Overview on ECO-Ready contingency planning documentation

Gerhard Schiefer
proQuantis

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

Technical References

Project Acronym	ECO-READY
Project Title	Achieving Ecological Resilient Dynamism for the European food system through consumer - driven policies.
Project Coordinator	Czech University of Life Sciences (CZU)
Project Duration	48 months

Deliverable No.	n/a
Dissemination level [1]	PU
Work Package	5
Task	5.3
Lead beneficiary	proQuantis
Contributing beneficiary(ies)	n/a
Due date of deliverable	n/a
Actual submission date	September 02, 2025

[1] PU = Public
PP = Restricted to other programme participants (including the Commission Services)
RE = Restricted to a group specified by the consortium (including the Commission Services)
CO = Confidential, only for members of the consortium (including the Commission Services)

Document history

V	Date	Beneficiary	Author
1	Sept 02, 2025	proQ	Gerhard Schiefer
2			

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

Summary

Contingency planning deals with short term, suddenly emerging situations which require immediate 'contingency actions' for 'repair'. It is complementary to a long-term approach, enabling to anticipate and mitigate shocks intensity, improving overall the resilience of the food system.

This report summarizes the activities within the ECO-Ready project in supporting European Living Labs in developing contingency plans for selected hazards their region might have to cope with. All activities are documented in specific ECO-Ready reports which are accessible on the ECO-Ready website www.eco-ready.eu.

The contingency planning documentation includes 7 reports:

1. Contingency planning: A framework for dealing with contingencies in food security (ECO-Ready deliverable 5.2)
2. Potential LLM planning support for Living Labs: an example for demonstration (Sweden)
3. Contingency planning arguments: the case of Catalonia
4. Contingency planning arguments: the case of Basilicata, Italy
5. Contingency planning arguments: the case of Masuria
6. Contingency planning arguments: the case of the Czech Republic
7. Contingency planning arguments: the case of Central Greece

The conceptual outline is presented in the first report. The second report guides readers in utilizing Large Language Models for developing a first draft of a contingency plan which is then up for evaluation, change and improvement by the relevant stakeholder groups. The report uses an example from Sweden for its demonstration. Reports 3 to 7 are dedicated case studies building in interaction with Large Language Models. The interaction policies of the case studies follow a standardized interaction process adapted to the specific needs of the various cases. The standardized interaction process is provided in an appendix to this report.

Disclaimer

This publication has been produced within the ECO-READY project which has been funded by the European Union Horizon Europe Research and Innovation Programme under grant agreement n°101084201.This publication reflects only the views of the author. The European Commission and Research Executive Agency cannot be held responsible for any use which may be made of the information contained therein.

Table of content

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

Part 1. The conceptual basis (report 1)

1. The policy engagement

Contingency planning for food security has been in discussion for quite some period and has found its way in a number of European documents with a focus on ensuring short-term food supply and security in the European Union. This is exemplified in the Farm to Fork Strategy which provides 4 directives (EC, 2020a; pp. 12-13):

1. Enhance the "*…coordination of a common European response to crises affecting food systems in order to ensure food security and safety, reinforce public health, and mitigate their socioeconomic impacts within the EU…*".
2. Develop a "*…contingency plan for ensuring food supply and food security to be put in place in times of crisis…*".
3. Revitalize the "*…Agricultural Crisis Reserve to its full potential…*" to be used during agricultural market disruptions.
4. Establish a "*…food crisis response mechanism coordinated by the Commission and involving Member States…*".

For an overview on the consideration of contingency planning issues in European documents, the Sendai Framework (*Sendai Framework directives on Disaster Risk Reduction Preparedness* (UNISDR, 2015; p. 21) provides an appropriate scheme. It identifies four Disaster Risk Reduction (DRR) priorities (UNISDR, 2015, p. 9):

1. Understanding disaster risk;
2. Strengthening disaster risk governance to manage disaster risk;
3. Investing in disaster risk reduction for resilience;
4. Enhancing disaster preparedness for effective response, with a focus on 'Building Back Better' in recovery, rehabilitation, and reconstruction.

