

Final report

Small research and development activity

project	Agribusiness Master Class - Philippines
project number	AGB/2019/101
date published	28 October 2021
prepared by	Lilly Lim-Camacho, Michaela Cosijn, Anton Simon Palo,
co-authors/ contributors/ collaborators	Oleg Nicetic, Gomathy Palaniappan, Tiago Wandschneider, Steven Crimp, Rodd Dyer, Phillip Currey, Princess Alma Ani
approved by	Howard Hall
final report number	FR2021-059
ISBN	978-1-922635-68-6
published by	ACIAR GPO Box 1571 Canberra ACT 2601 Australia

This publication is published by ACIAR ABN 34 864 955 427. Care is taken to ensure the accuracy of the information contained in this publication. However ACIAR cannot accept responsibility for the accuracy or completeness of the information or opinions contained in the publication. You should make your own enquiries before making decisions concerning your interests.

© Commonwealth of Australia 2021 - This work is copyright. Apart from any use as permitted under the Copyright Act 1968, no part may be reproduced by any process without prior written permission from the Commonwealth. Requests and inquiries concerning reproduction and rights should be addressed to the Commonwealth Copyright Administration, Attorney-General's Department, Robert Garran Offices, National Circuit, Barton ACT 2600 or posted at http://www.ag.gov.au/cca.

Contents

1	Acknowledgments	3
2	Executive summary	4
3	Introduction	6
3.1	Rationale for AMC Philippines	6
3.2	Objectives	6
3.3	Project team	7
4	Program design and content	9
4.1	ISP short course on agribusiness and value chain leadership	9
4.2	AMC Program Design	11
4.3	AMC Program Content and Resources	12
5	Evaluation and impacts	18
5.1	Evaluation	18
5.2	Scientific impacts	19
5.3	Capacity impacts	19
5.4	Community impacts	19
5.5	Communication and dissemination activities	19
6	Conclusions and recommendations	21
6.1	Key design principles	21
6.2	Challenges and opportunities	22
7	References	23
7.1	References cited in report	23
7.2	List of publications produced by project	23
8	Appendixes	24
8.1	Appendix 1: Participant list	24
8.2	Appendix 2: Evaluation reports	26

1 Acknowledgments

The AMC Philippines team would like to thank the following for their support and championing:

- The ACIAR Country Management team, in particular Ms Mai Alagcan
- The PCAARRD Executive team, in particular Dr Reynaldo Ebora, Dr Fezoil Decena, Dr Ernie Brown and Dr Melvin Carlos
- The DFAT Philippines Country Office
- The employer institutions for our AMC graduates
- Our guest speakers and case study participants

2 Executive summary

The Agribusiness Master Class (AMC) aims to develop participant's knowledge of principles and practical analytical skills needed to apply market, consumer and value chain research methods to real-world agribusiness problems.

It is a vehicle to build future leaders and collaborators in inclusive business among researchers, policy makers and private sector managers in the Philippines. Initially piloted in Vietnam in 2015, the AMC has since been held in Myanmar, the Pacific, and now – the Philippines.

AMC in the Philippines has been developed and delivered by Commonwealth Scientific and Industrial Research Organisation (CSIRO), Foodlink Advocacy Cooperative (FAC), Philippine Council for Agriculture, Aquatic and Natural Resources Research and Development (PCAARRD) and the University of Queensland (UQ).

The objectives of the AMC Philippines project are:

- Develop and deliver short-course training in key agribusiness research, management and leadership concepts for PCAARRD Industry Strategic Science and Technology Plan (ISP) managers;
- 2. Adapt the Agribusiness Master Class (AMC), including new modules, content and case studies to suit the learning needs and contexts in the Philippines; and
- Deliver and evaluate the Agribusiness Master Class with a focus on analytical capability to identify opportunities and partners for inclusive agribusiness-led development in value chains in the Philippines.

The project was delivered in two parts, a short course on agribusiness leadership with Industry Strategic Plan (ISP) Managers of PCAARRD, and a full program run over three modules.

Tailoring the AMC to the Philippines

The approach and content of the Philippines AMC was based on assessment of needs by the partners, against what the existing AMC and Markets for the Poor (M4P) material provided. The team identified that the Philippines AMC needed to have a stronger focus on applications of agribusiness and value chain practice, as opposed to a heavy leaning on research skills.

This was supported by the backgrounds of AMC participants, having a mix of academic, business, and government representatives.

The following are key principles used for designing and delivering AMC Philippines:

- 1. <u>Critical thinking:</u> AMC and ISP participants were introduced to systems thinking as a foundational piece and encouraged to challenge resource persons along the way.
- 2. <u>Strength in diversity:</u> The AMC cohort was selected to be a diverse group of experts, spanning the Philippine archipelago. Content knowledge is not only drawn from resource persons and guest speakers, but also from the participants themselves.
- 3. <u>Grounded learning:</u> A vital part of design was ensuring that participants learned from actual value chain actors, within the context of their businesses and operations. Interaction with actual value chain actors on the ground within their respective contexts provided much nuance to understanding value chains.
- 4. **Shared learning:** Learning from peers was weighted equally, if not more, to learning from resource persons and was seen as a powerful mode of developing capacity and skills. On average, 50% of sessions were spent working with their peers, within project groups and outside of them.

- 5. <u>Impact-led learning:</u> Module content was selected because of their context relevance for Philippine agriculture. Self-awareness and system-awareness was a key starting point for the ISP short course, in order to help participants identify their place and role in creating change.
- 6. **Shadow spaces:** Participants are encouraged to self-organise and are given time and space to form bonds and pursue interests not directly within the scope of a module.

