

# The Global Adaptation Atlas



Establishing Priorities for Research, Policy and Action on Adaptation

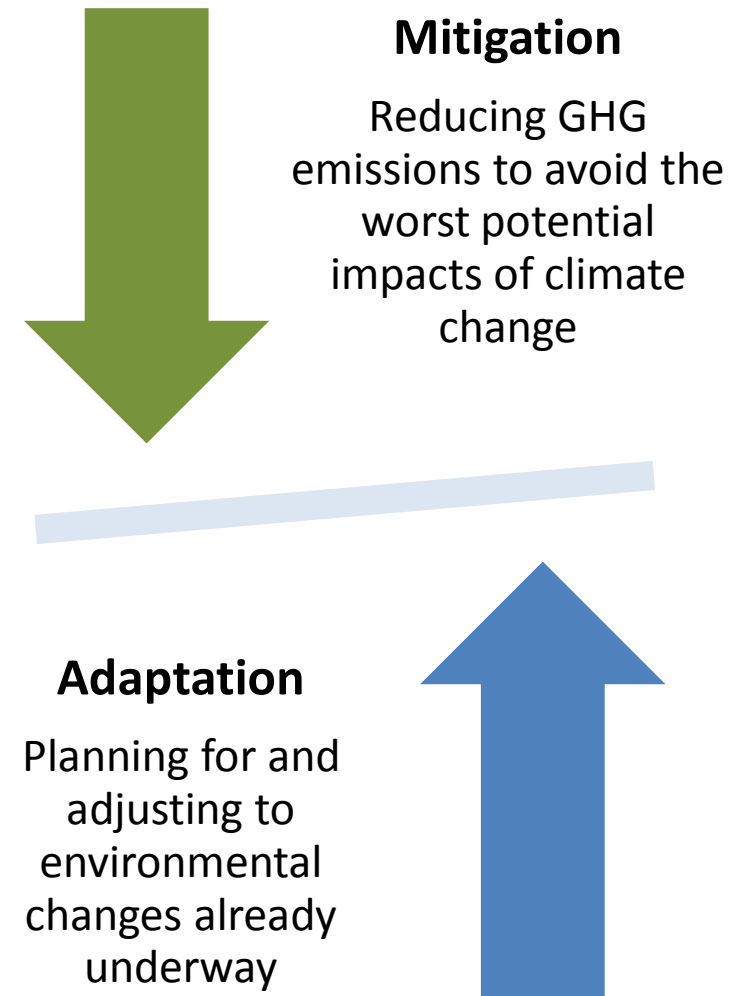
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Illustrated Summary – November 19, 2009

# The Challenge of Adapting Well

- Adaptation is gaining prominence in the research, policy and development fields.
- Emissions reductions anywhere “count” everywhere, but adaptations must be locally relevant *and* broadly coordinated
  - Complementary, not competing objectives
  - Growing push to set priorities for adaptation funding



