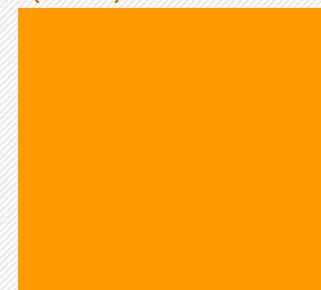




DEPARTMENT OF AGRICULTURE
BUREAU OF AGRICULTURAL RESEARCH

CLIMATE-RESILIENT AGRI-FISHERIES (CRA) ASSESSMENT, TARGETING &
PRIORITIZATION FOR THE ADAPTATION AND MITIGATION INITIATIVE
(AMIA) IN ARMM AND REGION IX

BASIC INFORMATION



AGENCY:	Mindanao State University, Marawi City
Project Team:	Otinggue M. Masnar and Danilo C. Mero
Implementing Partners:	DA-RFO, DA-SWCCO, CIAT
BENEFICIARIES:	DA National and Regional Offices, Decision-makers, policy-makers and planners, other sectoral stakeholders
PROJECT SITE(S):	Provinces of Lanao del Sur and Zamboanga Sibugay
APPROVED DURATION:	June 1, 2017 – May 31, 2018
ACTUAL DURATION:	June 1, 2017 – August 31, 2018
PERIOD COVERED OF THE PRESENTATION:	November 2017 to June 2018
RDE AGENDA ADDRESSED:	Integration and mainstreaming of appropriate and relevant technologies, i.e., approaches, frameworks, methodologies, tools, strategies and information into planning/policy formulation and wide-scale implementation
TECHNOLOGY DEVELOPED/ INFORMATION GENERATED:	Development of Unified Vulnerability Suitability Assessment (VSA) for all areas; Development of crop modelling tools for predictive use especially for high value crops Development of Unified Vulnerability Suitability Assessment (VSA) for all areas; Development of crop modelling tools for predictive use especially for high value crops
BRIEF DESCRIPTION OF TECHNOLOGY/ INFORMATION:	Climate-risk profiles/maps; Characterization/Profiling of CRA practices and Baseline study report on the productivity, profitability, and climate risks in Lanao del Sur and Zamboanga Sibugay.
POT. IMPACT:	Enhanced targeting,

Project Status



Objectively Verifiable Indicators / Targets	Actual Accomplishments	%	Influencing Factors / Problems Encountered	Action(s) Taken	Significant Findings and / or Remarks
<p>Objective 1: To strengthen capacities for CRA methodologies of key research and development organizations in the region (<i>Output: enhanced capacities of AMIA2++ partner organizations in the region</i>)</p>	<ul style="list-style-type: none"> • Attended the CRVA orientation and workshop in Pasay City, July 24-25, 2017 • Attended the pre-planning workshop for CRA financial tools in Alabang, August 15, 2017 • Attended the project coordination workshop in Alabang, August 1-18, 2017 • Conducted project orientation with Department of Agriculture Regional Field Office 9 in Zamboanga Sibugay • Conducted project orientation with Department of Agriculture Regional Field Office ARMM in Cotabato City 	<p>100</p>	<ul style="list-style-type: none"> • At first, on the part of the DARFO9, there was a little confusion about the different AMIA projects (AMIA 1, 2, 2++, 3) due to lack of proper explanation and discussion on their role. • Strong support of DA RFO ARMM team as well as the Provincial and municipal LGUs significantly contributed to the success of the workshop activities 	<p>Discussion on how the result of the project would contribute to CRA practices and investment</p>	<p>DA RFOs, Provincial and Municipal LGUs were very receptive and participative.</p>

Project Status



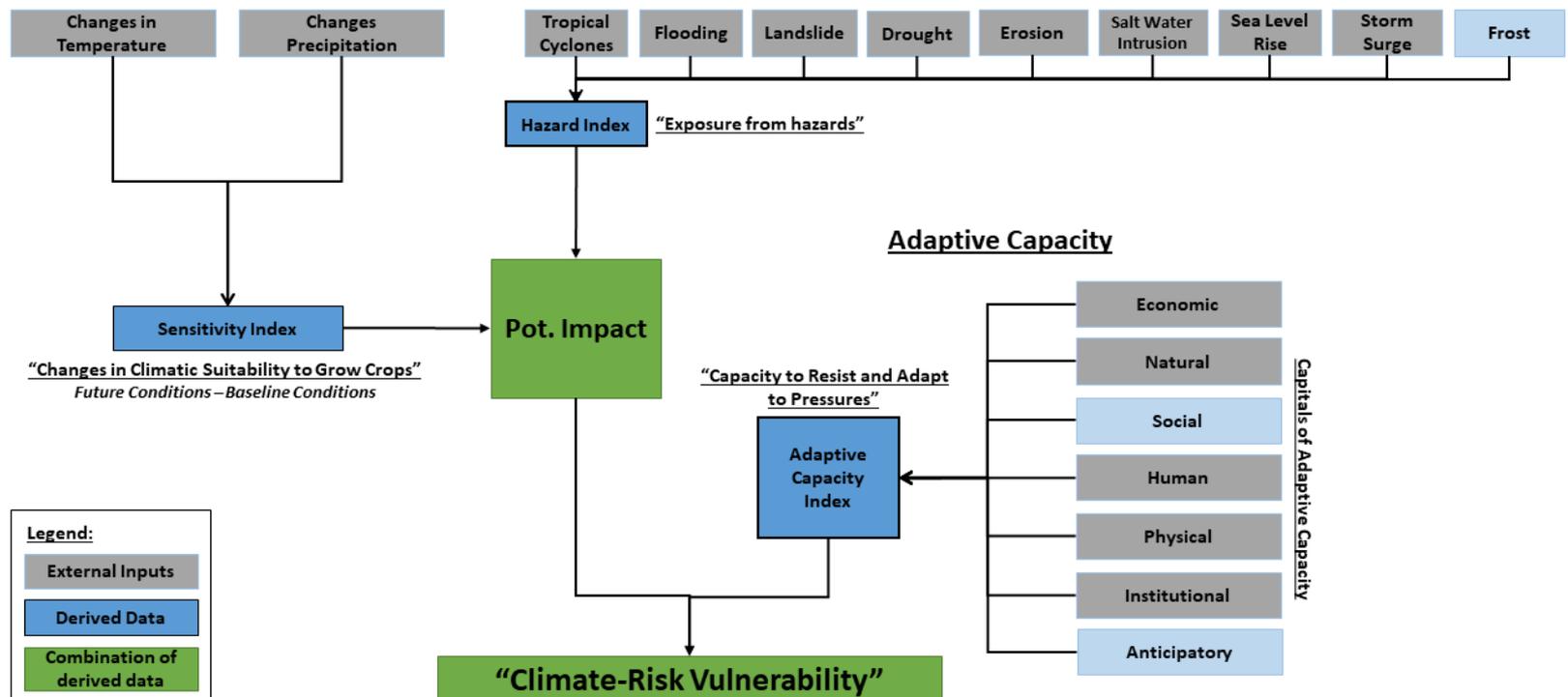
Objectively Verifiable Indicators / Targets	Actual Accomplishments	%	Influencing Factors / Problems Encountered	Action(s) Taken	Significant Findings and / or Remarks
<p>Objective 2: To assess climate risks in the region's agri-fisheries sector through geospatial & climate modeling tools (<i>Output: geospatially referenced data on climate-risks: biophysical-agricultural-socioeconomic parameters</i>)</p>	<ul style="list-style-type: none"> • Prepared 40 municipal basemaps of Lanao del Sur and 16 for Zamboanga Sibugay • Conducted crop occurrence workshop and produced crop occurrence map for 5 crops each for Zamboanga Sibugay and Lanao del Sur. • Climatic data for the project site, both the current and the future scenarios of 2030 and 2050 were downloaded from worldclim website. 	100	•		<p>Geospatial and climate modelling tools were available from CIAT dabased</p> <p>Provincial and Municipal LGUs were very receptive and participative in the validation of maps</p>

