

Survey on the implementation of the “justification”, “optimisation” and “limitation of doses” radiological principles in national regulations in Europe

ESTONIA

1 The implementation of European Directives

1. *Since when have the European Directives 96/29 and 97/43 been implemented in your country?*

European Directive 96/29 has been partly implemented in Estonia since 16. May 1997, when the first Radiation Act entered into force and fully implemented since 1. May 2004, when the new Radiation Act (RT I 2004, 26,173) entered into force. Directive 97/43 has been partly implemented since 1. May 2004.

2. *If they are not implemented, is it expected and when?*

Full implementation of Directive 97/43 is expected in 2006-2007.

2 Justification principle

1. *What is the exact wording of the justification principle in the Law?*

All new radiation practices must be justified in advance by their economic, social or other benefits in relation to the health detriment they may cause. Such justification shall be reviewed whenever new and important evidence about the efficacy or consequences of existing classes or types of radiation practices is acquired.

2. *Which practices are explicitly named as unjustified or forbidden?*

The deliberate addition of radioactive substances in the production of foodstuffs, toys, personal ornaments and cosmetics, and the import or export of such goods which contain radioactive substances is prohibited.

3. *Which regulatory body(ies) is (are) responsible to determine if a practice is justified or not?*

The performance of activities related to radiation protection shall be organised by the Estonian Ministry of the Environment within the limits of its competence through the Environmental Inspectorate and the Estonian Radiation Protection Centre.

3 Optimisation principle

1. *Could you give us the exact wording (citation) of the optimisation principle (ALARA) as defined in the Law or national regulation?*

It shall be ensured that, in the context of optimisation, all exposures shall be kept as low as reasonably achievable, economic and social factors being taken into account.

2. *Does the national regulation give a description on the practical way to implement the optimisation principle (e.g. need to perform dose prediction and to establish dose objectives, need to perform real-time dose follow-up, need to write feedback experience report, etc)?*

Practical way is given in the regulation No 41 of 29 April 2004: The time Limits for Proceedings to Issue, Amend or Revoke Radiation Practice Licences, the Specific Requirements for and Format of Applications for Radiation Practice Licences, and the Format of Radiation Practice Licences

3. *Does it exist a specific guidance to help operators / end-users in implementing the optimisation principle?*

No specific guidance is available. Some are in the preparation.

4 Dose limits

1. *Can you provide us with present regulatory dose limits established to reduce the probability of occurrence of stochastic effects?*
2. *What are the legal dose limits to prevent public and workers from deterministic health effects?*

The dose limits for the worker are: an effective dose of 100 mSv in 5 years and the effective dose of 50 mSv in any single year. For students of 16 to 18 years: an effective dose 6 mSv in a year. For pregnant women and foetus: an equivalent dose of 1 mSv. For the members of public: an effective dose of 1 mSv in a year.

The limit for equivalent doses for the lens of the eye for exposed workers is 150 mSv in a year and for the skin and extremities is 500 mSv in a year. The limit for equivalent doses for the lens of the eye for the member of public is 15 mSv in a year and the skin and extremities is 50 mSv.

5. Dose constraints

1. *Here again, could you give is the exact wording (citation) of the Law or regulations where the concept of dose constraint is mentioned.*

Dose constraints are not mentioned in the law.

2. *In which domain (e.g. public dose, occupational dose, patient dose, etc) and by whom (regulatory body, operators, etc) are dose constraints implemented in your country?*

Not yet implemented.

3. *What are the corresponding values and rationales behind these values?*

4. *What is(are) the status(es) of dose constraint(s)?*

It is not mandatory to use dose constraint.

5. *What is effectively done if a constraint is exceeded?*

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