The Stats



PCAARRD ISP managers completing the tailor-made agribusiness leadership short course. Agricultural engineering, crops, livestock, inland aquatic, forestry, technology transfer, socio-economics, communication and executive divisions were represented.



<u>Participants</u> for the full Agribusiness Master Class – 14 participants from the academe, 7 from PCAARD, 7 from the private sector (farming, agribusiness, consultancy), 1 NGO and 1 government (policy). Strong female representation with 22 females and 8 males.



<u>Value chain case studies</u> conducted by ISP and AMC participants as part of hands-on, practical capacity building where participants apply learning through field work.



Resource persons and guest speakers who have shared their insights with participants in both ISP and AMC. Guest speakers include private sector, government (Philippine and Australian), international research and farming representatives.

3 Introduction

Value chains have the power to transform livelihoods of smallholder farmers. But this can only happen if they foster an environment inclusive of the needs of farmers, while meeting the priorities of businesses along the chain.

The Agribusiness Master Class (AMC) aims to develop participant's knowledge of principles and practical analytical skills needed to apply market, consumer and value chain research methods to real-world agribusiness problems.

The Agribusiness Masterclass (AMC) concept was first developed and piloted by ACIAR in 2014-15, with the aim of developing research skills to address agribusiness challenges for developing countries. First applied in Vietnam, the AMC has also been adapted and delivered in Myanmar (AGB-2015-030) and the Pacific. More recently, ACIAR and its partners have recognised the need to update the AMC content, alongside tailoring the Markets for the Poor (M4P) Toolbook by DFID (AGB-2018-121).

3.1 Rationale for AMC Philippines

The program of work on developing vegetable and fruit value chains in Southern Philippines (including AGB-2012-109) identified the opportunity for capacity building of government, non-government and the private sector, particularly in coordination with leading national agricultural research institutions such as the Philippine Council for Agriculture, Aquatic and Natural Resources Research and Development (PCAARRD). Reflections from this program of work point to the importance of learning, networks, empowerment and ownership across the range of stakeholders (communities, private sector, government and researchers) to sustain and enhance the impact of the body of work.

Discussions with in-country partners and other stakeholders also identified the need to 'bridge the gap' between researchers and the private sector in order to deliver more impactful outcomes for farmers, communities and industry. This is particularly pertinent in the current innovation environment in the Philippines, where technology development and delivery aimed at supporting farmers and agribusiness is rapidly taking place. PCAARRD in particular, highlighted the opportunity to augment their technology transfer function to better harness connections with the private sector in delivering impact for the agricultural sector off the back of its research and development activities.

3.2 Objectives

The aim of AMC Philippines is to develop capabilities in inclusive agribusiness research, leadership and collaboration with selected researchers, policy makers and private sector managers associated with PCAARRD and the ACIAR agribusiness research and innovation in the Philippines.

To achieve this aim, the AMC delivered on the following objectives:

- Develop and deliver short-course training in key agribusiness research, management and leadership concepts for PCAARRD Industry Strategic Science and Technology Program (ISP) managers;
- 2. Adapt the Agribusiness Master Class (AMC), including new modules, content and case studies to suit the learning needs and contexts in the Philippines; and
- Deliver and evaluate the AMC with a focus on analytical capability to identify opportunities and partners for inclusive agribusiness-led development in value chains in the Philippines.

3.3 Project team

AMC Philippines was designed and delivered by a team of international and domestic experts in agribusiness management and value chains.

Name	Agency	Role in Project
Lilly Lim-Camacho	CSIRO	Project lead; Program design; Coordination; Content development; Delivery; Mentorship; Oversight
Anton Simon Palo	Foodlink Advocacy Cooperative	Program design; Coordination; Content development; Delivery; Mentorship; Oversight
Michaela Cosijn	CSIRO	Program design; Content development; Delivery; Mentorship
Oleg Nicetic	University of Queensland	Program design; Content development; Delivery; Mentorship
Rodd Dyer	FocusGroupGo	Program design; ISP content development and delivery
Princess Alma Ani	PCAARRD	Program design; Coordination; Monitoring and Evaluation; Oversight (PCAARRD)
Mai Alagcan	ACIAR	Program design; Mentorship; Oversight (ACIAR)
Tiago Wandschneider	Consultant	Content development and delivery (Module 1 – Value chain frameworks and analysis)
Phil Currey (TBC)	University of Queensland	Content development and delivery (Module 1 – rapid market appraisal)
Gomathy Palaniappan	Consultant / University of Queensland	Content development and delivery (Module 2 – community development and social inclusion)
Steven Crimp	Climate Smart Solutions / ANU	Content development and delivery (Module 3 – Climate risk in value chains)

In addition to the above, guest speakers were invited throughout the program to enrich content with real-world applications.

Name	Position	Topic
Dr Dindo Campilan	CIAT	Leadership, ISP short course
Ms Maricel Quilao	Honda Cars Philippines	Leadership, ISP short course
Mr Leopold Joseph Janer	Professional Insurance and Financial Advisors Association of the Philippines	Leadership, ISP short course
Dr Fezoil Luz Decena	Director, PCAARRD Institution Development Division	Closing remarks, Module 1
Dr Ernie Brown	Director, PCAARRD Socio-Economics Research Division	Opening remarks, Module 2
Mr Crisanto "Boysie" Sabino	Executive Director, East West Seed Foundation	Panel member, Inclusion, Module 2
Ms Caroline Grace Pedragosa	Development Consultant	Panel member, Inclusion, Module 2
Mr Stephen Arlo Lapid	OIC-Chief Post harvest and marketing unit, Bureau of Fisheries and Aquatic Resources Region 3	Panel member, Inclusion, Module 2
Ms Sophie McPhate	DFAT Third Secretary	Inclusive value chains, Module 2
Ms Donna Cariño	Institute for Social Entrepreneurship Asia	Panel member, Evaluating interventions, Module 3
Mr Rapa Lopa	President and CEO, Restart Micro- Enterprise Inc.	Panel member, Evaluating interventions, Module 3
HE Steven Robinson AO	Australian Ambassador to the Philippines	Supporting future leaders through Australia's Aid Program, Module 3
Dr Reynaldo V. Ebora	Executive Director, PCAARRD	PCAARRD's vision for agribusiness R&D and the AMC, Module 3