CRVA Theoretical/Conceptual Framework

Climate-Risk Vulnerability Assessment (CRVA) Framework

Exposure I: changes in temp. and prec.

Exposure II: Biophysical Indicators (climate-related pressures)



Adaptive capacity indicators

CAPITALS

Economic Indicators

- Poverty incidence
- Inflation rate
- Ag. min. wage
- Total banks and financial institutions
- Number of finance cooperatives

Natural Indicators

- % of crops irrigated
- % of forest and mangroves
- Agricultural production area

Human Indicators

- No. of private and public secondary, tertiary, and tech. vocational schools
- Ratio of public school teachers to students
- Literacy rate
- Public and private health services
- No. of public and private doctors
- Health services manpower
- No. of local citizens with PhilHealth
- Health-seeking behavior (Lanao DS)
- Hospital bed capacity

Physical Indicators

- Infrastructure investment
- Infrastructure network
- % of households with access to water services
- % of households with access to electricity services
- No. of public transport
- Average farm size
- No. of farm equipment/postharvest
- No. of seed growers
- Distance of farthest barangay from the market

Social Indicators

- % of women in government
- No. of registered farmer groups or unions
- % of farmers who are member of registered unions/groups/coops

Anticipatory Indicators

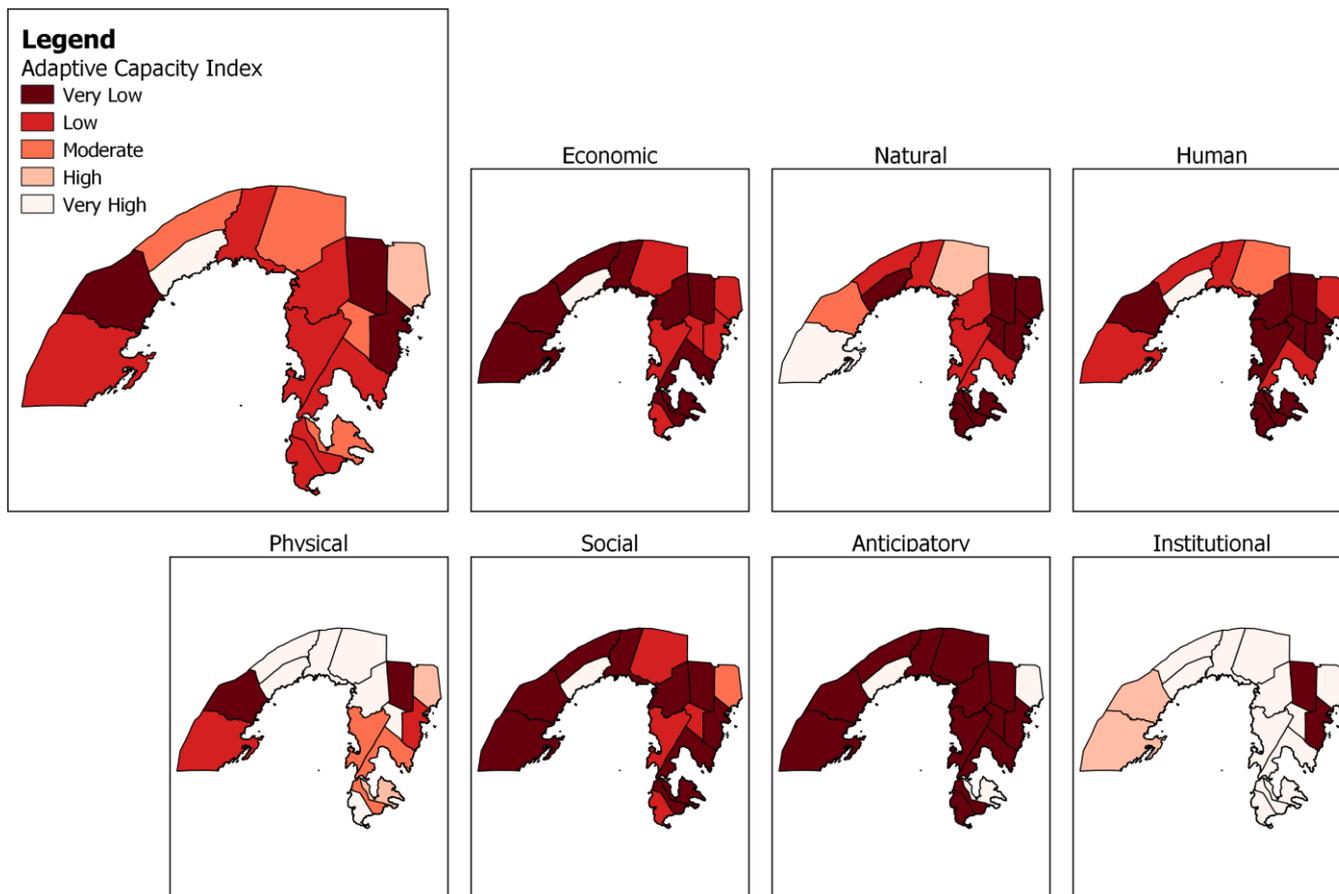
- No. of weather stations
- No. of trainings held related to climate change
- Access to communication technology (No. of telephone companies and mobiles services)

