

The development of the EU Adaptation Strategy:

ADVISORY GROUP "AGRICULTURE & ENVIRONMENT 19 June 2012

DG Climate Action





What is the issue at stake?

- Fight for 2°C, prepare for worse
- Adaptation and mitigation are complementary
- Adaptation action is required now
- Yet, a number of barriers still prevent effective adaptation
- Some of these barriers are best addressed at EU level

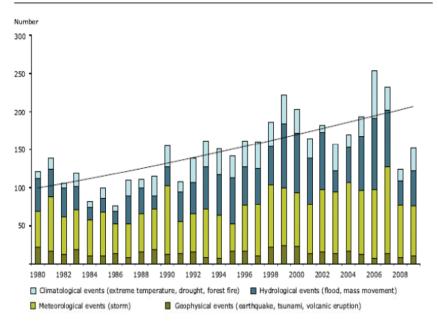




Evidence of current impacts

- The number and impacts of weather and climate - related events increased significantly between 1998 and 2009 (EEA, 2010).
- The SREX report (IPCC 2012) finds with a high level of confidence that economic losses from weather- and climate-related disasters have increased in the longterm, as people and economic assets have been increasingly exposed to risks.

Figure 2.3 Disasters due to natural hazards in EEA member countries, 1980–2009



Note: Definition loss events, events can occur in several countries, events are counted countrywise.

Source: NatCatSERVICE, 2010; © 2010 Münchener Rückversicherungs-Gesellschaft, Geo Risks Research, NatCatSERVICE — as at August 2010.



Arctic

Decrease in Arctic sea ice coverage Greenland ice sheet loss Higher risk of biodiversity loss

Northern Europe (boreal region)

Less snow, lake and river ice cover Northward movement of species More energy by hydropower Lower energy consumption for heating Higher risk of damages by winter storms Increased river flows Higher forest growth Higher crop yields More (summer) tourism

North-western Europe

of Error

Increase in winter precipitation Increase in river flow Northward movement of freshwater species Higher risk of coastal flooding

Mountain areas

High temperature increase Less glacier mass Less mountain permafrost Higher risk of rock falls Upwards shift of plants and animals Less ski tourism in winter Higher soil erosion risk High risk of species extinction

Coastal zones and regional seas

Sea-level rise
Higher sea surface
temperatures
Northward movement
of species
Increase in
phytoplankton biomass
Higher risk for
fish stocks

Central and eastern Europe

More temperature extremes Less summer precipitation More river floods in winter Higher water temperature Higher crop yield variability Increased forest fire danger Lower forest stability

Mediterranean region

Decrease in annual precipitation Decrease in annual river flow Increasing water demand for agriculture Lower crop yields More forest fires Less energy by hydropower More deaths by heat waves More vector-borne deseases Less summer tourism Higher risk of biodiversity loss Higher risk for desertification

Climate Action



Adaptation can reduce overall damage costs

Microeconomic evidence exists on the benefits of adaptation: for instance database in Climate-ADAPT on adaptation options

Sectoral evidence exists on the net benefits associated with adaptation action. For instance:

The avoided costs from the impacts of sea level rise in the EU are estimated, depending on the scenario, around EUR 1.5bn (A1B) and 7.3bn (E1) per year in the 2020's, around EUR 4.4bn (A1B) and 16.3bn (E1) per year in the 2050's, and around EUR 18.4bn (A1B) and 47bn (E1) per year in the 2080's. (source: ClimateCost Project).

Work on-going on the macroeconomic implication of adaptation at EU level, under no mitigation as well as when including mitigation policies





Who is affected, in what ways, and to what extent?

Respective significance of the impacts of climate change per policy area/sector will be presented.

- Agriculture, Rural development;
- Forestry;
- Ecosystems / Biodiversity;
- Soil;
- Water;
- Marine;
- Construction/Buildings;
- Transport;
- Energy

Cross-sectoral issues

- Social dimension
- Key geographical dimensions: coastal areas, mountain regions, cities





We identified the need for additional EU action

- Knowledge gaps remain, at all levels.
- Mainstreaming adaptation into EU policies remain undertaken on an ad hoc basis
- Not all Member States, regions, cities are at the same level of knowledge, development or capacity to respond to the adverse effects of climate change (→ consequence for transboundary issues)
- The private sector, including insurance and finance markets, is not yet fully delivering the right products and services to help private agents in increasing their resilience to climate risks.
- → Impact on economic imbalances and social vulnerabilities across the EU





Objectives and policy actions of the EU Adaptation Strategy

(1) Knowledge

- Improve and widen the knowledge base and identify gaps
- Further the understanding of vulnerabilities and adaptation options
- Facilitate knowledge use and exchange

(2) Policy and markets

- Mainstream adaptation into policies at EU level, including revision of legislation to include climate adaptation
- Identify potential adaptation actions to make markets work more efficiently

