

THE OFFICIAL NEWSLETTER OF THE DA - ADAPTATION AND MITIGATION INITIATIVE IN AGRICULTURE (AMIA) PROGRAM • VOLUME 4 | ISSUE 1 • OCT - DEC 2023

YEARENDER 2023: DA CRAO Continues to Promote Climate Change Mainstreaming, Build Resilient Farming Communities through AMIA Program

In 2023, the Department of Agriculture's Climate Resilient Agriculture Office (DA CRAO) remained steadfast in its commitment to promote the mainstreaming of climate change in agri-fishery plans, programs, and projects, while building resilient farming and fishing communities through the implementation of the Adaptation and Mitigation Initiative in Agriculture (AMIA) Program.

The DA CRAO achieved significant milestones in 2023, working on two fronts—providing policy support and extending operational interventions—to enhance climate change resilience in the agri-fishery sector. Here are the highlights of the DA CRAO's accomplishments for 2023:

Support for Policy Formulation and Resource Generation

The DA CRAO played a pivotal role in steering climate change policy and securing approvals for crucial Green Climate Fund (GCF) projects. Notable projects include the Adapting Philippine Agriculture to Climate Change (APA)—the first GCF project for the Philippine agriculture sector for a grant worth USD 26.3 million—and the Agriculture Sector Readiness for Enhanced Climate

Finance and Implementation of Koronivia Joint Work on Agriculture in Southeast Asia Project. The office, together with PAGASA, and the DA Field Programs Operational Planning Division, Bureau of Soils and Water Management, Project Identification and Evaluation Division, and Project Development Service, among others, worked with the Food and Agriculture Organization for the APA Project. Meanwhile, it collaborated with the ASEAN Climate Resilience Network member states for the GCF Readiness Project.

Moreover, CRAO was at the forefront of ongoing collaborations spanning disaster resilience, climate information services, greenhouse gas inventory, and other climaterelated projects, contributing to mutually beneficial partnerships. The office has also driven initiatives to support the implementation of the Nationally Determined Contributions and actively participated in the delivery of commitments for policy-based loan packages, providing inputs for disaster risk management and climate change action programs, aligning the agri sector's commitment to global climate action.

Integration of Climate Change in Agri-fishery Plans and Programs

Driven by its commitment to increasing farmers' productivity and income through science-based tools, the DA CRAO under the AMIA Program developed Decision Support Tools (DSTs) for commodity investment planning and prioritization. These DSTs are important for identifying and evaluating climate change vulnerability, empowering planners and decision-makers at both local and national levels to integrate climate change in agri-fishery plans and programs. As of December 2023, a total of 64 Climate Risk Vulnerability Assessment (CRVA) Maps were completed, and the National Color-Coded Agricultural Guide (NCCAG) Map Version 2.0 was updated to maintain the system's accuracy and reliability. This tool was launched during the celebration of the 16th Annual Global Warming and Climate Change Consciousness Week in November.

Capacitation of DA RFOs on Institutionalization of Climate Information Services

To enhance the provision of climate information services (CIS), DA CRAO, through DA Regional Field Page 2

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DA AMIA celebrates 10th year, kicks off 16th Climate Change Consciousness Week

The Department of Agriculture (DA)'s Adaptation and Mitigation Initiative in Agriculture (AMIA) Program launched the 16th Annual Global Warming and Climate Change Consciousness Week on November 20, 2023.

Coinciding with DA-AMIA's 10th anniversary, Agriculture Secretary Francisco Tiu Laurel led the weeklong celebration focusing on the achievements of building climate resilient communities and implementing initiatives toward a productive Philippine agriculture for past 10 years under the theme "Bayanihan Para sa Klima: Page 3

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Office (RFO) 5 and its partners, developed the Agro-Climatic Advisory Portal (ACAP). ACAP, an online web platform to automate conversion of weather forecasts to easily generate farming and fishing advisories. The roll-out of ACAP in all regions started in 2023 and will continue to progress in 2024 to complement the development of a National CIS hub, a part of the ongoing Asian Development Bank Technical Assistance Output 1.1, Institutionalizing Climate Resilient Agriculture.