In our analysis, we concentrate our classification on the priorities one, two, and four of the Sendai Framework and focus on the following major policy sets, crafted in alignment with the Green Deal:

1. The *Farm to Fork Strategy* (EC, 2020a) and associated documents,
2. The *Common Agricultural Policy* (EC, 2022) and *Common Fisheries Policy* (EC, 2023b, 2023c), along with related documents,
3. The *Biodiversity Strategy for 2030* (EC, 2020b).

2. A model view on contingency planning within the food system

Contingency planning and contingency plans are integral parts of food system activities and the management of these activities. It requires an understanding of the food system's actors, the interaction within the food system, and, with a view on food security in times of climate change, the system's interactions with its changing environment.

A framework of interactions of the food system with global environmental change has been presented by Ericksen (2008). It links environmental and socioeconomic variables with

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

natural drivers that affect food system stability and its ability to deliver outcomes, including food security, environmental health, and social welfare.

Ericksen's (2008) normative approach posits an equilibrium between three primary outcomes: food security, environmental welfare, and social welfare, emphasizing sustainable food systems. Biodiversity is included as a vital environmental driver within the *Global Environmental Change (GEC)* in Ericksen's approach, highlighting its influence on food system stability.

Ericksen's conceptualization has been simplified in Oxford Martin Program's framework on the *Future of Food* (2024). It allows the linkage of principles to the development of the contingency planning framework. It centers on food security as the primary outcome of a resilient food system integrating natural drivers into the broader category of 'Global Environmental and Climate Drivers (GEC)'.

We build on this concept but complement it with socio-economic driver feedbacks which are omitted in the Oxford framework. This balanced view on drivers is in line with the extensive review of external drivers of food security in the European Union as outlined in the document *Drivers of Food Security* (EC, 2023a).

3. The food security issue

The ECO-Ready project's contingency planning efforts adopt the European Commission's definition of food security, suggested in the *Contingency plan for ensuring food supply and food security in times of crisis* (EC, 2021) and originating from the FAO's Committee on World Food Security stating

> *"Food security exists when all people, at all times, have physical and economic access to sufficient, safe, and nutritious food that meets their dietary needs and preferences for an active and healthy life."*

This general view is further specified by the European Commission in EC (2023a, p.4) into 6 dimensions based on 4 dimensions specified by FAO in 2006 (Policy Brief, 2006) including availability of food, access to food (including affordability), food utilization (including quality and diversity), and stability, extended in the Commission document by agency and sustainability:

1. *Food availability* refers to the availability of sufficient quantities of food of appropriate quality, supplied through domestic production, imports or food aid.
2. *Food access* refers to individuals having adequate resources to acquire appropriate foods for a nutritious diet.
3. *Utilisation* relates to an individual's nutritional well-being reached through adequate diet, clean water, sanitation, and healthcare.
4. *Stability* is the condition by which the dimensions of availability, access and utilisation are sufficiently met, and in which the whole system is stable, thus ensuring that households are food secure at all times.
5. *Agency* describes the capacity of the food system's actors to make their own decisions about food.
6. *Sustainability* is the long-term ability of food systems to provide food security in a way

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

that does not compromise the economic, social, and environmental bases that generate food security for future generations.

While the project acknowledges all six dimensions of food security, the contingency planning view will have its primary focus on the first four of the dimensions which are relevant for immediate crisis response.

Although a widespread food crisis, emergency, or famine within the EU is unlikely, global geopolitical, environmental, and economic trends suggest that European citizens are not immune to future food security impacts if external drivers shift significantly.

Disruptions can stem from both external and internal drivers, or from combined impacts resulting from interactions between these factors. Due to the complexity of food systems, the precise effects of specific disruptions—and their timing—are often difficult to predict, which poses challenges for contingency planning. As noted by the European Commission (EC, 2021), '*…One of the challenges of contingency planning is to be prepared to deal with unknowable future shocks and their consequences…*'

Part 2: The planning process (report 1)

4. Common patterns in successful contingency planning

Common patterns across different contingency planning guides can inform the development of an effective contingency planning framework for food security crises.

