



22nd OSCE Economic and Environmental Forum  
First Preparatory Meeting, Vienna, 27-28 January 2014



## **Session III: Panel Debate**

**Improving environmental security:  
How can we reduce natural disaster risks?**

**Lessons learned / identified from the past**



**Johann Georg Goldammer**  
Global Fire Monitoring Center (GFMC)  
Freiburg, Germany

## **Principle / guiding statement**

**Unlike the majority of the geological and hydro-meteorological hazards:**

**Wildland fires (vegetation fires – wildfires) represent**

- a natural hazard
- which is primarily human-made
- can be predicted
- controlled, and
- in many cases, can be prevented

## **The ENVSEC Project**

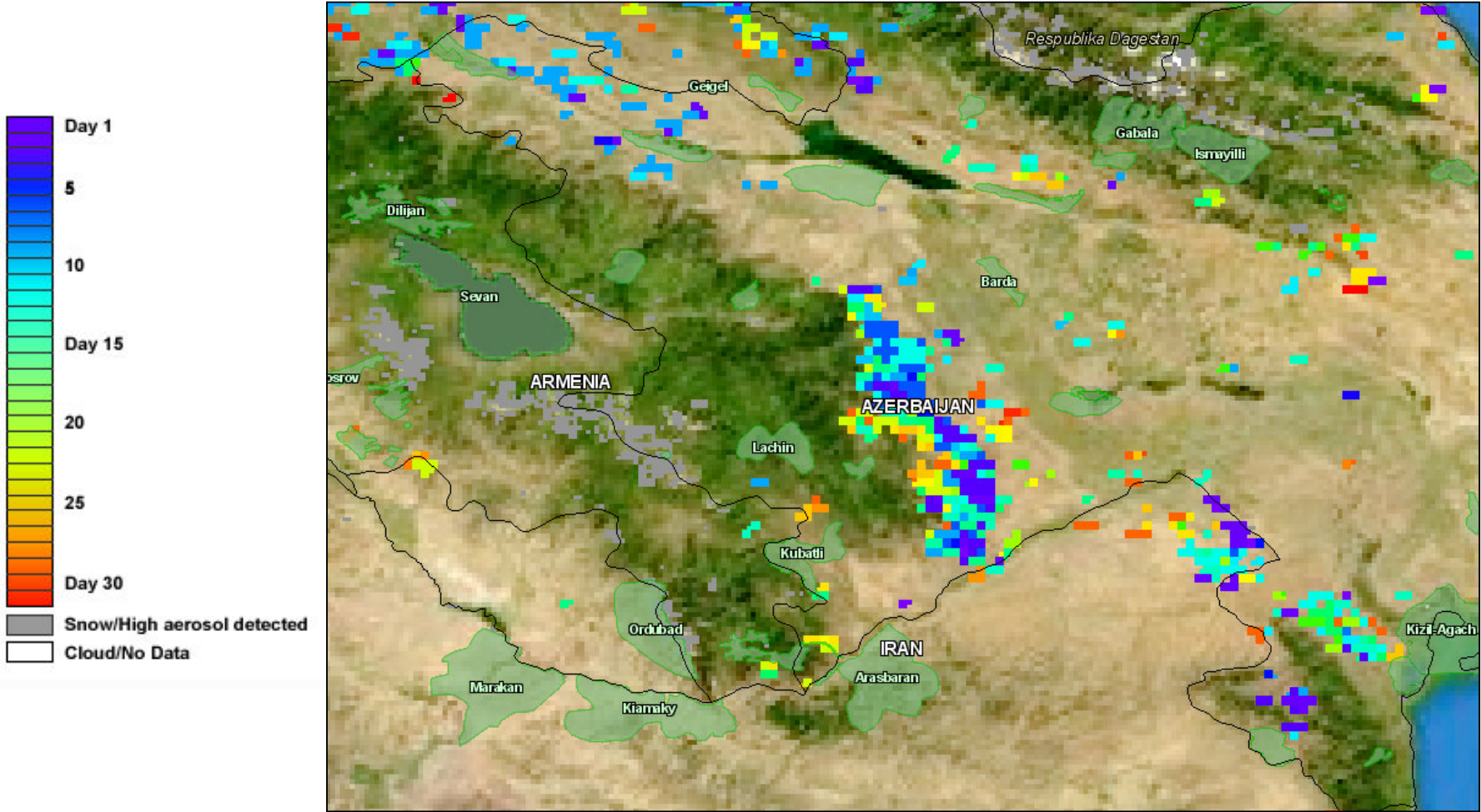
**“Enhancing National Capacities on Fire Management and Wildfire Disaster Risk Reduction in the South Caucasus”**