Prof Andrew Campbell	CEO, ACIAR	Partnerships for capacity, Call to Action, Module 3
Mr Howard Hall	Agribusiness Research Program Manager, ACIAR	Closing remarks, Call to Action, Module 3

4 Program design and content

4.1 ISP short course on agribusiness and value chain leadership



Figure 1 ISP short course participants and mentors at Tagaytay, September 2019

An ISP is PCAARRD's blueprint to operationalise its overall science and technology vision. This short course supported PCAARRD's ISP managers and technical staff in building their capacity to engage, influence and collaborate with agribusinesses in developing inclusive and sustainable agribusiness value chains.

Agricultural research managers are in a position to shift the trajectories of Philippine agricultural industries through

effective engagement and facilitating on-the-ground impact. This course specifically supported ISP managers in this role, by embedding value chain thinking and enhancing leadership skills with additional tools to those they already have. The course was held on 24-27 September 2019 at the Estancia Resort Hotel in Tagaytay City, Philippines, with 24 participants (Appendix 1a).

4.1.1 Learning outcomes

At the completion of the short course, ISP participants were expected to be able to:

- Identify and define real-world issues, opportunities and constraints to agribusiness development in agri-food value chains in the Philippines;
- Map value chains and identify appropriate investigative techniques to specific value chain challenges;
- Evaluate partnership needs and develop appropriate approaches to broker effective collaborations;
- Build on current leadership skills through enhanced foresighting and adaptive management techniques;
- Effectively communicate results and findings.

It was designed as a hands-on, practical and intensive course.

4.1.2 Course content and resources

The ISP short course was conducted over four days, with one day allocated for a field visit as well as evening activities. This visit was designed to expose participants to a 'walking the chain' exercise, where rapid value chain appraisal skills can be tested. Throughout the course, participants were provided with challenges and activities to test new tools and principles, particularly in leadership.

The resource persons for the ISP short course are: Dr. Lilly Lim-Camacho and Ms. Michaela Cosjin of CSIRO; Dr. Rodd Dyer of FocusGroupGo; and Mr. Anton Simon of Foodlink Advocacy Co-operative.

Day 1: Building capacity to influence the food and fibre system

Aim: Enhance understanding of the macroenvironment as well as defining their role in the system

Key topics: Systems thinking; impact planning; adaptive leadership; partnership brokering; stakeholder engagement

Activities: Goal setting; leadership; Partnership brokering in practice; Panel session on leadership, influence and impact



Figure 2 Guest speakers on leadership. L-R: Mr Joseph Janer, Ms Patch Quilao, Dr Dino Campilan and Dr Lilly Lim-Camacho

We were joined by Dr. Dindo Campilan of the International Center for Tropical Agriculture (CIAT), Ms. Maricel 'Patch' Quilao of Honda Cars Philippines, and Mr. Leopold Joseph Janer of the Professional Insurance and Financial Advisors Association of the Philippines (PIFAAP) who shared their personal experiences on leadership, influence, and impact on a panel talk during the training.

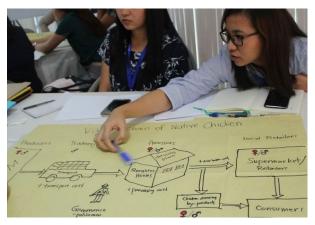


Figure 3 Chain mapping exercise: social inclusion

Day 2: Value chains in the context of ISP roles

Aim: Enhance knowledge base on principles of value chains, markets and livelihoods

Key topics: Multiple value chain priorities; value chain prioritisation and selection; value chain and market development principles; community values; social inclusion; guidelines on preparing for interviews

Activities: Prioritisation and assessment; value chain mapping; field visit preparation; questionnaire development

Day 3: Field visit

Aim: Apply approaches, principles and frameworks learnt to real world value chains

Activity: Field work, data collection, synthesis and analysis, presentation preparation

The participants were grouped and assigned different industries to visit and implement a rapid value chain appraisal. The industries and respective chain assignments given to the participants were the following:

- 1. ANSA Genetics, Inc. in Batangas and Rancho Consuelo in Laguna, for beef cattle chain:
- 2. Sorosoro Ibaba Development Cooperative (SIDC), Batangas for corn chain; and
- 3. Ahon Sa Hirap, Inc. (ASHI), Laguna for spring onion chain.

Day 4: Insights, reflections and ways forward

Aim: Synthesise and communicate key insights from field visits

Activities: Group presentations, reflections and feedback, future planning

Additional topic: Foresighting

4.2 AMC Program Design

The AMC is a vehicle for building future leaders and collaborators in inclusive business among researchers, policy makers and private sector managers in the Philippines.

The AMC aims to enhance skills and capacity of participants to plan and implement research for development activities that will contribute to food and livelihood security of farming communities, and growth of the Philippine agricultural sector.

Through agribusiness value chain analysis, participants identify the range of factors and relationships that affect the performance and competitiveness of various agricultural products, from production to transport, processing, distribution and marketing. Participants work with a range of stakeholders from the public and private sector to gain better understanding of and help address the risks, bottlenecks, and opportunities along the value chain.