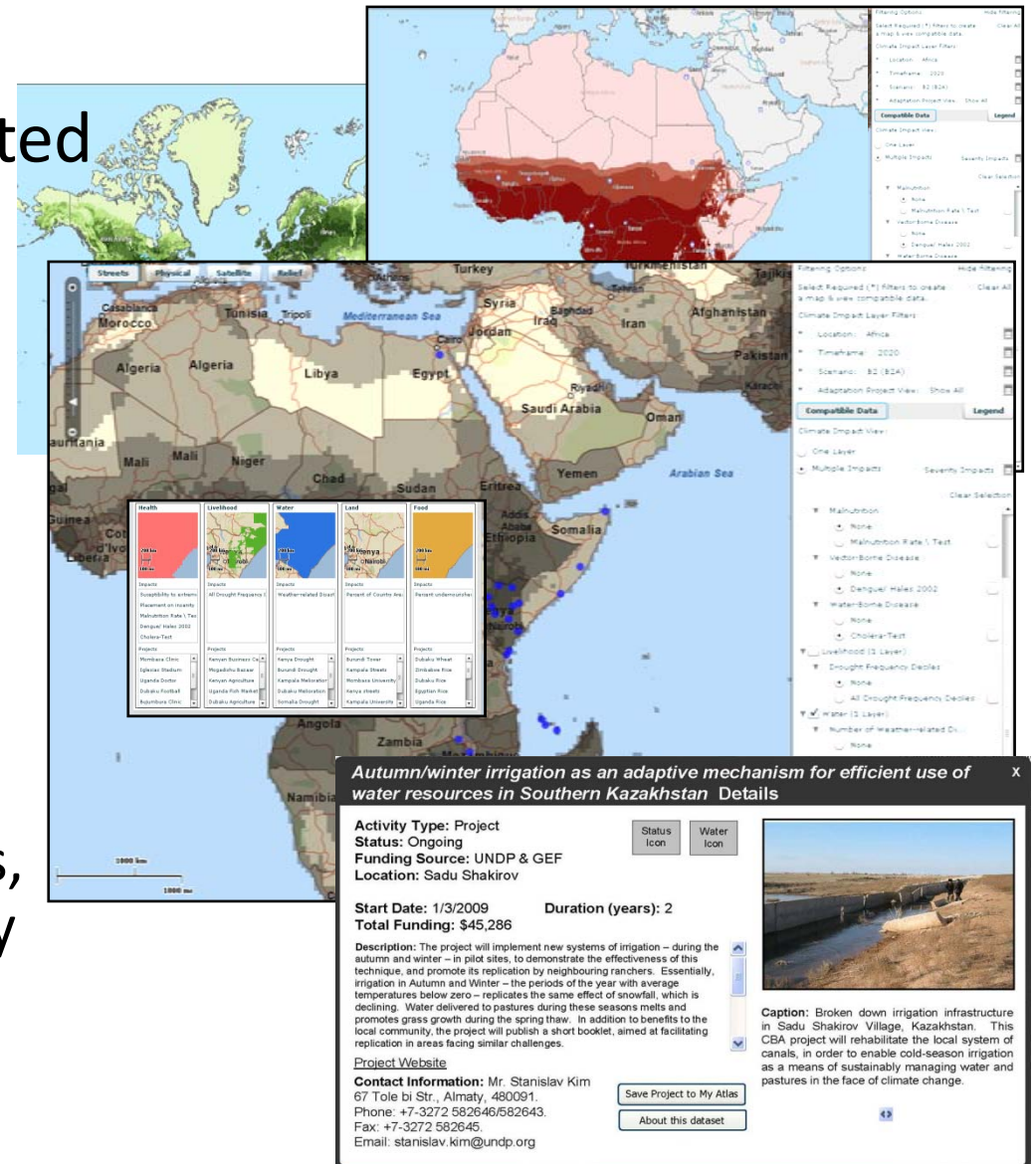
# Mapping is the Missing Link

- **Geography and spatial information are common threads connecting impact science and policy**
  - Climate impacts are site and population-specific
  - Populations in greatest need are often least able to adapt
- **Need for coordination of scientific research, policy and on-the-ground activity**
  - Maps showing current and projected climate impacts and adaptation activity can help in setting strategy for interventions and investments.
    - This is the aim of the Adaptation Atlas.

# What is the Adaptation Atlas?

- Web-based application enables user driven, dynamically generated maps of climate impacts and adaptation activities:

- Database of impacts from peer reviewed climate studies
- Repository of adaptation projects
- Data available for download and uploads of new data supported
- User can select different locations, timeframes, scenarios and overlay resulting data across sectors



# Who Will Use the Atlas and for what purpose?

**Policymakers & Leaders:** Visualize impacts affecting their regions, view portfolios of projects underway, and identify gaps that need to be filled

Policymakers

Ministers and Agency  
Directors

Philanthropic  
Foundations

Multi-lateral donors

United Nations

International climate  
negotiators

**Scientists:** Enter new impact data, download data and develop finer-grained integrated models and new data, further multidisciplinary collaboration

Natural  
Scientists

Social  
Scientists

**Citizens: Learn and contribute**

Enable civil society leaders, advocates, corporations, and others to identify impacts, adaptation options being implemented by others in the area, & opportunities for coordination



# Building Blocks

## 1 Consolidating science on impacts

- Identify gaps in science across disciplines, regions, scales
- Highlight areas for new integrated analysis

## 2 Mapping on-the-ground adaptations

- Facilitate continuous data collection on adaptation funding
- Create a comprehensive, searchable project database