Key components summarized from a variety of sources outlined in more detail in the ECO-Ready report include the following:

1. *Risk assessment and analysis*
2. *Inter-Agency coordination*
3. *Community participation*
4. *Capacity building*
5. *Financial and material resources*
6. *Monitoring and evaluation*
7. *Adaptability and flexibility*
8. *Effective communication.*

The *World Food Program* has implemented contingency planning to strengthen its humanitarian response. An evaluation conducted from 2002 to 2008 (WFP, 2009) provided insights into the effectiveness and limitations of these efforts, which are still valuable today.

They include:

a) the need for strong leadership and commitment from senior decision-makers, recognizing contingency planning as a management function rather than just a technical task,
b) the implementation of a participatory process involving all stakeholders, including finance, administration, human resources, ICT, and operational staff, to enhance coordination,

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

c) an initial assessment of humanitarian needs, combined with a capacity analysis to identify and address potential gaps,
d) the integration with national systems and existing disaster management practices, ensuring alignment with community-based efforts and government plans,
e) the implementation of regular reviews and updating of the planning process,
f) the integration into ongoing planning processes,
g) the linkage with early warning systems and decision-making frameworks,
h) the need to be facilitated by experienced planners who possess strong contingency planning and facilitation skills,
i) the design of a concise, user-friendly final plan with separate components for decision-makers, specialists, and donors,
j) the limitations in planning details required to inform about needed actions and response capacities for resolving anticipated problems, avoiding 'over-planning' or the 'consolidation trap', and
k) the identification of triggers for specific preparedness and response actions.

According to the WFO evaluation report, contingency planning should strategically be harmonized with other institutional processes, linked to local, national, and European authorities for accountability, and supported by training programs and the utilization of positive experiences from field work to build implementation capacity.

5. The challenge in contingency planning

The need for contingency planning may arise in situations when

a) a hazard situation has already occurred and authorities need to come up with appropriate action on short notice or, alternatively, in
b) preparing for future hazards that may evolve from risks and where actions based on contingency plans could assure food security and limit the negative consequences of hazards.

The planning challenge is the same for both situations with the exception that in a preparatory contingency planning, one needs to identify possible future risks as well as actors and actions that might be available in the future for dealing with a risk situation.

In food security, activities that could mitigate the effects of emerging risks include:

a) Activities mitigating direct effects on drivers. Such activities are relevant if *disruptions in drivers* result in effects on the food system and subsequently on food security.
b) Activities mitigating direct effects on food system. Such activities are relevant if emerging risks result in effects on the *food system* and subsequently on food security.
c) Activities mitigating direct effects on food security. Such activities are directly reducing or eliminating the effects of emerging risks on food security.

The challenge is to translate this principal approach into a *contingency planning process* which needs to build on an *early warning system, on actors* that may contribute to reducing the negative effects of hazards on food security and their appropriate coordination in times of need and *beneficiaries* of actor activities encompassing *consumers of food* and especially vulnerable groups such as low-income people, and enterprise stakeholders in the food chain.

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

6. The planning focus: risk scenarios and management of risks

Risks to food security in Europe could be linked to a variety of factors that can affect both, the availability and access to food:

1. *Climate Change*: Increasingly unpredictable weather patterns, such as droughts or floods, can disrupt crop production. By 2050, crop yields in Southern Europe could decline by up to 50% for key crops like wheat and maize due to extreme weather events (e.g., Alexander, 2022)

2. *Geopolitical Tensions*: Conflicts, trade restrictions, or disruptions in global supply chains (e.g., energy or key agricultural imports) could affect food availability. The probability varies depending on political landscapes, but impacts can be severe, leading to price volatility and shortages. In 2022, disruptions in global food supply chains caused European wheat prices to spike by 30-40%, affecting affordability and food availability (e.g., Aminetzah et al., 2023).

3. *Economic Instability*: Inflation, rising input costs (like energy and fertilizers), or economic downturns can reduce affordability of food for consumers. The probability is moderate but has high impact, particularly for low-income populations.

