3rd Meeting of the Emergency Preparedness and Response Standards Committee (EPReSC)
29 November to 1 December 2016

Agenda Item 5.1
Considerations for the Development of a Protection Strategy for a Nuclear or Radiological Emergency

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Background

- GSR Part 7 (2015)
- GSR Part 3 (2014)
- GSG-2 (2011)
• Require Member States to:
  – Develop, justify and optimize a protection strategy at the preparedness stage
  – Implement the strategy safely and effectively during a response
  – Refine the strategy as the emergency evolves
Background (cont.)

GS-R-2 (2002)

• Implementation of single protective action (i.e. intervention) on the basis of generic intervention level of dose actually avertable by taking that intervention

GSR Part 7, GSR Part 3, GSG-2

✓ Implementation of protection strategy (i.e. justified and optimized set of protective actions and other response actions) on the basis of generic criteria (GC) for dose projected and dose received with account taken of the reference level for residual dose
Background (cont.)

**Generic criteria**
- Projected dose
  - Basis to implement response actions

**Generic criteria**
- Received dose
  - Basis to implement medical actions

**Reference level**
- Residual dose
  - Basis to optimize and to judge effectiveness of strategy
• Safety Standards recognize the need for national authorities to consider a range of factors beyond radiation protection considerations
  
  – **Lack of guidance** on such factors, manner in which they are considered and ways responsible authorities can arrive at a justified and optimized protection strategy

• Requested by Member States (RASSC, June 2014)
Objective

• To provide Member States with practical guidance and a stepwise approach for the development, justification and optimization of a protection strategy including on:
  – Implementation of the concepts of reference levels and criteria in EPR
  – Various factors to be considered

• To provide example protection strategies for postulated nuclear or radiological emergencies
Scope

• Any nuclear or radiological emergency, irrespective of the cause
Target audience

- Decision makers (emergency managers)
- Emergency planners (at the facility, local, regional and national levels)
- Emergency response coordinators
- Qualified experts/radiation protection officers (radiological assessors, technical advisers to decision makers)
- Relevant staff of different response organizations at all levels
Place among EPR publications

- SF-1
  - Safety Requirements (primarily GSR Part 7)
  - Safety Guides (primarily GSG-2)
  - EPR Series (EPR-Protection Strategy)

Safety Standards Series
Expected contents

• **Section 1: Introduction**
  • *To provide the Background, Objective, Scope and Structure*

• **Section 2: The concept of a protection strategy**
  • *To introduce the concept of protection strategy*

• **Section 3: Basis for development of the strategy**
  • *To provide details on the planning basis including the hazard assessment and on driving principles for development and implementation of the protection strategy*
Expected contents (cont.)

- **Section 4: Development of the strategy**

  - To provide practical guidance on how to develop the strategy at the preparedness stage to include:
    - Considerations for the development
    - Step-by-step approach
    - Application of the concept of reference level including factors to be considered when setting a national reference level
    - Application of the concept of generic and operational criteria and considerations for developing national criteria
Expected contents (cont.)

• Section 5: Implementing the strategy
  • To provide practical guidance on how to implement the strategy during different phases of the emergency and how to adjust the strategy as the emergency evolves

• Section 6: Justification and optimization processes
  • At preparedness stage
  • During the response
    – Including various factors to be considered
Expected contents

• Section 7: Consultation with interested parties
  • To provide practical guidance on how to engage the public and other interested parties at the preparedness stage and during response, means for engagement and how to account for feedback received in refining the strategy

• Appendices:
  • Template contents of a protection strategy
  • Overview of protective actions, strengths, weaknesses, limitations, applicability

• References

• Annex: Example protection strategies (I-V)
Activities taken

• Two consultancy meetings:
  • 29 June – 3 July 2015
  • 21 – 24 March 2016

• Switzerland, Canada, Germany, Malaysia, France, UK, Australia
Activities planned

• Consultancies planned:
  • 9 – 13 January 2017
  • 3 – 7 July 2017
  • 25 – 29 September 2017

• Workshop on the Development of a Protection Strategy for Emergency Exposure Situations
  • 20 – 24 March 2017
Thank you!