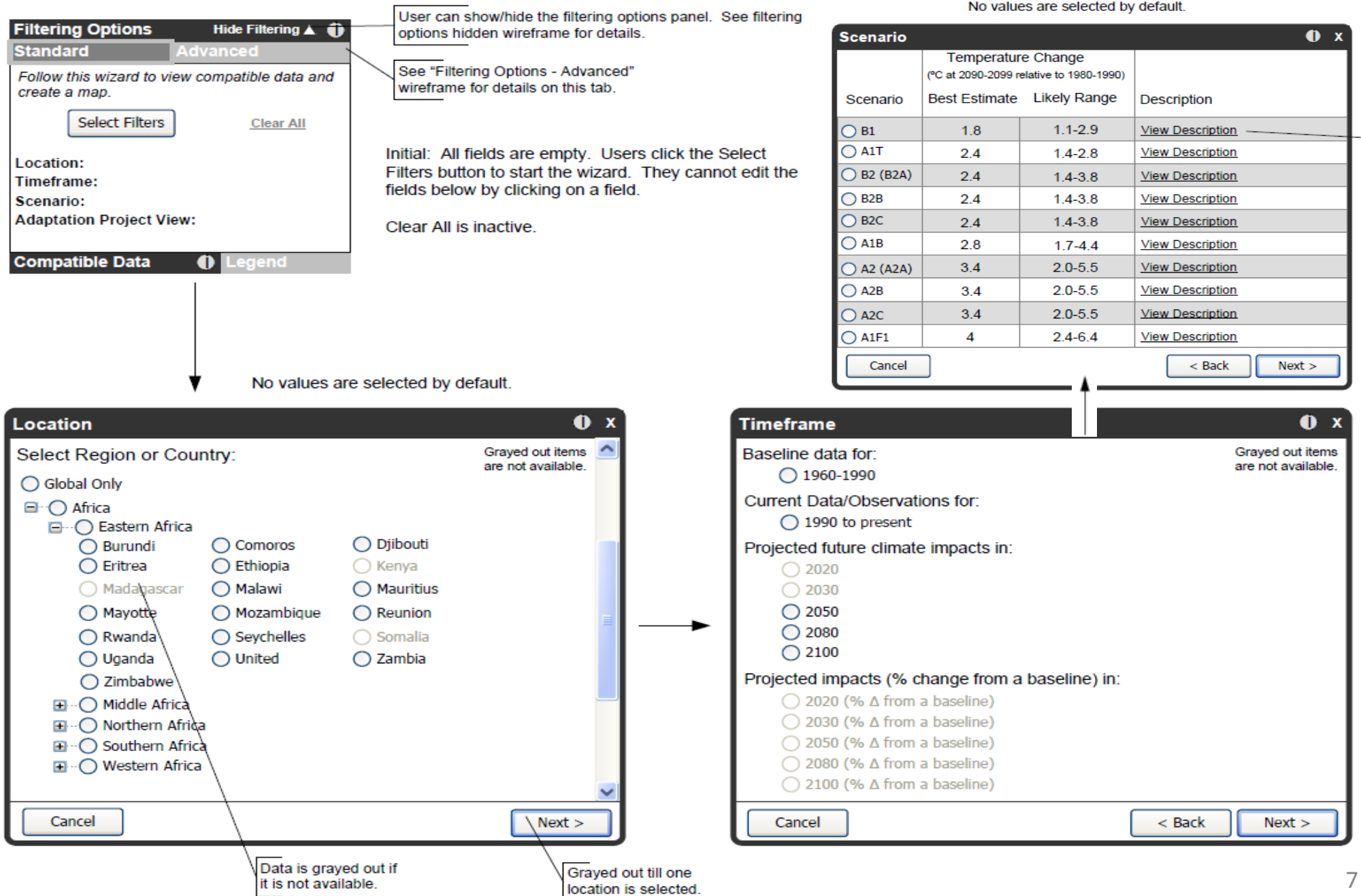
## 3 Creating a tailored outreach vehicle

- Create key user profiles and provide recommendations
- Collect and exchange local lessons and global best practices