**Phased project: Phase I initiated 2009  
Phase III: until 2015**

### **Target countries / region**

- Armenia, Azerbaijan, Georgia
- South Caucasus
- The greater region spanning South Caucasus and Balkans

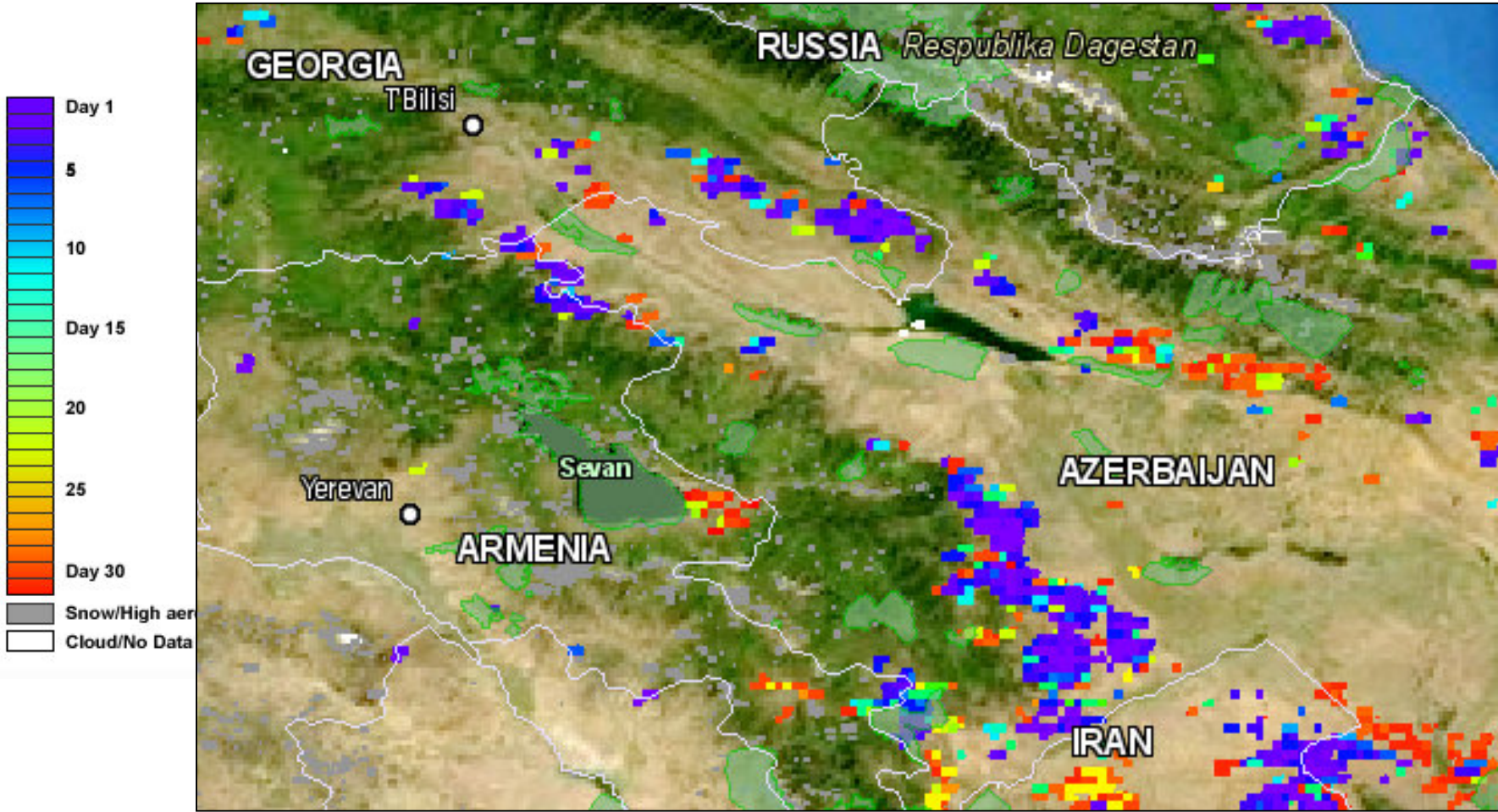
# Historic Fire Assessments (I)



