

FINAL
EVALUATION REPORT

VIE/433

Climate Adaptation and Resilience
in Thua Thien Hue Province

PROJECT SUMMARY DATA

Country	Vietnam
Long Project Title	Climate Adaptation and Resilience in Thua Thien Hue Province
Short Project Title	N/A
LuxDev Code	VIE/433
Version of the Report	December 2022

RATING OF THE PROJECT BY THE EVALUATION MISSION

Global rating (Effectiveness)	1.9 On a scale of 1 (excellent results, significantly better than expected) to 6 (the Project was unsuccessful, or the situation has deteriorated on balance).
Rating using other evaluation criteria	Relevance: 1.3 Coherence: 1.6 Efficiency: 2.0 Sustainability: 2.7

LIST OF ACRONYMS

ARCZ	Aquatic Resources Conservation Zone
AWPB	Annual Work Plan and Budget
BOD5	Biological oxygen demand
CAS	Centre for Agriculture Service
CBA	Cost-Benefit Analysis
CC	Climate Change
CCA	Climate Change Adaptation
CCM	Climate Change Mitigation
CCR	Climate Change Resilience
COD	Chemical Oxygen Demand
CPC	Commune People's Committee
CTA	Chief Technical Advisor
DA	Delegation Agreement
DAC	Development Assistance Committee
DARD	Department of Agriculture and Rural Development
DCC	Department/Division of Climate Change (at MONRE/DONRE)
DIB	District Implementation Board
DONRE	Department of Natural Resources and Environment
DPI	Department of Planning and Investment
DRR	Disaster Risk Reduction
EoP	End of Project
FA	Fishery Association
FCZ	Fisheries Conservation Zone

FGD	Focus Group Discussion
GHG	Greenhouse Gas
GOV	Government of Vietnam
HH	Household
ICF	International Climate Finance
IEC	Information, Education, Communication
IP	Implementation Partner
KAP	Knowledge, Attitudes and Practices
KII	Key Informant Interview
LPMB	Luxembourg Projects Management Board
M&E	Monitoring and Evaluation
MONRE	Ministry of Natural Resources and Environment
MRV	Measurement, reporting and verification
MECSD	Ministry of the Environment, Climate and Sustainable Development (Luxembourg; MDDI in French)
NA	Not available/ Not applicable
O&M	Operation and Maintenance
OA	Organic agriculture
OAA	Organic Agriculture Association
ODA	Official Development Assistance
OECD	Organization for Economic Cooperation and Development
PGS	Participatory Guarantee System
pH	Potential hydrogen
PPC	Provincial People's Committee
PSC	Project Steering Committee
RM	Risk Mitigation
RMNCH	Reproductive, maternal, newborn and child
SAG	Student Action Group
SPSS	Statistical Package for the Social Sciences
TA	Technical Assistance
TAO	Technical Assistance Office
TT Hue	Thua Thien Hue
UNFCCC	United Nations Framework Convention on Climate Change
VTV	Vietnam Television

TABLE OF CONTENTS

1.	EXECUTIVE SUMMARY	4
2.	DESCRIPTION OF THE PROJECT'S ACHIEVEMENTS AT THE MOMENT OF THE EVALUATION	7
2.1.	Coverage (geographical area and beneficiaries)	7
2.2.	Details of the objectives and results achieved	7
2.2.1.	<i>Overall objective</i>	8
2.2.2.	<i>Specific objective</i>	8
2.2.3.	<i>Results</i>	9
3.	IMPLEMENTATION DESCRIPTION	16
3.1.	Project's management structure	16
3.2.	Measures taken for harmonisation and alignment	17
3.3.	Measures taken to place capacity strengthening at the heart of the Project	17
3.4.	M&E	17
3.5.	Measures taken to ensure partnership	18
3.6.	Local contribution	18
3.7.	Project disbursement	18
4.	PROJECT EVALUATION	19
4.1.	Relevance – is the intervention doing the right thing?	19
4.2.	Coherence – how well does the intervention fit?	20
4.3.	Effectiveness – is the intervention achieving its objectives?	20
4.4.	Efficiency – how well are resources being used?	21
4.5.	Sustainability – will the benefits last?	21
4.6.	Crosscutting aspects	22
4.6.1.	<i>Governance for Development</i>	22
4.6.2.	<i>Gender equality</i>	22
4.7.	Specific questions	22
5.	LESSONS LEARNED AND RECOMMENDATIONS	26
	LIST OF APPENDICES	28

1. EXECUTIVE SUMMARY

The final evaluation of project VIE/433 Climate Adaptation and Resilience in Thua Thien Hue (TT Hue) Province was undertaken by Mekong Economics during September - December 2022. The evaluation aimed to provide a summative and formative appraisal of the project's achieved results within its framework and lessons learnt for the project's subsequent phase and/or existing studies or initiatives. Specifically, the evaluation assessed the project's achieved results and specific objectives, implementation modalities, capacity building, management and monitoring as well as other accomplishments using the evaluation criteria (relevance, coherence, effectiveness, efficiency, and sustainability) and considering cross-cutting aspects (governance for development and gender equality). This evaluation also included responses to specific questions on a variety of topics, lessons learnt, and suggestions.

The VIE/433 project aimed to increase the resilience and adaptive capacity to climate-related hazards and natural disasters in coastal and lagoon communes. It targeted the same 55,500 households (HHs) in the same 29 communes as the earlier VIE/033 in Quang Dien (11), Phu Vang (9), and Phu Loc (9), which were the most susceptible to the effects of climate change (CC) due to their proximity to the lagoon and low altitude. VIE/433 was a continuation of the very successful Official Development Assistance (ODA)-funded VIE/033 project (July 2013-June 2018), but as Luxembourg's first two pure climate projects, with a narrower technical scope than VIE/033 and a greater emphasis on climate change adaptation (CCA) through the addition of two new components, namely organic agriculture (OA) and institutional capacity development for CCA monitoring and measuring, reporting, and verification (MRV) of climate change mitigation (CCM) actions. VIE/433 moved towards climate change resilience (CCR) (International Climate Finance (ICF)) as the main objective, instead of entirely focusing on poverty reduction and local development (ODA). It was implemented with the same institutional structure and provincial and district partner cooperation as VIE/033.

VIE/433 was formally launched with a budget of 2,300,000 EUR (of which, Luxembourg - 2,000,000 EUR, and counterpart fund – 300,000 EUR) on 1 July 2018. The project was scheduled to conclude on 31 December 2020. However, due to delays in implementation caused by the Covid-19 outbreak, challenges in achieving expected outcomes within the limited timeframe and budget, particularly those related to two new technical components that were unfamiliar to the provincial key agencies, the Department of Agriculture and Rural Development (DARD) for OA and the Department of Natural Resources and Environment (DONRE) for climate monitoring and evaluation (M&E) and MRV, the project was given a 24-month extension until 31 December 2022 and granted an additional budget of 961,000 EUR, bringing the project total to 3,261,000 EUR.

VIE/433 accomplished its objectives as set out in the logframe and made significant progress thanks to the excellent coordination and ongoing efforts of all involved parties through the project's duration. By the end of 2022, 14/14 project indicators with an End of Project (EoP) target, met or surpassed that target, and five open-ended indicators (no EoP target) showed very good progress as well. Overall, the project increased the local CC-related resilience and adaptation in a sustainable, equitable, and efficient manner: 63,334 individuals directly benefiting; HHs suffering significant (monetary) damage and loss from climate-related impacts reduced by 48.9%; institutional capacity of the Division of Climate Change (DCC) of TT Hue DONRE increased by 63.5% compared to baseline; 95.8% procedures/steps of provincial CCA M&E and CCM MRV system developed & completed; 95.8% secondary pupils with improved knowledge, attitudes and practices (KAP) with regard to CCA-CCM and disaster risk reduction (DRR); 5,466 HHs directly benefiting from 14 sub-projects constructed and 11 sub projects repaired/upgraded and 875 ha productive land being better protected against specific CC impacts; 99.4% fishermen & farmers with improved KAP on effective management, use and conservation of fisheries & aquatic resources; 72.2% sample sites with surface water quality complying with all six parameters; 84.8% OA groups completing Participatory Guarantee System (PGS) certification procedures; fertilizer and pesticides/herbicides in OA across all pilot interventions reduced by 37,339 kg and 118.2 liters, respectively; 9,172.5 million VND or 380,000 EUR gained as total revenue of organic products in 2020-2022; and 79.7% organic food models completed post-production and marketing process cycle, etc.

The institutional structure and partners of both projects VIE/433 and VIE/033 were virtually the same. The Project Steering Committee put in place effective mechanisms to steer the project operation, track progress, and make strategic decisions. The Luxembourg Projects Management Board (LPMB) and Technical Assistance Office (TAO) worked in close collaboration, on the same premises, and were jointly responsible for overall project management. Each District Implementation Board (DIB) was supported by a District Facilitator. Overall, the project structure enabled a holistic set of support from different levels, which in turn supported the achievement of the project objectives.

The project adopted a strong participatory approach involving authorities, agencies and beneficiaries at all levels. By following this approach, the project resources and local resources were managed well towards achieving the project objectives. There were minimum modifications of the project interventions, simply because they were well designed in close consultation with local agencies and communities. This was also considered as one of the key elements to ensure the project's success.

The capacity building, including technical support, targeted a wide range of beneficiaries, including both organizations and individuals, at different levels. In general, the project partners and beneficiaries were well equipped with technical expertise/ capacity to implement the project activities. The capacity building interventions were considered highly successful.

The project collaborated with different stakeholders over the course of implementation, and it proved to be very efficient. A large number of diversified interventions completed within a limited timeframe was good evidence for the excellent coordination and partnership, and project organizational structure. The Implementation Partners (IPs) were more familiar with the project procedures, and found it less complicated, thanks to the project guidance and experience from VIE/033. The private sector was also involved in the project implementation to a certain extent (e.g. HueViet for OA product consumption, Que Lam with whom OA rice farmers signed contracts). An international non-government organization (i.e., HueHelp) provided survival swim classes to more than 4,000 primary students.

The project received high scores as per Organization for Economic Cooperation and Development (OECD) -Development Assistance Committee (DAC) evaluation criteria (on a scale 1 to 6 whereby 1 = Excellent result, 2 = Above average results and 6 = Unsuccessful). The project was fully in line with the national and provincial policies of enhancing the CCR and aligned with the local needs and priorities (*Relevance 1.3*). The project was aligned with the provincial policy frameworks and mandates of functioning departments (e.g., DCC/TT Hue DONRE), while active engagement with other multilateral and bilateral agencies, and I/NGOs allowed the project to harmonise with their initiatives (*Coherence 1.6*). The project enhanced the Government and community capacities and ecosystem resilience in response to CC and provided high quality small-scale infrastructure to protect people and their livelihoods (*Effectiveness 1.9*). Apart from significant delays in implementation due to the Covid-19 outbreak, the project activities mostly followed the plan with minimum adjustments. The implementing parties were very competent and committed to the implementation (*Efficiency 2.0*). A number of the project activities such as CC-related activities at schools, CCA M&E work, infrastructure selection process/ maintenance, Fishery Associations' (FAs') operation, compost fertilizer production would likely continue to a greater or lesser extent, depending on available funding and/or time, while it would require time to assess some activities such as OA models (*Sustainability 2.7*).

The project put a strong emphasis on raising CC-DRR awareness and capacity of a number of government agencies and community individuals at all levels. The project focused on tackling CC-related issues; however, gender equality remained an important aspect. Attention was paid to the vulnerabilities of women, and gender inequalities in relation to CCA and DRR when designing the project interventions and selecting beneficiaries.

What are the 1-2 most important results/successes for VIE/433, and 1-2 most important challenges for future projects?

Result #1: The "winner" in the previous VIE/033 project was lagoon fisheries, where a complex cooperation result was achieved. During that project assistance to adaptive agricultural activities, e.g., new varieties began. The proving of the viability and business case (at small scale) of OA has been the most impressive result from VIE/433. This needs to be built upon in any future project.

Result #2: VIE/433-led work on the CCA M&E and mitigation MRV systems was an innovative and unique contribution of the project. It is clear that much progress has been made on this, and that this impacted national level. The counterfactual (what would have happened "without project"), in our view, is that very little would have been achieved in this area without VIE/433.

Future challenge #1: Scaling up OA – this is discussed in some detail below.

Future challenge #2: Ensuring the sustainability of the fisheries lagoon cooperative system (associations, etc.), as discussed below.

Assess VIE/433 achievements in identifying, documenting and sharing good practice or innovative approaches?

The M&E system of VIE/433 continues from the previous project to be of the highest standard. Integral to a high-quality system is sharing and explaining what the data actually shows and means. This has also been done well, and flexibly. The cooperation with DONRE and Ministry of Natural Resources and Environment (MONRE) about the CCA M&E and mitigation MRV systems is the outstanding example. Asian Development Bank and PWC consultants are frequently consulting with TAO on the project's

MRV work. Infrastructure prioritization score cards, OA models are other good examples of tools/approaches that could be adapted/ replicated in other contexts. There were also numerous examples of informal dialogue and mutual assistance between project staff and Department of Planning and Investment (DPI) at provincial and district levels. Close and friendly working relations facilitate the exchange of ideas and tacit knowledge.

Other key achievements included the establishment of the TT Hue OA Association and PGS Coordination Board (under DARD), and the involvement of teachers and students and the dynamics in secondary schools in CC and environmental issues. For the purpose of sharing good practices, in Quarter I/2023, the project will focus on documentation (e.g., LuxDev capitalization notes) of a number of interventions and impact, including OA and CC - environmental activities in/with schools.

What lessons learned have potential for scale up? Are there any paradigm shifting/innovative elements that would invite having a closer look at (good practices? lessons learned)? How could the sustainability dimension be enhanced? Any sustainable financial mechanisms that could enhance the (financial) sustainability of project components? What links could be built to the private sector and what role could it play?

A future project would be wise to allocate modest funds to support the fisheries associations and associated activities (patrols, water testing, etc.). The sustainability (which basically means government co-funding) of lagoon management is not clear. Public, comprehensive and regular water quality testing is not yet fully transferred to non-project options, yet it is essential (for example, there were complaints from fisheries association members that pollution from increasing numbers of upstream fish cages is becoming a problem). Maintaining patrols is another issue. At present about 15 patrols are done per year, but present association membership fees could cover the costs of only one patrol. Marker posts will also require upkeep. One approach might be for a new project to reach agreement for 1-to-1 contributions to a dedicated account (so the projects deposits, say, 50,000 USD per annum after the government has done the same). In this, and in other areas where financial sustainability is an issue, innovative ideas to “nudge” government to take over some or all of the responsibility are needed.

If OA is supported in a future project, the ultimate goal is to achieve scale, which is reflected in numerous farmers shifting to OA products at relatively low one-off costs to themselves and to the project (and Government). In other words, the marginal costs (and risks) of “adding one more farmer” needs to be low – which can be achieved if expert local key farmers are available to mentor and train, if processing and all up-markets aspects of the value chain are established and cost-competitive, and if the cost of per-farmer certification falls as the total number grows.

As was part of the project awareness raising interventions in the beginning, any new project needs to “get inside the mind” of the farmer considering moving to organic farming. What is stopping them? Is it some sort of distrust, or just lack of information? Are they not confident in meeting new requirements?

From such an understanding we can consider “tipping point” ideas such as: insurance for the first two years of transition (e.g. a guaranteed income even if total crop failure, and some subsidy if OA income less than previous crop income); signed agreements with selected OA partners with additional financial support from surplus funds, expansion of OA work province-wide under a new to be expected Green Climate Fund (GCF) funded adaptation project (e.g. advanced technologies, collaboration with the private sector and Agribank); or vouchers to pay for transition costs (e.g. vouchers for 5 million VND or 207 EUR to pay a key farmer of your choice to support you); or guaranteed sales prices for two years for crops that meet OA standard. Covering certification costs is another option. In this way the “leap to scale” can be achieved (without making promises of unsustainable subsidies after two years).

Many of the activities funded under VIE/433 are public goods that have no prospect for commercial profit (OA being the exception, of course). Consequently, “linking to the private sector” (beyond paying for services) is problematic. Even in OA we should be cautious and avoid giving private firms exclusive access (e.g. “all farmers must sell to this firm”). Firms, like farmers, are profit maximising, and should be understood as such (i.e. not charities).

What a future project might consider, however, is underwriting the up-front (high risk) feasibility study costs of interested private firms (e.g. on 50/50 basis). Thus, for example, if OA grew rapidly with export potential, interested foreign buyers could have expenses covered to visit TT Hue producers (or maybe just Hanoi and Ho Chi Minh city buyers initially).

2. DESCRIPTION OF THE PROJECT'S ACHIEVEMENTS AT THE MOMENT OF THE EVALUATION

2.1. Coverage (geographical area and beneficiaries)

VIE/433 aimed to increase the CCR of both people and the natural environment. The project targeted the same 55,500 HHs in the same 29 communes¹ as VIE/033 in Quang Dien (11), Phu Vang (nine), and Phu Loc districts (nine), which were the most susceptible to CC effects owing to their proximity to the lagoon and low altitude.

VIE/433 was a continuation of the very successful ODA-funded project coded VIE/033 (July 2013 - June 2018), but as one of Luxembourg's first two pure climate projects,² with a narrower technical scope than VIE/033, and a greater emphasis on CCA by adding two new components, namely OA and institutional capacity development for CCA monitoring and MRV of CCM actions. VIE/433 moved towards CCR (ICF) as the main objective, instead of entirely focusing on poverty reduction and local development (ODA). It was implemented using the same institutional structure and provincial and district partner cooperation as VIE/033.

Given delays in implementation due to Covid-19 outbreak, challenges in achieving expected outcomes within the limited timeframe and budget, especially those related to two new technical components which were also unfamiliar to the provincial key agencies, the DARD for OA and the DONRE for climate M&E and MRV, the project was given a 24-month extension until 31 December 2022, and an extra budget of 961,000 EUR.

2.2. Details of the objectives and results achieved

The project included 21 indicators, of which 19 were achieved, including five open ended indicators (1, 10, 11, 17, 18) with no preset set target but positive progress, and two (Indicators 4 and 19) were cancelled with agreement of the Project Steering Committee (PSC): number 4 due to a major activity (series of CC contests at commune, district and provincial level) having been cancelled because of Covid-19, and number 19 due to OA work being too small scale (pilots) to measure Greenhouse Gas (GHG) emission impact. The project indicators were effective to measure the project achievements and served as a useful source to track the progress.

Given the numerous constraints imposed on the project by Covid-19 and other obstacles that arose during its implementation, the targets were well-calibrated, allowing the implementation team room to maneuver despite delays while remaining ambitious enough to have a demonstrable impact on the communities the project was intended to serve.

Table 1: Status of project indicators

Code	Description	Quantity	Indicator number
1	Achieved (EoP target achieved or exceeded)	14	2, 3, 5, 6, 7, 8, 9, 12, 13, 14, 15, 16, 20, 21
NA	Not applicable (open ended with no EOP target, but with good progress observed)	5	1, 10, 11, 17, 18
0	Cancelled	2	4, 19
Total		21	

¹ As several communes were merged, there are now 27 communes in total: Phu Gia commune (Phu Vang district) was a blending name of former Vinh Phu and Vinh Thai communes, and Giang Hai commune (Phu Loc district) was a blending name of former Vinh Hai and Vinh Giang communes.

² Project VIE/433 and VIE/401 were designed in parallel. These were the first two projects funded by the Climate and Energy Fund, coordinated by MECSD.

2.2.1. Overall objective

Contribute to the national and provincial objectives of strengthening human and natural system CCR, as reflected in the government's National Target Programme on CC and Green Growth 2016 and TT Hue provincial Action Plan on CC up to 2020

VIE/433 was in line with the national and provincial policies and objectives related to CC, which consisted of the National CCA Plan for the period 2021 - 2030, with vision to 2050 (Resolution No. 1055/QĐ-TTg dated 20 July 2020), the national five-year Socio-Economic Development Plan 2021-2025 (Resolution No. 16/2021/QH15 dated 27 July 2021), TT Hue provincial five-year Socio-Economic Development Plan 2021-2025, and the updated TT Hue provincial Action Plan to Respond to CC for the period 2021-2030, with vision to 2050.

It was well designed thanks to a participatory consultation with related government agencies and local communities during the preparation phase and over the course of implementation. The project activities focused on raising local awareness, skills and capacity on CC and DRR, CC-resilient infrastructure, CCA M&E and mitigation MRV systems, conservation of the lagoon ecosystem, and OA development. In general, the project provided necessary tools and capacity for local communities to adapt to the impacts they were observing and experiencing in relation to CC, which ultimately effectively contributed to achieve the overall objective.

2.2.2. Specific objective

To strengthen resilience and adaptive capacity to climate-related hazards and natural disasters in coastal and lagoon communes

No.	Indicator	Baseline	EoP	Code
1	Number of HHs in target communes directly benefiting from project supported interventions	NA	63,334 people & 8,904 HHs	NA

This was a broad, open-ended indicator without baseline or yearly objective. By the EoP, the project benefited 63,334 individuals (of which, primary and secondary students, teachers and staff – 87.1%, and Government of Vietnam (GOV) staff, fishermen and farmers - 12.9%), and 8,904 HHs (of which, OA farming HHs - 2%, infrastructure works benefited farming HHs - 61.4% and fishery HHs - 36.6%).

