# Nach Fukushima: Europa vor dem Atomausstieg? - Belgium position paper

#### 1. Introduction

Belgium acknowledges that all consequences have to be drawn out of the nuclear tragedy that is currently striking Japan. We welcome the European initiative to perform stress tests in every nuclear power plant in the European Union. However, at a period of time when our own reactors are ageing, along with many others in the European Union, we have to consider whether to carry on with nuclear electricity or to plan a global European nuclear phase-out. Belgium currently produces 55% of its electricity with nuclear technology with seven reactors divided in two sites, Doel and Tihange. Considering its current energy mix, the country could envisage to shut down its reactors by 2035, with the following schedule: the reactors Doel 1, Doel 2 and Tihange 1 would be shut down by 2025, Doel 3 by 2032, Tihange 2 by 2033, and Doel 4 as well as Tihange 3 in 2035.

However, such a drastic measure needs to be thought over and prepared carefully. First of all, the European internal energy market has to be completed (see 2.). Without this absolute condition, it seems absolutely idealistic that some EU Member States could secure their energy supplies without the use of nuclear power plants. The Member States also have to widen their energy mix (see 3. and 4.): because of the carbon emissions reduction goals, it is not possible to invest in coal-produced electricity any longer. Today, the best solution in order to produce electricity resides in the development of renewable energy sources, as well as a better supply in natural gas to be transformed into electricity using the technology of combined cycle gas turbine (CCGT). Finally, it is absolutely necessary that the EU reduces its energy needs. For that purpose, energy efficiency measures, as proposed in the Commission's new Energy Efficiency Plan of the 8<sup>th</sup> March 2011, have to be implemented successfully (see 5.).

Belgium contends that, if all these conditions are met, an EU-wide nuclear phase-out by 2035 would be possible.

### 2. Completion of the European common energy market

As stated during the latter European council, the EU needs a fully functioning internal energy market to reallocate energy among Member States. Only a full implementation of the Third Energy Package and the completion of an integrated and transparent energy market, foreseen by 2014, can ensure that consumers in each Member State have access to the energy resources they need. In addition to the implementation of the EU legislation, Belgium wishes to remind of the necessity to build the adequate infrastructures and interconnections that will physically enable gas and electricity to flow freely in the EU, allowing the completion of the common energy market.

# 3. Development of renewable energies

During the last decade, it has shown that renewable energy is the key to sustainable welfare. Therefore Belgium proposes a supranational development of renewables, in particular solar, wind, biomass and hydraulic energy. In order to use this technology among the Member States, an infrastructure needs to be completed (see 2.). At this point, it is obvious that every state shares an interest in using the different technologies as a community most effectively. Some states need to expand their infrastructure stronger than others to fulfil an effective, flowing energy network. Therefore a solidarity agreement ("energy fund") is needed.

This completion of the energy common market will give some Member States access to sources of renewables that they lack (eg. solar energy in Belgium).

#### 4. Gas

CCGT allows a clean and efficient production of electricity and warmth using natural gas. The use of this technology would simultaneously solve the problem of CO<sub>2</sub> emissions and nuclear production. In the case of a global nuclear phase-out, the quantity of electricity produced in the EU would be highly dependent to its supplies in natural gas. Belgium contends that a secure gas supply for the Member States can only be achieved if the supply sources are diversified, from outside as well as inside the EU. It is important to develop the pipelines technologies that would allow different sources of gas to be imported into the EU at a competitive price. It is also important that the European countries produce their own gas. For this purpose, Belgium acknowledges the opportunity of proceeding with shale gas extractions, which would bring the EU on the path of energy independency.

### a. Shale gas extractions in the EU

Belgium acknowledges the potential that lies in the European shale gas basins. A clean and efficient extraction of shale gas would contribute to securing EU gas supply for many years, allowing a production of electricity which would be compatible with the EU objectives. For this purpose, Belgium encourages the Member States to develop research on their basins and if applicable issue authorisations for the drillings, while ensuring that they are performed in the best possible ecological conditions.

### b. Securing imports from outside the EU

Although it is severely important that the EU strengthens its independency by producing more gas autonomously, it must secure imports from outside the EU. Hence, it is essential that pending pipeline projects are completed as soon as possible. In particular, Belgium considers the completion of the South Stream and Nabucco gas pipeline projects to be of prime importance in order to secure a sufficient natural gas supply to the EU in the near future. Furthermore, supply contracts need to be negotiated at the European level, so that all the Member States can benefit from the best prices possible.

# 5. Energy efficiency measures

In Belgium's opinion, a secure energy supply without the use of nuclear power can only be achieved through more ambitious energy savings. In that respect, Belgium welcomes Commissioner Hedegaard's declarations at the occasion of the European Regions Day on the 12th of April 2011. According to the Commissioner, energy efficiency must be given a higher priority within the EU budget. Structural and cohesion funds should be used to leverage investments in energy-saving measures such as building refurbishments. However, due to its budgetary restrictions, all these efforts cannot only rely on public money. The EU should develop financing instruments designed to leverage private capital and encourage investments in energy efficiency measures, like it is the case in Berlin. In this city, about 1300 public buildings have been renovated by private energy service companies. The Commissioner also proposed that the next Multi-annual Financial Framework (MFF) should give bigger priority to energy efficiency. Belgium fully agrees with the proposals of Commissioner Hedegaard and therefore grants it with its full support.