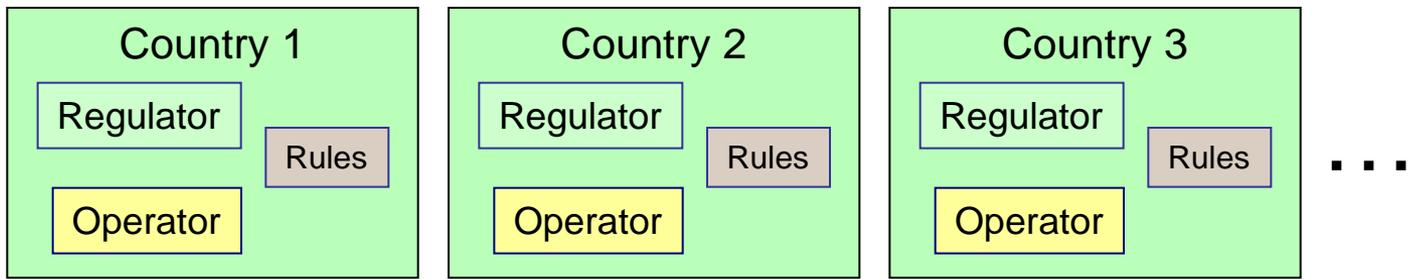
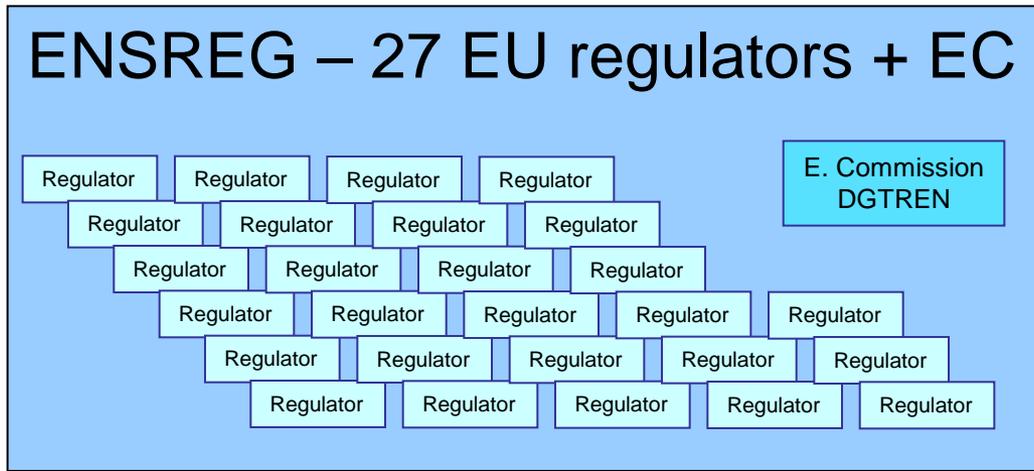