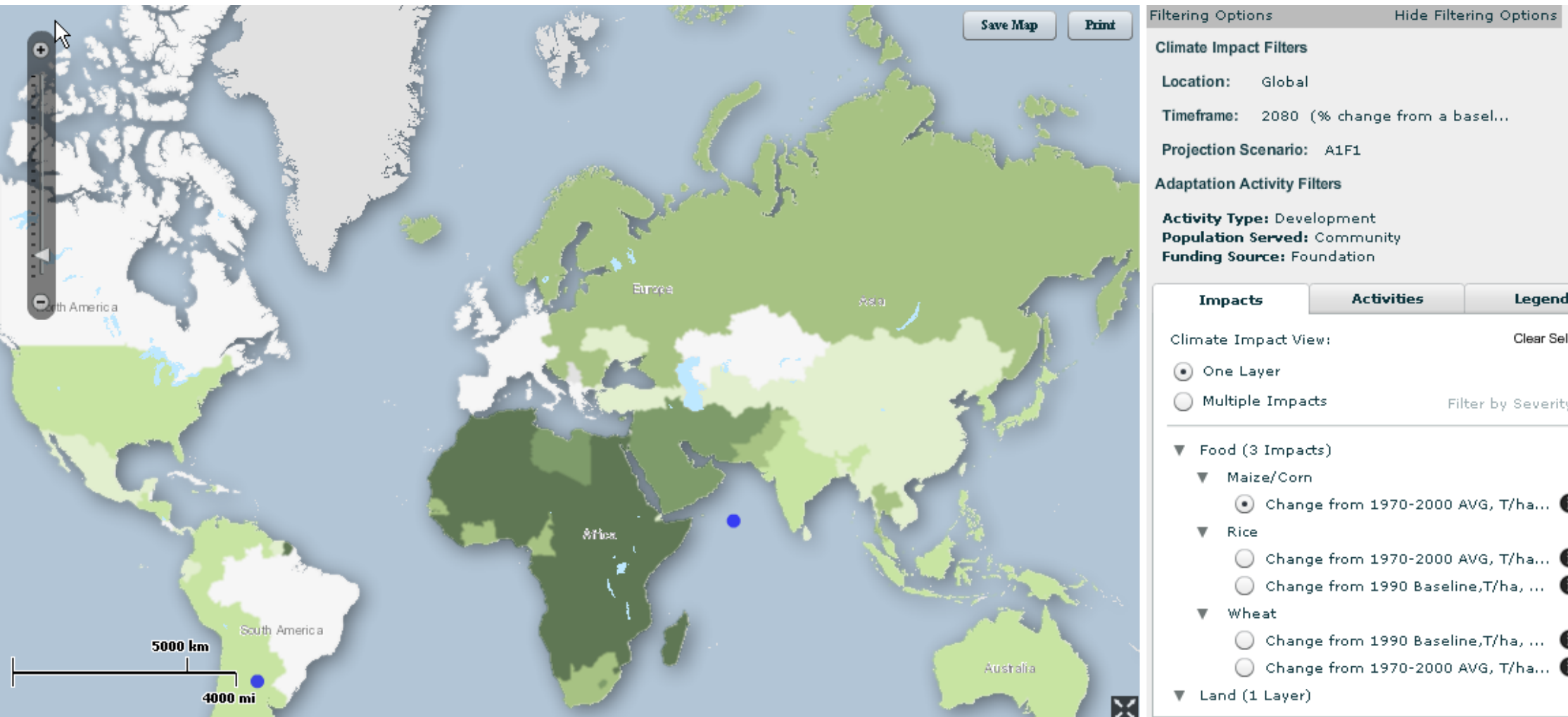
## 4 Sustaining long-term evaluation

- Develop a spatial data archive on impacts and activities
- Track changes in projected impacts & adaptations over time