No.	Indicator	Baseline	EoP	Code
2	Number of HHs in target communes suffering significant damage/loss (in monetary terms) from climate-related impacts to be reduced by 10% as compared to baseline data	690	352	1

By the end of the project, 352 HHs in the targeted communes reported to suffer significant damage or loss in monetary terms from climate-related impacts (about 10,596,000 VND or 439 EUR per year) compared to the baseline of 690 HHs.³ This 48.9% decrease could be explained by enhanced awareness and capacity of local communities thanks to various project interventions. For example, during the field mission undertaken by the final evaluation team, the Focus Group Discussion (FGD) respondents confirmed that they could prevent their property from being destroyed or taken away by floods by relocating their possessions to higher ground, nailing down their furniture, and/or moving their boats to safe shelters as instructed. The interviewed students warned their families about the possibility of flooding, allowing them to evacuate older relatives to safer areas in a timely manner. The emergency response team of the communes and villages supported local residents to reinforce houses and relocate people to safe places, where required.

No.	Indicator	Baseline	EoP	Code
3	The institutional capacity of DONRE's DCC for planning and MRV of CCA and CCM interventions has been strengthened and enhanced to reach moderately high capacity level (≥ 80% compliance with set of criteria)	22	85.5	1

³ As might be expected, estimating this indicator meaningfully was challenging. However, it was accomplished by measuring a HH's monetary damage/loss through five variables, namely loss on income, assets, production, healthcare, and funerals over a range of three years and then averaging the results, under the assumption that weather conditions during the project period were similar to the three years prior to the project's start.

TT Hue DONRE DCC's institutional capacity⁴ was much enhanced thanks to various trainings, its involvement in the development of CCA M&E (e.g., preparation of technical documents, tools, data collection) and CCA database management system, and availability of a web Portal for documentation and information exchange. Regarding CCM, the provincial DONRE DCC organized a number of workshops to raise awareness of DONRE staff on GHG mitigation and developed a provincial MRV framework for GHG mitigation which served as the basis to develop the provincial MRV system to track the GHG emission reduction, and the MRV technical manual. The DONRE DCC became the first provincial agency in Vietnam with the capacity to undertake the CCA M&E and associated tasks in charge.

Meanwhile, it would require a budget to upgrade the portal. The development of the provincial network of specialised hydro-meteorological monitoring stations, if not having been canceled due to delays, would have resulted in a greater benefit to the local agencies and community.

2.2.3. Results

Result 1

Government and community capacities to respond to CC are enhanced

Task 1: Further increase awareness and understanding of communities and authorities on climate-related DRR/risk mitigation (RM), especially in most vulnerable areas, and ensure they have the necessary skills to respond to it

No.	Indicator	Baseline	EoP	Code
4	Percentage of project supported stakeholders (local authorities, community groups, mass organisations) with improved KAP with regard to CCA, CCM and DRR over project period	NA		0

The project proposed and the Project Steering Committee agreed to cancel this indicator, given failures to implement a key intervention and later on Information, Education, Communication (IEC) activities due to Covid-19 restrictions.

No.	Indicator	Baseline	EoP	Code
5	Percentage of local authorities (district, commune and village) with improved adaptive capacity and skills to respond to natural disasters over project period	NA	100	1

The project training covered a large number of key personnel at district and community levels. The final evaluation found that the training was rated as “very useful”, “practical” and “applicable” and highly appreciated by the FGD respondents. They highlighted changes in their behavior such as evacuating to safer places, following the authorities’ instruction, not going to the field when a storm entered. The commune staff disseminated information about natural disaster prevention and control, and integrated it into their regular meetings, especially those in the flood and storm season from July to December every year.

According to the project’s final result in 2022, 100% of trainees confirmed their improved knowledge and skills to respond to natural disasters, of which 90.4% said they had a firm grasp of the pertinent, substantial knowledge and skills, and 37.7% said they applied their knowledge and skills effectively or trained others. Additionally, after completing the course, all trainees claimed to have improved (39.7%) or significantly improved (60.3%) their knowledge and abilities to respond to natural disasters. This achievement was, therefore, well justified.

⁴ The indicator was based on a point scoring method and a set of 33 capacity assessment criteria checklist and considered three areas: technical capacity (including knowledge and skills), core performance capacity (including individual and organizational behaviors and capabilities), and enabling environment (including policy frameworks, legal systems, and resources). These were based on the 2008 Capacity Assessment Handbook published by the JICA Research Institute. Data was collected prior to the start of the project, on an annual basis during project implementation, and at the conclusion of the project.

Task 2: Help government establish comprehensive monitoring systems to monitor CC events and track progress on various CCA and CCM interventions, and become ready for direct access to climate finance

No.	Indicator	Baseline	EoP	Code
6	The provincial MRV system for CCM interventions, aligned with the national MRV system, has been established with at least 90% of the required procedures/steps being developed and completed	NA	95.8	1

The provincial CCA M&E and CCM MRV systems were developed on the basis of United Nations Framework Convention on Climate Change (UNFCCC) guidelines, given the unavailability of national guidelines at the project start. The provincial MRV framework for GHG mitigation was developed based on the national MRV guidelines for GHG emission reduction issued under Government Decree No. 06/2022/NĐ-CP and Circular 01/2022/TT-BTNMT dated 7 January 2022. Meanwhile, the pioneering work on the provincial CCA M&E system was in good progress.

According to the project report, 95.8% of the required procedures/steps were developed and completed which was above the target of 90%.

No.	Indicator	Baseline	EoP	Code
7	Percentage of provincial and district DONRE staff/officer trained by the project reported to have improved knowledge and skills for planning and MRV of CCA and CCM	NA	100	1

The project reported 100% trainees had their skills and knowledge for planning and CCA M&E improved (i.e., “improved” - 59.3%, “significantly improved” - 40.7%), of which 58.8% effectively applied the acquired knowledge and skills in their daily work, and 47.1% rated the trained knowledge and skills “efficient” and “useful” for their work. One good example was that the provincial and district DONRE staff could handle the baseline data collection for the CCA M&E system. The Key Informant Interview (KII) with DONRE representatives during the field mission undertaken by the final evaluation team showed that they learnt a lot from the project training and other interventions, thereby enhancing their capacity to perform their work. This justified the project’s reported result.

Task 3: Continue and expand environmental education and practices as introduced over the last two years in primary and secondary schools, including on DRR/RM planning and action

No.	Indicator	Baseline	EoP	Code
8	Percentage of secondary pupils in target schools with improved KAP with regard to CCA and CCM, and DRR	6.1	95.8	1

As reported by the project, the final result (EoP 95.8% vs. Baseline 6.1%) was very encouraging thanks to a large number of interventions undertaken in 28 target secondary schools. The mini KAP survey undertaken by the final evaluation team showed that the project was successful in positively enhancing the students’ CCA-CCM-DRR KAP. When asked to rate several specific activities (i.e., Golden bell contest, painting competition, and “I learn to live green” module), the students selected either “useful” or “extremely useful” option, saying that they learnt a great deal, and gained a better understanding of the importance of environmental protection and required actions in response to CC. In addition, there were particularly impressive increments in their behavior between “before” and “after” the project interventions, especially concerning sorting garbage at home (from 2.1 to 4.6), reminding friends and relatives to “live green” (from 2.7 to 4.9), and recycling paper (from 3.0 to 4.8) (see Appendix F3 for details).⁵

No.	Indicator	Baseline	EoP	Code
9	Percentage of total activities in action plans proposed by secondary Student Action Groups (SAGs) that have been implemented over project period	N/A	100	1

⁵ In this mini KAP survey, the evaluation team selected some typical activities to identify changes in the students’ practice before and after the project interventions. Scale: 1 = ‘Never’, 2 = ‘Rarely’, 3 = ‘Sometimes’, 4 = ‘Often’, and 5 = ‘Always’

The SAGs could complete all (100%) planned activities under the guidance of their school teachers. Typical activities included conducting CC communication activities, training for their peers, making recycled products, organizing extracurricular activities such as painting and speech competitions. During the final evaluation's field mission, the surveyed students highlighted a number of positive changes in their schools thanks to the SAGs' activities such as students being more aware of CC risks and impacts, students being more conscious about their positive role as disseminators of environmentally-positive practices, and students' classrooms being "greener" and "cleaner". The SAG named "Green Planet" of Phu My Secondary School, for instance, was getting bigger in size (presently having one hundred members!) which indicated a growing interest in these CC themes among the students.

Result 2

Small-scale infrastructure is better protecting people and their livelihoods

Task 4: Plan and implement climate adaptive and resilient physical infrastructure in target areas, in support of people's changing livelihoods and increased protection against manifestations of CC - particularly storms, floods, droughts in the dry season, and salinisation of productive soil and lagoon water

No.	Indicator	Baseline	EoP	Code
10	Area (ha) of productive land better protected against the impacts of CC by project-supported infrastructure sub-projects	NA	875 ha	NA
11	Number of HHs directly benefiting from project-supported infrastructure sub-projects	0	5,466 HHs	NA

The infrastructure works directly benefited 5,466 HHs (accounting for 61.4% of total beneficiary HHs) and protected 875 hectares of agricultural land against specific CC impacts such as storms and flooding, salinity intrusion caused by sea level rise. The final evaluation found that the infrastructure works were highly appreciated by the local residents. For example, the boat shelters were very effective in protecting local fishers' assets during the recent storm and flooding in October 2022. The constructed dams, dykes, and canals effectively enabled the cultivation, transportation, and prevention of salinity intrusion. However, it was also observed that these infrastructure reached their limitations, and that they were already flooded too. Specifically, due to the flooding, the final evaluation team could neither visit any infrastructure works in Quang Dien district, nor access some selected works such as the salinity intrusion dams in Loc Tri commune (Phu Loc district) and in Vinh Xuan commune (Phu Vang district), and the boat shelter in Vinh Hien commune (Phu Loc district). The CC effects were becoming more severe, and these works were temporary dysfunctional.⁶

Result 3

Resilient ecosystems help to better adapt people to CC

Task 5: Develop and promote methods for participatory management, use and conservation of natural resources

No.	Indicator	Baseline	EoP	Code
12	Percentage increase in number of fishermen and farmers in target communes with improved KAP on effective management, use and conservation of fisheries and aquatic resources in Tam Giang-Cau Hai lagoon areas	43	99.4	1

The endline result (99.4%) was very high compared to the baseline data (43%). The final evaluation's FGD results showed that the fishermen were aware of key fishing regulations (e.g., Law on Fisheries, Decrees 42, 26, Circulars 18, 19, 20), sustainable aquaculture rearing and protection of aquatic resources, avoidance of destructive fishing, and registration of boats with size 6-12m. In Quang Dien district, significant changes in their behavior were observed, including the use of larger mesh size, replacement of high-capacity fishing boats by lower capacity boats of 16, 18, 20 CV, and establishment of self-management groups to protect the aquatic resources. In Phu Loc district, the FAs committed not to use electric pulses, and no longer secretly fish in the protected zones after the project training and the government's encouragement. Meanwhile, the use of small mesh nets had not been fully followed.

⁶ When a major flood hits, every 2-3 years in TT Hue, flood waters go to sometimes two meters and more, hence all is under water, including small-scale infrastructure. When waters recede these facilities work again as normal and protect HHs like before.

No.	Indicator	Baseline	EoP	Code
13	Percentage increase in the number of FAs in target communes with improved institutional capacity for management, use and protection of fisheries and aquatic resources in Tam Giang-Cau Hai lagoon areas	25.5	86.5	1

There was a significant increase in the proportion of FAs in the target communes with improved institutional capacity for management, use and protection of fisheries and aquatic resources in the Tam Giang-Cau Hai lagoon (baseline 25.5% vs. 86.5% endline). According to the FGDs and KIs results undertaken by the evaluation team, in Quang Dien district, thanks to the project's support for installation of more markers around the core zones, and concrete fish aggregating devices at Fisheries Conservation Zones (FCZs) and nursery areas, it minimized illegal fishing and the loss of fish and shrimp during the flood season. The local fishermen were very excited to discover that shrimp and fish were sheltering in the reef a lot, which increased the aquatic resources. The installation of poles to demarcate fish cage farming areas helped to restore the fish cage farming in Quang Thai and Quang Loi communes, given the decrease in the amount of algae in the lagoon in recent years. In Phu Loc district, the boundaries of protected zones for each FA were well identified. The fishery protection team in Giang Hai commune conducted regular patrols. The fishermen in Vinh Ha commune (Phu Vang district) confirmed higher aquatic yield thanks to the establishment of protected zones and fishing regulations, changes in size of nets and other fishing tools. Meanwhile, there remained a number of issues to handle such as depletion of aquatic resources and water pollution in the context of increasingly harsh climate, lack of patrol boats and funding, repairing funding, among others.

No.	Indicator	Baseline	EoP	Code
14	Percentage of (18) sample sites in the lagoon where the quality of the surface water complies with all the six parameters (S‰, potential hydrogen (pH), Alkalinity, PO ₄ , Chemical Oxygen Demand (COD), Biological oxygen demand (BOD ₅)) as per the required national standards set by QCVN 08 - MT:2015/BTNMT/MONRE and QCVN 02 - 19:2014/BNNPTNT/ Ministry of Agriculture and Rural Development	38.9	72.2	1

The samples were taken twice per year, in collaboration with the sub-department of fisheries under DARD. According to the project's latest test result in June 2022, 72.2% of the sample sites had the surface water quality complied with all six parameters, which was similar to the test result in June 2020 (77%). However, the test results in December 2020 and December 2021 showed that none of the 18 sample sites complied with all of the six parameters due to low levels of Salinity and Alkalinity parameters (<4‰ and <36 mg/l, and ≤2.5‰ and ≤38.5mg/l, respectively). The other parameters (pH, BOD₅, COD, and PO₄) in most of the sample sites met the required standards. This could be explained by the timing when the tests were undertaken, i.e., the tests for both 2020 and 2021 were conducted in December, during or shortly after a period of intense flooding or heavy rainfall, while the water quality was usually higher in June due to the onset of summer.

It's not easy for the final evaluation team to verify the results, but there is no doubt that the awareness of local residents about environment protection and aquatic resource conservation were greatly improved thanks to the project interventions. During the final evaluation's field mission, for instance, they reported to treat the wastewater (despite simple methods such as using lime, chlorine) before discharging to the lagoon, or inform local authorities if their fish and shrimp had diseases. They together monitored the wastewater discharge and reported if there was any issue.

Task 6: Pilot the development of a market for healthy organic agricultural products as a new and sustainable growth industry for the region

No.	Indicator	Baseline	EoP	Code
15	Percentage increase in the number of HHs in pilot communes with improved knowledge and a more positive perception of organic food products	8	96	1

The result was very impressive (baseline 8% vs. 96% endline).⁷ The final evaluation found that in Quang Dien district, the local farmers understood the OA benefits and challenges as well as negative effects of chemical use in agriculture production thanks to the project training, study tours to OA models in other provinces. In Phu Loc district, the development of organic peanut was really a challenge, when local farmers accepted to pilot the model only after about 10 meetings and various communication activities, and refused to continue after the failure of the first crop, saying the OA productivity was almost the same, but it was labor intensive. However, thanks to the project and authorities' advocacy, some (hardworking) farmers continued their work. At present, they not only maintained the peanut model, but also cultivated other crops in the organic direction. In Phu Vang district, the interviewed farmers were very enthusiastic about the OA, saying it was good for their health and environment despite being labor intensive. They reduced the amount of chemical fertilizers in other crops using conventional methods.

No.	Indicator	Baseline	EoP	Code
16	Percentage increase in the number of local people in pilot communes who are willing to pay an average 15% premium for certified organic food products	26.5	92.4	1

According to the project report, the percentage of local residents willing to pay 15% more for certified organic food products witnessed a significant increase from 26.5% (baseline) to 92.4% (endline). The increase was primarily attributable to technical training, and IEC campaigns (e.g. video clips, reportages, news broadcasted on TV, newspapers, social media) that highlighted the health benefits of organic produce. Additionally, companies promoted OA produce through advertisements and trade fairs.

However, the final evaluation findings showed that the result was challenged by the fact that the higher price could be guaranteed only if the organic products were sold to supermarkets, companies or luxurious restaurants rather than to ordinary consumers in localities as advised by the interviewed Centre for Agriculture Service (CAS) representatives and local farmers. Thanh Ha organic vegetable (Quang Thanh commune, Quang Dien) was an exceptional case where the CAS was proactive in buying the products for its farmers at 25-30% higher than the market price and searching for purchasing agents. In Phu Loc district, the organic peanut oil was sold to HueViet recently at nearly double the price (230,000 VND/liter or 9.54 EUR/liter) of conventional peanut oil (140,000 VND/liter or 5.81 EUR/liter), but yield and consumption remained low. In the past, when the peanut oil was not certified as an organic product, it was mostly used for domestic consumption or sent to relatives as gifts.

Furthermore, the farmers in Quang Tho commune said that it was hard for consumers to buy organic products at 15% higher price. Few people were willing to buy Quang Tho organic centella at 21,000 VND/kg or 0.87 EUR/kg, and the farmers could sell their centella to Quang Tho 2 Cooperative only. The organic centella price was only 1,000 VND/kg or 0.04 EUR/kg higher than VietGAP centella despite longer cultivation duration and huge investment. The organic vegetable in Vinh My commune was forced to sell at lower price because it did not look as good as the conventional vegetable, while the production cost was almost three times higher than the conventional production due to costly biological products and huge labor cost. This also indicated that even if the organic vegetable price was set 15% higher than the conventional vegetable price (this 15% premium excluded the increased cost), it could not compensate for the organic production cost. In Phu Vang district, the organic rice price sold to the cooperative was not as high as to businesses (e.g., HueViet). It could also be sold to schools and Duyen Anh Restaurant, but not much in quantity yet.

Meanwhile, the results were hampered (e.g. prices fetched in market) by a PGS system that needed to be in place local to provincial level to be 100% organic certified, yet was only fully completed in late 2022, with establishment of PGS Provincial Coordination Board under DARD.

No.	Indicator	Baseline	EoP	Code
17	Volume decrease in the use of chemicals in OA across all pilot interventions	NA	Fertiliser less: 37,339 kg; Pesticides & herbicides less: 118.2 litres	NA

⁷ The indicator referred to 400 HHs living in 12 pilot target communes that implemented OA models and other related interventions.

The project estimated a decrease of 37.33 tons of chemical fertilizers and 118.2 liters of herbicides, thanks to the OA production adopted by the HHs piloting the organic models. The final evaluation team found that this was viable because there was no use of chemicals in OA production, and organic fertilizers and biological products were used instead. The farmers knew how to make compost fertilizer (though it was constrained by regular flooding, small garden, labor intensive, lack of probiotics/ compost materials in localities), biological pesticide, and make use of agricultural by-products, which were usually discarded or burned earlier. The awareness of local farmers, whether or not participating in the OA models, was enhanced, thus, they reduced the amount of chemicals in other cultivation areas. The ecosystem tended to recover well, and the soil fertility improved over time.

No.	Indicator	Baseline	EoP	Code
18	Progress in total revenue of organic products produced by project supported HHs sold over project period	NA	9,172.5 Mn VND	NA

As per the project record, the total revenue of organic products in 2020-2022 was estimated at 9,172.5 mil VND or 380,000 EUR. It would take time to establish an OA model. During the initial years of OA production, the cost was high, while the productivity might be low (though tended to increase over years). For example, the local farmers shared with the final evaluation team that it would take about three years for organic centella farmers to enhance the soil fertility. Phu My organic rice farmers recalled the difficulties faced during the first two years of cultivation, and now they were happy to see the organic rice productivity getting more stable (i.e., 0.2 ton/500m² in 2019, 0.22 ton/500m² in 2020, 0.24 ton/500m² in 2021, and 0.26 ton/500m² in 2022), thanks to the improved soil fertility. While some farmers reported that their organic products could be sold to the market, the others said their organic products were mainly used for domestic consumption, or remained struggling to find a stable market.

No.	Indicator	Baseline	EoP	Code
19	GHG emission reductions from OA interventions in pilot areas	NA		0

This indicator was cancelled due to technical complications in measuring and the small scale of the pilots. The Project Steering Committee approved the cancellation on 18 December 2020.

No.	Indicator	Baseline	EoP	Code
20	Progress (%) in process leading up to fully operational PGS for organic food product certification	NA	84.8	1

The PGS certification⁸ process consisted of eight steps and 25 different procedures. The progress was reported at 84.8% completed by November 2022 (i.e., 20 OA groups were certified as “PGS OA producer group” by the District Intergroup Certification Committee, 65% of total groups completed or reached the final step of PGS certification procedures, and 25% of total groups completed 70% of total PSG procedures, three District Inter-Group Certification Committees were established in three districts, and the provincial PGS Coordination Board and a provincial Organic Agriculture Association (OAA) were established, and are housed within the provincial DARD).

The final evaluation team’s interview with TT Hue DARD showed that the establishment of the provincial OA Association and PGS Coordination Board (which was only fully established in October 2022) was necessary, given that the province was promoting OA production, and it would require a third party to certify the OA products at a relatively high cost of about 10 million VND/ha or 415 EUR/ha. [The province expected to set up another six district PGS groups in the other six districts.]

No.	Indicator	Baseline	EoP	Code
21	Percentage progress (average) in the organic food post-production and marketing process cycle	NA	79.7	1

⁸ Organic product consumers relied on either an external private/state agency or the network of individuals and organizations involved in the production, distribution and consumption/use of the organic product to guarantee the organic product quality. A guarantee system based on the involvement of people/organizations directly involved in the organic supply chain was called a PGS. The project supported the process of adopting the PGS to the certification of organic food products of pilot models.