Direct Farming Community Assistance through AMIA Village Approach

The DA CRAO, under the AMIA Program and through DA RFOs,

directly assisted farming communities to improve adaptive capacity against climate change. The establishment of climateresilient villages, known as AMIA Villages, empowered farmers to manage climate risks while sustaining their livelihoods. As of December 2023, 181 AMIA Villages have been established, benefiting thousands of vulnerable farmers and fisherfolk in Luzon, Visayas, and Mindanao. These climate resilient communities have made significant positive changes and caused substantial benefits in the lives of some 27,243 farmercooperators, to date. When we consider the ripple effect on their families, the total number of beneficiaries extends to approximately 136,215 farmers and their families or individuals within the AMIA farming communities.

Mainstreaming AMIA in DA Plans and **Programs**

To enhance the implementation of climate change adaptation and mitigation measures in the agrifishery sector, the DA CRAO has been actively advocating for the mainstreaming of climate change and the AMIA Approach into the plans, programs, and budgets of the DA, in accordance with its policies. The MASAGANA Rice Industry Development Program in 2023 adopted the AMIA Approach, with Php 138 million allocated under the Rice Business Enterprises Program to support AMIA Villages. AMIA's CRVA framework was also included in key national plans, such as the Philippine Development Plan 2023-2028 and National Agriculture and Fisheries Modernization and Industrialization Plan.

CRAO's advocacy for mainstreaming climate change extends beyond the DA, as it supported the Department of Agrarian Reform's (DAR) capacity building for DAR local focal points for the implementation of its climate resilient farm productivity program. There were 3 successive sessions conducted in May to June 2023 for Luzon, Visayas, and Mindanao DAR focal points. These trainings highlighted the AMIA Village Approach, to demonstrate mainstreaming climate change, and the use of AMIA's DSTs for planning and investment.

For 2024, the DA CRAO, through the AMIA Program, commits to engage in more impactful activities and. together with its partners, continue to be a champion in building a climateresilient future for the farming and fishing communities across the Philippines. (Joy Calvar-Adarayan)

AMIA VILLAGES BY THE NUMBERS

AMIA VILLAGES PER PHASE

PHASE 1

PHASE 2

PHASE 3

PHASE 4

48 villages 100 villages

28 villages

5 villages

EXPOSURE OF AMIA VILLAGES TO CLIMATE-RELATED HAZARDS

AMIA Villages exposed to Erosion

DEC. 2022

in 55 provinces

DEC. 2023

AMIA VILLAGES ESTABLISHED in 59 provinces



MOST COMMON CRA PRACTICES IN AMIA VILLAGES	
Farm Diversification	181 AMIA VILLAGES
Use of Climate Information Services	173 AMIA VILLAGES
Organic Agriculture Practices	114 AMIA VILLAGES
Use of Stress-Tolerant Varieties	83 AMIA VILLAGES
Water Management Technologies	41 AMIA VILLAGES



DA launches updated color-coded agri map to help farmers address climate vulnerability and boost yield, income

As part of its continued efforts to help increase farmers' productivity and income through science-based decision-support tools, the Department of Agriculture (DA), through the Climate Resilient Agriculture Office (CRAO), has launched the updated version of its National Color-Coded Agricultural Guide (NCCAG) Map.

Agriculture Secretary Francisco Tiu Laurel Jr. and CRAO Director Alicia G. Ilaga led the launching of the NCCAG Map Version 2.0 during the opening of the DA's celebration of the 16th Annual Global Warming and Climate Change Consciousness Week last November 20, 2023 at the DA Central Office.