4. *Biodiversity Loss*: Declining biodiversity and soil degradation (Ford, 2024) lower agricultural resilience, increasing vulnerability to pests and diseases. Probability is high with long-term severe consequences on productivity, estimated at about 12% over the next 20-30 years.

In general, the management of risks is a straightforward process based on the identification of a certain risk and involving the following commonly accepted major steps related to food security:

1. Specifying feasible and suitable *actions* for assuring food security and avoiding negative side effects.
2. Analysing *costs* and *effects* of actions.
3. Integrating all suitable actions into a *contingency plan*.

Each contingency situation is unique and, as a consequence, cannot be dealt with by a blueprint action plan. However, the contingency planning process should and could be developed as a *blueprint process* which can be picked up in times of need and followed routinely for developing a contingency plan in response to an actual contingency situation.

The necessary information about the actual contingency situation and the opportunities for dealing with it, depends on external input specific for any single planning situation. This external input is traditionally provided through databases about the past, through documentaries of alternatives (e.g., lists of possible risks) from which one can choose, and through expert opinion. This list is recently complemented by the utilization of Large Language Models a subset of artificial intelligence.

7. The process organization

The operational planning process needs to build on 4 main focus activities of decision needs:

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

1. **Focus activity 1**: the specification of the *region*, the *product* and *target group* of interest, and the *hazard* to be dealt with.
2. **Focus activity 2**: the identification of *objectives* and of suitable *actors* that could provide activities for mitigating the effects of hazards.
3. **Focus activity 3**: the calculation of the *benefits and costs* of selected activities.
4. **Focus activity** 4: the specification of *coordination* needs and opportunities for allowing timely realization of necessary activities.

Each one of them involves various planning stages. A condensed view is outlined in the report.

8. The communication with AI

The interaction with the LLMs follows the flow of the operational planning process. It is based on a Q&A interaction sequence building on so-called 'prompts', i.e. questions raised for initiating feedback from a Large Language Model. For guiding users into employing LLMs into their planning routines, the report lists basic prompts which are linked to the various process steps and which can be used as blueprints in various case studies. A revised version comprises the prompts listed in the appendix. They are just examples that should support in designing individualized prompts for any specific situation.

Part 3: The case study trial (report 2)

9. The trial case: Sweden

The case study concerns the appropriateness of a contingency planning effort for a limited market such as a market for leafy greens and herbs in Sweden. Contingency planning efforts are focused primarily on vertical farms but with a view on consumption effects. They are guided by the following summary of arguments:

1. General: A fertilizer price hike in Sweden could potentially impact food security, particularly in the production and consumption of leafy greens and herbs.

2. Consumption. Leafy greens and herbs tend to be high-turnover, perishable goods, and even small price increases can lead to decreased demand. If prices rise due to higher production costs, it might reduce accessibility to fresh produce, particularly for lower-income households, creating a food security issue.

3. Vertical farms, a growing industry in Sweden, are somewhat insulated from this challenge because they often use more controlled systems such as hydroponics or aeroponics, which require less fertilizer compared to traditional agriculture. However, they still rely on nutrient solutions, and price hikes in the chemicals and materials used in these solutions could raise costs. This might make locally grown leafy greens and herbs less competitive compared to imports or conventionally grown produce.

Planning approach:

Product: Leafy greens and herbs
Target group: Consumers and vertical farms
Hazard: price hike of fertilizer

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

Impact of a price hike of fertilizer on production/consumption
Contingency planning (basic): production support
Contingency planning (basic): consumer support
Consideration of budget constraints
Preference for biodiversity considerations
Comparing basic with biodiversity alternative, comparing costs
Activity option: Promotion of imports
Activity option: Promotion of self-sufficiency
Activity option: Promotion of vertical farms

Part 4: The case study routines (reports 3-7)

10. Spain (report 3)

This report concentrates on arguments for contingency planning in the Spanish region Catalonia with a primary view on Olive growing farms and the challenges they face due to experiences of drought and water shortages which might be linked to changes in climate. It is expected that in future scenarios the shortage of water will be a constant and increasing phenomena which requires action in support of farms, the region, and in consequence, the health of people, the cultural identity of the region, and the wealth of its population.