# Conclusion of Stress Tests

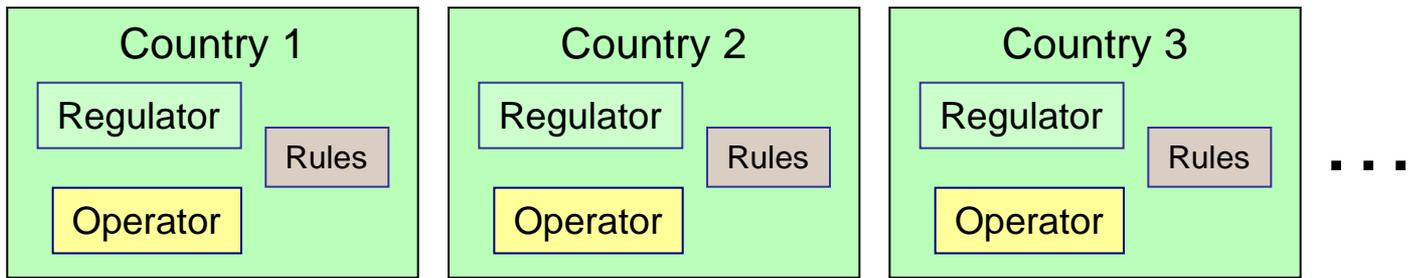
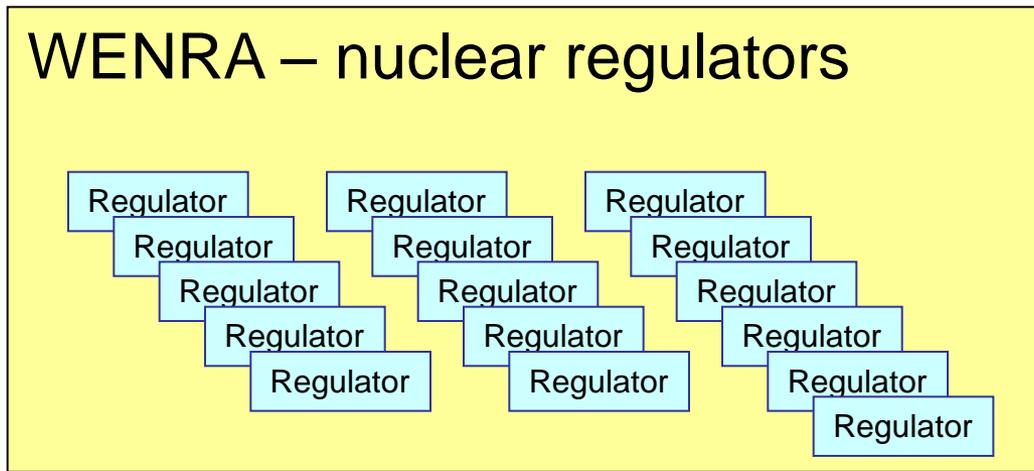
The end of the intense campaign