Institutional Indicators

- Number of agricultural staff
- No. of farmers visited or consulted with agricultural extension workers/staff

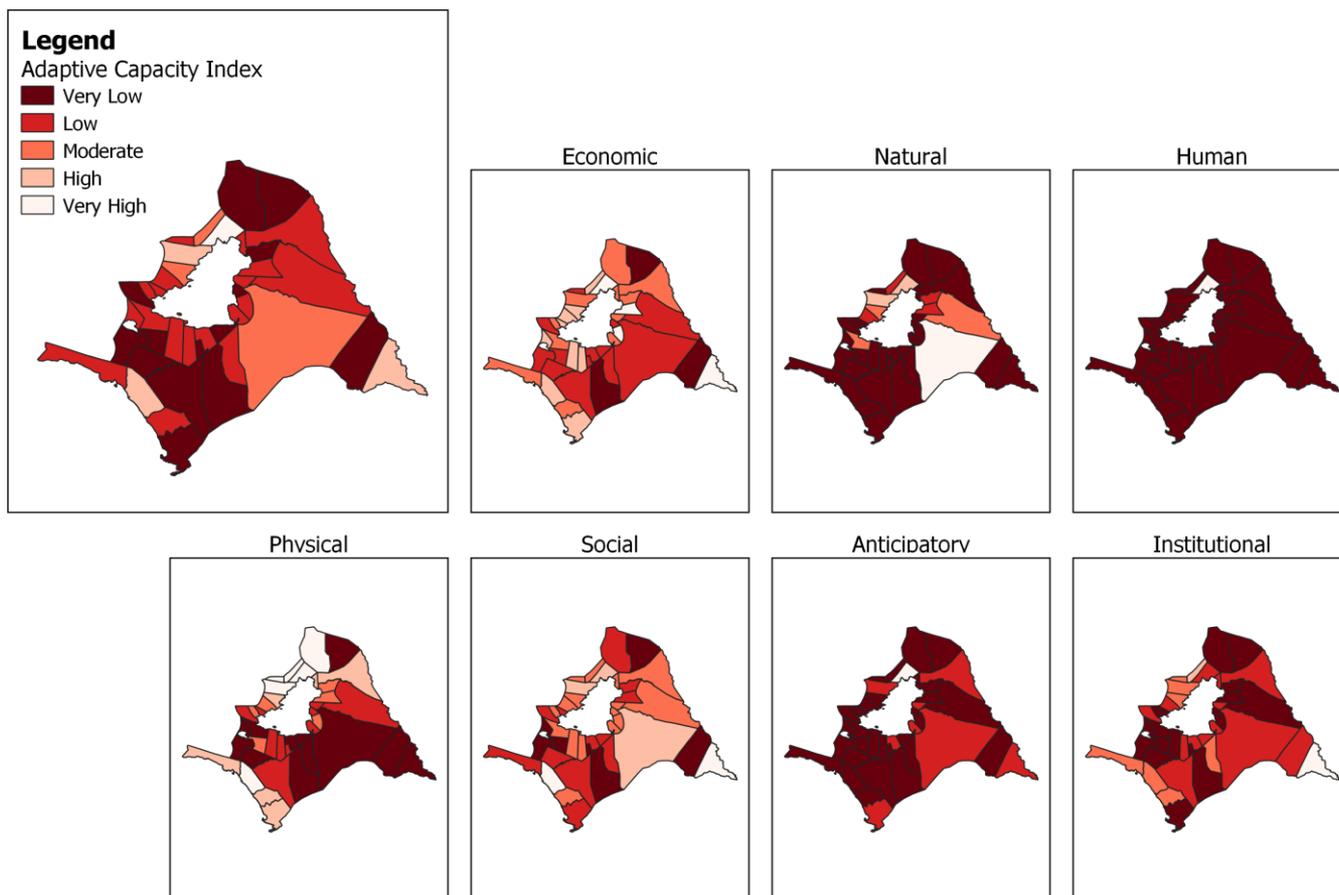
Adaptive Capacity: Composite map of AC (integration of the ff. capitals: Economic, Natural, Social, Human, Physical, Institutional, and Anticipatory)