The organic food post-production and marketing process consisted of five key steps: 1) Processing, 2) Packaging, 3) Labeling, 4) Advertising, and 5) Distribution. The project supported 20 OA models for organic rice, vegetable, peanut/peanut oil, and centella, 19 of which continued in 2022.⁹ On average, 79.7% of the model groups finished or were in the final stage up to date.¹⁰ Specifically, 17% completed the entire process cycle; 62% arrived at the final stage (i.e., 80% of the entire process cycle); and 21% finished 70-80% of the entire process cycle.

The final evaluation's findings showed that the first four steps were progressing well, while step no. 5 "Distribution" would require further efforts, given that at present, the farmers mostly relied on the cooperatives to consume their products (e.g. centella), while the cooperatives could not guarantee a stable consumption at an expected price. In addition, the current yield remained low, which made companies hesitant to sign contracts. Step no. 4 was another challenge for state agencies and related parties to handle.

⁹ The organic chicken model in Quang Dien district stopped.

¹⁰ This indicator measured the project outcome through the average percentage process in organic food post-production and marketing process cycle. The project reviewed all the Activity Completion Reports and used a process assessment checklist to assess the progress every six month, using the coding system of 0-1 point: "Not started yet" = 0 point; "On-going" = 0.5 point; "Completed" = 1 point. Then the data per pilot model was combined and analysed.

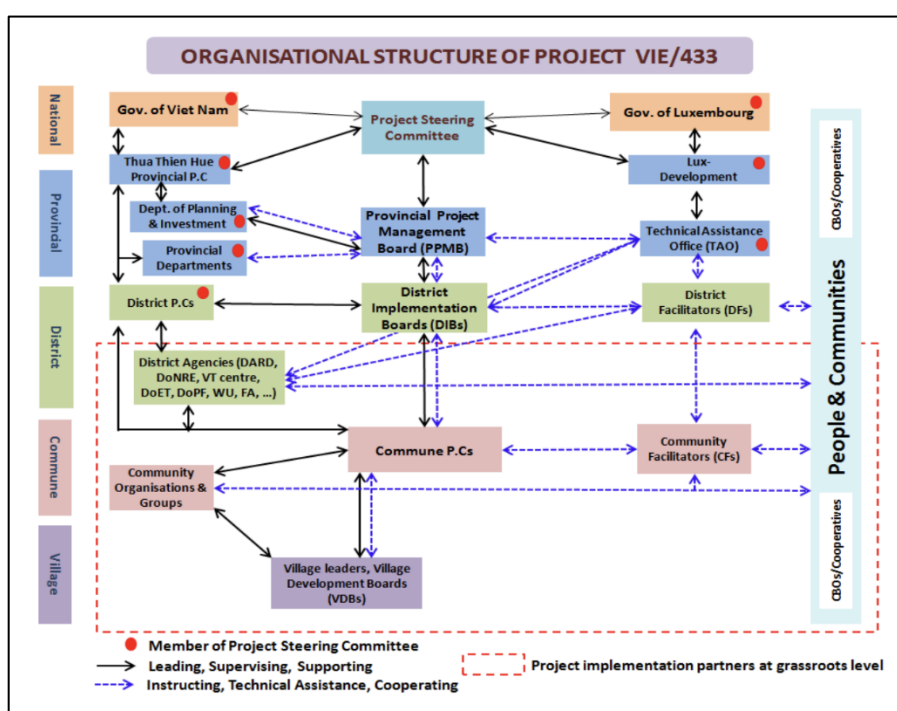
3. IMPLEMENTATION DESCRIPTION

3.1. Project's management structure

VIE/433 had the same management and implementation arrangements as VIE/033 (Climate Adapted Local Development and Innovation Project). The institutional structure and partners of VIE/433 and VIE/033 were virtually the same. These included working primarily through Delegation Agreements (DAs), preparing Activity Operation Plans and Activity Completion Reports following the interventions, writing technical and financial progress reports, etc.

The organisation of the PSC for VIE/401 and VIE/433 were mostly the same. The PSC consisted of representatives of Luxembourg (Ministry of the Environment, Climate and Sustainable Development - MECSD) and Vietnam governments (Ministry of Planning and Investment, Provincial People's Committee (PPC), District People's Committees, and relevant departments such as DONRE), and Chief Technical Advisor (CTA), and was in charge of key strategic decisions and review of progress. The LPMB was established to manage and implement the two ICF's projects, VIE/433 and VIE/401. The LPMB was headed by the same Vice Director of the DPI. The LPMB staff were existing DPI staff, and worked on the two projects for 50% of their time.

Figure 1: VIE/433 Organizational structure



The Technical Assistance (TA) team consisted of three national technical advisers, an international CTA, a (directly Luxembourg-funded international) Junior Technical Assistant, a Senior Admin-Finance Officer, an Admin-Finance Officer, an Interpreter and a driver. All but one split their time between VIE/433 and VIE/401 (50-50). Each DIB was supported by a District Facilitator contracted by LuxDev and being part of the TA team.¹¹ The LPMB and TAO worked in close collaboration, on the same premises, and were jointly responsible for overall project management.

The project also based their activities on the requirements at the community and village levels. This was able to occur, as the project got involvement of local authorities and communities at the grassroots level including village leaders, and cooperatives. This ensured that the project's activities were conducted in-line with the requirements of the beneficiaries. Overall, the project structure enabled a holistic set of support from different levels, which in turn supported the achievement of the project objectives.

¹¹ There was no Community Facilitator at the commune level despite being shown in the organizational structure.

3.2. Measures taken for harmonisation and alignment

The project was fully aligned with the GOV's policies, programmes, systems and procedures. The project adopted a strong participatory approach involving relevant national, provincial and district-level GOV agencies and stakeholders. By following this approach, the project resources and local resources were managed well towards achieving the project objectives. There were minimum modifications of the project interventions, simply because they were well designed in close consultation with local agencies and communities. This is considered as one of the key elements to ensure the project's success as well.

Similar to VIE/033, VIE/433 ensured that the GOV procedures were applied throughout the project's implementation, for instance the establishment of the M&E and MRV systems for CCA and CCM respectively. The GOV is responsible for these systems, and the project has worked alongside the relevant departments to develop them in-line with the GOV's requirements and regulations, as well as train the officials. OA interventions were designed to be aligned with the GOV's regulations. For example, Decree no. 109/2018/ND-CP dated 29 August 2019 by the Prime Minister on OA, and Vietnam's National Standard on OA TCVN 11041:2017 were used as guiding documents for the OA interventions.

3.3. Measures taken to place capacity strengthening at the heart of the Project

Several project interventions were about training and awareness raising, or typically included training and technical support as an integral part of the implementation. The capacity building targeted a wide range of beneficiaries, including both organizations and individuals, at different levels. Specifically, all Tasks under Result 1 on Government and community capacities to respond to CC were all about enhancing capacities of communities and farmers, schools, authorities and local leaders and technical staff on DRR, RM, CCA and CCM. Various trainings were designed for Task 5 and 6 under Result 3. Technical support was also provided for implementing partners and beneficiaries to enable them to handle their work. Behaviour change will likely last for those whom were exposed to the project activities.

The capacity building interventions were considered highly successful thanks to the well-implemented participatory and community-based approaches and invaluable (and systematic) training and communication activities as is shown in the indicator analysis of the specific objective and results. Specifically, for Result 1, 100% of local authorities with improved adaptive capacity and skills to respond to natural disasters, 100% of provincial and district-level DONRE officials with improved knowledge and skills for planning and MRV of CCA and CCM, and 95.8% of secondary pupils in target schools with improved KAP of CCA, CCM and DRR.

Nonetheless, the evaluation revealed a few areas of concern, including some complaints regarding interdepartmental communication and implementation, as issues of miscommunication and miscoordination led to a lack of funding for certain tasks. Strengthening the capacity of government agencies should emphasize interdepartmental coordination and cooperation and develop collaborative systems and mechanisms that allow for coherent and efficient project implementation.

3.4. M&E

The VIE/433 M&E system adopted the VIE/033 M&E system with some adjustments, taking its lessons learnt into consideration. The project performance was tracked in two dimensions:

- results-based monitoring (i.e., tracking the project achievements by output and outcome indicators, using the M&E matrix and Project Output Matrix, and data collected, processed and reported bi-annually, and annually by the project stakeholders); and
- context monitoring (i.e., assessing risks of external factors and required mitigation measures). The project monitoring was separated from the monitoring component under Task 2 which focused on enhancing institutional capacity in CC monitoring and MRV.

The project M&E documents included the M&E manual, M&E work plan, and M&E matrix, which served as a guidance on the data collection and reporting. Other monitoring tools consisted of infrastructure progress monitoring excel sheets, data collection instruments, and databases in Excel/Statistical Package for the Social Sciences (SPSS).

The baseline survey was conducted in December 2018, followed by the KAP survey (as part of the baseline) in Quarter 1, 2019. The endline survey, including the KAP survey, was done in Quarter 3-4, 2022. Given budget and time constraint, no Mid-term Review of VIE/433 was planned.

3.5. Measures taken to ensure partnership

The project collaborated with different stakeholders over the course of implementation, and it proved to be very efficient. A large number of diversified interventions completed within a limited timeframe was good evidence for the excellent coordination and partnership, and project organizational structure. The IPs were more familiar with the project procedures, and found it less complicated, thanks to the project guidance and experience from VIE/033 (e.g., DAs terms). The private sector (e.g., HueViet Organic One Member Company, Duyen Anh Restaurant, Vo Ni enterprise Que Lam enterprise for OA production under Task 6) was also involved in the planning (i.e., developing annual workplan and budgeting) and implementation (e.g. meeting with farmers and cooperatives to discuss varieties and price; signing contracts with agriculture cooperatives on behalf of farmers to buy OA products prior to each crop; attending field visits, meetings, technical training; monitoring the OA production; joining the collection, packaging, promotion and distribution of OA products). An international non-government organization (i.e., HueHelp) provided survival swim classes to more than 4,000 primary students.

3.6. Local contribution

The project total budget was 3,261,000 EUR, of which Luxembourg's contribution (Climate and Energy Fund grant) was 2,961,000 EUR (original 2,000,000 EUR plus 961,000 EUR extension) and GOV's contribution from the provincial and district budget was 300,000 EUR (excluding tax exemptions as national financial contribution). The grant was disbursed in accordance with the implementation progress and approved work plan. Meanwhile, the GOV's contribution was used to cover the project administrative and operational cost at the provincial and district levels.¹² VIE/033 vehicles and office equipment were transferred to VIE/433 and VIE/401. Environment impact assessments and associated mitigation actions were undertaken by local counterparts.

Similar to the previous VIE/033, the standard local contribution to hardware interventions accounted for 2%, and a community contribution, either in cash or in kind, was applicable to almost all software interventions. For instance, the local partners arranged venues for training; the farmers contributed 100% varieties, 50% organic fertiliser, 100% manure (organic centella model in Quang Dien district, Annual Work Plan and Budget (AWPB) 2019-2020, Task 6), 50% organic fertiliser, 100% manure (organic vegetable production model in Phu Loc district, AWPB 2019-2020, Task 6) and labour.


3.7. Project disbursement

The project disbursement was low during 2020-2021 due to delays in implementation in the context of Covid-19 pandemic. As of 31 December 2022, cumulative expenditure reached 2,804,918 EUR, or 94.73% of Luxembourg's 2,961,000 EUR budget.

Organization and Management activities (Task 0) accounted for 20.14% of the total disbursed amount and was consistently disbursed over the years. A large proportion of the budget was spent on the hardware intervention (Task 4), most of which was disbursed in 2018 as part of DAs signed with DIBs in charge of infrastructure in three districts. A relatively equal disbursement ratio was recorded for Task 5 (14.39%) and Task 6 activities (16.92%). The other tasks (Task 1, 2, and 3, mainly consisting of capacity development interventions) made up a much smaller proportion of the total budget, 1.87%, 4.44%, and 4.91% respectively (see Appendix C1).

¹² For the previous project VIE/033, almost half of the Government contribution was to support infrastructure.

4. PROJECT EVALUATION

Evaluation scoring	
	1 Excellent results, significantly better than expected.
	2 Above average results, performance in certain areas better than expected.
	3 Expected results but there is scope for improvement.
	4 Below average results, clear need for improvement.
	5 Red flagged, the Project needs to be urgently reviewed / restructured.
	6 The Project was unsuccessful, or the situation has deteriorated on balance.

Given six different tasks undertaken by different implementing partners, and potential factors affecting the performance of each task in each location, the team assessed the project criteria (relevance, coherence, effectiveness, efficiency and sustainability) by tasks and locations. We adopted a participatory approach in assessing and scoring the project tasks. The rating (1-6) was decided by the team in review of the project documents and in consultation with KII and FGD participants. Specifically, scoring cards of all evaluation criteria were shown to the FGD participants with an explanation of each term and scoring (1-6). The group chose in consensus after discussion a final score to award each criterion. Similarly, we asked KII respondents to score the project interventions that they were involved in (see Appendix F2). The scores produced for each activity were then averaged.

4.1. Relevance – is the intervention doing the right thing?

VIE/433 interventions were rated as very relevant. This excellent score was attributed to the highly participatory planning process and close consultation with related parties over the course of implementation. The project was fully in line with the national and provincial policies of enhancing the CCR. It focused on raising awareness, skills and capacity on CC and DRR, CCA M&E and CCM MRV capacity, climate-resilient infrastructure sub-projects, lagoon ecosystem conservation, and OA production, which were all essential to enhance the CCR (e.g., better preparedness and protection against floods and other natural disaster risks, improved management and conservation of aquatic resources, reduced volume of chemicals used in agricultural production) and realize the provincial targets (e.g. developing OA was seen as a priority of TT Hue province, and the provincial authorities had been taking various initiatives to promote the OA production.¹³ The project helped the province to pilot the OA models.) Each intervention was aligned with the communities' actual needs and priorities, which could be well justified by the active participation and tremendous support of local authorities and communities during the implementation process and the ownership of the process and results. A marginally lower score was given to some interventions such as the provision of “small mesh” to the FAs in Phu Xuan commune, lack of sorted trash cans in villages, relatively small scale of infrastructure sub-projects, despite being very useful.

The rating for relevance is 1.3.

¹³ Resolution No. 20/2020/NQ-HDND of the People's Council of TT Hue province dated 23 December 2020 stipulating a number of policies to facilitate the development of agricultural production to restructure the agricultural sector in TT Hue province in the 2021-2025 period, including policies to support the OA development. The OA development scheme in TT Hue province for the period of 2022 - 2026 and orientation to 2030 was finalized and approved as per TT Hue PPC's Decision no. 1342 /QĐ-UBND dated 6 June 2022.

An agreement on investment cooperation to expand production, processing and consumption of OA products between the People's Committee of TT Hue province and Que Lam Group JSC was signed in 2019, and a memorandum of cooperation in building, expanding and developing OA and circular agriculture in the period 2022-2026 between the two parties was signed in October 2022.

4.2. Coherence – how well does the intervention fit?

The project was aligned with the provincial policy frameworks and mandates of functioning departments. These activities were well-coordinated and complementary to one another. For example, the project supported DCC of the provincial DONRE in developing institutional capacity related to CCA M&E and CCM MRV and helped the agency become the first agency in Vietnam with capacity to undertake the associated tasks. As per Decree No. 06/2022/ND-CP, the provincial MRV system should be developed following the national MRV guidelines, and the functional departments should report the data to the PPC as regulated. The development of OA was aligned with the provincial and district priorities and development policies. The project partners were well trained on necessary procedures to ensure compliance with local regulations.

In terms of external coherence, the project established contacts with a number of multilateral and bilateral agencies, and I/NGOs such as :

- a GCF-funded and UNDP-managed project, for cooperation in CCA and DRR monitoring;
- GIZ, for work in mitigation MRV;
- Hue Help, for survival swimming classes for students;
- University of Hue for OA support; and
- Vietnam OAA.

The linkages with a number of market players operating in the OA field such as Que Lam, HueViet, and Duyen Anh enterprises were also established. Active engagement with these stakeholders allowed the project to harmonise with their initiatives.

The rating for coherence is 1.6.

4.3. Effectiveness – is the intervention achieving its objectives?

The project's interventions were evaluated to be effective. The project's goals and objectives were achieved due to the proper design and implementation. The parties (TAO, DIBs, IPs) were functioning and collaborating very well. VIE/433 provided a good case study in developing the provincial CCA M&E and CCM MRV system. The FAs and lagoon communities' capacity in response to CC was strengthened thanks to the project training and support. The project infrastructure sub-projects, despite being small scale, were of high quality and benefited the local population, particularly the boat shelters which worked well during the recent storm and flood in October 2022. The OA pilots, which were seen as very challenging - there was very little in place before the project started, and would require much more effort to make commercial products, gained initial important results in raising local awareness and knowledge.

There were some positive unintended outcomes including the establishment of a parallel economy for waste during OA interventions (e.g., the waste generated through agricultural activity, such as straw or husk that was usually discarded - was now utilised, and a transactional system took place wherein the waste was traded for money; or indeed certain farmers were paid to store the waste), and the identification of weaknesses in the solid waste management infrastructure at certain locations, such as schools (e.g., the lack of sufficient solid waste management, especially at schools; with reference to a lack of bins and so on). However, there were additional negative effects, such as the theft of fish from communes that practiced fishery conservation by communes that were not targeted. This type of free-rider problem was not necessarily anticipated and plagued targeted fishery communes.

The rating for effectiveness is 1.9.

4.4. Efficiency – how well are resources being used?

Thanks to the project's proper design and implementation, the project resources were well managed and could result in significant achievements. Apart from significant delays in implementation due to the Covid-19 outbreak,¹⁴ the project activities mostly followed the plan with minimum adjustments. The implementing parties were very competent and committed to the implementation, which was vital to the success of the project, given that some interventions were very challenging such as CCA monitoring and MRV system, and OA development. The project provided sufficient training, tools and technical guidance and support to ensure the implementation capacity of beneficiaries and implementing partners. The project's spending was in accordance with the cost norms and budget plan.

The rating for efficiency is 2.0.

4.5. Sustainability – will the benefits last?

A number of the project activities would likely continue to a greater or lesser extent, while it would require time to assess some activities such as OA models. Specifically, the CC-related awareness, knowledge and capacity of local people were enhanced thanks to the project's practical training, diversified communication activities, and valuable technical guidance and support. The students introduced what they learnt from the project activities to their families and friends, and some of them shared it further with other people. The schools integrated the project activities in their extracurricular activities, though it would be limited by available funding and time.

The national MRV guidelines were issued recently as mentioned above. The MRV-relevant training that occurred during the project proved invaluable. The province might allocate a budget to maintain the CCA M&E work, but it would depend on the funding availability and feasibility. In essence, VIE/433 served as both a pedagogical tool and a valuable case study to ensure a sustained CCA M&E and CCM MRV system going forward.

The constructed infrastructure was superior to similar programmes and projects in the same region; however, local budgets for the infrastructure sub-project's Operation and Maintenance (O&M) remained limited, especially in the context of increasing natural disasters. Concerning the infrastructure selection process followed since VIE/033, the government actually picked up on that too. They were not following exactly the same selection process as the project, but they considered different criteria and variables for a more informed database selection of infrastructure interventions.

The FAs' operation would be constrained due to the lack of patrol boats and O&M funding, while there was a lack of funding to further stock fingerlings and fences to protect aquatic zones, failure to use bigger mesh size by all fishermen, and water pollution in downstream areas.

The farmers mastered the compost fertilizer production, and would continue to make it for use in future crops. However, the OA model sustainability would be challenged by the technical complexity, high investments for initial crops, labor intensive, small scale production, low consumption of products, costly PGS testing, lack of PGS operation funding, unfavorable weather, flooding, lack of materials for making compost fertilizer, among others. In addition, it would be likely to challenge the continuation of the models, given the project withdrawal at the early stage of OA development, small scale of pilot models, and required time to develop a good OA model in general (i.e., 5-15 years, depending on types of models), including various steps to make it work well. However, the project aim was to prove the model could work, by putting in place the necessary building blocks (awareness/ capacity building, production, packaging/labeling/marketing, certification), which was largely done and successful, and the buy-in and integration in the GOV system (established OA Association and PGS Coordination Board within DARD) was a major result, critical for sustainability. Suggestions to sustain the OA production are presented in the next section.

The rating for sustainability is 2.7.

¹⁴ The Covid-19 pandemic seriously disrupted the project implementation in 2020 and 2021, given frequent restrictions (e.g., no meetings, no training, provincial borders closed, schools closed, etc.). Thus, many planned activities were put on hold and delayed, and some were canceled. Many others such as training, study tours, workshops/seminars must be rescheduled as large meetings and gatherings were not allowed. This was, however, out of the project control. The project did whatever was possible in response to the outbreak, and quickly resumed its activities as soon as the restrictions were removed.

4.6. Crosscutting aspects

4.6.1. Governance for Development

Good governance was well integrated into the project design. The Project put a strong emphasis on raising CC-DRR awareness and capacity of a number of government agencies and community individuals at all levels. The two components, CCA M&E-CCM MRV and OA development, were new and challenging, but the project managed to complete key steps to enhance the governance capacity and create a fundamental background for further developments.

4.6.2. Gender equality

The project focused on tackling CC-related issues, and there was no specific activity that particularly targeted women or men; however, gender equality remained an important aspect. Attention was paid to the vulnerabilities of women, and gender inequalities in relation to CCA and DRR when designing the project interventions and selecting beneficiaries. VIE/033 had specific tasks linked to gender when VIE/433 did not. However, the project continued to work the same way it did before, and ensured that at activity level there was a balanced 50-50 in gender representation.