Planning approach:

Product: Olive production
Hazard: The Drought Problem and effect of harvest loss
Farm and policy opportunities, necessary funds
Production alternatives for farms, cost/revenue and transition
Policy recommendations and allocation of cost estimates

Health, Culture and Wealth
Transition and actors for transition support

Investments during 5-year transition period by farms and other groups
Coordination of activities

11. Italy (report 4)

This report concentrates on arguments for contingency planning in the Italian region Basilicata with a primary view on contingencies in tomato and olive production that may arise from climate developments leading to increased drought.

Planning approach:

Product; Tomatoes
Target group: producers
Hazards: Water shortage and drought for agricultural production in the region
Scenario 1: Phasing out of tomato production
Scenario 2: Keeping tomato production at present level
Scenario 3: Hybrid strategy

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

12. Poland (report 5)

This report concentrates on arguments for contingency planning in the Polish region Masuria with a primary view on contingencies that may arise from diseases in milk cows such as foot-and-mouth disease and the pressing problem of demographics with young people leaving agriculture.

Planning approach:

Product: Milk Target group: farms Hazard 1: Cow disease affecting milk production Transition option for farms by reducing milk production Hazard 2: Dealing with the demographic problem Hazard combination: The demographic challenge and the disease risk in perspective Strategic recommendations for addressing the combined risks Overall coordination concepts

13. Czech Republic (report 6)

This report concentrates on arguments for contingency planning in the Czech Republic with a primary view on contingencies that may arise from climate change leading to increased drought.

Planning approach:

Product: Clover and alfalfa Target group: farms Hazard 1: Drought and effects Adaptation opportunities Farm situation development Actor engagement and coordination Hazard 2: Market disruption risk Market disruptions, climate change and effects of disruptions Contingency planning Actor engagements and coordination

14. Greece (report 7)

This report concentrates on arguments for contingency planning in the Greek Central Region. with a primary view on contingencies that may arise from climate developments leading to increased wildfires and drought.

Planning approach:

Products: Relevance for Greece/farms Hazards: Priorities for contingency planning Focus hazard: drought Selection of most valuable farm types Contingency planning: Most valuable farms and most critical hazards

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

Actor engagement in contingency planning
Development path towards resilience
Development without public funds
Coordination: active schemes and proposed scheme
Building on new products: buckwheat

References

Alexander, P. (2022). How climate change threatens Europe's food. University of Edinburgh. https://impact.ed.ac.uk/opinion/how-climate-change-threatens-europe-s-food/#:~:text=In%20Europe%20and%20around%20the,more%20limited%20and%20less%20effective (accessed Oct. 2024)

Aminetzah, D., et al. (2023). A reflection on global food security challenges amid the war in Ukraine and the early impact of climate change. McKinsey and Company. https://www.mckinsey.com/industries/agriculture/our-insights/a-reflection-on-global-food-security-challenges-amid-the-war-in-ukraine-and-the-early-impact-of-climate-change#/ (accessed Oct. 2024).

EC. (2020a). Farm to fork strategy: For a fair, healthy and environmentally-friendly food system. Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions, 381: 1-9.

EC. (2020b). Communication—EU Biodiversity Strategy for 2030. https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=celex%3A52020DC0380

EC. (2021). Contingency plan for ensuring food supply and food security in times of crisis. https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX:52021SC0318

EC. (2022). COMMON AGRICULTURAL POLICY FOR 2023-2027: 28 CAP STRATEGIC PLANS AT A GLANCE. https://agriculture.ec.europa.eu/system/files/2022-12/csp-at-a-glance-eu-countries_en.pdf

EC. (2023a). Analysis of main drivers on food security—SWD. https://commission.europa.eu/publications/analysis-main-drivers-food-security_en