Andrej Stritar  
Chairman, ENSREG

# ENSREG, an advisory body



# WENRA, a voluntary club

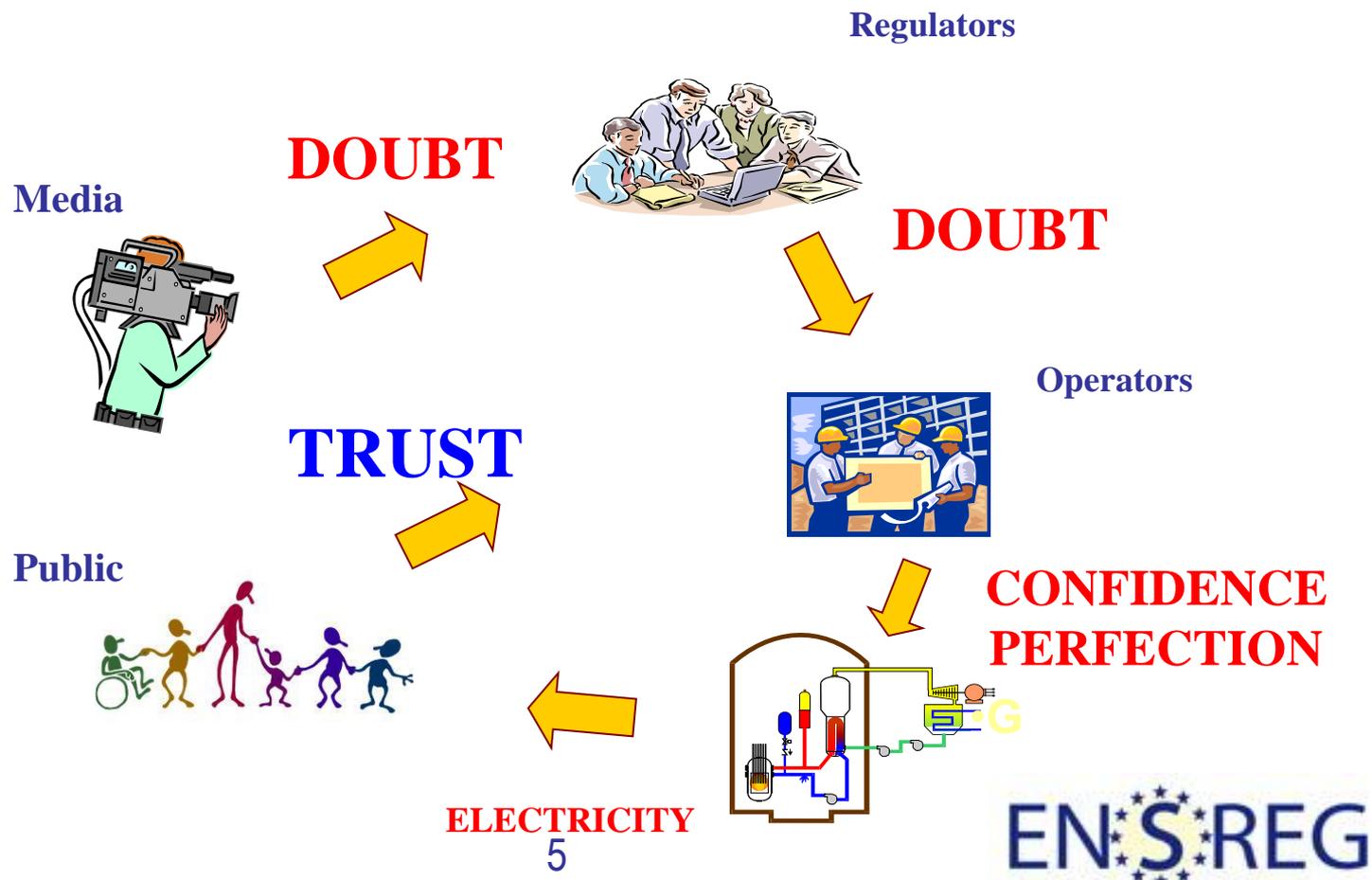


# Nightmare of 11 March 2011

- Beneficial conversion of mass to energy turned into a disaster



- The feedback loop for assuring perfection has failed!
- Trust of the society was lost!



Stress Tests were about restoring confidence and regaining trust by further improving nuclear safety

# Why Fukushima has happened?

- Tsunami is a very rare natural disaster.
- It was underestimated during the design, there was not enough knowledge about it.
- Safety margins were too small.
- Uncertainty of our understanding of natural phenomena should have been compensated by bigger conservatism – higher protective dikes!

# Fukushima concerns

The main lessons learned from Fukushima were actually the main objectives of our Stress Tests:

- Did we properly take into account uncertainties of all potential external hazards?
- Are our plants robust enough, are safety margins big enough?
- Are we able to cope even with extremely low probability events?

# EU Stress Tests

- May 2011: Detailed specifications
- Intensive work by operators and regulators
- End of 2011: National Reports
- Spring 2012: International Peer Review.
- Hundreds of man-years were invested.
- Stakeholders involvement, transparency.
  
- More in next presentations

# What was achieved?

- Many immediate hardware and organisational improvements in the plants.
- Many plans for further improvements in the near future.
- Intensive harmonisation of accident mitigation practices in NPPs.
- Plans for long term conceptual improvements on international level.

# What is still missing?

- The ***Security Track*** of EU Stress Tests is expected to report by the end of month.
- During the year the issue of **off-site emergency preparedness** has proven to deserve even more attention.
- Long term ENSREG action plan.

# Global Impact

- EU Stress Tests became a global model
- Directly used in some countries (Japan, UAE, Russia ...)
- Important reference for all the others, including IAEA

# What next?

- **Stress Test campaign is over!**
- All lessons learned and actions to be done will be included in our normal working processes.
- Majority has to be done by operators and national regulators.
- Common technical issues will be dealt by WENRA.
- ENSREG's special Task Force is preparing our action plan.
- Additional plant visits will be organised after proper objectives are defined.

# Proper focus

- Stress Tests were about the **design of plants** and **mitigation of accidents**.
- Equally or more important is **operational safety**.

**The focus of operators and regulators must be properly balanced between these three cornerstones of nuclear safety!**

You will hear much more details in  
next presentations.

Looking forward to today's discussion!