The project M&E data showed that female participants were involved in a number of activities such as training, workshop, awareness raising. For instance, female participants accounted for 51% in the training on result-based project management, CCA-DRR M&E, data collection and analysis (T2A1), and approximately 60% in the CC-DRR training and extra-curricular activities for secondary school students (T3A1). The SAGs included more than 50% of female students. The training on cage fish farming, fishing laws and regulations and boat registration (T5) which were typical for male fishermen, also included female participants (approximately 10%). Approximately 30% of trainees attending OA-related training (T6) were female.

4.7. Specific questions

1. Assess the quality and sustainability of the CC/DRR infrastructure projects supported by the project as well as the O&M system put in place.

Similar to VIE/033, the construction quality is highly satisfactory and is regarded as being significantly better than the infrastructure built out in other programmes. The new sub-projects helped minimise negative environmental impacts, prevent soil erosion, and protect the land from CC effects.

The financial and human resources for O&M are mobilised by various organisations. The Agricultural Cooperatives are in charge of irrigation canals and other works for agricultural production, while the Commune People's Committee (CPC) is in charge of public roads and other civil works. The CPC utilises the state budget and/or other available local resources for management, O&M. Regarding maintenance, the majority still relies on the community, the labour of the people, or the annual payment of rice in accordance with the regulations. Members of the cooperative are required to contribute cash or in-kind labour to the O&M. However, maintenance work remains limited and inconsistent, varying by location and construction type.

Implementation and execution of maintenance tasks will be effective when specified and directed by the project and accompanied by adequate resources. The project must conduct an inspection and evaluation of post-flood damage in order to repair the damage to the VIE/433 project as well as the previous projects (VIE/023 and VIE/033) and provide prompt solutions. Future project(s) should take this into account, given the local limited budget as mentioned above.

The infrastructure projects have been maintained and are sustainable (in the sense that all infrastructure has a lifetime of some decades, and current and future CC projections for the target region were put into consideration during the planning stage). This has been because of correct initial construction and implementation of the O&M system.

Noteworthy, however, is that modest VIE/433 funds were allocated to repair infrastructure from the previous LuxDev livelihoods project. The same may be needed for VIE/433 CC/DRR infrastructure in 2025 and beyond. This is because funds for O&M are modest and cannot cover substantial repairs – which might make eminent sense in terms of return-per-dollar but are difficult to secure through the present Vietnamese budgeting systems. The project may look for options to allocate some funds for this maintenance if feasible, and in future, the government should commit to provide infrastructure repairs in case of damage.

There were not many spillover effects from VIE/433 to GOV systems to plan, build and manage infrastructure, as we might expect, as the work that was done was carried out somewhat independently from the GOV, mainly relying on provincial and local agencies to implement these projects. DPI are reportedly going to use modified impact scorecards to help them prioritise investment in the future, which we might label a modest “power result”¹⁵, but otherwise GOV (TT Hue) ways of doing O&M and repairs remain as before (i.e. not good enough). We can argue, however, that awareness about this issue has been achieved by VIE/433. If there was a post-evaluation in, say 2025, of the impact of 20 years of (closed) LuxDev projects in TT Hue, a comparison of LuxDev-funded infrastructure to equivalent TT Hue government infrastructure might be revealing. The particular attention of LuxDev to the repair and O&M of “their” infrastructure should show up in comparison to normal Vietnamese systems.

2. To what extent are the provincial MRV guidelines (based on UNFCCC guidelines) compatible and complementary with the national MRV guidelines and what must be done to ensure closer alignment?

The phrasing of this question is misleading as there was a symbiotic relationship between developing national and TT Hue-specific GHG mitigation MRV guidelines. National MRV guidelines (based on UNFCCC guidelines) did not exist at the start of VIE/433, even though the national MRV guidelines on GHG emission reductions and ozone layer protection have been recently issued through the Government Decree 06/2022/ND-CP and MONRE Circular No. 01/2022/TT-BTNMT dated 7 January 2022, and detailed guidance on how to develop/build a provincial system for MRV of mitigation actions is lacking. So VIE/433 forged ahead on their own and informed the national process of articulating the national guidelines through ongoing exchanges and dialogue, particularly on aspects of specific measurement methods. Thus, and again arguably a “power result”, VIE/433 assisted the national level in drafting their guidelines on establishing a provincial MRV system (if they plan to do so) – by basically being a useful case study.

*3. Has the project had a **wider** impact through community focused CC/DRR interventions and/or government adoption of mechanisms introduced or applied by the project?*

In general, we find Result 1, TASK 1 (CC/DRR awareness and coping) and TASK 3 (school DRR education) to have been the least impressive aspects of VIE/433 when comparing the activities undertaken by the project, given that the activities had been discussed and selected in a highly participatory manner (see Relevance section), and transferred to the annual and multi-annual workplans.

In Task 1 various trainings and activities were undertaken, but some were vague and general (CC contests), and for others the need and actual change results were not clear (early warning systems, “skills to respond to natural disasters”). The “problem statement” needed more articulation. For example, authorities and communities plan for and respond to natural disasters every year in TT Hue, so what specifically are they “doing wrong”?

TASK 3 was obviously hindered by Covid-19, but again specification of “the problem” could have been better. For example, in this tik tok age do students really not know the basics of CC? Were the interventions shaped by a knowledge of what students already knew? From our visits to schools, however, it was clear that the children and teachers enjoyed the CC events, and many students reported that what they did at home had changed because of them (e.g. sorting of rubbish, turning off lights). Yet it was also clear that the events were not going to be sustained, though the behaviour change will likely last for those whom were exposed to the activities. While there was clear enthusiasm around the knowledge gained, the schools demonstrated a lack of confidence in maintaining these events given both the time and funding required for them.

The wider impact through other CC/DRR-related interventions is essentially a question of replication: What worked so well that many other communities and farmers copied it spontaneously? The ongoing enthusiasm and growth of lagoon fisheries associations seems to be one example. We worry, however, about the financial sustainability of those associations. Members fees are low, as is TT Hue Government financial support. The number of boat patrols and other activities may reduce post-project (something for a 2025 post-evaluation to look at).

¹⁵ Power Results may be defined as results that spilled over to impact a larger beneficiary group beyond the immediate project area, and are reasonably attributable to the project intervention (maybe shown through contribution analysis). “Normal” project results are different. They are reasonably expected and are defined in typical logical frameworks. They focus on the economic agents who will be directly involved in project activities. Power results are *unreasonably expected* and may emerge from conscious effort or simply by chance.

The promotion of OA has great potential for wider impact, but it remains at the stage of “proving the business case” to farmers (so limited stand-alone replication). VIE/433 played a very important role in supporting the move to organic products, which was a priority for, and funded by the government as well. The key VIE/433 role was covering the expense of organic farming of various products at small scale – which would not have been financially viable as a business due to the high fixed costs of training, TA, market penetration, branding and packaging, and – most expensively - certification. Financial viability (which depends on scale economies) is a prerequisite to achieving anything. That is why we look into it in some depth. It seems fine (maybe less so for vegetables, and certification is expensive for small farmers). But given financial viability, there are skills and market access issues to overcome - they can be “bottlenecks” to achieving more income for farmers. Hopefully the foundation has been built to support scaling up, where new farmers can “go organic” at much lower marginal start-up costs than the initial pilot phase farmers. We recommend that any future project focus on the scaling-up challenge for the most profitable organic products, which bring environmental and CCR benefits as well as financial. In the field evaluation, farmers demonstrated a sufficient level of understanding on which organic products they could produce (given their inputs) and which ones fetched the highest prices. A majority of the existing OA farmers were elderly, though the project did not track this information. Older farmers might find it hard to read and write Vietnamese, learn or record information required by PGS procedures, while young people tended to work in factories in industrial parks or non-farming activities where they could earn a higher income than in agriculture.

In addition, VIE/433-induced changes to government mechanisms, as noted above, include infrastructure prioritization score cards, cooperative use of the lagoon resource, developing and pioneering project MRV guidelines, and OA foundation for scaling up.

<p>4. What measures are required to sustain achievements in OA and mitigate the delays in setting up the PGS?</p>
--

Farmers are all HH businesses. They have two main assets: their labour and land, and they allocated those resources to maximise profits. They are also very risk averse: the consequence of wrong crop or other decisions can be the loss of HH income for an entire year. Add to this the regular battering from increasingly frequent storms and floods and you can see that they want the business case for moving to OA very clear indeed.

The remarkable achievement of VIE/433 (supported by the Government) has been to prove that higher profits can be made from OA (and on some products more than others). Without that nothing can move forward. Moving forward to scale up, however, has its own new challenges and needs its own detailed implementation strategy. That strategy should have a commercial design. For example, key farmers (trainers-of-trainers) should be thought of as consultants and paid accordingly (maybe pro-bono, with a piloting of which payment model proves to be more viable). Cooperatives set up as processors must be transparent about their finances and margins, and be open to competition. Exclusive arrangements for wholesale and distribution should be avoided.

The PGS system was delayed because the province-level Association and Coordination Board took longer than planned – and it was fully completed in late 2022. Maybe expectations were too high? It is never a quick process to establish new structures at higher levels of government (in any country) – agreeing on budgets, staffing, regulations, etc.

The project were handing over a fund of 78,000 EUR to the OA Association for 3-year further support to OA cooperatives and the PGS system, in the hope that they continue to grow and get to sufficient scale where OA cooperatives and their members can fund the operation of OA Association and PGS Coordination Board.

Organic products are a young, new market, but two things will help sustainability of OA. Firstly, some signed agreements with selected OA partners with additional financial support from surplus funds, that will allow them to strengthen while the market grows, and a new large GCF adaptation project in the pipeline with a major Climate-Smart Agriculture component that would continue and expand the work on OA province-wide (e.g., advanced technologies, collaboration with the private sector and Agribank as partner). In this new GCF project, the anticipated involvement of Agribank (as per MOU signed with them already) e.g with preferential interest rates at probably 0.5% per year on loans to OA farmers, should help a lot in this respect. Food safety is becoming an issue of major concern in Vietnam, and the government strongly supports OA.

5. What impact did the project have on the institutional capacity of relevant government agencies to monitor climate events, and to plan, implement and monitor CCA and CCM interventions?

There is a presumption in this question that the government was not doing these things particularly well before the project. That is probably not true. Monitoring of “events” (e.g. flood levels, water flows) and their consequences (e.g. crop losses) has always been adequate. Similarly, a core focus of the government has always been helping farmers and others to mitigate and adapt (e.g. the support for permanent housing in rural areas).

There are, however, some things that the project did that have helped in this area. We noted better prioritising of infrastructure above, for example. Also important have been the commune-up participatory planning approaches supported under both VIE/033 and VIE/433. These have “given stronger voice” to lower levels, seem to have been appreciated as worthwhile (at least in most districts). How sustainable will such processes be is an open question, but at least the project has demonstrated a model and shown its value.

The institutional capacity of DCC/ TT Hue DONRE (and lesser extent TT Hue DARD) related to CCA M&E and CCM MRV was much enhanced thanks to the project interventions. They could effectively apply the acquired knowledge and skills in their daily work and handle the baseline data collection for the CCA M&E system.

5. LESSONS LEARNED AND RECOMMENDATIONS

While being a climate project, VIE/433 was built on the earlier interventions and lessons learnt of VIE/033 and other evaluations.

What are the 1-2 most important results/successes for VIE/433, and 1-2 most important challenges for future projects?

Result #1: The “winner” in the previous VIE/033 project was lagoon fisheries, where a complex cooperation result was achieved. During that project assistance to adaptive agricultural activities, e.g., new varieties began. The proving of the viability and business case (at small scale) of OA has been the most impressive result from VIE/433. This needs to be built upon in any future project.

Result #2: VIE/433-led work on the CCA M&E and mitigation MRV systems was an innovative and unique contribution of the project. It is clear that much progress has been made on this, and that this impacted national level. The counterfactual (what would have happened “without project”), in our view, is that very little would have been achieved in this area without VIE/433.

Future challenge #1: Scaling up OA – this is discussed in some detail below.

Future challenge #2: Ensuring the sustainability of the fisheries lagoon cooperative system (associations, etc.), as discussed below.

Assess VIE/433 achievements in identifying, documenting and sharing good practice or innovative approaches?

The M&E system of VIE/433 continues from the previous project to be of the highest standard. Integral to a high-quality system is sharing and explaining what the data actually shows and means. This has also been done well, and flexibly. The cooperation with DONRE and MONRE about the CCA M&E and mitigation MRV systems is the outstanding example. Asian Development Bank and PWC consultants are frequently consulting with TAO on the project’s MRV work. Infrastructure prioritization score cards, OA models are other good examples of tools/approaches that could be adapted/ replicated in other contexts.

There were also numerous examples of informal dialogue and mutual assistance between project staff and DPI at provincial and district levels. Close and friendly working relations facilitate the exchange of ideas and tacit knowledge¹⁶.

Other key achievements included the establishment of the TT Hue OA Association and PGS Coordination Board (under DARD), and the involvement of teachers and students and the dynamics in secondary schools in CC and environmental issues. For the purpose of sharing good practices, in Quarter I/2023, the project will focus on documentation (e.g., LuxDev capitalization notes) of a number of interventions and impact, including OA and CC - environmental activities in/with schools.

What lessons learned have potential for scale up? Are there any paradigm shifting/innovative elements that would invite having a closer look at (good practices? lessons learned)? How could the sustainability dimension be enhanced? Any sustainable financial mechanisms that could enhance the (financial) sustainability of project components? What links could be built to the private sector and what role could it play?

A future project would be wise to allocate modest funds to support the fisheries associations and associated activities (patrols, water testing, etc.). The sustainability (which basically means government co-funding) of lagoon management is not clear. Public, comprehensive and regular water quality testing is not yet fully transferred to non-project options, yet it is essential (for example, there were complaints from fisheries association members that pollution from increasing numbers of upstream fish cages is becoming a problem). Maintaining patrols is another issue. At present about 15 patrols are done per year, but present association membership fees could cover the costs of only one patrol. Marker posts will also require upkeep. One approach might be for a new project to reach agreement for 1-to-1 contributions to a dedicated account (so the projects deposits, say, 50,000 USD per annum after the government has done the same). In this, and in other areas where financial sustainability is an issue, innovative ideas to “nudge” government to take over some or all of the responsibility are needed.

If OA is supported in a future project, the ultimate goal is to achieve scale, which is reflected in numerous farmers shifting to OA products at relatively low one-off costs to themselves and to the project (and Government). In other words, the marginal costs (and risks) of “adding one more farmer” needs to be low – which can be achieved if expert local key farmers are available to mentor and train, if processing

¹⁶ Tacit knowledge represents internalized knowledge that an individual may not be consciously aware of, such as how he or she accomplishes particular tasks.

and all up-markets aspects of the value chain are established and cost-competitive, and if the cost of per-farmer certification falls as the total number grows.

As was part of the project awareness raising interventions in the beginning, any new project needs to “get inside the mind” of the farmer considering to move to organic farming. What is stopping them? Is it some sort of distrust, or just lack of information? Are they not confident in meeting new requirements? Etc.

From such an understanding we can consider “tipping point” ideas such as: insurance for the first two years of transition (e.g. a guaranteed income even if total crop failure, and some subsidy if OA income less than previous crop income); signed agreements with selected OA partners with additional financial support from surplus funds, expansion of OA work province-wide under a new to be expected GCF-funded adaptation project (e.g. advanced technologies, collaboration with the private sector and Agribank); or vouchers to pay for transition costs (e.g. vouchers for 5 million VND or 207 EUR to pay a key farmer of your choice to support you); or guaranteed sales prices for two years for crops that meet OA standard. Covering certification costs is another option. In this way the “leap to scale” can be achieved (without making promises of unsustainable subsidies after two years).

Many of the activities funded under VIE/433 are public goods that have no prospect for commercial profit (OA being the exception, of course). Consequently, “linking to the private sector” (beyond paying for services) is problematic. Even in OA we should be cautious and avoid giving private firms exclusive access (e.g. “all farmers must sell to this firm”). Firms, like farmers, are profit maximising, and should be understood as such (i.e. not charities).

What a future project might consider, however, is underwriting the up-front (high risk) feasibility study costs of interested private firms (e.g. on 50/50 basis). Thus, for example, if OA grew rapidly with export potential, interested foreign buyers could have expenses covered to visit TT Hue producers (or maybe just Hanoi and Ho Chi Minh city buyers initially).

APPENDICES

LIST OF APPENDICES

APPENDIX A	ToR of the Evaluation Mission
APPENDIX B	Missions Programme and List of People met
APPENDIX C	Appendix C1: Budgets Appendix C2: OECD/DAC Markers - Analysis
APPENDIX D	Matrix of the Logical Framework and Indicators of the Project at the moment of Evaluation
APPENDIX E	Time Table
APPENDIX F	Technical Appendix Appendix F1: Summary of project activities Appendix F2: Evaluation grid: with ratings for evaluation and cross-cutting criteria and description Appendix F3: Mini KAP survey related to Task 3 Appendix F4: Infrastructure sub-projects 2019-2022 Appendix F5: Cost-Benefit Analysis (CBA): OA Model Appendix F6: Mini survey on DAs Appendix F7: Poster-flyer
APPENDIX G	Bibliography
APPENDIX H	Maps
APPENDIX I	Pictures

EVALUATION MISSION

Final evaluations:

Project VIE/433 – Climate Adaptation and Resilience in Thua Thien Hue Province

Project VIE/401 – Energy Efficient Lighting NAMA Pilot in Hue City (Mitigation)

Terms of Reference

1. GENERAL FRAMEWORK

1.1. Vietnam-Luxembourg Cooperation

Luxembourg's Official Development Assistance (ODA) to Vietnam has been supporting TT Hue province for almost 20 years with bilateral ODA projects in primarily rural development, health, and tourism. However, with Luxembourg ODA now ending, the highly regarded Vietnam-Luxembourg partnership has been transformed into climate cooperation.

In March 2016, LuxDev, the Luxembourg Development Cooperation Agency was mandated by the Ministry of Foreign and European Affairs (MFEA), on behalf of the Luxembourg Climate and Energy Fund and the Ministry of the Environment, Climate and Sustainable Development (MECSD) to formulate a mitigation (VIE/401) and an adaptation intervention (VIE/433) in Vietnam to be funded by Luxembourg international climate finance.

These are LuxDev's first Climate Change projects funded by the MECSD, considered as International Climate Finance (ICF) no longer ODA. The latest General Cooperation Agreement between the governments of Luxembourg and Vietnam was signed in November 2017, including new provisions for climate interventions.

The mitigation project, coded VIE/401, initially budgeted with 2 mio EUR for a duration of 3 years, concerns an Energy Efficiency (EE) NAMA pilot in Hue City, and is based on an EE Lighting NAMA project idea note the MECSD had commissioned in 2014.

The adaptation project, coded VIE/433, also budgeted with an initial 2 mio EUR for an initial 2.5 years project duration, gives suite to an ODA-funded adaptation project coded VIE/033. This much appreciated 'Climate Adapted Local Development and Innovation Project' (CALDIP, VIE/033, 2013-2017) was concluded in December 2017.

NB: In particular, the evaluation will provide short and precise answers to the main headings as listed in the General Submission Template for ICF Funding 2021-2025 from the Climate and Energy Fund. These categories include a look at the climate rationale of the intervention, the additionality of the support provided, the alignment to the Paris pathway including the climate impact measurement, stakeholders and project beneficiaries, the elements of transformation (paradigm shifting potential, scalability) among others.

1.2. Scope of the evaluation

The scope of this evaluation covers the first two major interventions implemented by LuxDev under ICF funding.

Final evaluations:

- VIE/433 – Climate Adaptation and Resilience in Thua Thien Hue Province;
- VIE/401 – Energy Efficient Lighting NAMA Pilot in Hue City.

It's recommended that a specific analysis is carried out for each intervention based on the respective situations/contexts and implementation approaches. Any prior relevant experience capitalisations, studies, workshop reports, documents (e.g., annual work plans, annual progress reports, monitoring reports) should be taken into consideration within the analysis.

1.3. Objectives and areas of intervention

VIE/401 – Energy Efficient Lighting NAMA Pilot in Hue City

The project has been designed to achieve energy savings and GHG emission reductions through the substitution of conventional lamps with LEDs in public urban areas. Following a data-based approach and in consultation with the relevant counterpart agencies, street and school lighting were selected for LED installation.

The pilot project aimed for three expected results, to be achieved through five intervention areas (tasks):

Result 1 – Capacity strengthening and enabling activities for the NAMA pilot (Software)

Task 1 – Preparation and enabling activities for the pilot

Task 2 – Awareness raising and capacity development

This **software component** primarily focuses on activities that help increase awareness and understanding of the link between EE and energy savings on the one hand, and global warming and climate change on the other – with GHG emissions from primarily coal-driven power plants the connecting link.

Result 2 – LED demonstration procurement and installation, and impact measurement in Hue City (Hardware, MRV)

Task 3 – LED installation and impact measurement (MRV)

This **hardware and impact measurement component** consists of a range of activities related to the selection, procurement and installation of low energy consuming LED lighting to replace high energy conventional lighting in select public locations. Following a comprehensive data-based selection process of possible locations and proposals in 2019, 54 primary secondary and high schools and 18 streets in Hue City were selected for LED installation.