EC. (2023b). Approved 28 CAP Strategic Plans (2023-2027): Summary overview for 27 Member States Facts and figures. https://agriculture.ec.europa.eu/system/files/2023-06/approved-28-cap-strategic-plans-2023-27.pdf

EC. (2023c). State of Food Security in the EU A qualitative assessment of food supply and food security in the EU within the framework of the EFSCM. Autumn 2023 – Nr 1. https://agriculture.ec.europa.eu/system/files/2023-11/efscm-assessment-autumn-2023_en.pdf

Ericksen, P. J. (2008). Conceptualizing food systems for global environmental change research. Global Environmental Change, 18(1): 234-245. https://doi.org/10.1016/j.gloenvcha.2007.09.002

FAO (2006). Food Security. Policy Brief, June 2006, issue 2. https://www.fao.org/fileadmin/templates/faoitaly/documents/pdf/pdf_Food_Security_Cocept_Note.pdf (accessed Oct. 20924).

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

Ford, A. (2024). Europe's soil emergency. Politico Europe. https://www.politico.eu/article/soil-degradation-eroding-europe-agriculture-harvest-crops-flood-drought/ (accessed Oct. 2024).

Oxford Martin Program on the Future of Food. (2024). *WHAT IS THE FOOD SYSTEM?* [Institutional web site]. https://www.futureoffood.ox.ac.uk/what-food-system

UNISDR. (2015). Sendai Framework for Disaster Risk Reduction 2015-2030 (A/CONF.224/CRP.1)—World | ReliefWeb. https://reliefweb.int/report/world/sendai-framework-disaster-risk-reduction-2015-2030-aconf224crp1?gclid=CjwKCAjww7KmBhAyEiwA5-PUStf5_Fe1dw7MhXQRpQSSw4fBBKZGI01hP4rLf4f6qRDtNS-eDBtUmRoC55YQAvD_BwE

WFP. (2009). Strategic Evaluation of WFP's contingency Planning 2002—2008. World Food Programme. https://documents.wfp.org/stellent/groups/public/documents/reports/wfp223517.pdf

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

Appendix: Generalized interaction proposal

Focus activity 1: Region, group, product, hazard

1.1 Region: ➔ Specify region

> Is the region embedded in a larger region with similar natural characteristics?

1.2 Target group: ➔ Specify target group of interest

> What is the relevance of the target group for the region
> Target group, diet, expenditure (% of diet), diet quantities and expenditure for diet elements for total target group in country
> Agric. products in diet, quantity and share of expenditure in diet
> Country total: product quantities and expenditures in target group

1.3 Product: ➔ Specify product of interest

> What is the relevance of the product for the region
> Can the selected product easily be exchanged by other products in production program
> What is the relevance of the product for the target group (production program or diet)
> Can the selected product easily be exchanged by other products in diets
> Does deficiencies in product delivery lead to food security concerns

1.4 Hazard and impact

> What hazards could occur that influence product and target group
> Rank hazards according to probability and impact in a scale of 1-10
> Hazard limited to target region or experienced in wider region, country, globally
> Impact of hazard on food security building on a scale from 1 (very minor) to 5 (Famine)
> Hazards with highest impact on agric. production or availability of food considering farms and food chain
> Impact of specified hazard on drivers for agric. production, on agric. production, on food system elements (e.g. transportation, import, etc.) and eventually on food availability in terms of quantities
> Impact on food availability, food access, food affordability for target groups; changes in food expenditures within budget of target group, increase in food expenses within country

1.5 Planning decision

> Is the selected hazard of primary interest for any contingency planning
> Does dealing with the selected hazard warrant a food security or economic contingency planning for the region?
> Does dealing with the selected hazard warrant a food security or economic contingency planning for the target group.

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

Focus activity 2: Objectives, actors, actions

2.1 Objectives: ➔ Specify food security level that should be reached

> Link impact judgement to objectives, identify change of levels

2.2 Interested groups

> Which groups have an interest in developing a contingency plan.
> Which groups have an interest in implementing a contingency plan.
> Which groups can provide support in in implementing a contingency plan.