The NCCAG map is a database of map overlays that shows the natural suitability of economically important crops and the eight major hazards based on projected climate scenarios for 2050. It overlays data on soil properties, elevation, slope, rainfall pattern, temperature, and climate change-induced multihazards. The database features maps that are vital to crop growth and survivability such as water availability and climate data, as well

as location-specific information on socio-economic conditions. NCCAG has proven instrumental in advising farmers on crop selection for optimal production and identifying climate risks in agricultural areas. It also serves as a guide for national government agencies and local government units for the location-specific deployment of technologies and support services based on climate risks.

NCCAG Map Version 2.0 incorporates the latest maps from various authorized mapping agencies, introduces additional layers, and provides users with new interactive features, emphasizing statistical data integration.

Accurate and up-to-date data

DA CRAO Director Alicia G. Ilaga emphasized that updating the NCCAG Map, which was first activated and launched in 2017, was crucial to maintaining the system's accuracy and reliability.

"The thematic datasets used in the NCCAG Map are obtained from different mapping source agencies, which generate new sets of data every five years. Updating the map ensures that all information remains accurate and up-to-date," Dir. Ilaga stated. She added that this initiative aligns with the commitment to providing tools that assist in providing valuable insights and facilitate well-informed planning and decision-making processes regarding agricultural suitability, climate hazards, and land cover data.

New features

NCCAG Version 2 now features updated crop suitabilities and an additional crop, bringing the total number of economically important crops featured in the database from 20 to 21.

These include abaca, banana, cacao, cassava, coconut, coffee, corn, garlic/onion, legumes, mango, palm oil, papaya, pineapple, rice, rubber, sugarcane, sweet potato, taro, vegetables, yam, and bamboo—the latest addition. Additionally, the map provides updated data on eight climate-change-induced hazards.

The updated version introduces a

new layer called Rice Suitability Zones (RSZ), based on data from the Philippine Rice Information System (PRISM). This layer identifies current and potential expansion areas for rice cultivation and provides information on soil properties vital to rice growth. NCCAG Version 2.0 also integrates the Climate Risk Vulnerability Assessment (CRVA) Maps of 63 provinces nationwide and includes location and data on the DA's AMIA Villages.

Moreover, it introduces enhanced map interactivity features, focusing prominently on statistical data generation. Users can now choose from three distinct types of statistical data: (1) Crops Suitability + Multi-Hazards; (2) Crops Suitability + Land Cover; and (3) Multi-Hazards, providing a tailored and more user-friendly experience.

The updating of the NCCAG Map was a project under the AMIA Program through DA Regional Field Office 4B-Mimaropa.

The NCCAG Map Version 2.0 is available for public access at www.farmersguidemap.da.gov.ph. (Joy Calvar-Adarayan)



DA AMIA celebrates 10th

year... (From Page 1)

Bagong Bansang Matatag" and DA sub-theme "AMIA, Isang Dekada: Bayanihan tungo sa Matatag na Agrikultura."

"Addressing climate change is an immediate and critical global concern that demands our prompt attention and concerted action. President Ferdinand R. Marcos, Jr. emphasized the need for implementing measures to adapt

and mitigate the impacts of climate change across various sectors especially agriculture and production," Laurel said.

Laurel added that the celebration is significant and its theme emphasizes the importance of bayanihan or working hand in hand to address the effects of climate change and collectively fortify the country's agricultural sector. The agriculture chief cited DA- AMIA's pivotal component in securing a resilient and robust agricultural

sector as a platform of partnership and innovation for climate action.

DA-Climate Resilient Agriculture Office (CRAO) Director Alicia Ilaga, on the other hand, discussed the lineup of activities for the celebration including the Training on Climate Information Service for Regional Focal Persons, Philippine Resilience Award, and Policy Talks for the rice sector. "Ito ay inaalala natin upang mabigyan ng importansya ang pagtugon sa impacts ng climate change at

global warming. Kung hindi pa kayo naniniwala, sabi nga climate change is real, it is here, and it impacts everybody," Director Ilaga said.

