

Radiological Protection  
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## Building a Framework for Post-Nuclear Accident Recovery Preparedness

National-Level Guidance



## NEA Workshop on Preparedness for Post-Nuclear Accident Recovery

### *Food and Drinking Water Management* EGRM publication topical findings

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# Introduction

## Draft Guidance Framework



# Guidance for developing a Framework

[ FOOD MARKET IS MULTISCALE



# Guidance for developing a Framework

## [ CHALLENGING ISSUES

- Develop radiological criteria for maintaining food safety in the days, weeks, months or even years after the radiation emergency;
- Produce an outline monitoring strategy for national and local authorities;
- Collect and collate information on applicable protective actions; and
- Develop a mechanism for engaging with stakeholders and the local community.

# Radiological criteria

## [ DEFINITION

**BE PREPARED**



■ *Radiological criteria are quantitative values for the practical implementation of the radiological protection system. Expressed in terms of dose or derived quantities (ICRP, 2020).*

# Radiological criteria

[ MAXIMUM PERMISSIBLE LEVELS

**Bq/kg**  
(MPLs)



- ❖ Rational complex and difficult
- ❖ Generic and not adapted
- ❖ Any change may be not understood

❖ Known in advance

# Radiological criteria

[ DOSE

# Sv, Sv/y

(Reference levels)



❖ Selection with  
time frame

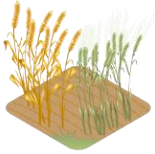


- ❖ Consistent with  
emergency phase
- ❖ Used for  
benchmark
- ❖ Adaptable

# Food monitoring strategy



■ Routine programs for monitoring of foodstuff are pre-existing (normal operation);



■ There is a need for considerable expansion and adaptation;



■ Monitoring everything is not doable, thus a specific strategy shall be implemented by authorities;



■ Room for public self-monitoring actions shall be made.



# Plan for protective actions



## [ PREPAREDNESS



- Ensuring access to, and familiarisation with, databases and information on protective actions that can be applied by the authorities as well self-help actions;
- Planning to involve local communities and affected stakeholders in the evaluation of protective actions;
- Developing experimental approaches for refining/adapting protective actions under local conditions;

# Plan for protective actions

## [ PREPAREDNESS



- Developing a pre-prepared outline communications plan to present the rationale for protective actions;
- Developing an approach to compensate producers for loss of production or adaptation to new practices or procedures;
- Agreeing on factors to be included in defining “end-state”/success criteria that allow protective actions to be withdrawn.

## Conclusion

- Specific concern of the public with water usage (drinking water, irrigation, recreation);
- Food controls and more flexible criteria to manage food safety (issue of deriving those criteria, more flexible regulation strategy by embarking diet and cultural features);
- New approach needed to cope with the issue of loss of image and/or for emblematic food products: ensure the quality of the products - ensure the confidence of the consumer - maintain the economy.

## Conclusion

### [ SUBGROUP COMPOSITION

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**Thank you for your attention**