Zamboanga Sibugay



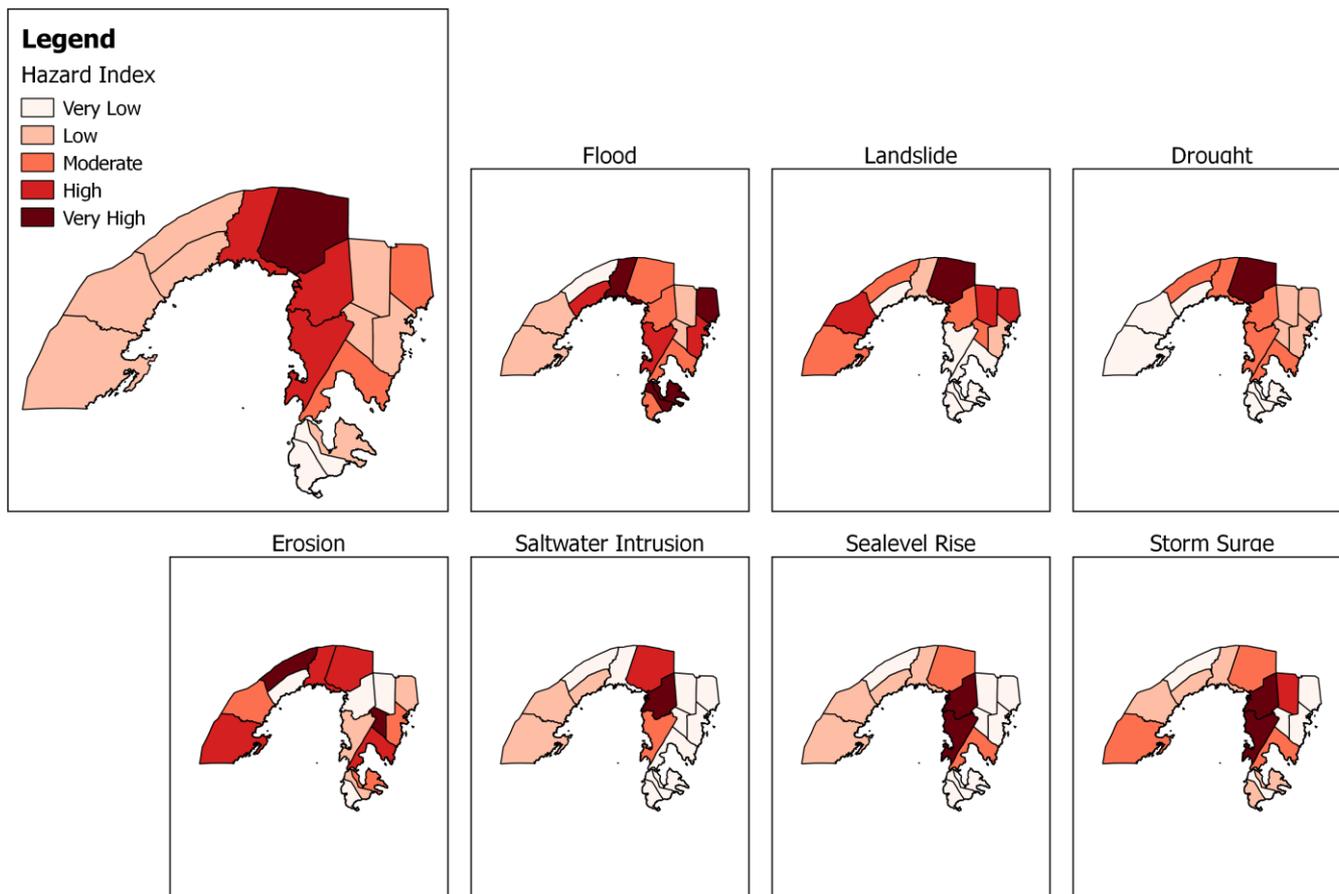
Adaptive Capacity: Composite map of AC (integration of the ff. capitals: Economic, Natural, Social, Human, Physical, Institutional, and Anticipatory)