Sen. Aquilino "Koko" Pimentel, represented by his wife Kathryna Yu-Pimentel, congratulated the DA for implementing the AMIA Program and AMIA villages that served as model communities for best practices and technological and institutional innovations. (Gumamela Celes Bejarin, DA-AFID)



A 2023 Triump: Women of AMIA Shine Big in the Prestigious 2023 **Philippine Resilience Awards for Women**

Among the biggest highlights of 2023 for the Department of Agriculture (DA) Adaptation and. Mitigation Initiative in Agriculture (AMIA) Program is having its "Women of AMIA" honored with the prestigious 2023 Philippine Resilience Awards for Women in October 2023.

DA Climate Resilient Agriculture Office (CRAO) Director Alicia G. Ilaga bagged the award in recognition of her commitment to building

community-based resilience in vulnerable farming communities through the AMIA Program.

Joining Dir. Ilaga in the roster of awardees is Ms. Mila V. Bogñalbal, a farmer-cooperator of the DA Regional Field Office 5's AMIA Village in Tiwi, Albay, who was acknowledged for her efforts in promoting resilient food systems and sustainable livelihood through the implementation of climateresilient agricultural practices.

The 2023 Philippine Resilience Awards is a pioneering national awards program that honors and promotes resilience-building excellence. The Women Category recognizes key movers of initiatives that emphasizes inclusivity of women and all genders in climate and disaster resilience action. Dir. Ilaga and Ms. Bogñalbal were among the ten pioneer recipients of the Award. Meanwhile, numerous AMIA regional focal points and farmer-cooperators were featured

among the semi-finalists and finalists. The Philippine Resilience Award was organized and given by the Climate Change Commission, in collaboration with the Office of Senator Loren Legarda, Philippine Commission on Women, National Resilience Council, and SM Prime Holdings, Inc., among others.

Let's take a look at all the women of AMIA who emerged as semi-finalists, finalists, and recipients of the Philippine Resilience Award!

















CONGRATULATIONS WOMEN OF AMIA CHAMPIONS!

2023 Philippine Resilience Awards for Women Awardees



DIR. ALICIA G. ILAGA

DA Climate Resilient Agriculture Office (CRAO) Director

A visionary leader dedicated to advocating for climate-resilient agriculture, Dir. Ilaga has been leading for more than a decade the implementation of the AMIA program to respond to the challenges brought by

climate change in the agri-fishery sector, and to mainstream climate resiliency in DA policies, programs and investments. As Director of CRAO, she plays a key role in the DA's development and execution of various climate action strategies that are responsive to the country's growing requirements in anticipation of the challenges posed by climate change.

MILA V. BOGÑALBAL

DA Regional Field Office 5 AMIA Village Farmer-Cooperator

Ms. Bogñalbal is the President of the Joroan Farmers and Fisherfolks Association (JFFA), a farmer group supported under the DA AMIA Program since 2021. A dedicated and passionate leader, Ms. Bogñalbal has been instrumental in

helping her fellow community members bounce back from the tragedy caused by Super Typhoon Rolly in 2020 by forming the JFFA. As President of JFFA, she helped her fellow members boost their productivity and income through the promotion and adoption of appropriate climate resilient agriculture practices and technologies based on climate risks.

2023 Philippine Resilience Awards for Women Finalist



CARMELITA FANTILANAN

AMIA Focal Person DA Regional Field Office 6

2023 Philippine Resilience Awards for Women Semi-Finalists



GINA DAPAT

DA Regional Field Office 7 AMIA Village Beneficiary President, Fatima-Bandilaar Farmers' Association



MARILOU CELI

DA Regional Field Office 1 AMIA Village Beneficiary resident, Anda Mushroom Grower and Organic Farmers Association



GRACITA PADAYHAG

DA Regional Field Office 7 AMIA Village Beneficiary Member, Tubod Vegetable Growers Association





In Abatan, Buguias, Benguet, a steadfast and compassionate farmer named Daguio Atopen has become a beacon of inspiration within the Northern Hills Farmers Association and his local community. Atopen's innovative knack for converting fruit and vegetable waste, coupled with indigenous materials, into valuable farm resources, has set a remarkable example.