# Creating maps: Three mouse clicks to find data!

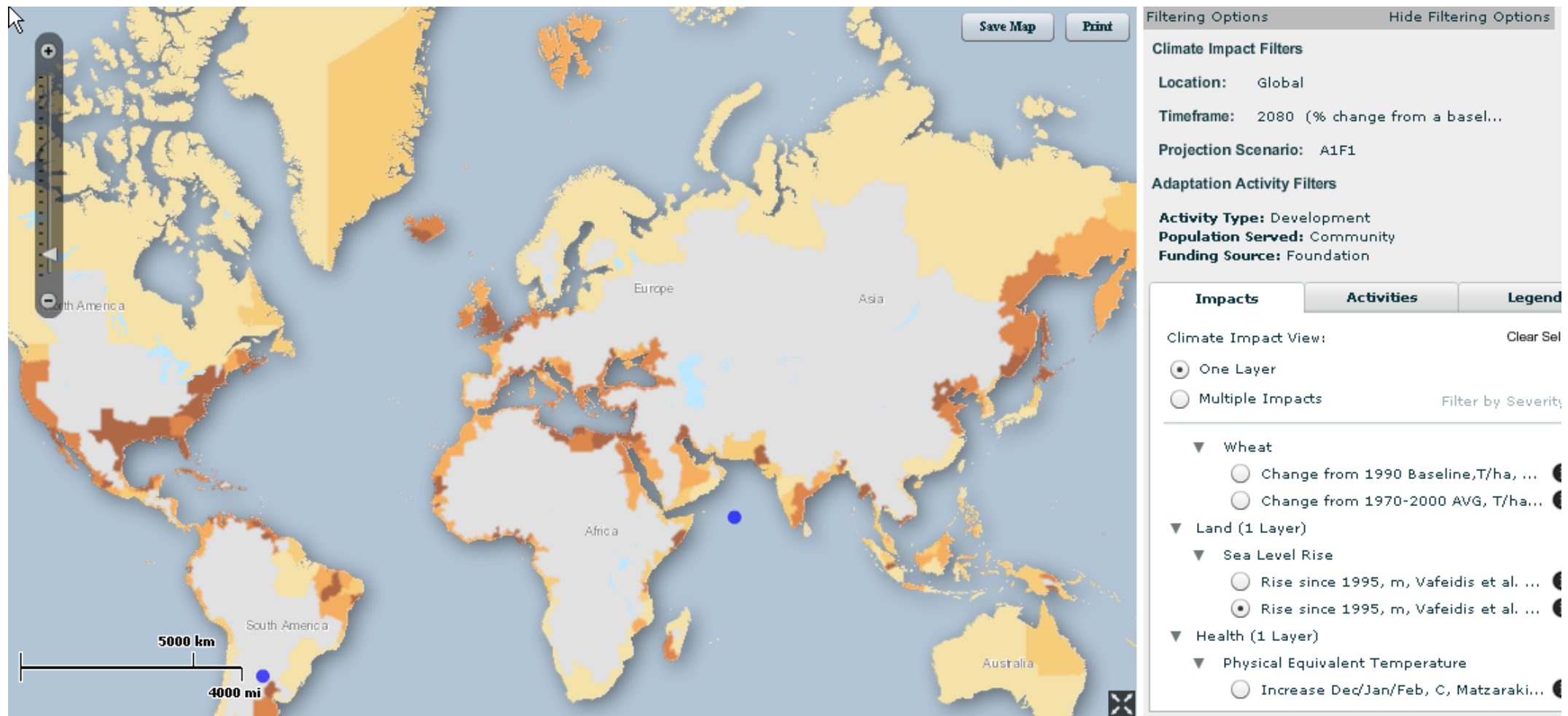


# Projected Change in Maize Production by 2080

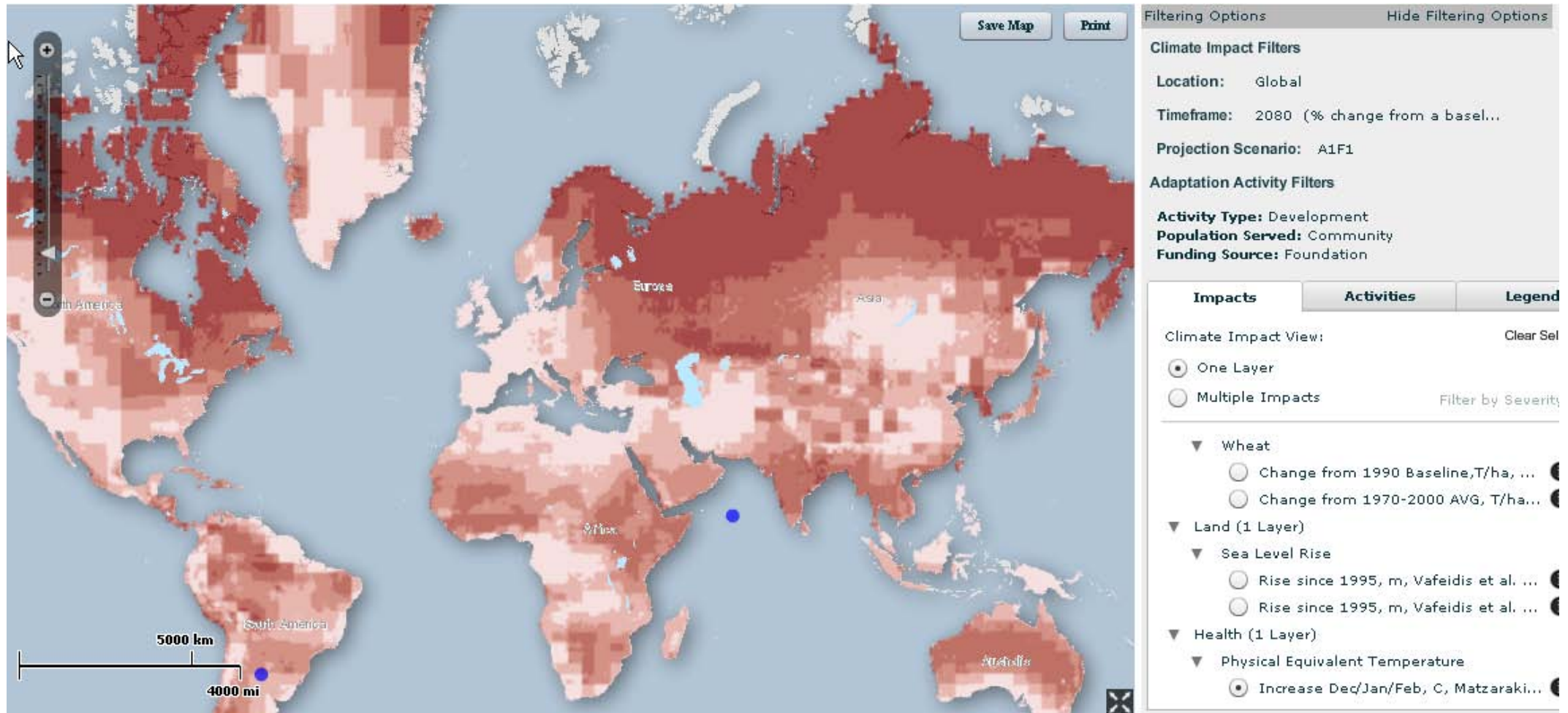