This pilot mitigation intervention has an important focus on **MRV**, which is a new field of expertise, directly related to measuring the impact of the intervention in terms of power savings and hence a reduction in GHG emissions. Three types of MRV exist: provincial MRV, sectoral MRV and project MRV. Under sister project VIE/433 the focus is on the overall institutional capacity development for MRV with the provincial Division of CC under DONRE, whereas under this VIE/401 the focus is specifically on project MRV, and the pilot EE/LED intervention. Following Measurements and calculations as per international (UNFCCC) guidelines, GHG emission reduction results need to be officially Reported to the national level (MONRE), independently Verified, and formally registered as a contribution to Vietnam's National Determined Contribution (NDC). Results will then be included in the government's biennial NDC report, as a contribution to Vietnam's climate and CO₂ commitments at the global level.

Result 3 – Exploration for upscaling and proposal development beyond the NAMA pilot in Hue City (Follow-up intervention)

Task 4 – Documentation and communication on the pilot intervention's outcomes, for further support and use to an upscaling proposal

Task 5 – Preparation of, and full proposal for a higher-level mitigation intervention

VIE/401 was designed to cover two phases. A first pilot phase in Hue City, followed by a second phase with the goal of extending the intervention to other municipalities/provinces in the country. This extension in scope in subsequent phases would be necessary to attract public and private climate funding.

VIE/433 – Climate Adaptation and Resilience in Thua Thien Hue Province

VIE/433 aims to contribute to Vietnam's goal of strengthening the resilience of people and the natural system to climate change, and specifically to assist local authorities and communities in coastal and lagoon communes to increase their understanding and resilience and decrease their vulnerabilities to climate change.

To achieve these objectives, the project aimed for three expected results, to be achieved through six intervention areas (Tasks):

Result 1 Climate Change and Disaster Risk Reduction (DRR) – Government and community capacities to respond to climate change are enhanced

Task 1 – Increase awareness, understanding and coping capacity

Task 2 – Help establish comprehensive monitoring systems to monitor CC events and track progress on various CC adaptation and mitigation interventions and become ready for direct access to climate finance

Task 3 – Expand primary and secondary environmental and DRR education

Result 2 – Small-scale infrastructure is better protecting people and their livelihoods

Task 4 – Implement climate adaptive and resilient physical infrastructure in target areas

Result 3 – Resilient ecosystems help people better adapt to climate change

Task 5 – Promote methods for participatory management, use and conservation of natural resources

Task 6 – Support development of a market for organic farming as a new sustainable growth industry for the region

Similar to VIE/033, Project VIE/433 targets the same 29 communes in Quang Dien, Phu Vang and Phu Loc districts that, due to their location along the shoreline or around the lagoon as well as their low altitude, are considered most vulnerable to Climate Change impacts.

Commune Vulnerability Capacity Assessment reports that were done for all communes in 2014 indicate that in recent times these communes have severely suffered the adverse effects of climate extremes such as unusually cold weather, droughts, typhoons, floods, salt intrusion, and coastal erosion.

In alignment with, and response to national climate data requirements, VIE/433 assesses and helps strengthen government climate adaptation MRV and general Monitoring & Evaluation knowledge, systems and skills so as to be able to properly monitor the effects of climate change and track the outputs, outcomes and impact of various adaptation and DRR interventions in the province. Thus, a comprehensive CC M&E and MRV system will be established within government, based on national and international climate MRV requirements.

1.4. Institutional framework

LuxDev is the executing agency for the programmes funded by the Luxembourg government. It acts under an execution mandate from the Ministry of the Environment and the Ministry of Finance. The mandate states that LuxDev is responsible for project and programme implementation together with the designated stakeholders and counterparts.

National execution agencies are identified in the Technical and Financial Documents (TFD) of each intervention and in the bilateral agreements signed between both governments:

- VIE/401: Ministry of Planning and Investment (signatory of the bilateral protocol); TT Hue Provincial People's Committee (PPC) as governing agency; TT Hue Department of Planning and Investment (DPI) as project owner;
- VIE/433: Ministry of Planning and Investment (signatory of the bilateral protocol); TT Hue Provincial People's Committee (PPC) as governing agency; TT Hue Department of Planning and Investment (DPI) as project owner.

The results chains for VIE/401 and VIE/433 are presented in appendix A.

1.5. Budget and duration

The VIE/433 and VIE/401 interventions, under LuxDev's execution mandate, started in July 2018 for an initial period of 2,5 and 3 years respectively.

The closure date for both projects is 31/12/2022 (after time extensions).

The MECSD granted time and budget extensions as summarized in the table below:

Project/ Programme	Initial Budget	Initial Duration	Extension granted	Actual Budget	Disbursement rate (15/05/2022)
VIE/401	2 200 000 EUR (2 000 000 EUR Luxembourg MECSD ; 200 000 EUR GoV)	36 months	+18-month time extension	2 200 000 EUR	73% (of Lux contribution only)
VIE/433	2 300 000 EUR (2 000 000 EUR Luxembourg MECSD; 300 000 EUR (GoV))	30 months	+ 961 000 EUR (Luxembourg MECSD) +18-month time extension	3 261 000 EUR	82% (of Lux contribution only)

1.6. Present situation and progress of the projects/programmes

The interventions have achieved the following key results/outputs since their launch:

VIE/401 - Energy Efficient Lighting NAMA Pilot in Hue City

RESULT 1: Capacity strengthening and enabling activities for the NAMA pilot

TASK 1: Preparation and enabling activities for the pilot

All activities related to the preparation of the pilot have been completed.

TASK 2: Awareness raising and capacity development

- Work under this Task corresponds with and contributes to the objectives and targets of the *Vietnam National Energy Efficiency Programme (VNEEP) 2019-2030*, approved (PM) March 2019, as well as of *TT Hue's Energy Efficiency Plan 2019-2030*, issued November 2019. Ministry of Industry and Trade (MOIT) is responsible for energy, and TT Hue's Department of Industry and Trade (DOIT) is responsible for implementation of the provincial EE plan.
- Consists primarily of a large Information Education Communication (IEC) programme with primary, secondary and high schools, to increase awareness on linkages between EE and climate change and stimulate energy savings through changed behaviour.
- 126 schoolteachers became master trainers, and more than 1,400 teachers were trained; 31 Student Action Groups were established in 23 secondary and 8 high schools to take lead in EE awareness raising activities in schools and in the community.
- While exciting work in all schools was ongoing, unfortunately schools were forced to close frequently since the start of Covid, including the entire period May-Dec 2021, and they only gradually re-opened Q1 2022.
- This component also included various capacity development interventions, including energy audits for major industries and subsequently government buildings, in collaboration with DOIT staff.
- Work 2022 that is on-going: (i) contests on EE and CC for students in 22 secondary and 8 high schools, which were postponed due to COVID, and (ii) trainings on energy management and energy internal assessments for enterprises and intensive energy users.

RESULT 2: LED demonstration procurement and installation, and impact measurement in Hue City

TASK 3: LED installation and impact measurement

Hardware

- All planned 1,071 street LED luminaires were installed by April 2021, replacing the same number of high-energy consuming HP SODIUM luminaires on 18 roads.
- 18,692 LED tubes were installed by late July 2021 and replaced 13,676 conventional (fluorescent T8 36W and T10 40W) lamps in 1,347 classrooms in 54 schools.

- Whereas the number of luminaires on roads was unchanged (1 for 1), the number of LEDs installed in schools substantially increased, 13,676 to 18,692. That is because installation of new lighting in schools must comply with the latest lighting quality requirements of the GOV, Ministry of Health.
- A third small (bonus) package of street lighting, from cost savings of two previous hardware packages, was prepared and approved by PPC, and the tender was launched in May 2022. The 493 additional luminaires for 8 roads are expected to be in place by September 2022 and will add to the final project result and GHG reduction impact.
- Installation of LEDs has brought some major co-benefits: (1) Cost savings for schools, totaling 92.3 million VND in 4 months' time (Sep-Dec 2021), and for the street lighting management company (and tax payer) totaling 43.7 million VND in 10 months' time (Mar-Dec 2021); (2) The quality of lighting has tremendously improved, with the measured Lumen in classrooms roughly double what it was before, which is highly appreciated by teachers and students; And (3) following discharging of old school luminaires as per strict hazardous waste management procedures, 45,026 mg of mercury has been captured that otherwise someday may have ended up in the environment.
- Work 2022 that is on-going: procurement and installation of third hardware package (493 additional luminaires for 8 roads). And perhaps a fourth package, if or when decided at a mid-year project review

Impact measurement (MRV)

- Based on formal UNFCCC instructions and with informal Department of Climate Change (DDC)/Ministry of Natural Resources and Environment (MONRE) guidance the project completed most of the preparatory work and documents (baseline measurements, project MRV technical manual) and continued its capacity development through necessary trainings to partners.
- Following installation in 2021, the measurement of power savings started on roads in March 2021 and in all 54 schools in Sep 2021. Measurements of power consumption and power savings from LEDs on roads is fairly straightforward and computer driven (HEPCO control room), but much more complicated for school lighting (other appliances except lighting, e.g. fans, on same circuits, actual use of lights to be monitored with support of electronic devices, etc.).
- Project applies UNFCCC measurement methodologies AMS-II.L for street lighting and AMS-II.N for school lighting, whereby annual CO₂ emission reduction is calculated with annually achieved net electricity savings x the current emission factor (EF) for Vietnam's Electricity Grid.
- In 2021, operation of LEDs on roads already led to an average 20.9 MWh of net energy savings per month, and 209.1 MWh in ten months of operation.
- Operation of LEDs in schools already helped to achieve an average 47.4 MWh of net energy savings per month, and 189.6MWh in 4 months' time.
- National guidelines on MRV, to be developed by MONRE and long overdue, are now drafted and being circulated for feedback, but have not been finalised yet.
- Procedures on reporting, verification and registration will be informed by the national MRV guidelines. Thus, for the project to be able to continue and complete this critical part of the pilot, these national guidelines will have to be formally issued first, and soon.
- Work 2022 on-going: (i) Measuring actual use, electricity savings and GHG emission reductions from project installed LED on roads and in schools; (ii) Reporting the result to the relevant agencies, and have it verified by a qualified independent authority; (iii) have that GHG result registered at the national level and included in the biennial NDC report; and (iv) hand over the MRV system to a designated agency, to continue these MRV measurements and procedures in years to come.

RESULT 3: Exploration for upscaling and proposal development beyond the NAMA pilot

TASK 4: Documentation and communication on the pilot intervention's outcomes, for further use and support to an upscaling proposal

The project has worked extensively on MRV system development and institutional capacity building with the DCC at the provincial DONRE, as well as with DOIT, and has a link with the DCC at the MONRE ministry, for guidance on (unfinished) national MRV guidelines. Taking direction primarily from UNFCCC guidelines, the project documented (a) the technical process and procedures of baseline measurements at schools, (b) baseline measurements on roads, and (c) joint Project Task Force and LuxDev technical measurements and observations as part of the internal verification process. That documentation and the project MRV Manual the project completed, will in due course be shared with relevant partners in government and among the donor community. LuxDev is a member of the Working Group on EE under

the Vietnam Energy Partnership Group (VEPG) under MOIT and will use that route to connect with relevant partners on project MRV work and achievements in TT Hue.

TASK 5: Preparation of, and full proposal for a higher-level mitigation intervention

Due to various challenges and shifting scenarios, the focus of project partners shifted from an intended follow-up to VIE/401 in CC mitigation to an adaptation follow-up project. However, explorations continue to identify a viable outfit that would consider supporting a larger EE intervention in Central Vietnam, specifically in the tourism sector, or in an alternative field e.g., lagoon-based floating solar, or a large EE programme for government managed buildings (government offices, schools, police stations...) in the province. The Global Climate Change Alliance Plus (GCCA+) and Team Europe Initiatives managed by EU Delegations in various countries will be considered.

VIE/433

Result 1 Climate Change and Disaster Risk Reduction (DRR) – Government and community capacities to respond to climate change are enhanced

TASK 1: Increase awareness, understanding and coping capacity

Activities under this Task focus on CC and DRR awareness raising and capacity building of local stakeholders, communities, teachers and students, e.g. through Community-Based Early Warning Systems, climate change contests, and increased DRR skills including survival swimming for primary school students. Considering the nature of interventions and target audiences under Task 1, most activities under this Task were seriously affected by Covid restrictions.

An agreement with DONRE's sub-department of Environmental Protection was signed, to organise 14 IEC contests at commune, district and provincial level. Due to prolonged Covid restrictions, however, this major intervention was several times postponed and ultimately cancelled.

In spite of Covid, the project managed to organise 17 training courses, for 510 government staff, Fishery Associations (FAs) and Agriculture Cooperatives. Post training assessments indicated that 90.3% of trainees improved their knowledge and skills to respond to natural disasters. Project interventions in target districts have been extensively covered by national VTV and local TRT television news channels and contribute significantly to the main objective (awareness raising) under this Task.

TASK 2: Help establish CCA M&E and Mitigation MRV systems and become ready for direct access to climate finance

To monitor impact of all CC adaptation and mitigation interventions, Vietnam needs to develop CCA M&E and mitigation MRV systems, at both national and subnational level. The national guidelines to do so have been in preparation for years and are long overdue, and whereas a draft is now in circulation, they still have not been formally issued yet. Therefore, over the last three years the project developed monitoring and MRV guidelines and procedures in TT Hue directly based on UNFCCC guidelines, which Vietnam's national guidelines will also need to comply with. This was done in consultation with the responsible unit (DCC) at the MONRE ministry.

The work on a CCA M&E system in TT Hue has been progressing well, with the project supporting the relevant (prov/district) agencies in building the necessary capacity and developing databases. Tracking of progress is based on a process assessment checklist within the (provincial) partner agency DONRE. A number of significant outputs were accomplished: i.e. roadmap, framework design and methods, M&E indicator sets (510 for vulnerability, 200 for climate impact and risks, 345 for adaptation actions and financial resources, adaptation results and impact), 27 data collection tools, SPSS database template, and strengthened capacity through trainings on data collection and data entry.

In this final year 2022, the project is further support training on, and a comprehensive assessment of CC impacts in the province utilising data from the new CCA M&E system, further establish the CCA M&E database management system, help DONRE develop a Masterplan for a provincial network of specialised hydro-meteorological monitoring stations, organise workshops to help enhance general knowledge of the Paris Agreement, NDC, NAMA, MRV... and further support development of the provincial and project-level MRV framework for mitigation actions, in line with national MRV guidelines.

TASK 3: Expand primary and secondary environmental and DRR education

Work and activities with teachers and students continued in first half 2021, after which schools were closed in the remainder of 2021, and re-opened in Q1 2022. Project interventions such as the in-class use of the 'I Learn To Live Green' syllabus and module, 'Golden Bell contests', painting competitions, and trainings on first aid and emergency responses continued, with participation of 7,089 secondary school students (57.9% girls) and 196 teachers.

In 2021, another 8 Student Action Groups (SAGs) were established, in all secondary schools in Phu Loc district, making a total of 17 SAGs with 340 members who are involved in the continuous implementation of peer education and communication activities in their schools. 28 sets of IEC tools including 84 banners and 168 posters were developed for that purpose. A recent assessment of (first established) SAGs showed that all 9 groups involving 180 members (58% girls) and guided by 27 teachers, had effectively completed 100% of their planned activities for 2021, with project technical and financial support. In Quang Dien, the formation of SAGs in secondary schools was delayed due to Covid, and done in 2022.

The project's cooperation with the UK-registered NGO *Hue Help* to conduct survival swim classes for grade 3/4/5 students continued, partly in response to the PPC's call for support to swim classes, in the context of floods and drowning risks. Another 36 teachers were trained as survival swim coaches, and 2,324 pupils were trained in survival swimming. The intervention came to the attention of a German documentary maker, who in May 2022 brought a team to Hue to produce a documentary for showing on ARTE.

Result 2 – Small-scale infrastructure is better protecting people and their livelihoods

TASK 4: Implement climate adaptive and resilient physical infrastructure in target areas

Following an objective, data-based, competitive selection process, with each of the 29 target communes entitled to propose their single best climate-resilient INFRA investment scheme, 14 sub-projects had been selected, for a total amount of 866,000 EUR. All 14 schemes were completed on time and on budget, by November 2020. These are boat shelters (2), salinity intrusion dams (1), irrigation/drainage canals (2), salinity intrusion dykes combined with drainage pump stations/boat shelters (8), and drainage & impoundment systems (1). Combined these schemes provide increased protection to 5,466 HHs, and to 875 ha of productive land.

In 2021 project partners selected an additional 12 sub-projects, from all previously built 92 Infra schemes under VIE/033 and VIE/433, that needed some repair and/or upgrading. As of May 2022, only three of these repair schemes are still to be completed.

Result 3 – Resilient Ecosystems help people better adapt to climate change

TASK 5: Promote methods for participatory management, use and conservation of natural resources

Activities under this Task aim to increase the understanding of the legal framework and management and technical capacity of Fishery Associations (FA) and lagoon communities, to manage the protected Fisheries Conservation Zones (FCZ).

In 2021 alone, the project (i) organised (19) training courses on the revised Law on Fisheries and on relevant legal documents and regulations on management of fisheries and aquatic Resource Conservation Zones, to 851 FA members; (ii) organised (23) training courses on procedures to register fishing boats operating in domestic waters and in the lagoon; (iii) supported 590 concrete tubes of fish aggregating devices for an area of 277 ha in 14 FCZ; (iv) supported procurement of 3.6 million fingerlings and crab seedlings for nurturing in 20 FCZ over an area of 604 ha; (v) supported the restructuring of 9 FCZ, (vi) helped procure 5 patrol boats for monitoring compliance with local rules and regulations; and (vii) supported 13 FAs with life jackets and torches for use in emergency situations.

Following from VIE/033, VIE/433 continued water quality testing in the lagoon, but the new project increased quality requirements to the highest level, meaning all 6 parameters as per GOV regulations. The test result in December 2021 was not good enough, with none of the 18 sample sites having all six parameters comply with the required standard. However, this was due to the heavy rains at the time of collecting water samples (rainy season). Based on previous test experience, a final testing will be carried out by mid-2022 (dry season), when project management expect a confirmation of the tendency of much improved water quality in the lagoon over the last eight years.

The focus in 2022 will continue to be on IEC activities to raise local people and students' awareness of the importance of the lagoon ecosystem and need for environmental protection, and to propagate and guide fishermen not to violate exploitation regulations to better protect natural resources and livelihoods.

TASK 6: Support development of a market for organic agriculture as a new sustainable growth industry

The project is helping the province to develop an Organic Agriculture (OA) market, through awareness-raising interventions, technical capacity development of farmers, establishment of a quality certification mechanism, and support in post-production management and marketing.

Pilot models of organic vegetables, centella, rice, peanuts and chicken are on-going and doing well, even though the major floods in late 2020 inundated entire fields and destroyed much of what had been accomplished in the first few years. Nevertheless, in 2021 activities picked up again and many farmers managed to restore their fields. 18 OA producer groups continued to implement models, and half of those have reached the final stages of post-production and marketing, i.e. advertising and distribution.

In 2021, 1,800 farmers were trained in organic farming techniques, producing organic fertiliser, and Participatory Guarantee System (PGS) procedures. Logos, packages, labels, leaflets and posters for various organic farming products were designed and a large IEC campaign on the benefits of OA for socio-economic development, health, environment and well-being continued. Products are either bought by private organic food companies with whom cooperatives sign advance deals for a certified price (rice), or are sold in the market (vegetables, peanuts, centella). Besides potentially higher net income from output, farmers also save money on inputs (fertiliser, pesticides), the cost of organic fertiliser like seaweed being much lower.

The process to establish the PGS mechanism needs to follow various steps and comply with many government requirements, hence has been cumbersome and slow. The building blocks at the district level have been in place for some time, but necessary steps at the provincial level, primarily establishment of the planned OA Association and a PGS Coordination Board, are not completed. This is having a negative impact for those farmers currently organised in *OA Producer Groups* and whose operations have already been formally recognised and certified by district PGS Certification Committees, but still cannot sell their produce at their fair price. As of May 2022, the Association is being established, and the PGS provincial Coordination Board is to follow soon.

Preparation of a follow-up project to VIE/433:

Unlike VIE/401, a follow-up project to VIE/433, to be funded by ICF, was not planned nor aimed for. However, early on it became clear that a small-size mitigation follow-up project for ICF would be very difficult to achieve, as the main ICF agencies primarily look for projects that ensure major GHG emission reductions. Hence the early shift of focus to an adaptation follow-up, instead of a mitigation follow-up intervention.

Consequently, preparation of a new CC Adaptation project for TT Hue province, to be funded by the Green Climate Fund (GCF) has been on-going since 2019 and is progressing, albeit slowly. In late 2021, a company with GCF experience was hired to work on a revision of a second draft of Concept Note (CN) already submitted earlier by LuxDev. Overall that draft was received quite positively by the GCF, but with further requirements, specifically the need for a stronger focus on (i) climate finance support from private sector and banks, and (ii) paradigm shift potential i.e. larger scale impact of the proposed intervention. LuxDev submitted a third revised version of CN in December 2021, and a fourth version in May 2022. We remain confident that this first Luxembourg supported GCF project proposal, for a new USD10 million adaptation intervention in TT Hue, with the *no objection* support from the NDA at MPI already received and financial support from the MECSD committed, will materialise and be in place at some point, tentatively in early 2023.

1.7. Previous evaluations

Neither VIE/401 nor VIE/433 were evaluated at mid-term so a complete analysis of both projects is required.