(3) Cooperation and facilitation

- Facilitate cooperation with and between Member States, regions, cities and other relevant stakeholders
- Provide guidelines for adaptation

→ Overall approach: considering a range of options addressing the "what" and "how"



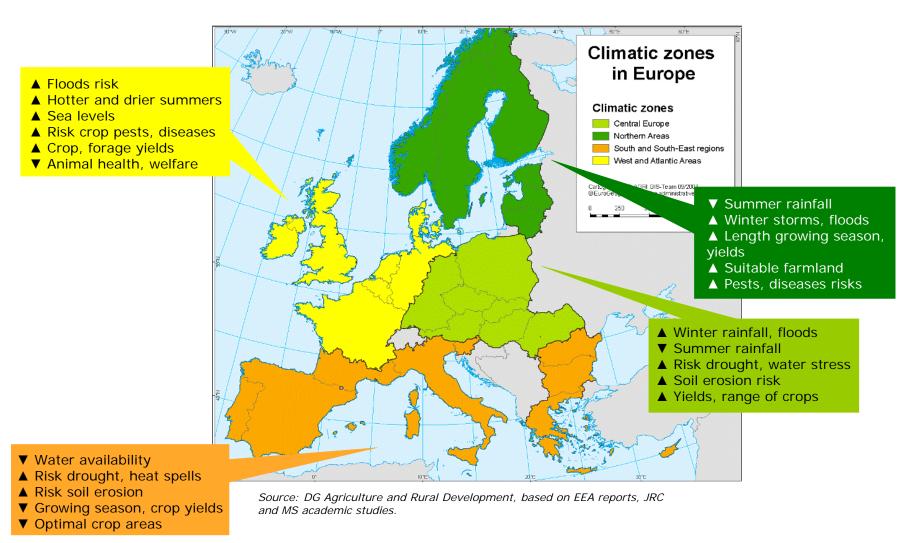
Roadmap







Climate change – Possible impacts on EU agriculture





How current CAP contributes to adaptation

- Provides basic level of income security to farmers
- Shift to decoupled support enables adaptation to market and agronomic conditions
- Framework for sustainable management of the natural environment - cross compliance
- Rural development policy possibilities for targeted support to a large array of adaptation measures involving building adaptive capacity and implementing actions





Pursuing adaptation to CC with CAP instruments

Sustainable management natural resources

- New "green" payment as part of income support
- Enhanced cross-compliance for climate change
- Enhanced environmental and climatic focus for support within rural development

Financial support

- Continuation of agri-environmentclimate measures
- Enhanced support for risk management instruments (insurances, mutual funds)

Building Resilience

Research, innovation

- Support from research and innovation (from 1,9 to 4,5 billion €)
- European Innovation partnership on "Agricultural productivity and sustainability"

Enhance adaptive capacity

- RD: Knowledge transfer and information actions
- Improved Farm Advisory instrument covering climaterelated issues



Guidance on climate proofing CAP and Cohesion policy: objectives/rationale

Adaptation experts, Managing Authorities and farm advisors need to understand opportunities for adaptation in the context of CAP and Cohesion policy

Targeted, specific guidance linking adaptation research/technical information to planning and development of CP/CAP programmes is lacking

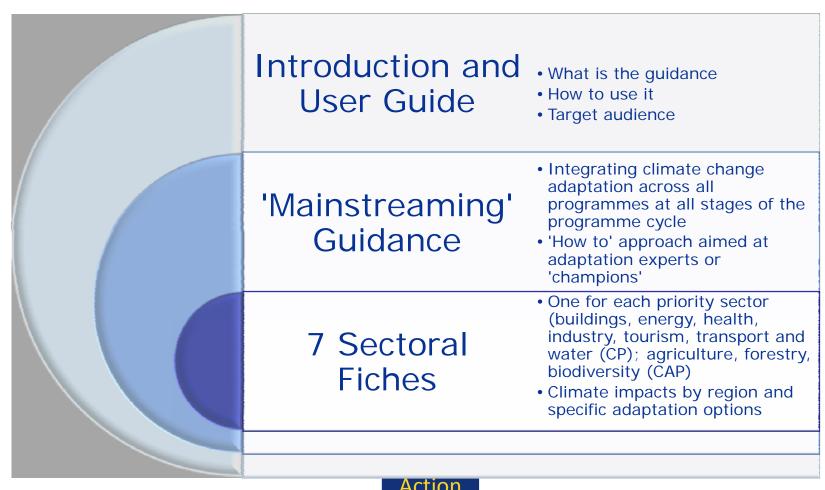
Some guidance exists for 07-13 on environment/biodiversity but **not for adaptation** and its unique characteristics

This **EU 27 level guidance is a start** – it can be tailored for the Member State situation and used to generate awareness





Guidance Draft Contents





Thank you!

http://ec.europa.eu/clima/sites/change/