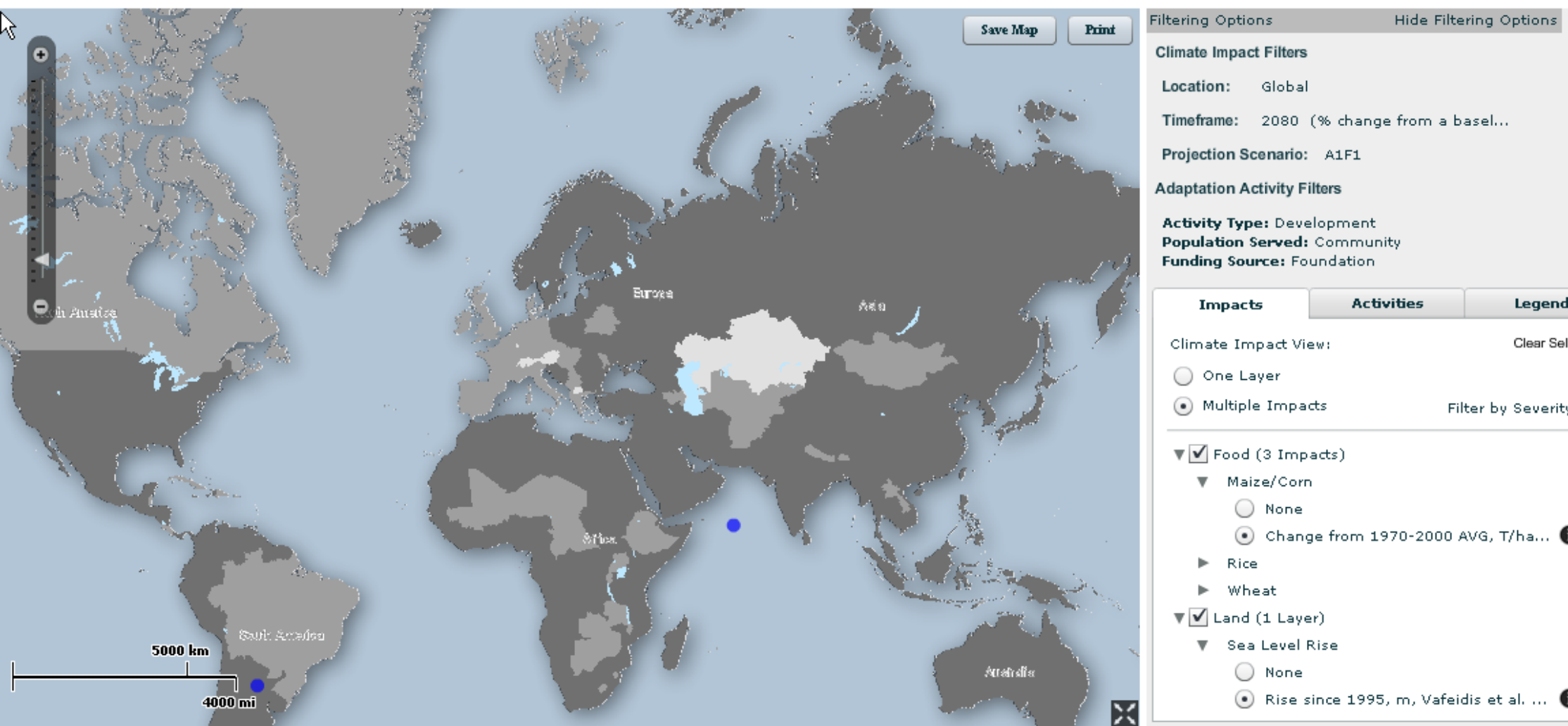
# Projected Change in Sea Level Rise by 2080



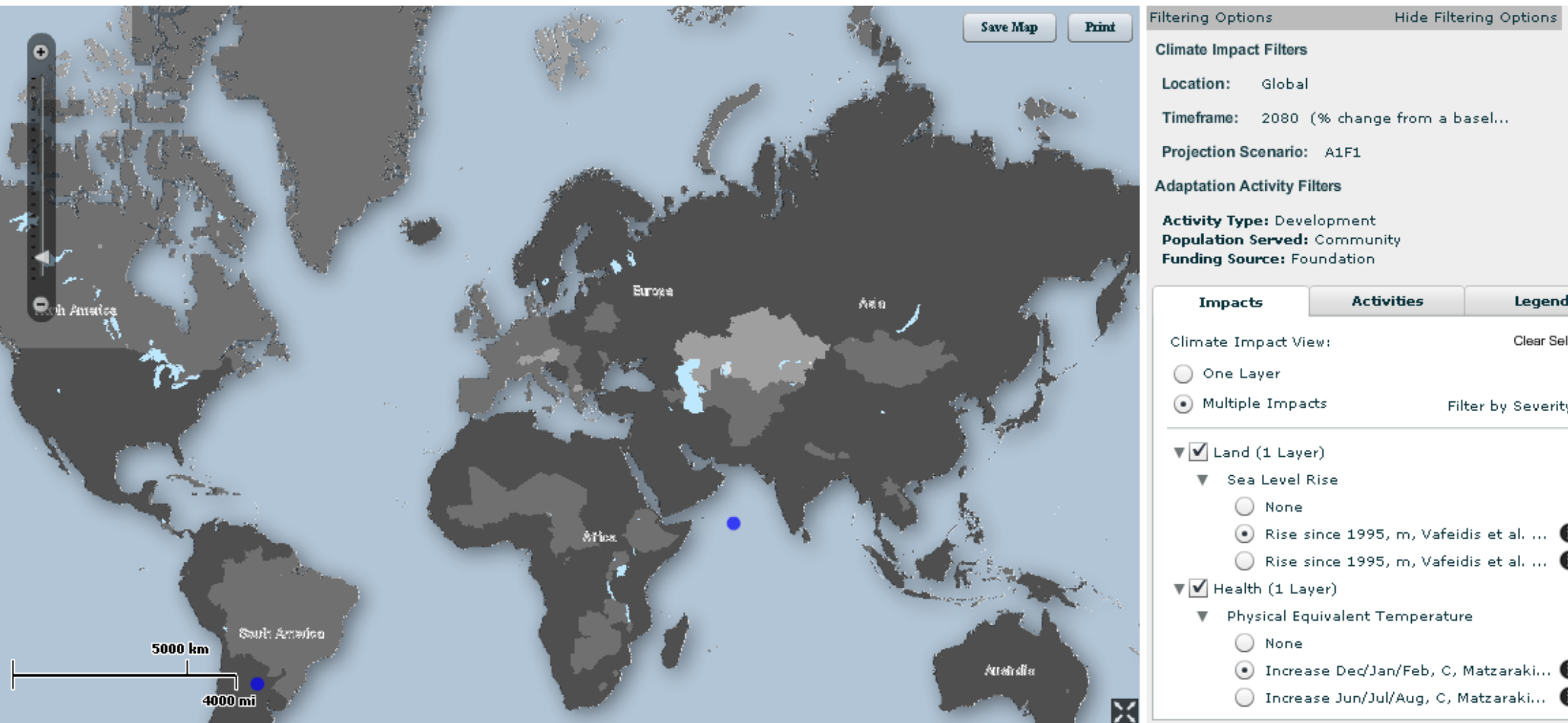
# Projected Change in Physical Equivalent Temperature by 2080



