



Towards a European Nuclear Safety and Radiation Protection Approach

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ASN, the French nuclear safety Authority

The act of 13 June 2006 gave to the former Regulatory body the statute of an Independent Administrative Authority : ASN

- ASN is managed by a board of 5 commissioners appointed by
 - the French President (ASN chairman and 2 commissioners)
 - the leader of the Senate (upper house of Parliament) (1 commissioner)
 - the leader of the National Assembly (lower house) (1 commissioner)

Appointments are irrevocable, for a non-renewable 6-year term, full time.

- ASN reports to the French Parliament.
 - Its annual report on nuclear safety and radioprotection in France is sent to Parliament, the government and the French President. It is presented to the Parliamentary office for assessment of scientific and technological choices, in a public session.
- ...and to the international community (“peers”) through IRRS and, in the coming years, provisions of the European directive on nuclear safety.



ASN's duties

Regulation

Authorization

Controls : inspections and enforcement actions

Contribution to the emergency situations response

Information of the public





ASN, the French nuclear safety Authority

450 persons with diverse backgrounds and status:

- 210 persons in the Paris headquarters
- 240 persons in the 11 regional divisions
(230 nuclear safety and radiation protection inspectors, appointed after intensive training)

Budget: €65 million

**Technical support organisation:
IRSN (institute for radiation protection and nuclear safety)
where 400 persons carry out expert assessment work for ASN
costing €80 million**

➔ Altogether 850 persons working for ASN



ASN's scope of activities

The nuclear installations and activities regulated by ASN are numerous and varied:

- 58 pressurised water reactors + one under construction,
- all the fuel cycle installations, excluding the uranium mines,
- research centres (reactors, laboratories),
- medical and industrial installations using radioactive sources,
- transport of radioactive materials
- several nuclear installations under decommissioning (notably the first generation of NPPs)

125 “Basic Nuclear Installations” (BNIs) - NPPs, reprocessing plants, enrichment plants, research reactors, waste management plants - are regulated by ASN



Strong involvement at International level

- 5% of the global staff involved in international activities
- More than 20 cooperation agreements with Regulators from third countries
- Full participation to international bodies (IAEA, NEA ...) activities
- Active member of international informal bodies (e.g International Nuclear Regulators Association)

Being a regulator controlling the second largest nuclear programme give us some duties, at international level



Europe, our frontier

Common desire expressed by European countries to create a political area, gathering its members, and producing supranational regulations

A real challenge, notably in the nuclear field :

- 27 Member states
- +/- 150 NPPs in operation
- Various positions regarding nuclear power
- Different regulatory approaches
- Different technologies
- Moving frontiers

Strong need to make national approaches closer and closer and to build a common vision of nuclear safety and radiation protection



Brief History of RP and NS in Europe (1)



In 1957, decision of the 6 Member states (France, Italy, Germany, Luxembourg, Belgium, The Netherlands) of the European Union to join their efforts to develop civil application of nuclear energy



Signature, in 1957, of the Treaty creating a European Atomic Energy Community (EAEC), dealing with :

- *Investments,*
- *research,*
- *International cooperation,*
- *basic safety standards*
- *supply of uranium*
- ...

But « forgetting » nuclear safety and management of radioactive waste and spent fuel



Brief History of RP and NS in Europe (2)

The first stones of a European approach of nuclear safety and radioactive waste and spent fuel management had no legal basis :

- ✓ **Bilateral cooperation** : safety bodies from European neighbouring countries have developed a spontaneous cooperation policy
- ✓ **Club of Regulators** : the confident relations between Regulators, helped by special events (enlargement of the European Union) have generated some voluntary initiatives. The most remarkable is the Western European Nuclear Regulators' Association (WENRA).

Encouraged by these initiatives, and by the need to ensure a global protection of European citizens, the European Commission has submitted to the European countries **legislative proposals aiming at providing a framework for nuclear safety and radioactive waste and spent fuel management**





The pillars of a European approach for NS and RP

European common vision of Nuclear Safety and Radiation Protection

Bilateral cooperation between European Regulatory Bodies

- Day to day cooperation
- Exchange of staff
- Crossed inspections
- ...

Networks of European Regulators

- **WENRA** : safety reference levels for existing NPPs, safety of the management of RW and Spent fuel, Safety objectives for new reactors ...
- **HERCA** : dosimetric passport, body scanners, emergency preparedness, medical applications

European Legislation

- Legal texts on :
 - Basic safety standards
 - Nuclear safety
 - Emergency situations
 - ...

Prepared with the help of the European Nuclear Safety Regulators' Group



New challenges

Progress can still be made :

- **Technical works still have to be undertaken on important matters at the European level** (e.g : *Long term operation, Emergency preparedness ...*)
- **Legislation at European level still has to be completed** (e.g : *draft legal text on the management of radioactive waste and spent fuel*)

But now methodology is well known :

- **On technical matters** : *inputs are provided by networks of Regulators (WENRA, HERCA) and endorsed at the end by the European Union*
- **On political matters** : *European Union provides for draft legal texts, after consultation of the Regulatory bodies (ENSREG)*



EU-US : towards a fruitful partnership

The European approach of nuclear safety and radiation protection is now mature. Europe has now :

- ❑ **Technical credibility**, thanks to the work of the Regulatory bodies networks,
- ❑ **Political visibility**, thanks to the relevant legal basis adopted at the European level

Europe can now propose a common vision. It will express it at the first European Conference on nuclear safety next 28-29 June 2011.

Europe becomes a natural counterpart of USA, able to :

- ❑ **exchange on technical matters** (*safety objectives for new reactors, Long term operation, doses limits ...*)
- ❑ **be a major actor at international level** to defend specific European positions