Lanao del Sur



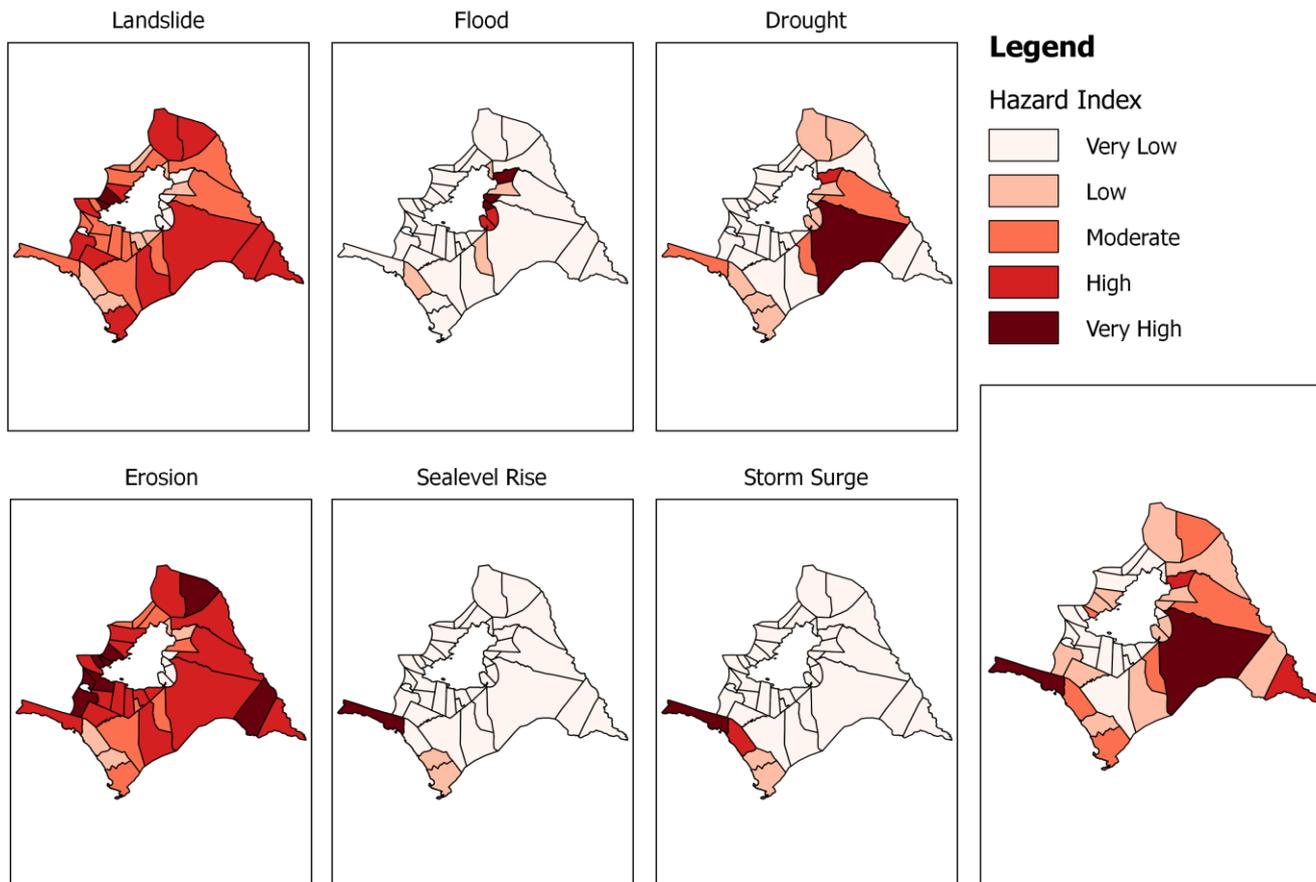
Exposure 2: Hazards: Spatially weighted hazard index map (shows municipality with have high hazard risk)

Zamboanga Sibugay of Region IX – Zamboanga Peninsula



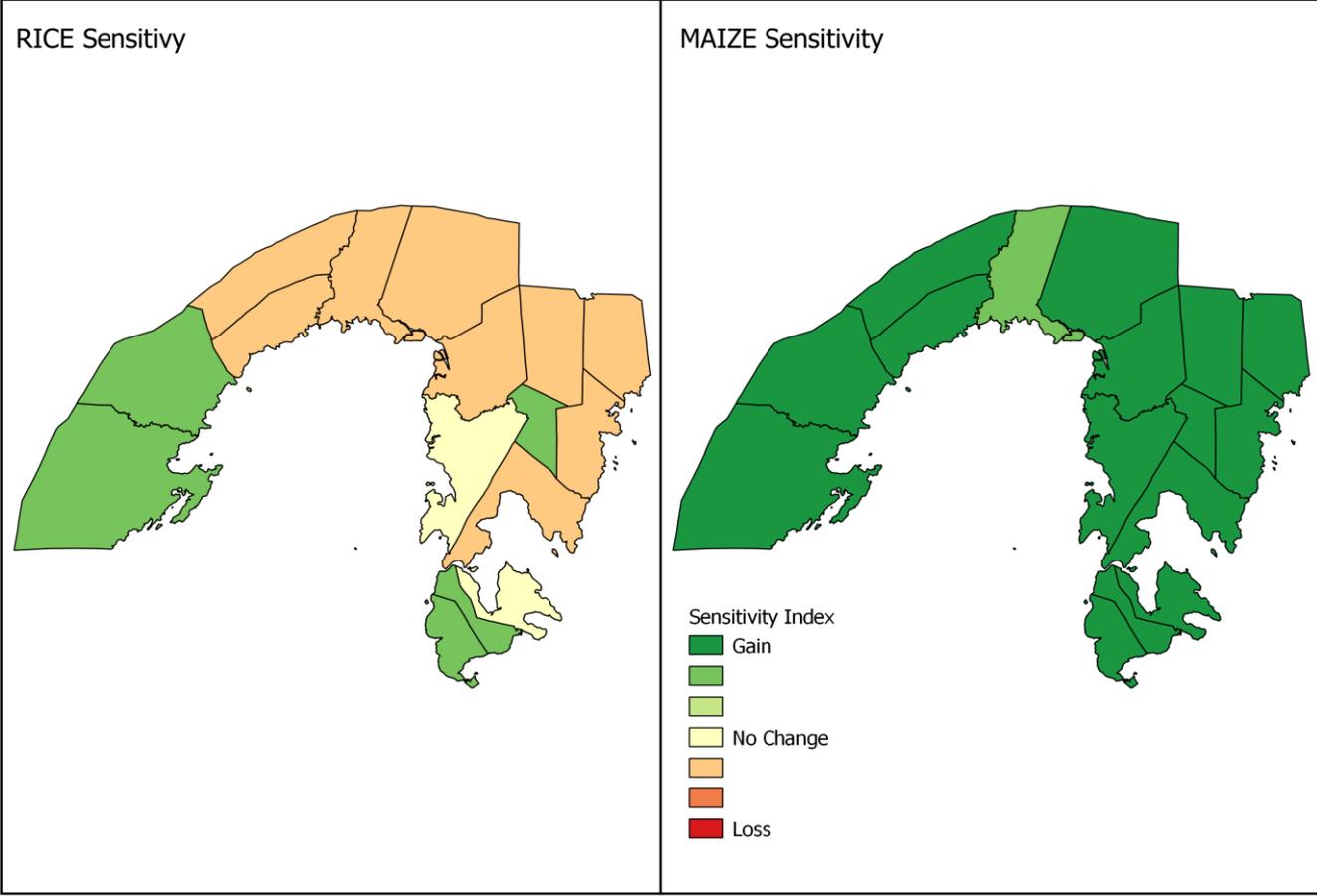
Exposure 2: Hazards: Spatially weighted hazard index map (shows municipality with have high hazard risk)