4.2.1 Mode of delivery

AMC Philippines was delivered over three modules. Initially, this was based on earlier AMC modules which were run over 2-3 days. However, at the design phase it was apparent that 4-5 day programs would achieve module objectives more effectively.

The AMC was originally designed as a face-to-face capacity building program, but limitations brought about by the COVID-19 pandemic led to the shift to online delivery for the third module.

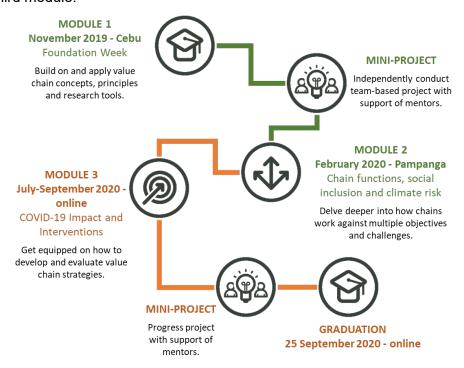


Figure 4 AMC module timelines and delivery mode

4.2.2 Participant selection

The main criteria for selecting participants was an ongoing need to apply agribusiness and value chain expertise in their role. The AMC was targeted towards mid-career professionals from government, academe and private sector (including farming) who were looking to influence their organisations towards the long term.

Expressions of interest were sought, using a form that allowed applicants to describe their interests in agribusiness, how they intended to use their newfound skills, and whether they

had their employer's support in participating. This was particularly important because the AMC required three weeks of full-time participation.

The target number of participants was 25, but this number was extended to 30 upon the request of PCAARRD to include more project leaders and technical staff involved. This was off the back of feedback from the ISP short course.

The participants represent the academe, government, research, corporate and farming sectors. Majority of participants were women, which was also reflected in applicants. While the target cohort was mid-career professionals, there were several senior managers, university professors and practitioners who were successful because of their ability to influence their organisation and shift approaches and behaviours effectively. The list of participants can be found in Appendix 1b.



Figure 5 AMC participants and module 1 resource persons at Cebu, November 2019

4.3 AMC Program Content and Resources

4.3.1 Module 1: Value Chain Concepts and Principles

AMC Module 1 was designed to provide participants with key principles and frameworks around value chains. At the completion of this module, participants are expected to be able to:

- 1. Develop a good understanding of value chain frameworks and concepts
- 2. Build capacity in framing real-world value chains in the context of the broader food and fibre systems
- 3. Design and conduct simple value chain studies
- 4. Reflect and critique on value chain information and perspectives
- 5. Effectively communicate results and findings

AMC Module 1 was held in Cebu City from 25-29 November 2019. Throughout the week, AMC participants were provided with activities and challenges to test new tools and principles. The module was conducted over five days, with one day allocated for a field visit. Participants were expected to work outside of their usual hours, particularly during the field day. The field day was designed to expose participants to a 'rapid appraisal value chain analysis' exercise.

Module content and resources

The resource persons for Module 1 were Lilly Lim-Camacho, Anton Simon Palo, Tiago Wandschneider, Oleg Nicetic and Phil Currey. Mai Alagcan was also present for critical feedback and guidance to participants.

Day 1: Value chain frameworks and concepts

Key topics: Introduction to value chains, frameworks for selecting value chains, value chain mapping

Activities:

- Value chain selection: How do you choose a chain to analyse? Participants were tasked to develop selection criteria for value chains, as well as evaluate them.
- Chain mapping and node identification: AMC participants were tasked with mapping
 different chains, then identifying the different nodes or actors that operate within the
 individual functions in a chain.

Day 2: Value chain analysis and its tools

Key topics: Methods for value chain analysis, heterogeneity in chains, regional market analysis, rapid value chain appraisal

Activities:

- Handout for Rapid Market Appraisal
- Case studies featuring rapid market appraisals: vegetables and mangoes
- CALCOA case study

Day 3: Preparing for the field

Key topics: Consumer perspectives of value chain analysis, preparing for fieldwork Activities:

- Forming groups and destination briefing
- Research questions exercise: Participants were given a client, tasked to define a value chain research problem, and develop research questions for their respective clients.

Day 4: Field visits

Activities:

Participants were asked to walk the chain of five commodities – chicharon (pork rind), lechon (roast pork), carabao dairy, cacao and danggit (dried fish). They were provided with a topic, a vehicle and a small operating budget to 'walk the chain' in order to find chain participants on their own. Participants synthesised and analysed their results and prepared for their presentations in the evening.

Day 5: Consolidating insights from the week

Group presentations: each group presented their findings for 10 mins, with 5 mins for questions. Each group then reflected on their experiences and key insights.

Mini-project ideas: Idea development, followed by pitching. For the first round, 10 ideas were developed and pitched. Round 2 narrowed that down to five, refined and repitched. These five formed the mini-projects that AMC participants pursued for the rest of the Master Class.

Module 1 was closed by PCAARRD Director Institution Development Division Dr Fezoil Luz Decena.



Figure 6 Walking the chain presentations with strict time-keeping protocols

4.3.2 Module 2: Chain functions, social inclusion and climate risk

AMC Module 2 was designed to provide participants with key principles and frameworks around inclusive value chains. At the completion of this module, participants were expected to be able to:

- Building on Module 1, increase understanding of value chain concepts and frameworks, including chain functions
- Develop an understanding of the importance of social inclusion in values chains and the use of frameworks for the creation of inclusive agri-business models
- Understand risk and vulnerability in value chains with a focus on climate change and how to prepare for the future
- Design and conduct value chain studies adding a social inclusion and climate lens
- Effectively communicate results and findings

AMC Module 2 was held in Clark, Pampanga from 24-28 February 2020. Throughout the week, AMC participants were provided with activities and challenges to test new tools and principles. The module was conducted over five days, with one day allocated for a field visit. The field day was designed to expose participants to a 'rapid appraisal value chain analysis' exercise. In addition, participants were given time to work on their mini-projects.