Adaptation project VIE/433 is a follow-up from an earlier climate adaptation project, VIE/033, with focus on adaptation for sustainable livelihoods. That 10 million Euro intervention, implemented from 2013 to 2018, was evaluated as having had exceptional results — with top quintile scores for each one of the five OECD/DAC evaluation criteria (relevance, effectiveness, efficiency, sustainability, impact) as well as for each one of the three cross-cutting criteria (good governance, gender, environment/climate change).

Detailed technical reports on each project/programme as well as the monitoring and evaluation matrices will be submitted to the winning bidder.

2. THE MISSION'S OBJECTIVE

The mission has as its main objective to provide a summative and formative appraisal of the results achieved within the framework of the projects VIE/401 and VIE/433 and identify findings and lessons learned that can feed into the subsequent phases of the projects and/or complement existing studies or initiatives.

2.1. Analyse the results and the specific objectives reached at the time of the evaluation, compared to what had been anticipated in the Technical and Financial Document (TFD), in the Inception Report, and in Annual Operational Plans (AOPs).

Describe the objectives, results achieved and refer to the indicators.

NB: The objective is not to present a detailed list of tasks, activities and (output level) indicators but focus on achievement of results and their role in effecting concrete changes at the level of the targeted beneficiaries.

It will be important to document any discrepancies between changes planned during inception and those observed at project closure.

2.2. Analyse the implementation modalities deployed by the projects

The evaluation mission should take a critical look at the various implementation modalities deployed by both projects (e.g., direct project management by LuxDev; delegation agreements; execution agreements etc.) and provide an opinion on their complementarity and their contribution to achievement of expected results.

2.3. Analyse the results achieved in terms of capacity strengthening

Since capacity strengthening (CS) is central to both of these interventions, the mission should carry out specific analyses of CS, identify lessons learned and main findings.

Describe the measures/strategies taken by both projects to place capacity strengthening, which is at the heart of LuxDev's mission, in the center of the project. Did the project provide the counterpart(s) with sustainable capacity to plan and implement its policies, and account for them?

What strategies have been deployed to strengthen the capacities of the different actors? Did the trainings and technical assistance provided have an impact on the skills? Were they effective? How to maximise and measure capacity strengthening in future interventions? Comment on the possibility to change from a staff needs assessment approach to a more comprehensive Institutional Development approach with services provided by partners (quantitative and qualitative) as focus.

Analyse measures taken to empower the less autonomous beneficiaries (especially women) and indicate the results achieved.

2.4. Analyse the programmes' management and monitoring, with a specific emphasis on:

- the technical assistance deployed within the projects/programmes;
- harmonisation and alignment principles; - see also coherence (internal and external);
- monitoring of the different project levels (activities, tasks, results, specific objectives – M&E matrix), including the M&E mechanisms implemented by each intervention. The specific annex on COVID-19 (appendix E) should also be considered.

2.5. Analyse the programmes using the following evaluation criteria, considering cross-cutting aspects (see appendix C for details)

OECD DAC Evaluation criteria¹:

- relevance (incl. climate rationale, Paris pathway);
- coherence (incl. additionality of the support provided);
- effectiveness;
- efficiency; and
- sustainability.

OECD DAC Rio Markers for Climate:

- climate change mitigation (scored 2 for VIE/401);
- climate change adaptation (scored 2 for VIE/433).

Crosscutting aspects:

- governance for development;
- gender equality;
- environment and climate change;
- capacity development.

The evaluation mission should assess and draw conclusions from how the projects addressed gender, environment/climate change issues and integrated them into project activities and/or implemented dedicated crossing cross-cutting activities. Questions on capacity strengthening are covered under section 2.3.

2.6. Analyse the following specific evaluation questions

VIE/401

- Scalability: What is the scalability potential of the project's hardware intervention (i.e., lighting retrofit carried out by the project in public street and school lighting)? Assess based on a cost-benefits analysis (e.g., energy savings, emissions reductions).
- Long term transformation: Have the software interventions (e.g. the IEC campaign) effectively resulted in improved CC/EE awareness and behavioral change among student and faculty? What can be done to consolidate and build on the gains achieved by the project?
- Paradigm shifting potential: How can the results/impacts of a pilot project such as VIE/401 be (more) effectively leveraged to strengthen policies (particularly at provincial level) as well as contribute to expanding practical awareness raising and behavioral change among local populations?
- Challenges: What explains the significant delays in the installation of LED lighting and what measures can be taken to ensure effective and rapid implementation of future RE/EE hardware interventions?

¹ According to LuxDev's internal evaluation policy, impact is evaluated ex-post and as such is the responsibility of the Ministries. However, it can be included as a criterion upon specific request.

VIE/433

- Assess the quality and sustainability of the CC/DRR infrastructure projects supported by the project as well as the O&M system put in place.
- To what extent are the provincial MRV guidelines (based on UNFCCC guidelines) compatible and complementary with the national MRV guidelines and what must be done to ensure closer alignment?
- Has the project had a wider impact through community focused CC/DRR interventions and/or government adoption of mechanisms introduced or applied by the project?
- What measures are required to sustain achievements in OA and mitigate the delays in setting up the PGS?
- What impact did the project have on the institutional capacity of relevant government agencies to monitor climate events, and to plan, implement and monitor climate adaptation and mitigation interventions?

2.7. Establish lessons learned and provide recommendations for the continuation of the project/programme

- What does the evaluation mission consider to be the most important results/successes for each intervention (maximum two (2) and justify why) and what does the evaluation mission consider to be the most important challenge (maximum two (2), justify why and give a recommendation) to be addressed in future projects.
- in terms of Knowledge Management and Sharing, assess the programmes' achievements in identifying, documenting, and sharing/replicating good practice and/or innovative approaches, possibly also linked to the COVID context (see special appendix E).
- What lessons learned have potential for scale up? Are there any paradigm shifting/innovative elements that would invite having a closer look at (good practices? lessons learned)? How could the sustainability dimension be enhanced? Any sustainable financial mechanisms that could enhance the (financial) sustainability of project components? What links could be built to the private sector and what role could it play?

3. TASKS AND METHODOLOGY

3.1. Methodology

The evaluation mission will work in a participatory way, engaging the different parties involved at different levels and ensuring that the specific interests and needs of target beneficiaries are considered.

Both quantitative and qualitative research methods shall be used to assess overall project performance and impact.

3.2. Preparation of the mission

- LuxDev briefing via a virtual tool;
- review of the Technical and Financial Documents (latest versions), projet inception reports, quarterly reports, annual progress reports, annual operational plans etc.;
- research any other relevant documentation;
- elaboration of questionnaires and evaluation forms for the different stakeholders;
- inception report.

3.3. Field mission

- Virtual briefing with the Regional Office in Vientiane including the Resident Representative, the project teams and (if applicable), representatives from Luxembourg Embassy;
- conditions allowing (e.g., COVID-19 restrictions, monsoon season), field visits must include:
 - meeting at central level with the different institutions involved (National Counterparts and other Cooperation organisations, including institutions and bodies that deal with crosscutting issues),
 - consultation and cooperation with the VIE/401 and VIE/433 project team on detailed field work plan,
 - field visits in target districts of Quang Dien, Phu Vang and Phu Loc to collect data and information paying attention to a gender-sensitive representation of the groups/parties met,
 - meetings with concerned district authorities and project implementing partners to collect evaluation data, views and recommendations.
- presentation of the mission's main conclusions to the provincial and district project stakeholders, by means of an aide-mémoire or a PowerPoint presentation (allow for enough time for the restitution and make sure that all stakeholders (M/W) are represented);
- restitution with the LuxDev Regional Office (and if possible, in the presence of representatives of the Ministry of Environment, Climate and Sustainable Development, the Ministry of Foreign and European Affairs / Office of the Luxembourg Cooperation).

3.4. Reporting and debriefing with LuxDev Headquarters

- Drafting of the provisional reports;
- debriefing via a virtual tool on the draft version of the reports with LuxDev Headquarters and representatives. Representatives from the Luxembourg Embassy as well as from the Ministry of Environment, Climate and Sustainable Development, LuxDev Regional and the project/programme teams may also attend if requested;
- finalisation of the reports.

4. REPORTS

The two evaluation reports will be prepared in English. A draft version of the reports will be sent to LuxDev through the Evaluations department by e-mail at least ten (10) working days before the debriefing (date to be set after the field mission).

The Evaluations department will organize report dissemination and the compiling of comments. The final version of the report (electronic file in word format) must be sent to LuxDev at most two weeks after the debriefing.

The draft report, final report and/or executive summary will be translated into Vietnamese as very few staff members are able to benefit from the findings if these are only made available in English. The projects/programmes will organise the translation.

The report will be developed following the LuxDev Model and shall not exceed 30 pages (excluding Appendices):

- executive summary (this is a key document for decision-makers which can be disseminated separately from the full report and must be formulated in clear, easy-to-understand language). The document will be published on LuxDev's website);
- description of the Project's achievements at the time of evaluation:
 - coverage (institutions, area and beneficiaries, M/W),
 - summary of activities conducted,
 - details of the objectives and results achieved;
- description of the implementation:
 - management structure for the Project,
 - measures taken for harmonisation and alignment,
 - measures taken to place capacity strengthening at the heart of the Project,
 - monitoring and evaluation,
 - measures taken to ensure partnership,
 - local contribution;
- project evaluation:
 - relevance,
 - coherence,
 - effectiveness,
 - efficiency,
 - sustainability,
 - crosscutting aspects,
 - specific questions;
- lessons learned and recommendations.

In addition, the winning bidder will also be expected to work with LuxDev's Evaluation and Communications Departments on a 1–2-page poster/flyer that will present the key findings, recommendations and lessons learned for each report in an attractive and accessible manner.

Appendices:

- ToR of the evaluation mission;
- programme of the evaluation mission and persons met;
- project budget (planned and actual, from Luxembourg and the Counterpart) and analysis of the DAC markers;
- logical framework and indicators at the time of evaluation;
- project chronograms (anticipated and actual);
- technical documents;
- bibliography;
- maps;
- pictures, etc.

5. DURATION OF THE MISSION AND REQUIRED PROFILES

The overall estimated number of working days is around 120 days, and the team should be composed of approximately six persons including experts, coordination and enumerators.

The composition of the team and the input/duration of the various experts as well as the proposed methodology have to demonstrate that the overall expertise to execute the final evaluation in a satisfactory way is covered/ensured by the proposed evaluation team.

The bidder will assign a head of mission (see 5.1 below for required profile) to ensure overall coordination of the mission (management of experts, reporting) and carry out the briefing and debriefing with LuxDev HQ. In the methodological note (to be submitted as part of the technical proposal), the bidder will clearly outline how the team will be coordinated and how the head of mission will prepare the field mission. A documentary review period has been planned so that the team can assimilate the most relevant information and submit an inception report prior to the field mission.

It's also recommended to ensure sufficient diversity in the expertise proposed, whether in terms of age and gender and – **most importantly** - involvement of regional and/or local experts to overcome the issue of Vietnamese language and interpretation.

The composition of the team and the input/duration of the various experts can be modified, but the methodological note must demonstrate that the overall expertise to execute the evaluation in a satisfactory way is indeed covered/ensured by the proposed evaluation team.

The consultancy company should provide the necessary backstopping to the proposed evaluation team and ensure the verification and quality assurance (content, language and form) of the required documents according to the LuxDev style.

Experts that have been directly involved in implementation during the projects' lifecycle may not be included in the evaluation team

5.1. Head of Mission – evaluations and environment and climate change expert

International expert with minimum 15 years' experience in the evaluation of international development projects or programmes, including a specific focus on climate change mitigation and/or adaptation projects.

In depth understanding of integrating crosscutting aspects (governance for development; gender equity; environment and climate change) and applying related tools (environmental screening, gender analysis, OECD-DAC marking, etc.). Familiarity with Rio Markers a strong plus.

Fluent in English, the team leader should have strong leadership capability with the following soft skills:

- organisation and coordination;
- communication at different levels (policy and operational);
- integrity, strong sense of responsibility;
- availability (main contact person for LuxDev); and
- confirmed capacity to manage and coordinate senior sectoral experts.

Experience in at least two different Asian countries including Vietnam.

Knowledge of Vietnamese a plus.

5.2. Cross-cutting expertise available within members of the evaluation team

Gender: Confirmed experience in gender and social analyses.

Environment and climate change.

Governance for development.

Capacity development: Confirmed experience in structured approaches to capacity strengthening at individual, organizational and institutional levels.

5.3. Estimated duration of the mission (in working days)

	Experts
	Estimated number of days
Preparation and briefing	14 Days
Field mission	90 Days
Submission of provisional reports	1 Day
Debriefing with Luxembourg	
Reporting	15 Days
(Integration of comments MAEE/LuxDev and submission of final report)	
Total	120 Days

The mission is scheduled to take place by September/October 2022 and the mission details (scheduling, logistics) will be worked out in advance with the project teams. Local travel for the field missions will also be facilitated by the projects/programmes.

Entry requirements in Vietnam are subject to ongoing change, due to COVID-19 developments in SE Asia. As of 15 May 2022, all Covid related travel restrictions have been lifted.

Appendices:

Appendix A: Logical Frameworks

Appendix B: DAC Markers

Appendix C: Evaluation Criteria

Appendix D: Maps

Appendix E: Analysis of the COVID-19 context and impact

Table B1: List of persons met (In-depth interviews)

Date	Time	Location	Institution/ Organisation	Name/ Title
17 – Oct – 22	9:00-12:30	Hue city	LPMB	Mr. Nguyen Quang Cuong/ Director
17 – Oct – 22	9:00-12:30	Hue city	LPMB	Mr. Tran Ho Hai/ Official
17 – Oct – 22	9:00-12:30	Hue city	LPMB	Mr. Nguyen Ngoc Thinh/ Official
17 – Oct – 22	9:00-12:30	Hue city	TAO	Dr. Alain Jacquemin/ CTA
17 – Oct – 22	9:00-12:30	Hue city	TAO	Ms. Pham Thi Lien Hoa/ Project Officer cum Interpreter
17 – Oct – 22	9:00-12:30	Hue city	TAO	Mr. Pham Huu Loc/ Technical Adviser Community-Driven and Ecosystem-Based Adaption
17 – Oct – 22	9:00-12:30	Hue city	TAO	Mr. Tong Phuoc Hoang Lan/ Technical Adviser Physical Infrastructure Planning & Procurement
17 – Oct – 22	9:00-12:30	Hue city	TAO	Mr. Hoang Thanh Hung/ Technical Adviser CC Measurement, Reporting and Verification
17 – Oct – 22	9:00-12:30	Hue city	TAO	Ms. Doan Thi Diem Tien/ Senior Admin and Financial Officer
17 – Oct – 22	9:00-12:30	Hue city	TAO	Ms. Vo Thi Anh Thu/ Admin & Financial Officer
18 – Oct – 22	8:00-9:30	Quang Dien dist.	DIB	Mr. Nguyen Thanh/ DIB Director
18 – Oct – 22	8:00-9:30	Quang Dien dist.	District DARD	Ms. Tran Thi Thanh Nha
18 – Oct – 22	10:00-11:30	Quang Dien dist.	Agricultural Service Center	Ms. Tran Thi Hong Van
18 – Oct – 22	10:00-11:30	Quang Dien dist.	District DoET	Mr. Tran Doan/ Officer
19 – Oct – 22	8:00-9:30	Phu Loc dist.	DIB	Mr. Le Nguyen Vu/ Director
19 – Oct – 22	8:00-9:30	Phu Loc dist.	District DARD	Mr. Pham Van Dao/ Deputy Head of Department
19 – Oct – 22	10:00-11:30	Phu Loc dist.	Center of Agricultural Service	Mr. Huynh Tien Dung/ Deputy Director
19 – Oct – 22	10:00-11:30	Phu Loc dist.	District DoET	Mr. Tran Minh Khoi/ Deputy Head of Department

Date	Time	Location	Institution/ Organisation	Name/ Title
				Ms. Nguyen Thi Hanh/ Technical Officer
19 – Oct – 22	13:30-15:00	Phu Loc dist.	Giang Hai CPC	Mr. Mai Xuan Tuan/ Vice Chairman
20 – Oct – 22	8:00-9:30	Phu Vang dist.	DIB	Mr. Phan Van Ngoc/ Director
20 – Oct – 22	8:00-9:30	Phu Vang dist.	DIB	Ms. Nguyen Hoang Yen/ Officer
20 – Oct – 22	8:00-9:30	Phu Vang dist.	DIB	Mr. Le Minh Hung/ Officer
20 – Oct – 22	8:00-9:30	Phu Vang dist.	District DARD	Mr. Mai Xuan Ha/ Technical Officer
20 – Oct – 22	10:00-11:30	Phu Vang dist.	Center of Agricultural Service	Mr. Tran Huu Danh/ Deputy Director
20 – Oct – 22	10:00-11:30	Phu Vang dist.	District DoET	Mr. Nguyen Huu Hai/ Officer
20 – Oct – 22	13:30-15:00	Phu Vang dist.	Phu My CPC	Mr. Duong Thai/ Vice Chairman

Table B2: List of FGD's participants

Date	Time	Location	Institution/ Organisation	Name/ Title
18 – Oct – 22	8:15-9:30	Sia town, Quang Dien District	FA	Mr. Ha Van Duy/ Head of Association
				Mr. Le Van Thach/ Deputy Head of Association
				Mr. Nguyen Dien/ Secretary
				Mr. Bui Binh/ Head of Thach Binh Residence Group
				Mr. Luong Ngoc Manh/ Head of An Gia Residence Group
				Ms. Dang Thi Huyen/ Association member
				Ms. Tran Thi Be/ Association member
				Mr. Le Van Son/ Deputy Chairman of Sia town People's Committee
				Mr. Le Van Hien/ Deputy Chairman of Sia town People's Committee
				Mr. Tran The Son/ Fishery Officer of Sia town People's Committee

Date	Time	Location	Institution/ Organisation	Name/ Title
18 – Oct – 22	10:15-11:30	Sia town, Quang Dien District	Dang Dung Secondary School	Ms. Ngo Thi Ha/ Teacher
				Ms. Do Thi Tho/ Teacher
				Le Nhu Cat Tuong/ Student
				Ho Nguyen Bao Phuong/ Student
				Ngo Thi Phuong Anh/ Student
				Tran Long Nhat/ Student
				Hoang Ngoc Gian Don/ Student
18 – Oct – 22	14:30-16:00	Quang Tho commune, Quang Dien District	Quang Tho II Cooperative	Mr. Hoang Trong An/ Farmer / Centella model
				Ms. Nguyen Thi Hue/ Farmer - Centella model
				Mr. Nguyen Luong Bao/ Group leader
				Ms. Nguyen Thi Be/ Farmer - Centella model
				Mr. Nguyen Luong Tri/ Head of Cooperative
19 – Oct – 22	8:00-9:30	Loc Dien commune, Phu Loc district	Loc Dien Secondary School	Mr. Nguyen Van Tuan/ Teacher
				Mr. Le Anh Quoc/ Teacher
				Nguyen Phuc Nam Phuong/ Student
				Van Thi Ngoc Nhi/ Student
				Tran Nhat Thuy Duong/ Student
				Huynh Thi Nhu Y/ Student
				Nguyen Phuong Bao Tran/ Student
19 – Oct – 22	10:00-11:30	Loc Dien commune, Phu Loc district	Trung Luong FA	Mr. Nguyen Chinh/ Fisherman
				Mr. Le Thanh Long/ Fisherman
				Mr. Pham Mui/ Fisherman
				Mr. Mai Bau/ Fisherman
				Ms. Nguyen Thi Ke/ Fisherman

Date	Time	Location	Institution/ Organisation	Name/ Title
				Mr. Tran Nu/ Fisherman
				Ms. Nguyen Thi Hoa/ Fisherman
				Ms. Le Thi Quyen/ Fisherman
				Mr. Tran Thanh Van/ Fisherman
				Mr. Tran Van Son/ Fisherman
19 – Oct – 22	9:00-10:30	Loc Dien commune, Phu Loc district	Village Women Union, Fatherland Front, Farmer Association	Ms. Nguyen Thi Lien/ Village Women Union
				Mr. Nguyen Minh/ Head of Fatherland Front
				Mr. Nguyen Van Minh/ Village leader
				Ms. Nguyen Thi Xi/ Village leader
				Mr. Huynh La/ Farmer
				Mr. Le Thien/ Head of Production Group
19 – Oct – 22	15:30-17:00	Giang Hai commune, Phu Loc district	My Hai Cooperative	Mr. Huynh Quoc Dung/ Farmer
				Mr. Trang Dang/ Farmer
				Mr. Nguyen Phuc/ Farmer
				Ms. Le Thi Ly /farmer
				Ms. Nguyen Thi Cam/ Farmer
				Mr. Nguyen Viem/ Farmer
				Mr. Huynh Van Vui/ Farmer
				Ms. Truong Thi Thanh Tam/ Farmer
19 – Oct – 22	14:30-16:00	Giang Hai commune, Phu Loc district	Aquaculture farmer group	Mr. Nguyen Khoai/ Farmer
				Mr. Nguyen Viet Hung/ Farmer
				Mr. Nguyen Co/ Farmer
				Ms. Nguyen Thi Chim/ Farmer
				Mr. Pham Dung/ Farmer
				Mr. Tran Van Tam/ Farmer

