

Overview of



The Regional Rice Initiative



Regional Rice Initiative

Designed to:

Contribute to Strategic Objective 2 (SO2) “Make agriculture, forestry and fisheries more productive and sustainable” as a pilot project in 2013

Focus countries:

Indonesia, Lao PDR, the Philippines





Regional Rice Initiative

Supports:

Rice farmers and producers in applying sustainable rice production practices to rice ecosystems and landscapes in order to increase rice production and resource use efficiency, and ultimately improve food and nutrition security





Regional Rice Initiative

Focusing on:

Importance of goods and services produced by and available from rice ecosystems and landscapes.





Regional Rice Initiative

Rice fields – **More than just rice!**

Component 1 – Aquaculture & fisheries *Rice-fish*
Water resources/irrigation

Component 2 – Biodiversity, Landscapes and
Ecosystem Services including Trees
outside forest

Component 3 – Sustainable Intensification of rice-
farming systems

Component 4 – Climate change adaptation and rice
cultures/heritages





Component 1

- A large number of aquatic organisms in rice ecosystems are utilized as food and provide essential nutrients that are otherwise not sufficiently present in the diets of local people.
- In two provinces of Lao PDR alone, a total of 95 organisms were documented from rice-based ecosystems.
- ✓ Recognizing a range of services/goods provided by rice ecosystems and associated biodiversity



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Water resources/irrigation *MASSCOTE*

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Component 2

- While recognizing the multi-functionality of agricultural systems, no single system can deliver the full range of goods and services that might be envisioned as desirable/adaptable to all agro-ecological zones.
- Need to developed an analytical framework for rice agro-ecological systems, providing a basis for developing Save and Grown curriculums and facilitating farmer-research dialogues

Relationships between 6 rice intensification/farming/crop management systems and 13 ecosystem services – *benefits that people obtain from ecosystems* – as key outcomes of multi-functional rice-based agricultural systems

ECOSYSTEM SERVICES	Conservation agriculture	Integrated Farming System	Organic agriculture	Holistic heritage agriculture	System of rice intensification (SRI)	Integrated pest management (IPM)
Diet diversity	●	●	●	●		
Carbon sequestration	●	●	●	●		
Cultural services		●		●		
Energy provision		●				
Genetic diversity			●	●		
Mitigation of GHGs	●	●	●	●		●
Pest control		●	●	●	●	●
Soil structure, fertility, erosion control	●	●	●	●	●	●
Resilience to climate disturbance				●	●	
Water quality	●	●		●	●	
Water quantity	●			●	●	●
Weed control		●	●	●	●	
Wild biodiversity & habitat provisioning			●	●		



Component 2

- Trees outside forest (TOF) studies conducted on rice production landscapes revealed benefits of TOF in (1) provision of food and other products for home consumption; (2) income generation; and (3) erosion control and stream water regulation





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Component 3

- *Save and Grow* principles integrated in Farmers' Field Schools (FFS) curriculums, including aquatic biodiversity elements
- **606** farmers supported (expecting additional **1,000** farmers to practice sustainable rice production approaches by the end of next year, some of them by the end of this year)

Results from 10 FFS in the Philippines: comparing *Save and Grow* and conventional farmers' practices

ITEM/FFS	REGION 10				REGION 12	AVERAGE
	BUKIDNON	LANAO NORTE	MISAMIS OR	MISAMIS OCC	S KUDARAT	
FFS SITE						
Number of FFS	2	2	2	2	2	
Municipality	Valencia City	Lala	Balingasag	Clarin	Tacurong City	
Barangay (1)	Nagbag-o	Pinuyak	Dumarait	Mialen	Grino	
Barangay (2)	Colonia	Simpak	Talusan	Kinangay S	Baras	
% INCREASE (DECREASE)						
Net Income	54.12	119.08	67.04	20.78	50.00	58.89
Yield	29.03	31.69	18.00	30.00	49.76	30.98
Cost of Production	-33.17	-47.05	-31.01	-25.32	-34.64	-34.80



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cultures/heritages *AMICAF, GIAHS*



Component 4



Rice Policy Simulations with Rice Economy Climate Change (RECC) Model

- Rice price volatility will increase if agricultural investment in ASEAN 8 countries will not grow during the projection period.
- Constant agricultural investment increase in 8 ASEAN countries will contribute to a decrease in international rice price volatility under future climate change, especially Thailand and Vietnam



Component 4



- **Provincial Agricultural Market (PAM) Model in the Philippines** – policy simulations to determine the impact of government agriculture expenditure on the domestic rice market under a changing climate
- **Climate change analysis in Lao PDR** – addressing climate risk to the rice sector and providing an opportunity for policymakers and private stakeholders to learn timely and effective adaptation actions, e.g. crop diversification, before risks spread across the country.



Component 4



GIAHS

Globally Important Agricultural Heritage Systems



- identified agricultural heritage sites with high agro-biodiversity of global significance, resilient farming systems and good practices for climate change adaptation in the Philippines and Indonesia
- promoted policies/programmes for dynamic conservation of agro-ecosystems, emphasizing a balance b/w conservation, adaptation and socio-economic development



Component 4



GIAHS

Globally Important Agricultural Heritage Systems



Recognition of rice ecosystems and multiple goods and services

- Led to economic gains for farmers
- Opened door for technical/financial assistance and collaboration
- Brought back/restored dying “heritage” values
- Nationally Important Agricultural Heritage Systems (NIAHS)



Regional Rice Initiative

C 1

C 3

C 4



**Weakness of the
pilot phase**

C 2



**Lack of synergies of
Components 1 to 4**

Phase II (integration in Save & Grow)