Module content and resources

The resource persons for Module 2 were Michaela Cosijn, Lilly Lim-Camacho, Anton Simon Palo, Gomathy Palaniappan and Steven Crimp. Mai Alagcan was also present for critical feedback and guidance to participants.

Day 1: Chain functions and mini project update

Key topics: Chain functions

Activities:

- Opening remarks by Dr Ernie Brown, Director, PCAARRD Socio-Economics Research Division
- Module 1 reflections and expectation setting
- Mini-project presentations
- Field work briefing
- Panel event on inclusion:
 - Crisanto "Boysie" Sabino, Executive Director, East West Seed Foundation

- o Caroline Grace Pedragosa, development consultant
- Stephen Arlo Lapid, OIC-Chief Post harvest and marketing unit, Bureau of Fisheries and Aquatic Resources Region 3

Day 2: Inclusive value chains and how to achieve them

Key topics: Defining inclusion, benefits and barriers to participation, operationalising inclusion, tools for inclusion, gender, evaluating interventions

Activities:

 Special Guest: Department of Foreign Affairs Third Secretary, Ms Sophie McPhate

Day 3: Climate change and value chains

Key topics: Climate risk and value chains

Activities:

- Vulnerability mapping
- Case studies



Figure 7 Guest speaker, DFAT Third Secretary Ms Sophie McPhate

- Mapping gender roles across the value chain, using tools for social inclusion:
- Debate: Is it an inclusive value chain?

Day 4: Field work

Six teams visited organisations involved in six commodities to apply their skills in a reallife situations. This included:

- Rice: (Farm + Inavet Nutrition Technologies), San Simon, Pampanga
- Fisheries (Tilapia): Minalin, Pampanga
- Mango: Tala-Orani Multipurpose Cooperative (TAMCO), Tala Orani, Bataan
- Coffee: Tala-Orani Multipurpose Cooperative (TAMCO), Tala Orani, Bataan
- Coconut: Tala-Orani Multipurpose Cooperative (TAMCO), Tala Orani, Bataan

Day 5: Consolidating insights from Module 2

Activities included:

- Group presentations on field work interviews
- Plenary feedback: reflections on inclusion on the field
- Mini-project working time
- Closing remarks by Dr Melvin Carlos, Deputy Executive Director for Administration, Resource Management and Support Services (DED-ARMSS), PCAARRD

4.3.3 Module 3: Chain functions, social inclusion and climate risk

AMC Module 3 was originally designed to support participants' ability to develop and evaluate value chain interventions given multiple priorities. It was designed to build off principles and frameworks provided to participants in Modules 1 and 2. As the final instalment for the Philippine Agribusiness Master Class, the module was also designed to be a forum for participants to showcase their skills in agribusiness research and value chain analysis as demonstrated through their mini-projects.

However, COVID-19 posed both limitations and opportunities for AMC participants and resource persons. The decision to re-design Module 3 was made to take advantage of the pressing challenges that agricultural value chains are facing in the Philippines in light of COVID-19 impacts. Module 3 was re-oriented to equip participants with the skills to identify and evaluate potential interventions that support agrifood value chains in response to COVID-19 and its impacts.

At the completion of the module, participants were expected to be able to:

- 1. Develop a good understanding of the impact of large-scale disruptions to agricultural systems
- 2. Evaluate recovery strategies from multiple perspectives in the value chains
- 3. Effectively communicate the results of their studies to key stakeholders within their organisation

Operation

Module 3 had two parts: 1) content delivery and discussions, 2) hands on research – including primary data collection, analysis and reporting. The module is conducted entirely online, using a combination of platforms.

Commencing in July 2020 and over a course of 10 weeks, 2-3 hour sessions were held each week to deliver content, discuss issues, and organise research activities. Resource persons delivered presentations through an online meeting platform. These presentations were recorded and uploaded to the AMC website and on Microsoft Teams in case some participants were not able to join a session at a proposed time. Content delivery was followed by discussion sessions. Microsoft Teams was used by resource persons and participants as a communication platform in between sessions.

On week 4, participants commenced data collection for their research on COVID-19 and agrifood value chains. The project was expected to take 6 weeks to complete.

Module content and resources

The resource persons for Module 3 were Lilly Lim-Camacho, Anton Simon Palo and Michaela Cosijn. Oleg Nicetic was present as mentor for project work.

Week 1: Re-orientation and introduction to Module 3

Key topics: Background on COVID-19 and current state of knowledge; COVID-19 in the Philippines

Activities: Break out groups and playback: Local impacts of COVID-19

Week 2: The impact of COVID-19 on agrifood value chains

Key topics: Disruptions along the value chain; COVID-19 and inclusion

Activities: Break out group and playback: Most vulnerable parts of the chain

Week 3: Interventions and recovery

Key topics: Evaluating interventions

Activities: Panel of speakers: What does recovery look like? With Ms Donna Cariño, Institute for Social Entrepreneurship Asia and Mr Rapa Lopa, President and CEO, Restart Micro-Enterprise Inc.

Week 4: Research project briefing

Key topics: Frameworks for investigating impacts of COVID-19; protocols for HSE; ethics guidance; reflections on running interviews during COVID-19

Weeks 4 and 5: Data collection

Activities: Participants collected data over two weeks, each aiming to conduct 5 semi-structured interviews over the phone or online. Resource persons were available online for guidance and advice.

Weeks 6 and 7: Data analysis

Activities: Participants pooled and analysed their data. Resource persons were available online for guidance and advice.

