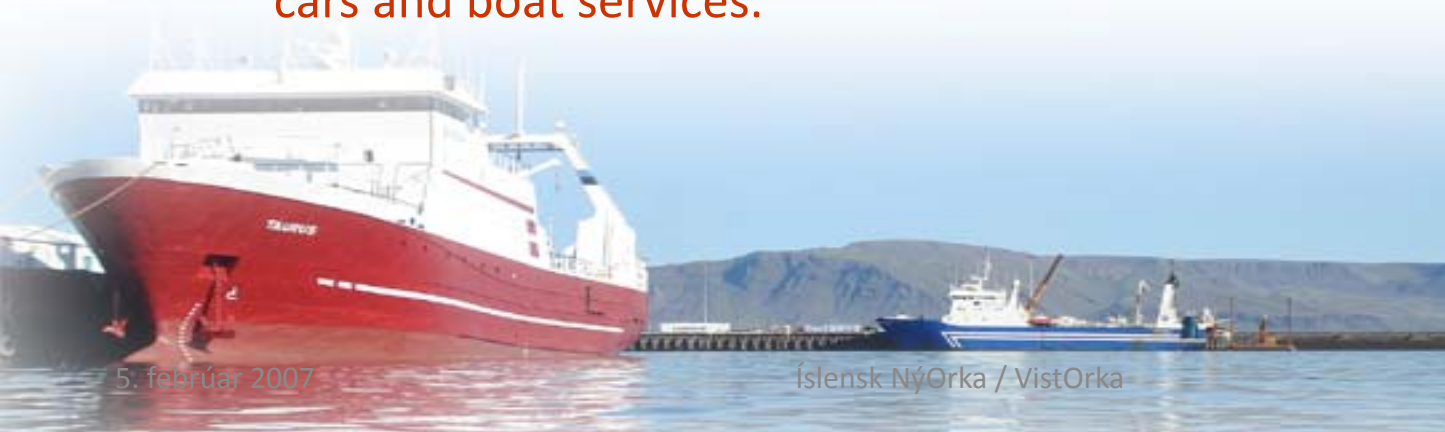


SMART-H₂

Goals

Sustainable Marine & Road Transport - H₂ in Iceland

- 20-30 hydrogen cars on the street before the end of 2009
- Various forms of drive trains, fuel cell vehicles, cars with internal combustion engines, retrofitted technology, hybrids, battery powered vehicles etc.
- Auxilliary power unit on a 150 pers tour bout.
 - Icelandic design of a 10 kW fuel cell and battery (hybrid system that can boost power when needed) instead of diesil engine
- Production and distribution system for hydrogen tested for personal cars and boat services.



5. febrúar 2007

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research

- The research will focus in on a number of aspects:
 - *Technological performance* – data collected on filling, maintenance etc
 - *Economic aspects* – costs during the life cycle
 - *Social impacts*, - such as changed transport patterns, fuel security
 - *WtW within the Icelandic borders*- from measured data
- Foreseen outcomes
 - There is interest in broadening the research view to more than hydrogen, and analyse the various fuel options in a comparative way
- The results should feed into governmental decision making





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Examples of cars

- DaimlerChrysler
 - A – class **with Fuel Cell**
 - **Range: 200 km on filling**
- Toyota Prius, a hybrid car
 - retrofitted for burning hydrogen
 - **Range: 160km on each filling**





SMART-H₂ Budget

- The project budget is about 530-700 mi lkr or 9 – 13 miUS\$
- VistOrka provides 225 milljónir (32-42%)
- Research funding and cooperation will be sought in Iceland and on the international arena.
- The partners take on the role of testing, leasing, providing technology and classification as well as research and data collection.
- These are:





VistOrka



Alcoa Fjarðaál



Sterkir Stofnar **Hertz**



Linde Gas }

AGA



Glimps of the future