# Overlay of Projected Changes in Maize and Sea Level Rise

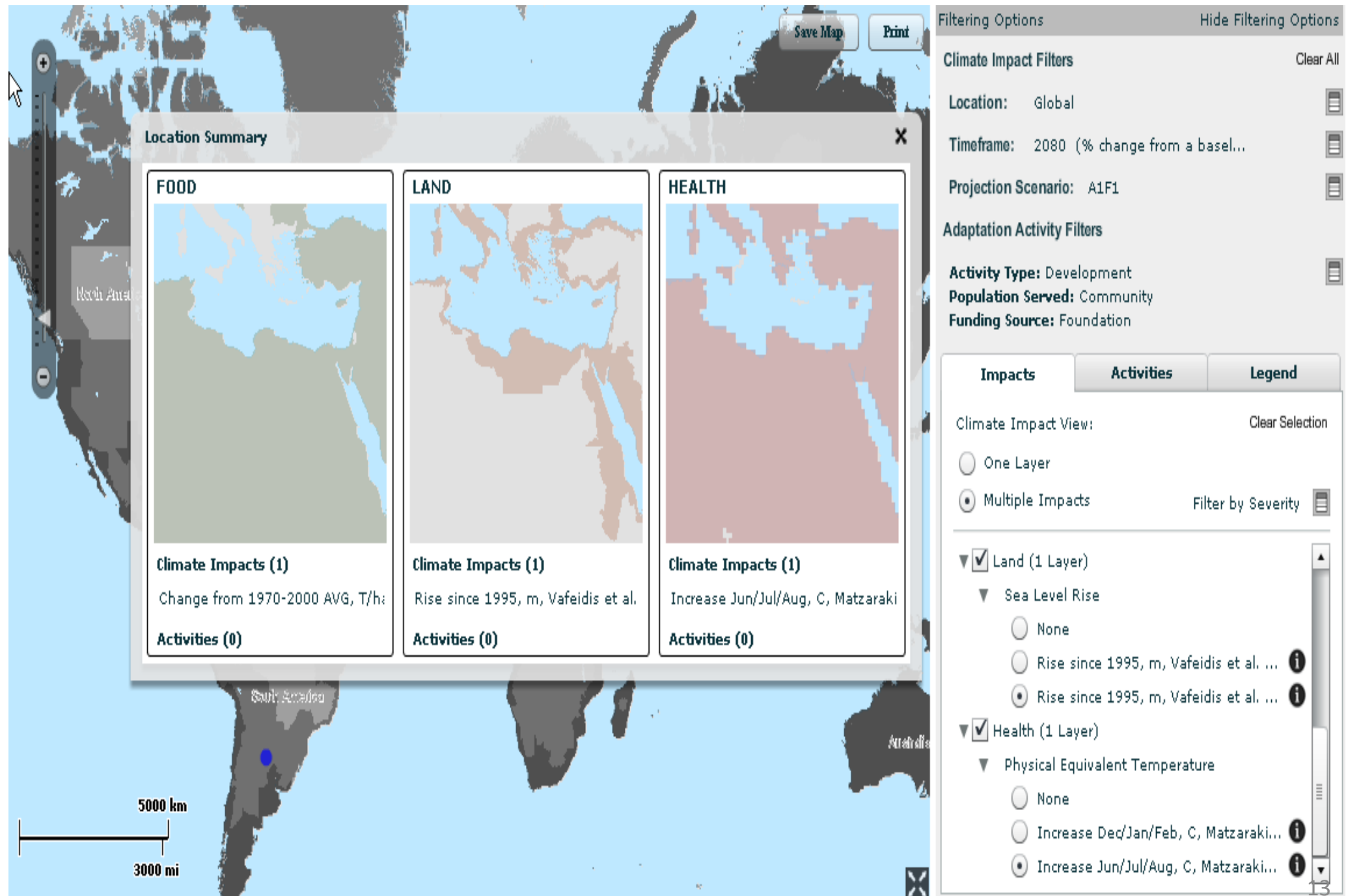


# Overlay of Projected Changes in Maize, Sea Level Rise and Physical Equivalent Temperature





Clicking on a point on the map will display a detailed breakout map





Location: Global

Timeframe: 2080 (% change from a baseline)

Projection Scenario: A1F1

Theme: Land

Category: [what is category?]