Lanao del Sur – ARMM/BOL



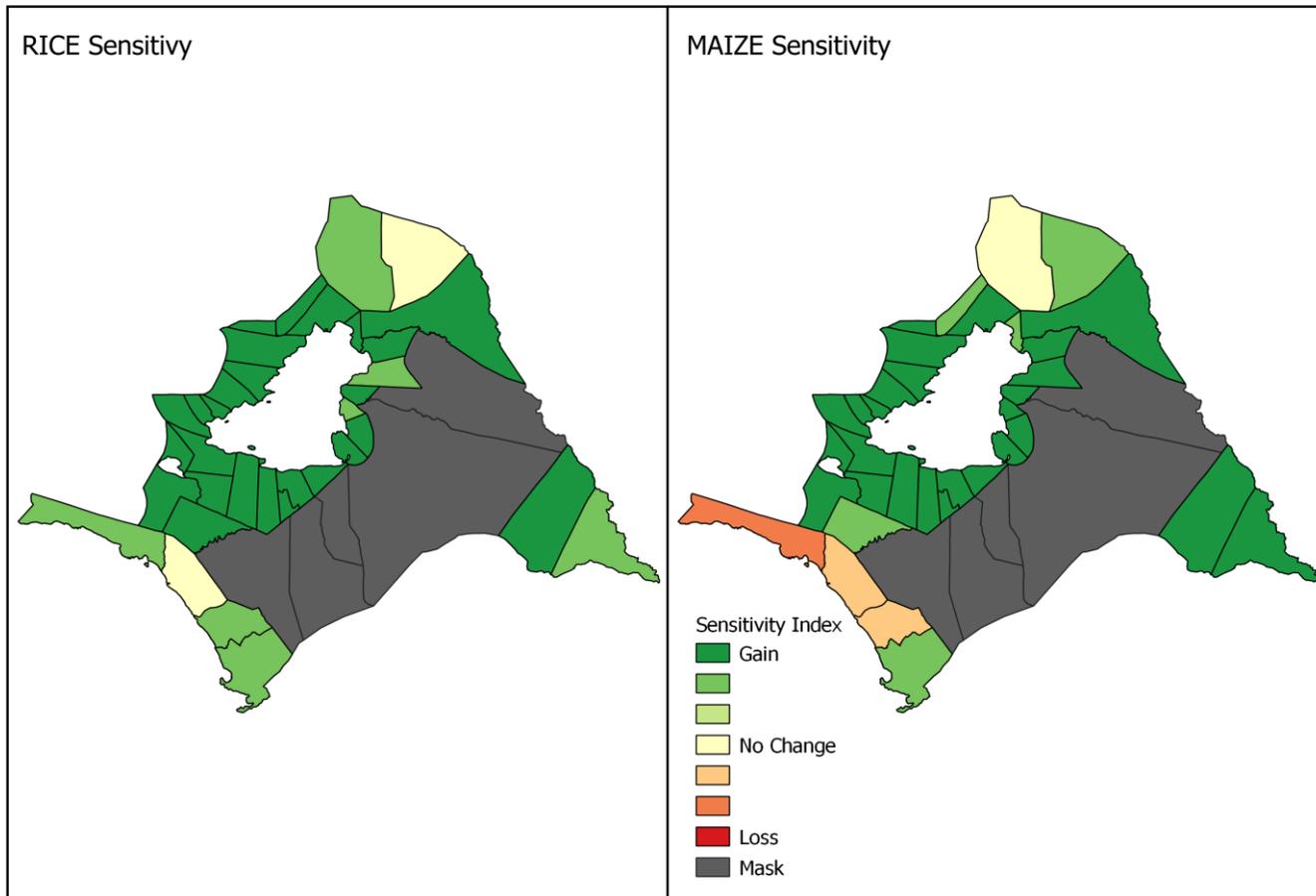
Exposure 1: Sensitivity: The increase or decrease of climatic suitability of selected crops to changes in temperature and precipitation