Weeks 8 and 9: Reporting

Activities: Teams presented their findings to their institutions and special guests. Projects included:

- COVID impacts on Davao catfish value chain
- Effects of COVID-19 on cacao value chain in Davao
- Impact of COVID-19 on Baybay vegetable value chain
- Online delivery platforms during COVID
- The Dream Coffee COVID impact

Week 10: Completion and reflection

Activities: Cohort reconvened to reflect on learning through the project; summary of the AMC journey; participant evaluation; online graduation ceremonies. One of the final sessions encouraged participants to continue their impact beyond the program. His Excellency Steven J. Robinson AO, Australian Ambassador to the Philippines, shared the Australia's aid program in the Philippines for supporting leaders; Dr. Reynaldo V. Ebora, Executive Director of DOST-PCAARRD, discussed the vision for agribusiness research and development of the council; and, Professor Andrew Campbell, Chief Executive Officer of ACIAR, motivated the participants to take real steps and to continue their impact beyond AMC.



Figure 8 AMC Philippines Online: Graduation ceremonies

5 Evaluation and impacts

5.1 Evaluation

Independent evaluation was conducted by PCAARRD at the end of each session. Evaluation reports for the ISP short course, Modules 1, 2 and 3 are found in Appendix 2.

The overall feedback from these evaluation reports were highly positive and encouraging and were used to continually refine the subsequent modules.

Extract from ISP evaluation:

There were few recommendations cited by the participants. One of which suggests more and in-depth sessions on leadership and partnerships while majority of the participants recommend to conduct the same training for other technical staff including ISP managers who were not able to attend the training. According to them, the training will allow other technical staff to appreciate their expertise in a different or holistic approach.

Extracts from AMC evaluations:

- Participants highly commended the resource speakers for their diverse knowledge
 on their respective topics discussed. They also appreciated how different
 lectures/concepts on inclusive value chain were presented, discussed, and applied
 through their group activities, particularly in their fieldwork. In particular, the
 importance of an inclusive value chain on social, gender, and climate change; how
 its application determine the gaps, issues, and concerns in addressing the
 problems in the AANR sector. (Module 2)
- For the training improvement, participants suggested incorporating more actual examples and activities aside from the lectures presented. This will aid the participants to have an in-depth understanding of the concepts of value chain not just in research but in the actual field /industry application. In doing so, it will help to identify further and bridge the gap between research (academe) and the industry. (Module 2)
- The majority of the participants emphasized the significant experience in the conduct of their mini-projects. They appreciated more the value chains by doing the practical application of the principles and understood more the effect of the pandemic in the value chain of the commodities they have studied. They were also introduced to remote data collection due to the constraints that arise from the pandemic. (Module 3)
- The participants appreciated the approachable mentors and organizers that aid them along the progress of making their research projects and whole training. They also commended the inclusion of the impact of COVID-19 in the training series that help them in understanding the current situation and making them able to recognize and assess possible interventions that support agrifood value chains. (Module 3)
- All participants agreed to recommend the training course to their colleagues, research and development practitioners, industry representatives, policymakers, cooperative members, non-governmental organizations (NGOs) workers, academicians, and project managers. (All modules)

5.2 Scientific impacts

The AMC project, "Online Delivery Platforms: Revolutionizing Agri-Food During the Covid-19 Pandemic" was published and presented by Miko Mariz C. Castro, Melissa P. Loquias, Ivee V. Fuersaz, Imee Marie A. Acopiado, and Leira Mae Suarez. It received the Best paper award for the Innovations in Food and Fiber Supply Chain session, at the Philippine Agriculture and Economic Development Association Conference, 3-4 June 2021.

Two AMC projects, 'A rapid value chain appraisal on the use of pesticides in mango production in Luzon' and 'Rapid market appraisal for expanding tilapia culture areas in Davao del Sur' are now fully funded projects, led by AMC graduates from University of the Philippines Los Baños (UPLB) and University of Philippines (UP) Mindanao.

5.3 Capacity impacts

There have been multiple capacity impacts observed during the project, and after. The following capacity building outcomes have been observed:

- 1. a request from PCAARRD to increase the number of PCAARRD participants allowed into the full AMC program: An additional five places were created for the AMC, taking the total number of participants to 30.
- 2. AMC graduates now part of the ACIAR Inclusive Value Chains full project, contributing agricultural economics, market research and corporate engagement expertise to identifying strategies by which agribusinesses and small holder farmers can co-benefit as partners in a value chain.
- 3. Lecturing and speaking opportunities for private sector AMC graduates in universities
- 4. Several AMC graduates receiving John Dillon Fellowships from ACIAR, following their formal recognition as ACIAR Alumni, thanks to the efforts of Mai Alagcan
- 5. a commitment to scale AMC capacity building through PCAARRD's online learning resources, utilizing AMC graduates as next generation resource persons
- 6. the development of the new Agri-Aqua Business Hub at PCAARRD, which specializes in connecting science and technology solutions with agribusiness

5.4 Community impacts

No community impacts have yet been observed.

5.5 Communication and dissemination activities

AMC Website:

 CSIRO has developed a website specifically to host content for the AMC. https://research.csiro.au/inclusivechains/

PCAARRD Media:

- 'PCAARRD builds up agribusiness and value chain thinking among its ISP managers and technical staff', 13 December 2019 by Monica B. Castillo of PCAARRD (AMC Participant)
- '<u>Agribusiness Master Class Philippines kicks-off</u>', 7 February 2020 by Monica B.
 Castillo of PCAARRD (AMC Participant)
- '2nd Agribusiness Master Class PH focuses on inclusivity, gender, and climate lenses', 7 April 2020 by Monica B. Castillo of PCAARRD (AMC Participant)

• <u>Philippine Agribusiness Master Class produces its first graduates</u>, 01 December 2020 by Polianne Tiamson, Princess Alma Ani, Meliza Abeleda

ACIAR Media:

- Mastering value chains in the Philippines, 25 September 2020
- An enduring 'bayanihan' in agricultural research for development, 20 April 2021

6 Conclusions and recommendations

6.1 Key design principles

The Philippine Agribusiness Master Class was a highly successful capacity building initiative that was designed to have ongoing capacity building impacts through the strength of networks. On reflection with the team at multiple points during the program's delivery, the following key design principles surfaced as essential to the program's success.