The year 2021 brought its share of challenges for Atopen, primarily in escalating fertilizer costs, a fundamental necessity for plant growth. He recalls, "I had no choice but to acquire it for the sake of my crops." Adding to his woes were unpredictable weather patterns that resulted in crop damage and farm erosion. However, it was these very setbacks that sparked Atopen's resourcefulness and ingenuity.

The pivotal moment in Atopen's farming journey arrived with the introduction of the AMIA Program. This initiative provided Atopen and his organization with vital training in climate-resilient agricultural practices, including organic farming, fertilizer formulations, Good Agricultural Practices (GAP), and diversified farming through the Climate Resilient Field School (CRFS). Additionally, their organization received support for a cattle production project, marking the inception of Atopen's venture with a single cattle as starting capital. The program also introduced agroforestry and water-saving technologies, supplying coffee and lemon seedlings, water tanks, pumps, and engine sets.

Recognizing the inherent value in these opportunities and newfound knowledge, Atopen resolved to employ a waste-resource approach through vermicomposting, declaring, "My only plan is to produce for my farm, not knowing the other side of it, which is a good start for business too."

He embarked on the journey of collecting cattle waste, fruit and vegetable peelings, and locally available materials to establish a 3-span vermicompost in early 2022. This humble initiative soon expanded to four spans with larger capacities. As of January 2023, Atopen has successfully harvested approximately 53 sacks or 2,090 kilos of Vermicast, satisfying his crop's fertilizer requirements and staunchly combating erosion on his farm.

Encouraged by the surging demand for his vermicompost, Atopen received orders from prominent NGOs like the GoodFoodCommunity and neighboring barangays. This unforeseen commercial interest has ignited his aspirations to transform his vermicomposting endeavor into a thriving business.

With heartfelt gratitude, Atopen extends his appreciation to Department of Agriculture Regional Field Office-CAR and the AMIA team, stating, "You always guided, supported, and molded us all the way to becoming more resilient villagers of Buquias, Benquet." (Crisante Rosario, AMIA CAR)

This article was edited as part of the report on the results of a synthesis workshop titled, "Learnings from the Climate Change Adaptation Efforts of IIRR and DA-AMIA in the Philippines" conducted on October 10-13, 2023 under the IIRR-ClimBeR Proiect.



AMIA, IIRR document lessons on climate change adaptation efforts

The DA Adaptation and Mitigation Initiative in Agriculture (AMIA) coorganized with the International Institute of Rural Reconstruction (IIRR) a synthesis workshop aimed at documenting and sharing the outcomes, lessons learned, best practices, innovations, and success stories from climate change adaptation projects of AMIA and IIRR in the country.

The activity, held in Tagaytay City, Cavite from October 10 to 13, 2023, was participated by DA AMIA regional focal persons and communications staff nationwide as well as representatives from IIRR.

The workshop agenda featured a range of activities, including plenary sessions, focus group discussions, and field visits to IIRR's learning sites in Cavite, facilitating in-depth engagement with climate change adaptation efforts.

The activity was conducted as part of the IIRR-Building Systematic Resilience against Climate Variability and Extremes (ClimBeR) Project.

AMIA, R1 organize climate information service conference to promote resilient agriculture, safer communities

In an effort to further promote the use of climate information services (CIS) for agriculture, the Adaptation and Mitigation Initiative in Agriculture (AMIA) Program Regional Field Office (RFO) VI and the Rice Watch Action Network Inc (RWAN) jointly organized a CIS conference for local government units (LGUs) and other partners on December 18, 2023, in Iloilo City.

The conference, conducted in collaboration with the Department of Science and Technology (DOST) PAG-ASA and with support from the DA Climate Resilient Agriculture Office (CRAO), carried the theme "Climate Information Service Towards Resilient Agriculture and Safe Communities."

The event featured three sessions, comprising presentations, panel

discussions, and an open forum, aimed at enhancing the understanding and appreciation of CIS by LGUs and other relevant partners.