Zamboanga Sibugay

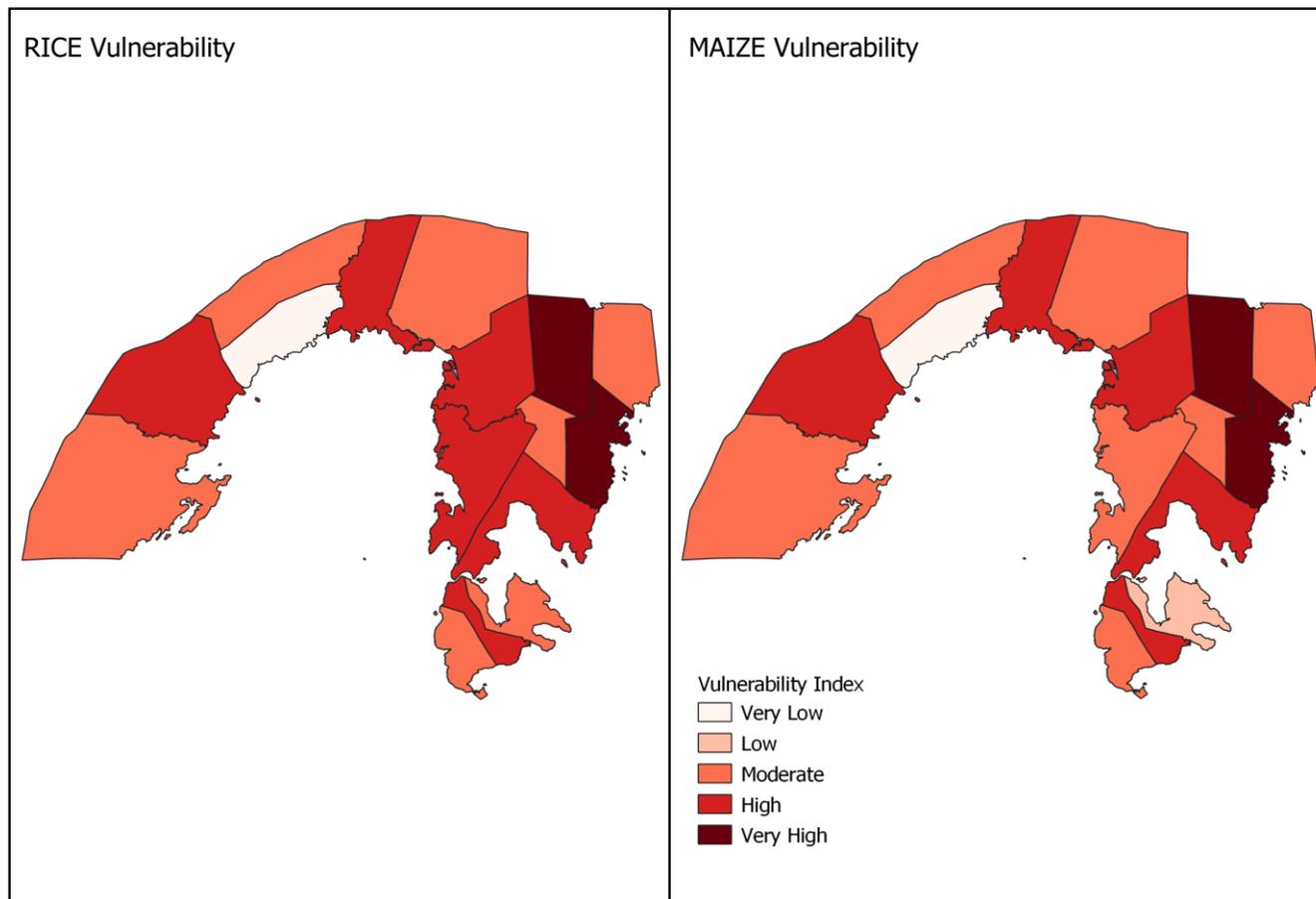


Exposure 1: Sensitivity: The increase or decrease of climatic suitability of selected crops to changes in temperature and precipitation