2.3 Actor groups

> Which groups could actively engage in the creation, implementation, and marketing of a contingency plan
> What actors are in place that could support in case of food security problems
> Contacts of actors
> Actors with influence on food security related to food provision and food consumption, and their potential opportunities access to actors (address etc.)

2.4 Action opportunities and impact

General actions on food security

> What actions could be provided for assuring food security in hazard situation
> Impact of individual actor activities on food availability (ordering), their short term activation and efforts (costs) for activation (ordering)

General actions on hazard effects

> What direct actions by which actors could eliminate or reduce hazard effects on food production; specify impact
> What indirect actions by which actors could eliminate or reduce hazard effects on food production; specify impact
> What actions could support economic food producers, logistics, retail; specify impact

Actions on food availability

> What actions could assure that more of critical food is available for consumers

Actions on support of target groups

> What actions could be provided for supporting consumers in purchasing power; specify impact
> What actions could be provided for supporting food producers; specify impact
> What actions could be provided for supporting farms in hazard situations; specify impact

2.5 Action challenges

Retail arguments

> What would be asked for in our food provision activity for continuing serving those in need

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

> What additional funds and personnel would be needed for keeping our service level
> To what extent can retail reduce food security challnegs by increasing offers of product alternatives
> What possibilities of increasing import while keeping negative effects low.

Policy arguments

> What is possible without considering financial consequences
> What is possible with a limit in public funds of …
> What could be done without public funds

Biodiversity expert arguments

> What are consequences of present contingency plan on biodiversity
> What could be done in improving food security without damaging biodiversity
> If negative consequences on biodiversity are reduced by 50%, what consequences are for food security

Media arguments

> To what extent can media and consumer organizations reduce food security challenges (promoting alternatives, etc.)

Farm adviser arguments

> What could be done to assure that farms remain profitable in a contingency situation

2.6 Action specification

> Which action combinations are best in combining different interests (compromise action)
> What is impact of action combinations
> Specify characteristics of action combinations considering feasibility, eligibility, speed of approval in contingency situation, costs, effects
> Activity combinations (orderings) with short term availability, high impact, and limited efforts
> Impact of activity combinations with short term availability, and limited efforts on drivers for agric. production, on agric. production, on food system elements (e.g. transportation, import, etc.) and eventually on food availability in terms of quantities
> Improvements on food availability, food access, food affordability for target groups; changes in food expenditures within budget of target group, increase in food expenses within country

Focus activity 3: Side effects, cost/benefit, resources

3.1 Side effects

> What side effects of actions are expected?
> What actions could reduce side effects?

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201

3.2 Actions for reducing side effects

> Estimation of costs to reduce the negative impact on farms considering financial aid, training programs, market development, and gradual transition incentives.

3.3 Evaluation

> Specify verbally costs and effects considering economics, social, environmental issues
> Specify costs and effects in scale between 1 and 10
> Specify costs and effects in money terms
> Estimation of costs of short-term actions to support the target group dealing with a specified hazard considering the number of people affected, the type of support provided, and the duration of the support
> Comprehensive comparison between the costs of taking actions in support of target group and farms, and the societal costs if no actions are taken considering direct financial costs and broader socio-economic impacts.
> Propose reduced action plan if total costs of actions should be reduced by 50% considering priorities and the elimination/reduction of actions with lower benefit/cost ratio.

3.4 Feasibility

> What is the ability of a guiding institution to activate actions
> What could be a 'guiding institution'; or does it need a group of guides for a contingency situation
> What funds are necessary for contingency actions and what funds can be made accessible
> Specification of contact addresses of actors and guiding institution

3.5 Selection of actors and actions

> What combination of actions is the most effective

Focus activity 4: Coordination

> How are actions of different actors interrelated and require coordination?
> What coordination schemes are in place?
> Are these coordination schemes sufficient?
> How should an efficient and feasible coordination scheme look like?
> Coordination opportunities and efforts linked to actors, variations of engagement

Funded by the European Union

The ECO-READY project has received funding from the European Union's Horizon Europe Research and Innovation Programme under grant agreement n° 101084201