August 2006



# Historic Fire Assessments (III)



August 2010

**Georgia 2010**





Georgia 2010







**Georgia 2010**



# Objectives & Basics

## Highlight the role of fire management in forests and agricultural lands (I)

### “Fire management”: Definition

- Prevention of fire application and wildfires resulting in destruction or damages of ecosystem services
- Avoidance of “excessive” or unnecessary burnings
- Suppression of damaging fires
- Use of prescribed (controlled) management fires where fire effects are beneficial for ecosystems / land-use systems

# Objectives & Basics

## Highlight the role of fire management in forests and agricultural lands (II)

### Fire management will contribute to

- Protection of stability, productivity and carrying capacity of the ecosystem itself
  
- Reduction of secondary risks / effects of wildfires, e.g.
  - Depletion of soil
  - Increasing surface runoff & erosion
  - Land slides, mud slides, rock fall
  - Flash floods and excessive flooding of lowlands







# Objectives & Basics

## Highlight the role of fire management in forests and agricultural lands (IV)

### Fire management will contribute to

- Reduction of economic losses
  - Private & public property
  - Infrastructures .....

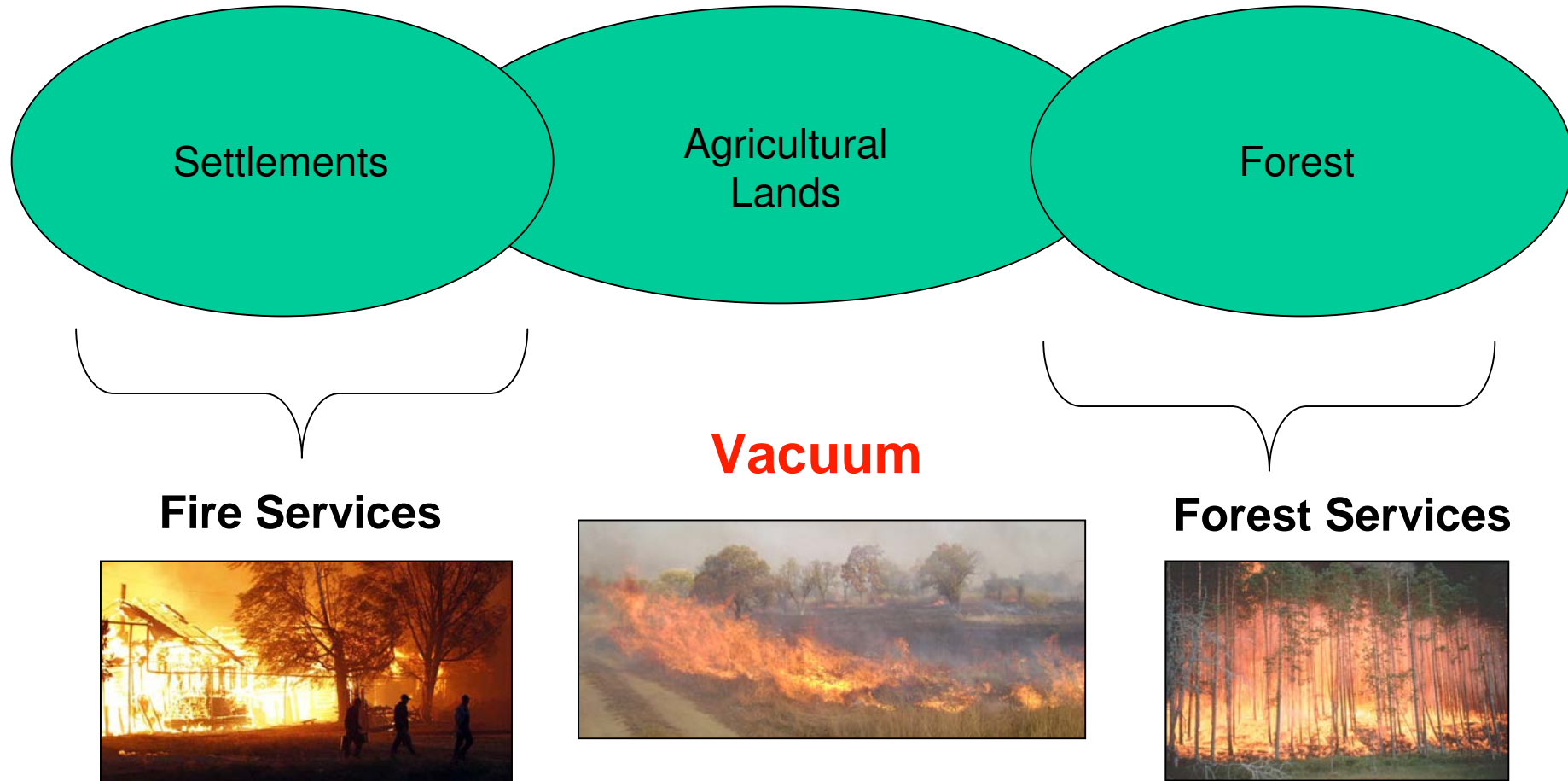
Canada – Slave Lake – 16 May 2011

- 7,000 inhabitants, all evacuated
- > 400 businesses / homes destroyed
- Insurance losses: € 513 million





# In many countries of the Region: Legal / technical vacuum for managing agricultural fires



# The ENVSEC Project

## Main focus of work in Armenia, Azerbaijan, Georgia (I)

- Initiating awareness and dialogue at national level: National Round Tables on Fire Management
- Involvement of civil society, notably local communities
- Development of national fire management policies with inter-agency / cross-sectoral participation



# The ENVSEC Project

## Main focus of work in Armenia, Azerbaijan, Georgia (II)

- Capacity building of agencies involved (forestry, parks, emergency situations)
- Support formation and capacity building of volunteer groups



# The ENVSEC Project



## Main focus of work in the region (I)

- Joint regional training supporting a culture of transboundary cooperation: Antalya Fire Management Training Center (2010-2014)