- 1. <u>Critical thinking:</u> AMC and ISP participants were introduced to systems thinking as a foundational piece and encouraged to challenge resource persons along the way. Resource persons modelled this behaviour by openly debating with each other to demonstrate how systems can be viewed from various angles, and how differing perspectives shed new light to situations. Participants were also asked to present outputs of activities and case studies frequently. In Module 1, they were trained to 'pitch' their concepts for their mini project. At the end of the week, each participant was able to represent a group or team. This continues to be a critical feature for the modules.
- 2. <u>Strength in diversity:</u> The AMC cohort was selected to be a diverse group of experts, spanning the Philippine archipelago. Participants are asked to take advantage of this diversity, through regular tasks such as group work as well as their mini-projects. Content knowledge was not only drawn from resource persons and guest speakers, but also from the participants themselves. AMC participants are not only selected for their ability to take on learnings but also their ability to share expertise.
- 3. <u>Grounded learning:</u> A vital part of design was ensuring that participants learned from actual value chain actors, within the context of their businesses and operations. Interaction with actual value chain actors on the ground within their respective contexts provided much nuance to understanding value chains. Non-verbal messages, ground-level sensorial experiences, and even emotions provided the participants added dimension to the contexts of these value chain actors hence revealing much about the actors' goals, motivations, complaints, and even desires.
- 4. **Shared learning:** Learning from peers was weighted equally, if not more, to learning from resource persons and was seen as a powerful mode of developing capacity and skills. On average, 50% of sessions were spent working with their peers, within project groups and outside of them. Activity tables were mixed and randomized to avoid cliques forming, and to encourage the development of new networks. Experiential learning, shared by groups as they visited field sites and face challenges, was critical in forming bonds as well as synthesizing information rapidly.
- 5. <u>Impact-led learning:</u> Module content was selected because of their context relevance for Philippine agriculture, and participants were constantly challenged to 'step into someone else's shoes' to understand the perspectives of various value chain actors. Self-awareness and system-awareness was a key starting point for the ISP short course, in order to help participants identify their place and role in creating change. Frequently inviting practitioners as guest speakers provided an impact focus to learning.
- **Shadow spaces:** Participants were encouraged to self-organise and were given time and space to form bonds and pursue interests not directly within the scope of a module. This allowed for the development of new ideas, and the ownership and

championing of them, without depending on resource persons too much. Shadow spaces are known to foster innovation and learning through informal interaction (Pelling, et al. 2008).

6.2 Challenges and opportunities

There have been several challenges and opportunities identified throughout the conduct of the AMC. Some, such as stronger interest than anticipated, have been managed by extending project resources to enable more participants to join the course. This was offset by PCAARRD's offer to conduct evaluation on behalf of the AMC, since it had to do it anyway for their staff members.

Others were more challenging, such as the impact that COVID-19 had on the ability to effectively conduct the course.

- Online and face-to-face learning is not a 1:1 translation: the resourcing and effort
 requirements are substantially different and while one is physically taxing (face-toface) over a short period of time (8 days in country including travel), online learning
 requires more detailed preparation, longer delivery times, and is likely to me more
 mentally taxing over a prolonged period of time (10 weeks).
- COVID-19 challenges some of the principles that made AMC successful: shared learning and shadow spaces, where participants can bond through connections with each other outside of work, is less successful in an online environment. Peer learning, especially in diverse groups, is best done face-to-face.
- Online learning is still not equitable: While every effort to engage each AMC
 participant was made, individual circumstances led to some not being able to
 participate as much as they would have had Module 3 been conducted face-to-face.
- It does not feel finished: Because celebrations in their traditional sense have not been had, there is an ongoing sentiment that a final 'session' is still needed to cap the AMC off. That said, participants are still conversing and planning in a jovial way, which strengthens relationships and networks.

The opportunity that COVID-19 presented to the AMC was also significant. This included:

- Presenting the AMC participants with a real challenge that value chains played a key
 role in, where they could truly make a difference. This shift showcased the need for
 critical thinking in systems, and the participants were able to demonstrate their agility
 when plans changed.
- Prestigious guest speakers were more accessible, leading to a very high-profile reporting and graduation series of sessions, and greater buy-in and support.
- A stronger likelihood that AMC can be shifted to online learning through PCAARRD, because Module 3 has already demonstrated that it is possible.

Overall, the AMC was able to engage over 50 participants in a targeted capacity building program in the Philippines. We delivered 20 value chain case studies, and involved 16 different resource persons to contribute to the learning journey of the Philippines' first cohort of agribusiness champions.

7 References

7.1 References cited in report

Pelling, M., High, C., Dearing, J., Smith, D. (2008) Shadow Spaces for Social Learning: A Relational Understanding of Adaptive Capacity to Climate Change within Organisations. Environment and Planning A 40, 867-884.

Kolb, A.Y., Kolb, D.A. (2005) Learning Styles and Learning Spaces: Enhancing Experiential Learning in Higher Education. Academy of Management Learning & Education 4, 193-212.