A significant highlight of the conference was the ceremonial signing of the Memorandum of Understanding (MOU) between DA RFO VI and its Western Visayas LGU partners that implement AMIA Villages, ensuring the sustainability of CIS operations and continued support for the implementation of AMIA villages.



#AMIANewsInBrief

The latest news about the AMIA Program as implemented by DA-AMIA Regional Field Offices Compiled by: Quennie May Camu



30 members of the Liwan East Farmers Association, a DA-CAR AMIA Program supported farmer group in Rizal, Kalinga, successfully completed their Season Long Training under the Climate Resilient Field School on Rice and Livestock Production last November 2023. Read more at: f @amiacordillera



DA RFO 1 AMIA Program, in collaboration with the Geographic Innovations for Development Solutions, Inc., has initiated a series of training sessions for local government unit representatives aimed at updating the Climate Risk Vulnerability Maps in the provinces of Ilocos Sur, La Union, and Ilocos Norte. Read more at: **f** @climatechange.da.ilocos



The DA RFO 2 Climate Change (CC) Adaptation Mitigation Initiative in Agriculture (AMIA) Program, in a decisive move towards fostering sustainable agriculture practices, spearheaded the crafting of the logical framework for the CC-AMIA Program. Read more at:

☆ Cagayan Valley AMIA - CREATE



The DA CALABARZON, through the AMIA Program, conducted an orientationworkshop to capacitate the officials and staff of the Department of Agrarian Reform 4A on the AMIA Decision Support Tools, valuable for informed decision-making in the agriculture sector. Read more at:

@AMIA.4A



The DA RFO 5 AMIA Team facilitated a Climate Information Service (CIS) training course participated by different agriculturist and technicians from the local governments of Camarines Norte, Camarines Sur and Albay. The training was organized by DA Agricultural Training Institute RFO 5. Read more at: (1) @daamiarfo5



The Office of Sangguniang Bayan of San Lorenzo, Guimaras has declared every Thursday as AMIA Market Day in the town. The initiative, launched on October 19, 2023, involved five local associations and aimed to strengthen agricultural sustainability and community development in the area. Read more at: (1) AMIA Western Visayas



DA RFO 7, through the AMIA Program, turned over on December 7, 2023 some fifty-eight heads of heritage chickens and sixteen sacks of chicken feeds to the members of the Fatima Bandilaan Farmers Association AMIA Village at Baragangy Bagay, Daanbantayan, Cebu. Read more at:

@AMIASIETE



The DA RFO 8 initiated a bamboo planting project at selected sites enrolled under the AMIA Program to address soil erosion and landslide concerns. This initiative coincided with the National Bamboo Month, underscoring bamboo's multifaceted potential. Read more at: 👔 @agri.region8



CAGAYAN DE ORO CITY - A team from the Asian Development Bank Technical Assistance Project paid a courtesy visit to DA RFO 10 Regional Executive Director Carlene C. Collado on November 7, in this city, for a table discussion on the possible scaling up of agribusiness value chain of DA RFO 10 AMIA Village in Bukidnon.
Read more at:

AMIA-Region 10



The DA RFO 11 Research Division, through the AMIA Program and in partnership with the Bureau of Fisheries . and Aquatic Resources Region 11, formally launched the first Agricultural – Aquaculture (Marine) AMIA Village in the Philippines located at Brgy. Talisay, San Isidro, Davao Oriental on November 10, 2023. Read more at: 👔 @amia0nse



In celebration of the 16th Annual Global Warming and Climate Change Consciousness Week, the DA RFO 12 Department of Environment and Natural Resources, conducted a joint tree and bamboo planting activity on November 23, 2023 at Brgy. Reyes and



The DA RFO Caraga, through the AMIA Program, successfully conducted a project briefing to discuss the . establishment of an AMIA village at Brgy. Sabang-Gibong, town of Talacogon, Agusan del Sur last December 6, 2023. The initiative aimed to increase the adaptive capacity of the farmers in the area, who are vulnerable to various climate risks. Read more at: 🕧 caragamia