Date	Time	Location	Institution/ Organisation	Name/ Title
				Mr. Tran Hung/ Farmer
				Ms. Tran Thi Nu/ Farmer
				Mr. Phan Can/ Farmer
				Mr. Tran Van Minh/ Farmer
19 – Oct – 22	14:30-16:00	Vinh My commune, Phu Loc District	My Loi Cooperative	Mr. Hoang Van Tho/ Head of Cooperative
				Mr. Hoang Kinh/ Group Leader
				Mr. Hoang Binh/ Group Leader
				Mr. Le Thao/ Group Leader
				Mr. Hoang Be/ Group Leader
				Ms. Hoang Thi My Ngoc/ Group Leader
				Ms. Doan Thi Kim Sa/ Cooperative member
				Mr. Hoang Trong Tri/ Deputy Head of Cooperative
20 – Oct – 22	8:30-10:00	Vinh Ha commune, Phu Vang district	Ha Giang and Ha Trung FA	Mr. Tran Thao/ Fisherman
				Mr. Bao Quoc/ Fisherman
				Mr. Nguyen Van Phuong/ Fisherman
				Mr. La Dong/ Fisherman
				Mr. Dang Bao/ Fisherman
				Ms. Hoang Hong/ Fisherman
				Mr, Nguyen Van Thien/ Fisherman
				Mr. Phan Nguyen/ Fisherman
				Ms. Nguyen Thi Giam/ Fisherman
				Mr. Van Dinh Tieng/ Fisherman
20 – Oct – 22	8:30-10:00		OA model	Mr. Mai Tu/ Fisherman
				Ms. Dang Thi Xuan/ Farmer

Date	Time	Location	Institution/ Organisation	Name/ Title
		Vinh Ha commune, Phu Vang district		Ms. Bui Thi Tuyet No/ Farmer
				Ms. La Thi Thien/ Farmer
				Mr. Mai Bua/ Farmer
				Mr. La Van Nhon/ Farmer
				Mr. Dang Van Khoi/ Farmer
				Mr. Le Van Dinh/ Farmer
				Mr. Tran Bay/ Farmer
20 – Oct – 22	15:30-17:00	Quang Phu My 1 commune, Phu Vang District	OA model (Organic Rice model)	Mr. Hoang Van Tuan
				Mr. Ho Vien/ Farmer
				Mr. Tran Huu Hung/ Farmer
				Mr. Tran Huu Phong/ Farmer
				Mr. Duong Viet Ko/ Farmer
20 – Oct – 22	14:30-16:00	Phu My commune, Phu Vang District	Phu My Secondary school	Ms. Nguyen Thi Phuong/ Teacher
				Le Thi My Anh/ Student
				Nguyen Thi Thao My/ Student
				Le Nguyen Kieu Trinh/ Student
				Lai Phuoc Gia Hao/ Student
				Le Van Toan/ Student
20 – Oct – 22	14:30-16:00	Phu Xuan commune, Phu Vang district	Le Binh FA	Mr. Tran Mot/ Fisherman
				Mr. Nguyen Van Lang/ Fisherman
				Mr. Tran Van Dai/ Fisherman
				Mr. Tran Van Tam/ Fisherman
				Ms. Nguyen Thi Cam/ Fisherman
				Ms. Tran Thi Som/ Fisherman
				Mr. Phan Van Hieu/ Fisherman
				Mr. Tran Van Co/ Fisherman

Table C1-1: Disbursement by Tasks over years 2019-2022 (EUR) as of 31 December 2022

PPROJECT VIE/433 ADAPTATION - DISBURSEMENT							2,961,000
T&A	Year	2018	2019	2020	2021	2022	Total
		31.27%	15.26%	10.63%	20.37%	17.21%	94.73%
	Disbursement by Year	925,776.35	451,886.54	314,700.25	603,093.58	509,461.30	2,804,918
T0	Organisation and Management	18,104.13	144,057.06	126,126.91	121,738.07	154,809.45	564,835.62
T0A1	Project formulation	-	-	-	-	-	-
T0A2	Coordination	116.16	95,692.21	68,491.34	60,862.21	63,699.24	225,161.92
T0A3	Logistical and Administrative Support	16,232.39	35,648.62	39,218.87	44,387.10	48,434.60	135,486.98
T0A4	Working tools	366.81	-	810.35	-	-	1,177.16
T0A5	Functioning	1,268.05	6,439.00	8,071.75	16,488.76	7,344.84	32,267.56
T0A6	Audit, Evaluation & Closure	-	-	9,534.60	-	27,092.98	9,534.60
T0A7	Monitoring Field	120.72	6,277.23	-	-	8,237.79	6,397.95
T0A8	Contingencies	-	-	-	-	-	-
T1	TASK 1: Further increase AWARENESS and UNDERSTANDING of communities and authorities on Climate Change (CC)	-	9,628.41	(3,659.25)	24,055.49	22,333.91	52,358.56
T1A1	Awareness raising to local stakeholders (district and commune authorities and communities) about CC generally, and its implications for TT Hue specifically. (CAPACITY/KNOWLEDGE)	-	9,628.41	(6,294.49)	2,555.06	352.90	5,888.98
T1A2	Training to further strengthen local capacity (district, communes) to respond to natural disasters. (CAPACITY/SKILLS)	-	-	2,635.24	21,500.43	21,981.01	24,135.67
T2	TASK 2: Help government establish comprehensive MONITORING SYSTEMS to monitor CC events and track progress on various CC adaptation and mitigation interventions, and become ready for direct access to climate finance	10,364.85	24,294.86	14,481.12	39,610.78	35,879.29	124,630.90
T2A1	Strengthen/build capacity on RBM and M&E of CC impacts generally, and of CC adaptation (CCA) & Disaster Risk Reduction (DRR) interventions (with DARD+DONRE)	-	5,322.34	352.19	-	15,515.65	21,190.18
T2A2	Help establish the provincial MRV system for climate change mitigation interventions, aligned with the national MRV system (with DONRE)	-	5,284.59	-	24,817.97	7,761.24	37,863.80
T2A3	Evaluate and share the established provincial monitoring system for CC adaptation and MRV for CC mitigation interventions with the public;	-	-	-	-	5,096.35	5,096.35
T2A4	Technical assistance to GOV on MRV systems (@50%)	10,364.85	13,687.93	14,128.93	14,792.81	7,506.05	60,480.57
T3	TASK 3: Continue and expand ENVIRONMENTAL EDUCATION and practices as introduced over the last two years in primary and secondary schools, including on DRR/RM planning and action;	-	41,663.67	20,024.67	21,283.86	54,762.03	137,734.23
T3A1	Secondary schools 'CC Champions' take lead in organising school/extra-school CC activities and actions in schools, and possibly the wider community, to raise awareness about CC and DRR, and take appropriate action. (AWARENESS / KNOWLEDGE / ACTION)	-	21,921.73	12,358.71	9,920.41	38,018.93	44,200.85
T3A2	DRR training and skill development (e.g. First Aid, emergency aid, swimming classes...) to schools (SKILLS)	-	19,741.94	7,665.96	11,363.45	16,743.10	38,771.35
T3A3	Operational assistance to communes (some 10 CFs @60%) ;	-	-	-	-	-	-
T4	TASK 4: Plan and implement CLIMATE ADAPTIVE AND RESILIENT PHYSICAL INFRASTRUCTURE in target areas, in support of people's changing livelihoods and increased protection against manifestations of climate change - particularly storms, floods, droughts in the dry season, and salinisation of productive soil and lagoon waters.	856,323.73	14,755.31	15,618.49	134,667.13	25,693.80	1,047,058.46
T4A1	Plan small-scale infrastructure sub-projects, identified through a participatory planning cycle and based on comprehensive quantitative and qualitative selection criteria, and implement through delegation;	849,378.74	82.46	474.06	118,807.28	17,647.76	968,742.54
T4A2	Technical assistance for infrastructure (@50%)	6,944.99	14,672.85	15,144.43	15,859.85	8,046.04	52,622.12
T5	TASK 5: Develop and promote methods for PARTICIPATORY MANAGEMENT, USE AND CONSERVATION of natural resources.	28,442.72	95,604.70	80,553.70	122,385.97	76,585.19	403,572.28
T5A1	In follow-up to recommendations of positive external evaluations under VIE/033 – through continued community mobilization and joint action the (23) Fishery Associations (FAs) and lagoon communities are becoming increasingly effective in managing the protected Fisheries Conservation Zones (FCZ).	-	27,717.51	19,032.67	53,966.14	21,569.58	100,716.32
T5A2	Further increase the protection of the entire lagoon as one ecosystem and a vital natural resource, through a focus on pollution prevention.	-	7,812.14	21.39	3,838.13	964.25	11,671.66
T5A3	Technical assistance to districts (DFs @100%)	28,442.72	60,075.05	61,499.64	64,581.70	54,051.36	214,599.11
T6	TASK 6: Pilot the development of a MARKET FOR HEALTHY ORGANIC AGRICULTURAL (OA) products as a new and sustainable growth industry for the region	12,540.92	121,882.53	61,554.61	139,352.28	139,397.63	474,727.97
T6A1	Awareness raising and capacity building interventions, including in government, in support of development of a market for OA (demand), and to show and motivate producers to switch to OA (supply)	-	22,395.93	7,450.12	21,816.80	14,417.83	51,662.85
T6A2	Planning and development of OA production models/pilots	-	41,271.03	17,571.70	66,245.25	36,560.78	125,087.98
T6A3	Preparation of an organic farming certification scheme	-	19,485.02	4,861.10	18,517.41	9,953.57	42,863.53
T6A4	Support to post production management and marketing (packaging, branding...)	-	12,230.20	4,306.61	4,145.43	46,320.23	20,682.24
T6A5	Technical assistance to OF and Tasks 1,3,5	12,540.92	26,500.35	27,365.08	28,627.39	32,145.22	95,033.74

Table C1-2: Disbursement by budget lines over years 2019-2022 (EUR) as of 31 December 2022

VIE/433 - Climate Adaptation and Resilience in Thua Thien Hue Province							
Financing plan: budget by BL and by year							
Task/Activity							
		Total	2018	2019	2020	2021	2022
1	Human Resources	2,401,005	925,289	367,044	271,824	499,839	337,010
2	Equipment & Materials	1,177	367	-	810	-	-
4	Training	351,473	-	78,566	32,532	103,255	137,121
5	Monitoring & evaluation	51,263	121	6,277	9,535	-	35,331
6	Miscellaneous	-	-	-	-	-	-
Total in EUR		2,804,918	925,776	451,887	314,700	603,094	509,461
			2018	2019	2020	2021	2022
1	Human Resources	2,401,005	925,289	367,044	271,824	499,839	337,010
0.1	Project formulation	-	-	-	-	-	-
0.2	Coordination	288,861	116	95,692	68,491	60,862	63,699
0.3	Logistical and Administrative Support	183,922	16,232	35,649	39,219	44,387	48,435
0.5	Functioning	39,612	1,268	6,439	8,072	16,489	7,345
1.1	Awareness raising to local stakeholders (district and commune authorities and communities) about CC generally, and its implications for TT Hue	6,242	-	9,628	(6,294)	2,555	353
2.2	Help establish the provincial MRV system for climate change mitigation interventions, aligned with the national MRV system (with DONRE)	37,864	-	5,285	-	24,818	7,761
2.3	Evaluate and share the established provincial monitoring system for CC adaptation and MRV for CC mitigation interventions with the public;	5,096	-	-	-	-	5,096
2.4	Technical assistance to GOV on MRV systems (@50%)	60,481	10,365	13,688	14,129	14,793	7,506
3.1	Secondary schools 'CC Champions' take lead in organising school/extra-school CC activities and actions in schools, and possibly the wider community, to raise awareness about CC and DRR, and take appropriate action. (AWARENESS / KNOWLEDGE / ACTION)	82,220	-	21,922	12,359	9,920	38,019
3.3	Operational assistance to communes (some 10 CFs @60%) ;	-	-	-	-	-	-
4.1	Plan small-scale infrastructure sub-projects, identified through a participatory planning cycle and based on comprehensive quantitative and qualitative selection criteria, and implement through delegation;	986,390	849,379	82	474	118,807	17,648
4.2	Technical assistance for infrastructure (@50%)	60,668	6,945	14,673	15,144	15,860	8,046
5.1	In follow-up to recommendations of positive external evaluations under VIE/033 -- through continued community mobilization and joint action the (23) Fishery Associations (FAs) and lagoon	122,286	-	27,718	19,033	53,966	21,570
5.2	Further increase the protection of the entire lagoon as one ecosystem and a vital natural resource, through a focus on pollution prevention.	12,636	-	7,812	21	3,838	964
5.3	Technical assistance to districts (DFs @100%)	268,650	28,443	60,075	61,500	64,582	54,051
6.1	Awareness raising and capacity building interventions, including in government, in support of development of a market for OA (demand), and to show and motivate producers to switch to OA (supply)	66,081	-	22,396	7,450	21,817	14,418
6.3	Preparation of an organic farming certification scheme	52,817	-	19,485	4,861	18,517	9,954
6.5	Technical assistance to OF and Tasks 1,3,5	127,179	12,541	26,500	27,365	28,627	32,145
2	Equipment & Materials	1,177	367	-	810	-	-
0.4	Working tools	1,177	367	-	810	-	-
4	Training	351,473	-	78,566	32,532	103,255	137,121
1.2	Training to further strengthen local capacity (district, communes) to respond to natural disasters. (CAPACITY/SKILLS)	46,117	-	-	2,635	21,500	21,981
2.1	Strengthen/build capacity on RBM and M&E of CC impacts generally, and of CC adaptation (CCA) & Disaster Risk Reduction (DRR) interventions (with DARD+DONRE)	21,190	-	5,322	352	-	15,516
3.2	DRR training and skill development (e.g. First Aid, emergency aid, swimming classes...) to schools (SKILLS)	55,514	-	19,742	7,666	11,363	16,743
6.2	Planning and development of OA production models/pilots	161,649	-	41,271	17,572	66,245	36,561
6.4	Support to post production management and marketing (packaging, branding...)	67,002	-	12,230	4,307	4,145	46,320
5	Monitoring & evaluation	51,263	121	6,277	9,535	-	35,331
0.6	Audit, Evaluation & Closure	36,627.58	-	-	9,535	-	27,093
0.7	Monitoring Field	14,635.74	121	6,277	-	-	8,238
6	Miscellaneous	-	-	-	-	-	-
0.8	Contingencies	-	-	-	-	-	-

Code	Project title	Creditor Reporting System sector classification (5 digit code) and description	Budget (EUR)	Marker **										
				Gender Equality	Participatory Development/ Good governance	Trade Development	Aid to Environment	RIO-Biodiversity	RIO-Climate Change (Mitigation)	RIO-Climate Change (Adaptation)	RIO – Combat Desertification	Aid in support of reproductive, maternal, newborn and child health (RMNCH)	Capacity Development	Program Approach
VIE/433	Climate Adaptation and Resilience in TT Hue province	41010 Environmental policy and administrative management	3,261,000	1	1	0	2	1	0	2	0	0	1	0

** The marking system consists of the following three values:

- the thematic marker represents a principal objective (score 2): that means that the thematic marker can be identified as being fundamental in the design and impact of the Project/Programme and which are an explicit objective of the Project/Programme. It can be determined by answering the question "would the Project/Programme have been undertaken without this objective (thematic)?"
- the thematic marker represents a significant objective (score 1): although important, are not one of the principal reasons for undertaking the activity;
- the thematic marker is not targeted to the policy objective (score 0): the thematic has been screened, but was found not to contribute to the policy objective.

A Project/Programme can have more than one principal or significant objective. To qualify for a score principal (2) or significant (1), the objective has to be explicitly promoted in the TDF. Avoiding negative impact is not a sufficient criterion.

Concerning the "**Capacity Building**" and the "**Programme Approach**" markers, the only markers applicable are 0 or 1.

Concerning the "**Aid in support of RMNCH**" marker, the marking system consists of the following five values: 4 RMNCH represents an explicit primary objective.

3 Most, but not all of the funding is targeted to the RMNCH.

2 Half of the funding is targeted to the RMNCH.

1 At least a quarter of the funding is targeted to the RMNCH.

0 Negligible or no funding is targeted to RMNCH activities/results. RMNCH is not an objective of the Project/Programme.

- Gender Equality (1)**

Gender equality was rated as "significant" (score 1). Despite being a climate project, the project design took women-related vulnerabilities and gender inequalities in related to CCA and DRR into consideration, which was reflected by a number of female participants in a number of the project interventions.

- Participatory Development/ Good Governance (1)**

Good governance was rated as "significant" (score 1). The project focused on raising CC-DRR awareness and capacity of a number of government agencies and community individuals at all levels. The project was designed and implemented in close consultation with related parties and communities.

- Aid to Environment (2)**

Aid to environment was rated as “fundamental” (score 2). Environment protection and conservation were a focus of all interventions. Result 1 included various training and awareness raising activities on environment protection for school teachers, students, local authorities and communities. Infrastructure sub-projects under Result 2 contributed to the protection of agricultural land. Result 3 focused on protecting the lagoon ecosystem, and developing OA which no chemicals were allowed in agricultural production.

- **Rio - Biodiversity (1)**

Biodiversity was rated as “significant” (score 1). Task 5 was designed to enhance the lagoon ecosystem resilience for better CCM, which could be realized by enhanced awareness and capacity of FAs and fishermen. Task 6 supported the OA development as a new sustainable growth industry [i.e., no chemicals used meant the soil fertility and ecosystem would be enhanced.]

- **CC (Adaptation) (2):**

CC (Adaptation) was rated as “fundamental” (score 2). Being a climate project, both hardware and software interventions of the project aimed to increase the CCR, including enhanced capacity of local government and community to respond to CC, constructed infrastructure to protect people and livelihoods, and improved ecosystem to adapt to CC.

- **Capacity development (1):**

Capacity development was rated as “significant” (score 1). Technical support was provided for implementing partners and beneficiaries to enable them to handle their work. The project carefully selected a wide range of capacity building interventions which contributed significantly to the local development, especially in terms of CCR.

Matrix of the Logical Framework and Indicators of the Project at the moment of Evaluation

Project VIE/433: Climate Adaptation and Resilience in Thua Thien Hue province										
MONITORING & EVALUATION MATRIX										
Overall Objective:		Contribute to the national and provincial objectives of strengthening human and natural system resilience to climate change, as reflected in the government's National Target Programme (NTP) on Climate Change & Green Growth 2016 and TT Hue provincial Action Plan on Climate Change up to 2020.								
Specific Objective & Results	Indicators	Unit of measurement	Baseline (Dec 2018) NA=not applicable	EOP Final Targets and Results Achieved (as of 30th Sept, 2022)		Data type & collection method	Source of verification	Frequency/ Time of data collection (EOP=end of project)	Person / institution in charge	
				OE =Open ended; EOP=End of project					Data collection	Data analysis
					Target	Result				
Specific Objective	Final Outcome									
To strengthen resilience and adaptive capacity to climate-related hazards and natural disasters in coastal and lagoon communes	1) Percentage of total households (HHs) in target communes directly benefiting from project supported interventions;	No. of HHs	NA	OE	63,334 people and 8,904 households	Primary data regularly collected through project output tracking system quarterly updated by DIBs	Activity Completion Reports, Output monitoring database and periodical M&E reports	Bi-annually Jun-Dec and EOP	DFs, DIB staff in charge of M&E, and TA CCMRV	TA CCMRV
	2) Number of HHs in target communes suffering significant damage/loss (in monetary terms) from climate-related impacts to be reduced by 10% as compared to baseline data;	No. of HHs	690	621	352	Primary data collected through VIE/433 baseline and endline surveys	VIE/433 baseline & endline survey database & report, final evaluation report and periodical M&E reports	EOP	TA CCMRV & external enumerators/External & independent consultant	TA CCMRV, External & independent consultant
	3) The institutional capacity of DONRE's Division of Climate Change (DCC) for planning and MRV of climate change adaptation and mitigation interventions has been strengthened and enhanced to reach moderately high capacity level (≥ 80% compliance with set of criteria);	% compliance	22	80	88.5	Primary data collected through baseline and endline surveys, using an institutional capacity assessment questionnaire	Baseline and endline survey databases and reports, final evaluation report and periodical M&E reports	Annually (Dec) and EOP	TA CCMRV, External/Independent Consultant	TA CCMRV, External/Independent Consultant
RESULT 1: Government and community capacities to respond to climate change are enhanced										
Tasks	Intermediate Outcome									
TASK 1: Further increase awareness and understanding of communities and authorities on climate-related Disaster Risk Reduction and Risk Mitigation (DRR-RM), especially in most vulnerable areas, and ensure they have the necessary skills to respond to it.	4) Percentage of project supported stakeholders (local authorities, community groups, mass organisations) with improved knowledge, attitudes and practices (KAP) with regard to CCA, mitigation and DRR over project period;	% of project supported trainees	NA	80	Cancelled	Primary data periodically collected through P project Monitoring Survey using a KAP questionnaire	Periodical M&E reports, Project Annual Reports	Annually (Dec) and EOP	CFs & DFs and external enumerators	TA CCMRV
	5) Percentage of local authorities (district, commune & village) with improved adaptive capacity and skills to respond to natural disasters over project period;	% of project supported trainees	NA	80	100	Primary data periodically collected through P project Monitoring Survey using an individual capacity assessment checklist	Periodical M&E reports, Project Annual Reports	Annually (Dec) and EOP	CFs & DFs and external enumerators	TA CCMRV