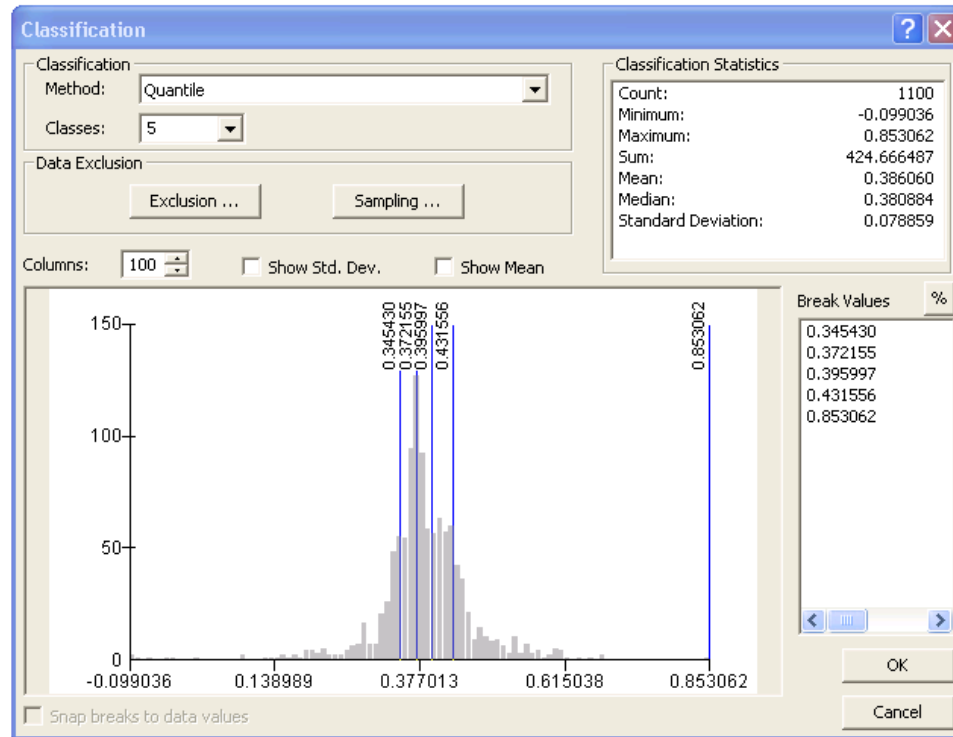
SubTheme: Sea Level Rise

Data Source: DINAS\_COAST

Citation: Vafeidis, A.T. "A New Global Coastal Database for Impact and Vulnerability Analysis to Sea-Level Rise." Journal of Coastal Research 24, 4 (2008)

Abstract:

land



## Climate Impact Layer Detail Page

## Project Detail Page

**Tunisia Corn Project**

Theme: Water  
Country: Tunisia  
State/Province:  
City:  
Type: Research  
Population Served: Community  
Funding Source: Foundation  
Total Funding Amount: 160000.00  
Start Date: Fri Jul 20 00:00:00 GMT-0400 2001  
End Date:  
Keywords:

**water**

**Sample Thumbnail**

[External Website Information](#)

Save Activity to My Atlas

**Filtering Options**

Climate Impact Filters

Location: Global  
Timeframe: 2080 (% change from a basel...  
Scenario: A1F1

**Activity Filters**

Development  
Vulnerable Community  
Foundation

**Activities** **Legend**

act View: Clear Selection

Impacts: Filter by Severity

(1 Layer)  
Sea Level Rise  
None  
Rise since 1995, m, Vafeidis et al. ...  
Rise since 1995, m, Vafeidis et al. ...  
(1 Layer)

**Physical Equivalent Temperature**

☐ None  
☐ Increase Dec/Jan/Feb, C, Matzarakis...  
☒ Increase Jun/Jul/Aug, C, Matzarakis...

# Partners

- **Advisory Board Spanning Science, Policy & Practice**
  - Climate Institute, UNF, WRI, Rockefeller, RFF, ESRI, SEI
- **Collaborative Partners**
  - UNFCCC, UNDP, WRI, College of William & Mary, UNITAR, RMSI
- **Funding Sources**
  - RFF
  - Clipore (MISTRA - Swedish Foundation for Strategic Environmental Research)
  - UN Foundation
  - Goldman Sachs (through seconding of 1 FTE for FY09)
  - ESRI (mapping software)

# Global Adaptation Atlas\*

\*patent pending

For more on the Atlas, visit [www.adaptationatlas.org](http://www.adaptationatlas.org) or email us at [info@adaptationatlas.org](mailto:info@adaptationatlas.org)