7.2 List of publications produced by project

Not applicable

8 Appendixes

Appendix 1a: ISP Participant list Appendix 1b: AMC Participant list

Appendix 2a: ISP Evaluation Report by PCAARRD

Appendix 2b: AMC Module 1 Evaluation Report by PCAARRD Appendix 2c: AMC Module 2 Evaluation Report by PCAARRD

8.1 Appendix 1: Participant list

Appendix 1a. ISP Participants

	Name	Position	Division	Agency
1	Ma. Teresa L. De Guzman	ISP, coffee	ARMRD	
2	Kristine Joy B. Panaligan	ISP, Banana, Durian, Pineapple	CRD	
3	Ma. Cecilia S. Alaban	ISP, Mango	CRD	
4	Sharie Al-Faiha A. Lubang	ISP, Onion, Garlic	CRD	
5	Kimberly Zarah B. Locsin	ISP, Ornamentals	CRD	
6	Abigail May O. Retuta	ISP, Sweet Potato	CRD	
7	Aleli A. Collado	ISP, Dairy	LRD	
8	Adelaida T. Calpe	ISP, Mangrove Crab, Shrimp	IARRD	
9	Eduardo V. Manalili	ISP, Milkfish, Aquafeeds	IARRD	
10	Dannah Lee D. Alcomendras	ISP, Shellfish- Mussel	IARRD	
11	Cynthia Almazan	ISP, Tilapia	IARRD	PCAARRD
12	Wilfredo C. Ibarra	ISP, Inland Biodiversity	IARRD	1 0/ 0/ 11 (1/12)
13	Nimfa K. Toretta	ISP, Bamboo	FERD	
14	Christine D. Santiago	ISP, Forestry Biodiversity	FERD	
15	Audrey O. Lapitan	Cross-cutting	TTPD	
16	Diane Cabello	Cross-cutting	TTPD	
17	Alexander John Borja	Cross-cutting	TTPD	
18	Princess Alma B. Ani	Cross-cutting	SERD	
19	Mia Barbara D. Aranas	Cross-cutting	SERD	
20	Monica Castillo	Cross-cutting	SERD	
21	Joel Ernesto A. Joven	Cross-cutting	ACD	
22	Josette San Luis	Cross-cutting	OED-RD	
23	Sharon Batoon	Cross-cutting	OED-ARMSS	
24	Mara Faylon	ACIAR	-	

Appendix 1b. AMC Participants

	Name	Position	Agency
1	Grace V. Tangcangco	Investment Specialist	DTI - Board of Investments
2	Melanie L. Moleno	Inclusive Business Program Director	DTI - Board of Investments
3	Miko Mariz C. Castro	Lecturer	School of Management - University of the Philippines Mindanao
4	Imee Marie A. Acopiado	Assistant Professor	School of Management - University of the Philippines Mindanao
5	Fe Macavinta Gabunada	Professor of Agricultural Economics	Ecological Farm and Resource Management Institute - Visayas State University
6	Moises Neil V. Serino	OIC-Director for Extension	Office of the Director for Extension - Visayas State University
7	Jewel Joanna S. Cabardo	Assistant Professor	University of the Philippines Los Baños
8	Thaddeus R. Acuna	Assistant Professor	University of the Philippines Mindanao
9	Leilani M. Briosos-Mc Donough	Enterprise Development Program Manager	Aboitiz Foundation
10	Larissa P. Joson	President/CEO	Rooted Seed Stories Corp.
11	Rupert Calvin G. Sievert	Chief Technology Officer	Farmwatch Solutions Inc.
12	Kristine Joy L. Tomanan	Research Officer	Foodlink Advocacy Co- operative
13	Mercedita A. Rosetes	Manager for Member Projects and Community Partnerships	Foodlink Advocacy Co- operative
14	Joyce Franzly Racoma- Gomez	Secretariat Coordinator	Grow Asia - Philippines Partnership for Sustainable Agriculture
15	Hadasha Navarra Bongat	Instructor I	Visayas State University
16	Melissa P. Loquias	University Research Associate I	School of Management - University of the Philippines Mindanao
17	Gideon Niel D. Tan	Instructor	Visayas State University
18	Glory Dee A. Romo	Assistant Professor	School of Management - University of the Philippines Mindanao
19	Daniel F. Apostol	Farmer - Owner	Apostol Techno-Demo Learning Farm, Inc.
20	Perfecto S. Belo	Treasurer	San Felipe Cooperative
21	Celia dR. Medina	Associate Professor 6	University of the Philippines Los Baños
22	Ivee V. Fuerzas	Faculty	University of Southeastern Philippines
23	Leira Mae Suarez	Faculty	Central Luzon State University
24	Roly Corpuz	Senior Science Research Specialist	Crops Research Division, DOST-PCAARRD
25	Marites Dayo	Senior Science Research Specialist	Livestock Research Division, DOST-PCAARRD
26	Engel Lalican	Senior Science Research	Technology Transfer and

27	Daisy Cabral	Senior Science Research	Forestry and Environment
		Specialist	Research Division, DOST-
			PCAARRD
28	Cynthia Almazan	Science Research	Inland Aquatic Resources
		Specialist II	Research Division, DOST-
			PCAARRD
29	Monica Briones Castillo	Science Research	Socio-Economics Research
		Specialist II	Division (SERD), DOST-
			PCAARRD
30	Princess Alma Ani	Senior Science Research	SERD, DOST-PCAARRD
		Specialist	

8.2 Appendix 2: Evaluation reports

Appendix 2a: ISP Evaluation Report by PCAARRD

Appendix 2b: AMC Module 1 Evaluation Report by PCAARRD

Appendix 2c: AMC Module 2 Evaluation Report by PCAARRD

Appendix 2d: AMC Module 3 Evaluation Report by PCAARRD