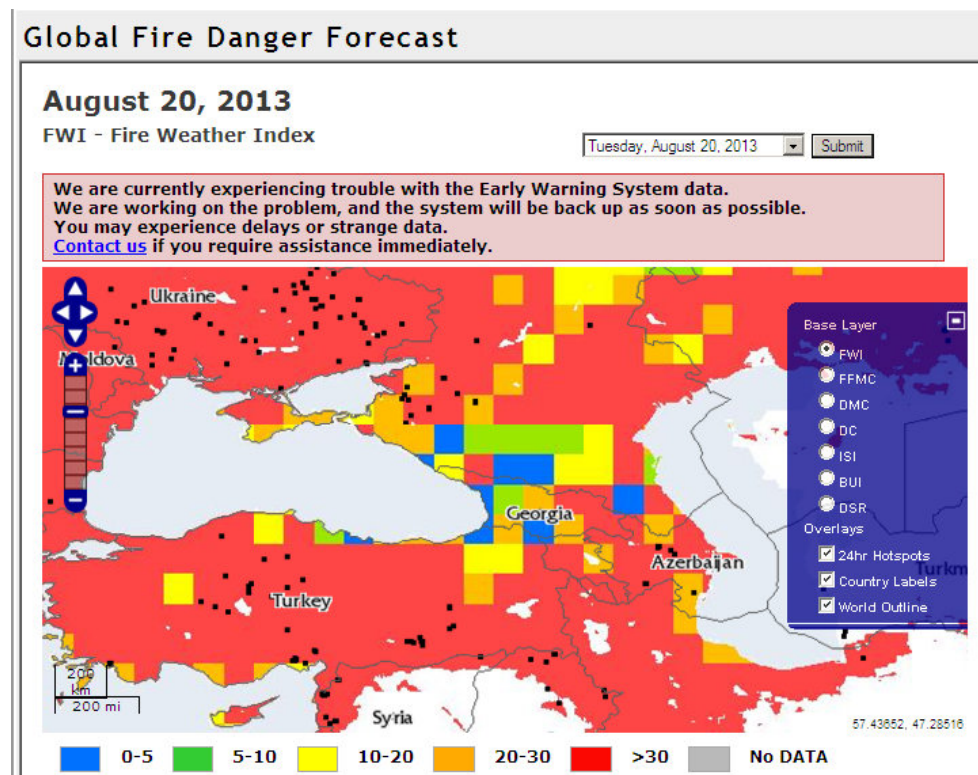


# The ENVSEC Project



## Main focus of work in the region (II)

- Development of a regional Wildland Fire Early Warning System
- Use of near-real time satellite information



# The ENVSEC Project

## Lessons identified (I)

- Addressing a disaster risk such as wildfire requires a holistic approach, i.e. across natural and cultural landscapes and institutional responsibilities
- Accordingly, a cross-sectoral mechanism must be created to initiate a dialogue in society and to identify the underlying reasons of wildfire risks (socio-economic, environmental, climate change, institutional), with emphasis on involvement of civil society



# The ENVSEC Project

## Lessons identified (II)

- Any solution requiring legal and institutional reforms and investments for capacity building (technical, human resources) requires the formulation of a national policy based on consensus and co-operation with the involvement of all relevant national stakeholders.

# The ENVSEC Project

## Lessons identified (III)

- Donor-supported projects and programmes must have a long-term scope and timeline since efficient, effective and sustainable capacities cannot be realized in short-term projects



# The ENVSEC Project

## Lessons identified (IV)

- Establishment and embedding national measures in an international nexus (e.g. through networks, bilateral and multilateral agreements)
  - will benefit from experiences of other countries and regions
  - and thus are economic

# The ENVSEC Project

## Lessons identified (V)

- Establishment and embedding national measures in an international nexus (e.g. through networks, bilateral and multilateral agreements)
  - will allow the development of interoperable systems for cross-boundary exchange and assistance in wildfire emergency situations, and to jointly achieve the goals of related legally binding international agreements

# The ENVSEC Project

## Conclusions

- Developing the ability of society to address wildland fire in a holistic approach from local to global requires the patience for doing this in a medium- to long-term time scale
- Repeat: Donor-supported projects and programmes must have a long-term scope and timeline since efficient, effective and **sustainable** capacities cannot be realized in short-term projects





22nd OSCE Economic and Environmental Forum  
First Preparatory Meeting, Vienna, 27-28 January 2014



# Thanks for Your Attention



**Johann Georg Goldammer**  
Global Fire Monitoring Center (GFMC)  
Freiburg, Germany