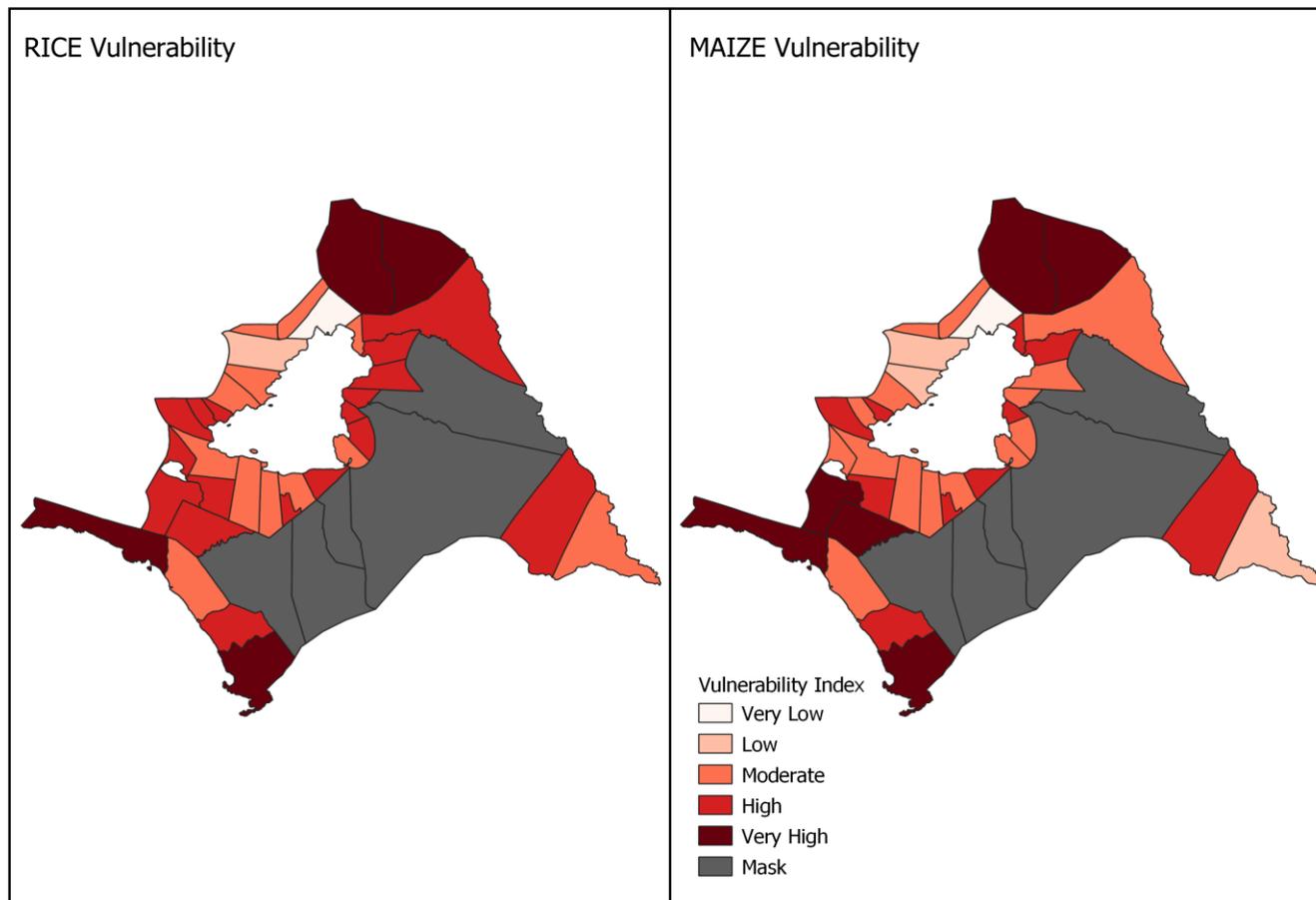
Lanao del Sur



Zamboanga Sibugay CRVA Map: Integration of Sens, Haz, and AC

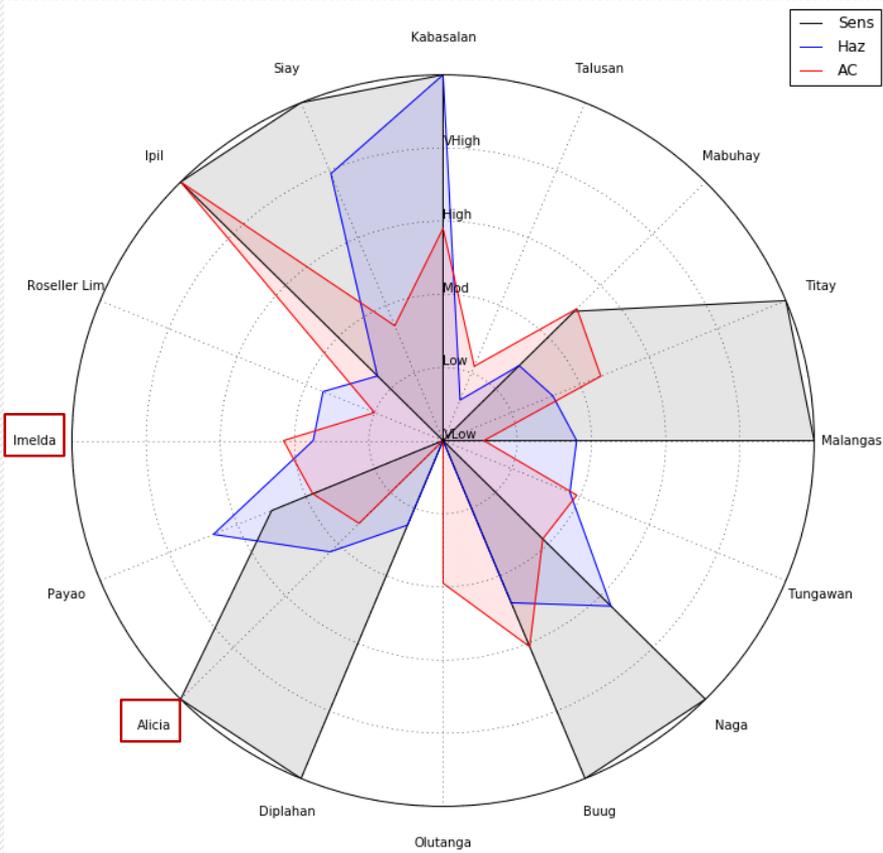


Lanao del Sur CRVA Map: Integration of Sens, Haz, and AC

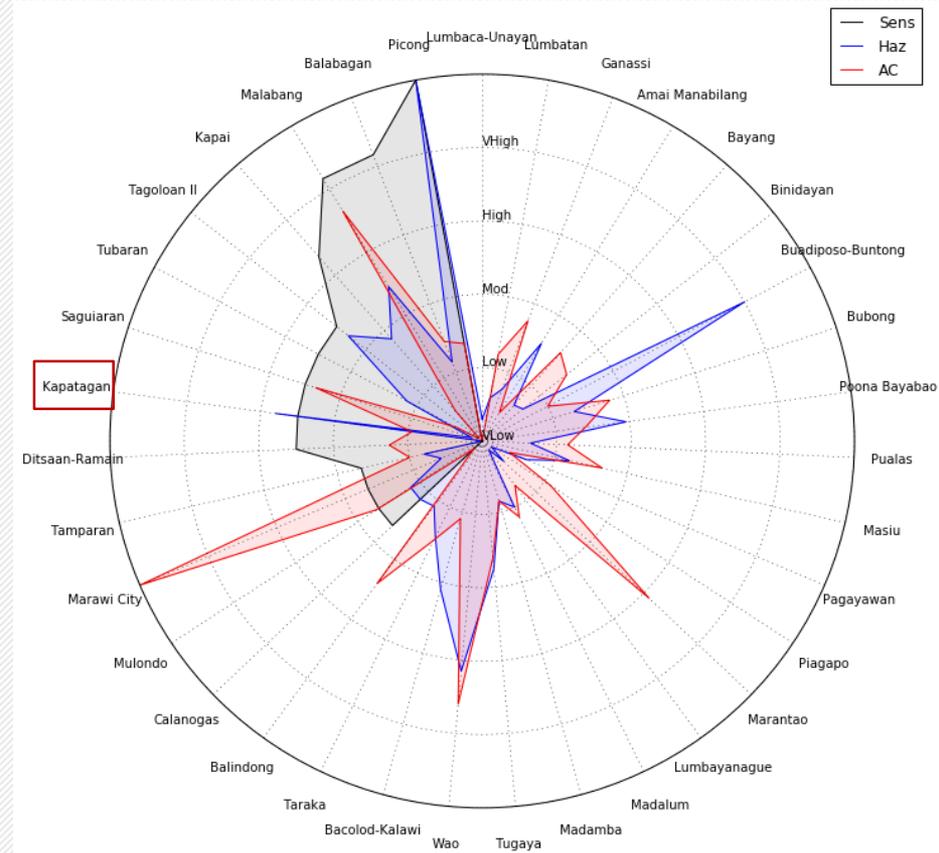


CRVA Radar Graph: Integration of Sens, Haz, and AC

Zamboanga Sibugay CRVA (Rice)



Lanao del Sur CRVA (Maize)



8 - Response to comments/questions from last BAR Review

Comments	Reply





THANK YOU!