Producing more and better with less inputs in a sustainable way

Rice-fish
Rice-duck

Evidence

Knowledge

- - Inputs
- + Yield
- + Income
- + Sust.
- Studies

Policy and strategy formulation and implementation

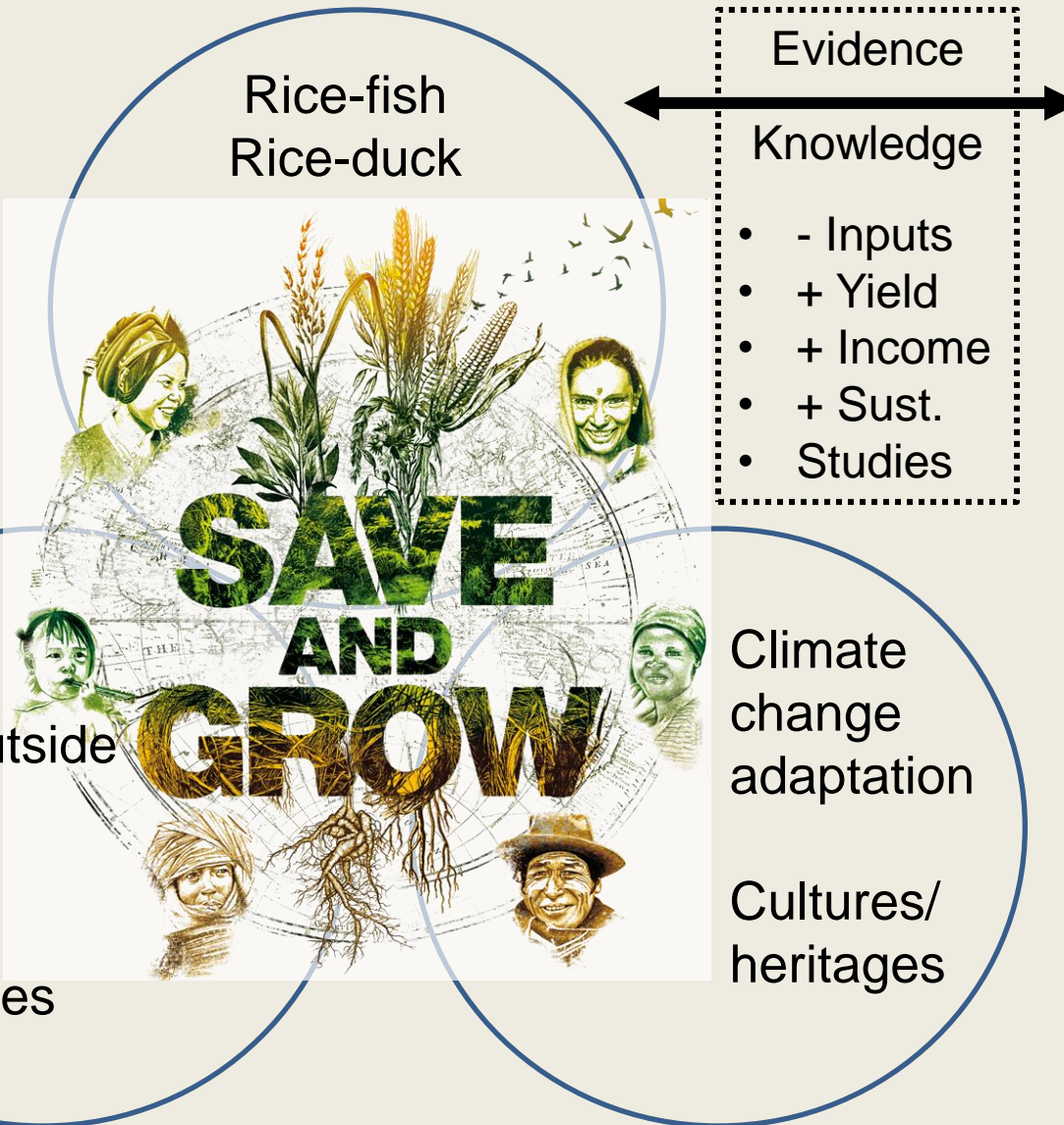
- National rice strategy/policy
- Pesticide policy
- Convention on Biological Diversity
- etc.

Trees outside forest

Rice-vegetables

Climate change adaptation

Cultures/heritages





A Regional Rice Strategy

A Vision for the Rice Economy

“Food-secure, better nourished and prosperous rice farmers and consumers in the Asia/Pacific region who benefit equitably from a vibrant, innovative and transformed rice sector that is more productive, efficient and environmentally sustainable by 2030”



A Regional Rice Strategy

- **6** Strategic Objectives
- **11** Themes and Strategic Options
- Support for (re)formulation and implementation of **national rice strategies or policies**
 - Myanmar ongoing
 - More countries – Indonesia, Lao PDR



A REGIONAL RICE STRATEGY FOR
SUSTAINABLE FOOD SECURITY
IN ASIA AND THE PACIFIC

FINAL EDITION



The Way Forward

- Continue to support farmers through Save and Grow integrated Farmers Field Schools and support them in applying sustainable practices to **produce more and better in quality/efficiency with less inputs in a sustainable manner, thereby increasing incomes and ultimately improving food and nutrition security**

The Way Forward

- Continue to build a **knowledge base and evidence on sustainability and resource use efficiency** to corroborate the effectiveness of the Regional Rice Initiative approach and seek opportunities to **replicate the model in other areas / countries, e.g. Africa** where both rice production and consumption are increasing

The Way Forward

- **National rice policies or strategies (re)formulated and implemented** drawing on the vision and strategic options suggested by the Regional Rice Strategy for Asia and the Pacific, while contributing to regional and global policy processes such as the Convention on Biological Diversity and Global Alliance for Climate-Smart Agriculture

Regional Rice Initiative – more than just rice!