Specific Objective & Results	Indicators	Unit of measurement	Baseline (Dec 2018) NA=not applicable	EOP Final Targets and Results Achieved (as of 30th Sept, 2022)		Data type & collection method	Source of verification	Frequency/ Time of data collection (EOP=end of project)	Person / institution in charge		
				OE =Open ended; EOP=End of project						Data collection	Data analysis
				Target	Result						
TASK 2: Help government establish comprehensive MONITORING SYSTEMS to monitor CC events and track progress on various CC adaptation and mitigation interventions, and become ready for direct access to climate finance	6) The provincial MRV system for climate change mitigation interventions, aligned with the national MRV system, has been established with at least 70% of the required procedures/steps being developed and completed;	% of procedures	NA	90	95.8	Primary data periodically collected through Project Monitoring Survey using a process assessment checklist	Periodical M &E reports, Project Progress Reports	Bi-annually, and EOP	TACC MRV	TACC MRV	
	7) Percentage of provincial and district DONRE staff/officer trained by the project reported to have improved knowledge and skills for planning and Monitoring, Reporting and Verification (MRV) of climate change adaptation and mitigation;	% of project supported trainees	NA	100	100	Primary data periodically collected through Project Monitoring Survey using a capacity assessment checklist	Periodical M &E reports, Project Annual Reports, Final evaluation report	Annually and EOP	TACC MRV	TACC MRV	
TASK 3: Continue and expand ENVIRONMENTAL EDUCATION and practices as introduced over the last two years in primary and secondary schools, including on DRR/RM planning and action;	8) Percentage of secondary pupils in target schools with improved knowledge, attitudes and practices (KAP) with regard to CC adaptation and mitigation, and DRR;	%	6.1	95	95.8	Primary data periodically collected through Project Baseline Survey using a KAP questionnaire	Baseline survey report, periodical M &E reports, project annual reports and final evaluation report	Annually and EOP	CFs & DFs and external enumerators	TACC MRV	
	9) Percentage of total activities in action plans proposed by secondary pupil Action Groups that have been implemented over project period;	%	NA	100	100	Primary data periodically collected through Project Monitoring Survey using a performance assessment checklist	Periodical M &E reports, Project Annual Reports	Bi-annually and EOP	CFs & DFs	TACC MRV	
RESULT 2: Small-scale infrastructure is better protecting people and their livelihoods											
Tasks	Intermediate Outcome										
TASK 4: Plan and implement climate adaptive and resilient physical infrastructure in target areas, in support of people's changing livelihoods and increased protection against manifestations of climate change, particularly storms, floods, droughts in the dry season, and salinisation of productive soil and lagoon water.	10) Area (ha) of productive land better protected against the impacts of climate change by project-supported INFRA sub-projects;	ha	NA	OE	875	Document review and project assessment upon the completion of INFRA sub-projects	INFRA sub-project completion report; Map of revised commune NRDPS; consolidated table of land areas supported for protection and periodic M &E report	Bi-annually	TAPIPP and TACC MRV	TAPIPP and TACC MRV	
	11) Number of households directly benefiting from project-supported INFRA sub-projects;	No. beneficiary HHs	NA	OE	5,466	Document review and project assessment upon the completion of INFRA sub-projects	INFRA sub-project completion report; revised map of commune NRDPS and consolidated estimate of beneficiary HHs by INFRA sub-projects and periodic M &E report.	Bi-annually	TAPIPP and TACC MRV	TAPIPP and TACC MRV	

Specific Objective & Results	Indicators	Unit of measurement	Baseline (Dec 2018) NA=not applicable	EOP Final Targets and Results Achieved (as of 30th Sept, 2022)		Data type & collection method	Source of verification	Frequency/ Time of data collection (EOP=end of project)	Person / institution in charge	
				OE =Open ended; EOP=End of project					Data collection	Data analysis
					Target				Result	
RESULT 3: Resilient ecosystems help to better adapt people to climate change										
Tasks	Intermediate Outcome									
TASK 5: Develop and promote methods for PARTICIPATORY MANAGEMENT, USE AND CONSERVATION of natural resources.	12) Percentage increase in number of fishermen and farmers in target communes with improved knowledge, attitudes and practices (KAP) on effective management, use and conservation of fisheries and aquatic resources in Tam Giang-Cau Hai lagoon areas;	%	43	95	99.4	Primary data periodically collected through Project Baseline Household survey	Baseline survey report, endline survey/final evaluation report	EOP	CFs & DFs and external enumerators	TACC MRV
	13) Percentage increase in the number of FAs in target communes with improved institutional capacity for management, use and protection of fisheries and aquatic resources in Tam Giang-Cau Hai lagoon areas;	%	25.5	85	86.5	Primary data periodically collected through Project Monitoring Survey using a capacity assessment checklist	Baseline survey report, periodical M & E reports, project annual reports and endline survey/final evaluation report	Annually and EOP	CFs & DFs and external enumerators	TACC MRV
	14) Percentage of (18) sample sites in the lagoon where the quality of the surface water complies with all the 6 parameters (S%, pH, Alkalinity, PO4, COD, BOD5) as per the required national standards set by QCVN 08 - MT:2015/BTNMT/MONRE and QCVN 02 - 19:2014/BNNPTNT/MARD;	%	38.9	70	72.2	Primary data of surface water quality periodically collected at 18 sampled sites in lagoon areas within project target districts	Data sheets regularly provided by Sub-Department of Fisheries and annual M & E reports	Bi-annually and EOP	Sub-Department of Fisheries (DARD) and TACC MRV	TACC MRV

Specific Objective & Results	Indicators	Unit of measurement	Baseline (Dec 2018) NA=not applicable	EOP Final Targets and Results Achieved (as of 30th Sept, 2022)		Data type & collection method	Source of verification	Frequency/ Time of data collection (EOP=end of project)	Person / institution in charge	
				OE=Open ended; EOP=End of project					Data collection	Data analysis
				Target	Result					
TASK 6: Pilot the development of a MARKET FOR HEALTHY ORGANIC AGRICULTURAL (OA) products as a new and sustainable growth industry for the region.	15) Percentage increase in the number of HHs in pilot communes with improved knowledge and a more positive perception of organic food products;	%	8	60	96.0	Primary data periodically collected through P project Monitoring Survey using a knowledge and perception questionnaire	Baseline survey report, periodic M & E reports, project annual reports and final evaluation report	Annually and EOP	CFs & DFs and external enumerators	TA CCM RV
	16) Percentage increase in the number of local people in pilot communes who are willing to pay (WTP) an average 15% premium for certified organic food products;	%	26.5	65	92.4	Primary data periodically collected through P project Monitoring Survey using a knowledge and perception questionnaire	Baseline survey report, periodic M & E reports, project annual reports and final evaluation report	Annually and EOP	CFs & DFs and external enumerators	TA CCM RV
	17) Volume decrease in the use of chemicals in OA across all pilot interventions;	Volume measurement (Kg/L)	NA	OE	Fertiliser :37,339kg; Pesticides & herbicides: 118.2 litres	Primary data periodically collected through P project Monitoring system, using a tracking template	Periodical M & E reports and annual project reports	Quarterly	CFs, DFs & TA CEB A	TA CCM RV
	18) Progress in total revenue of organic products produced by project supported HHs sold over project period;	VND	NA	NA	9,172.5 Mn	Primary data regularly collected using an output tracking form	Activity Completion Reports and periodical M & E reports	Bi-annually	CFs, DFs & TA CEB A	TA CCM RV
	19) GHG emission reductions from OA interventions in pilot areas.	kg of CO ₂ e	NA	NA	Cancelled	Primary data regularly collected based on pilot OA interventions, using relevant measurement methods	Activity Completion Reports and periodical M & E reports	Annually and EOP	CFs, DFs & TA CEB A	TA CCM RV
	20) Progress (%) in process leading up to fully operational Participatory Guarantee System (PGS) for organic food product certification	%	NA	80	85	Primary data regularly collected using a process assessment checklist	Activity Completion Reports and periodical M & E reports	Bi-annually	CFs, DFs & TA CEB A	TA CCM RV
	21) Percentage progress (average) in organic food post-production and marketing process cycle	%	NA	60	79.7	Primary data regularly collected using a process assessment checklist	Activity Completion Reports and periodical M & E reports	Bi-annually	CFs, DFs & TA CEB A	TA CCM RV
ABBREVIATIONS										
CCA	Climate Change Adaptation				INFRA	Infrastructure				
CFs	Community Facilitators				M & E	Monitoring and Evaluation				
CPC	Commune People's Committee				MRV	Measurement, Reporting and Verification				
DARD	Dept of Agriculture and Rural Development				NTP	National Target Programme				
DFs	District Facilitators				NRDP	New Rural Development Programme				
DIB	District Implementation Board				OA	Organic Agriculture				
DMHCC	Division of Meteorology, Hydrology and Climate Change				PCC	Provincial People's Committee				
DONRE	Dept of Natural Resources and Environment				PPMB	Provincial Project Management Board				
DPC	District People's Committee				SEDP	Socio-Economic Development Plan				
DRR	Disaster Risk Reduction				TA CCM RV	Technical Adviser-Climate Change Measurement, Reporting & Verification (MRV)				
EOP	End of the Project				TA CEB A	Technical Adviser-Community Driven and Ecosystem-Based Adaptation				
HH	Household				TA PIP	Technical Adviser-Physical Infrastructure Planning and Procurement				

N/A

The project activities were deployed as planned and were in good progress thanks to excellent coordination and continuous efforts of related parties. Some activities such as CCA M&E and CCM MRV systems (Result 1, Task 2) and OA development (Result 3, Task 6) which proved to be new and more complicated and challenging than the others, were well handled. Although a number of activities were seriously delayed given Covid-19 restrictions during mid 2020-early 2022, especially those under Task 1 and Task 3, their implementation resumed as soon as the situation allowed. The modification and/or cancellation of activities, if any, was made in consultation with related parties, taking the implementation capacity and situation into consideration. The undertaken activities and outputs by Tasks can be summarised as below.

Result 1: CC and DRR

Task 1: Increase awareness, understanding and coping capacity

Despite serious delays in implementation due to Covid-19 restrictions, the project managed to organise 30 one-day training classes on natural disaster response skills for 952 government staff at district and commune levels, heads of villages, FAs, members of agriculture cooperatives and mass organizations¹⁷, and 25 workshops on community-based early warning systems for 609 participants, as well as provide various equipment for the purpose of enhancing capacity in response to CC such as life jackets, rain coats, loudspeakers, power generators. Seven community-based early warning system models were set up in three districts (i.e., Quang Dien 2, Phu Vang 3, Phu Loc 2). A total of 16 news and reportages on the project interventions were produced and broadcasted on national Vietnam Television (VTV) and TT Hue Radio Television television channels such as news on Phu My organic rice certification broadcasted on VTV8.¹⁸ Meanwhile, some activities were cancelled due to the Covid-19 outbreak (e.g., 14 IEC contests on CC under Task 1).

Task 2: Help establish CCA M&E and Mitigation MRV system

Given the absence of a national and subnational system and guidelines on CCA M&E and CCM MRV at the project commencement, (i.e., the national MRV guidelines which regulated the National MRV framework and guidelines on GHG emission reduction and ozone layer protection was recently issued through Decree 06/2022/ND-CP dated 7 January 2022, regulating reduction of GHG emissions and protection of the ozone layer, and Circular No. 01/2022/TT-BTNMT dated 7 January 2022 detailing the implementation of the Law on Environmental Protection regarding CC response; however, the documents simply did not cover the provincial MRV framework that the project worked on with DONRE in TT Hue), the project developed the provincial monitoring and MRV guidelines based on UNFCCC guidelines and in consultation with MONRE and concerned provincial and district agencies. Further work on the MRV system should wait for the issuance of the national guidelines. Meanwhile, the project managed to complete key interventions related to the provincial CCA M&E system. Significant outputs included a roadmap (December 2020), framework design and methods (March 2021), M&E indicator sets (510 for vulnerability, 200 for climate impact and risks, and 345 for adaptation actions and financial resources, adaptation results, and impact), 27 data collection tools, an SPSS database template, and strengthened capacity of the provincial and district agencies on data collection and data entry.

The baseline for the CCA M&E system was completed in 2020 with the secondary data collected from 13 provincial and nine district agencies, and the primary data obtained from the survey of 4,069 HHs in 145 communes/ wards. The data served as a basis to develop the Database Management System for the provincial CCA.

The project organised various trainings for DONRE and DARD officials on result-based project management, project M&E, survey design, data collection, processing and analysis (2019 and 2021), CC and DRR-based investment decision making tools such as Cost-Effectiveness Analysis, CBA, Multi-

¹⁷ These included 12 classes for 310 trainees in Quang Dien, nine classes for 323 trainees in Phu Vang, and nine classes for 319 trainees in Phu Loc. The training provided an update on legal documents on disaster prevention and search & rescue - Disaster prevention and control fund, organizational and operational structure of the commune-level disaster prevention and control team, and guidance on building protection during storms, boat mooring and reinforcement of fish cages and aquaculture ponds, response to flash floods and landslides in coastal areas, and disaster recovery.

¹⁸ Please click on the links below, choose the date, timing and programs as mentioned. The broadcasted programs would be kept online for several months only.

(i) A long one broadcasted on the program of Investment Economy at 18:30, 12 November 2022 with a brief introduction at the beginning and the main part from minute 6.11 to the end. Please click the programme at 18:40 to watch until the end of the reportage: <https://vtvgo.vn/xem-truc-tuyen-kenh-vtv8-36.html>

(ii) The shorter one on the news programme at 18.05 on 22 November 2022, the coverage was at 12.50-15.33: <https://vtvgo.vn/xem-truc-tuyen-kenh-vtv8-36.html>

(iii) News on Phu My organic rice was broadcasted on VTV8 on 30 September 2022 (see news program at 11.30). The news started at 10:21: <https://vtvgo.vn/ts/3292441>

Criteria Analysis (2020), baseline data collection for CCA M&E system, conducted CC impact and vulnerability assessment using data from the new CCA M&E system, and held a number of workshops on Intended Nationally Determined Contribution, Nationally Appropriate Mitigation Actions, MRV, GHG emission reduction (2022).

Task 3: Expand primary and secondary environmental and DRR education

A series of ToT training for teachers and roll-out training on CC and DRR, extracurricular activities on environmental protection and CC such as painting competitions (3,360 students) and “Golden bell contests”¹⁹ (3,508 participating students and 10,852 cheering students), “I learn to live green” module (25 teachers and 3,273 students), and training/ communication on first and emergency responses (194 teachers and 28,876 students) were organised during 2019-2022, despite serious postponements during the Covid-19 outbreak. Survival swimming training was held for 4,214 students, and survival swimming coaching skills were delivered to 78 physical education teachers.

A total of 28 SAGs (20 students per SAG) were established at all secondary schools in three project districts, and operated under the guidance of 81 school teachers in accordance with the group action plans. The SAGs conducted 56 IEC activities on environmental protection, CCA and DRR for 5,831 peers.

28 sets of IEC tools, including 84 banners and 168 posters, were distributed for the education and communication activities.

Result 2: Small-scale infrastructure is better protecting people and their livelihoods

Task 4: Implement climate adaptive and resilient physical infrastructure in target areas

A total of 14 sub-projects (split by districts: Quang Dien - 6, Phu Loc - 5, Phu Vang - 3; by types of works: boat shelters - 2, salinity intrusion dams - 1, irrigation canals - 2, salinity intrusion dykes combined with drainage pump stations/boat shelters - 8, and drainage & impoundment systems - 1) were selected through an objective and competitive selection process, using the same planning system (i.e., based on Local Participatory Planning Process, Commune Vulnerability Capacity Assessment reports and data-based assessment and selection matrix) and implementation mechanism (i.e., delegation), but stricter selection criteria with a switched focus on CCA and DRR, and completed on time by November 2020. An additional 11 sub-projects from the previously 92 infrastructure works under VIE/033 and VIE/433 (Quang Dien - 2, Phu Loc - 4, Phu Vang - 5) were selected by the project partners for repairing or upgrading in 2021-2022.

Result 3: Resilient ecosystems help people better adapt to CC

Task 5: Promote methods of participatory management, use and conservation of natural resources

The project (i) restructured the management of nine Aquatic Resources Conservation Zones (ARCZs), (ii) stocking approximately 5.5 million fingerlings in 20 FCZs of over 604 ha, (iii) organised 25 one-day training courses on FCZ-related regulation and laws for 878 participants in 2022, (iv) conducted aquatic resource conservation-related IEC activities (e.g., knowledge contest for fishing community, golden bell contest for secondary and high school students), (v) held 33 training classes on registration of local fishing boats in 13 communes with the participation of 1,305 boat owners, (vi) installed 665 concrete/bamboo fish aggregating devices into 14 ARCZs, (vii) conducted regular water quality testing at 18 sample sites in the lagoon, (viii) provided five patrol boats, and 156 life jackets and 39 torches for patrol teams of 13 FAs; (ix) provided 04 training classes on environment protection for 142 fish cage farming HHs, and (x) installed 171 poles to demarcate/zone fish cage farming areas for four FAs (Ngu My Thanh, Ha Cong, Lai Ha and Trung Lang) in 2021.

Task 6: Support development of a market for organic farming as a new sustainable growth industry

The project conducted a comprehensive set of activities to support the development of the provincial OA market which were categorised into four sub-groups: (i) awareness raising and capacity building on OA (e.g., training, a large IEC campaign, 12 study tours on OA models for 230 farmers and staff); (ii) development of six OA models with the participation of 181 HHs (three models in Quang Dien - Sia town and Quang Thanh vegetable, and Quang Tho centella, one model in Phu Vang - Phu My rice, and two models in Phu Loc - Vinh My vegetable, Giang Hai peanut), OA production scheme, organic fertiliser production, testing of soil, water, vegetables; (iii) OA certification (20 PGS groups, three inter-groups,

¹⁹ Golden bell contest was an attractive playground that fostered the students' knowledge through questions on environmental protection and CC developed by the schools in consultation with TAO and DIBs. In each school, about one hundred students from different grades would be selected to participate in the show. They sat on a large stage, and each held a small board to give their answers. Those who could not answer a question had to leave the stage. The contestants were supported by their teachers to increase the chance of winning. The last one on the stage would become the winner who would be honored to ring the golden bell.

and one PGS Coordination Board and OA Association established); and (iv) post-production (e.g., brand identity, marketing, trade mark registration, packaging, and market access). Meanwhile, some activities were cancelled such as development of organic red rice, organic chicken and pig rearing models because it was hard to follow the technical requirements and ensure inputs (e.g. chicken rearing: organic feed, care, cage, flooding effects).

Evaluation grid: with ratings for evaluation and cross-cutting criteria and descriptions

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
1	18-Oct-22	Dang Dung Secondary School, Sia town, Quang Dien	R1	T3	1	1	2	2	3	Enhanced knowledge (CC, DRR, understanding weather forecast and self-protection when there is a disaster, plastic recycling, turn off lights/aircon when not in use, energy saving, using fewer plastic bags, etc.); knowledge shared with their parents and friends (some parents encouraged neighbors to use less nylon bags); but the activities were time consuming and costly
2	18-Oct-22	FA Tan Lap, Sia town, Quang Dien	R1	T1	1	1	1	1	2	Very useful training, enhanced awareness thanks to training (evacuation before storms, reduced waste)
3	18-Oct-22	FA Tan Lap, Sia town, Quang Dien	R3	T5	1	1	2	2	3	Very useful training; protected aquatic resources; support for water treatment in aquaculture; more aquatic resources; improved knowledge about water quality measurement, aquaculture, water management; however, water pollution in downstream area; lack of patrol funding and boat; self paid for patrol; lack of protection fence; expected to receive more fish aggregating devices, funding for FA operation, boat for patrol team.
4	18-Oct-22	District DARD, Sia town, Quang Dien	R3	T5	1	1	2	2	2	Useful and appreciated support (demarcation, concrete fish aggregating devices); enhanced awareness (no use of high capacity boats, use bigger mesh size but not all fishermen following, establishment of self-management groups to protect aquatic resource, no direct discharge of wastewater, reporting to local authorities if any fish/shrimp diseases); more aquatic resource which increased income; lack of funding to replicate
5	18-Oct-22	Centella Quang Tho II Cooperative, Quang Tho commune, Quang Dien	R3	T6	2	2	2	2	3	Very hard to change the local awareness on OA (as they were more familiar with Vietnamese Good Agricultural Practices production); very strict OA standards, labor intensive; high initial costs (about two years); hard to sell product because few wanted to buy at 21,000 VND/kg; partial purchase by cooperative, but sometimes not enough to sell to cooperative; affected income but had to follow the model; good change in soil and ecosystem; need to promote consumption, market linkage, marketing to ensure that the products will be sold at higher price.

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
6	18-Oct-22	CAS, Sia town, Quang Dien	R3	T6	1	2	2	2	3	Obtained knowledge (better understanding of OA benefits, OA practice, negative effect of conventional practice), Most difficult to sell centella products (currently sold to Quang Tho 2 Cooperative only), 1,000 VND/kg higher than VietGAP centella which was not attractive enough given long tending duration so farmers felt disappointed; lower productivity in early stage, but it took longer to harvest. Thanh Ha Organic vegetable could be sold 25-25% higher price than market price (after being certified in 2022) because the CAS was in charge of the consumption by developing linkages with purchase agents; sold to Duyen Anh restaurant, organic stores in Quang Tri, Quang Binh, Quang Nam, Da Nang provinces, and Hue Viet company, e-commerce platform; higher productivity over years thanks to careful tending, hardworking, making full use of by-products for compost/ Difficult to persuade farmers in 2019, 2020, 2021 due to low productivity (same price due to no certification), longer tending, more diseases. It's a pity that the project ended when the model was in progress; expected the project to last for another 4-5 years to perfect the OA process (normally, it should last for 5-15 years to complete a OA phase); need to promote marketing and build distribution stores; cold warehouse to store products; digital adaptation; support to maintain the PGS group operation because no district budget available; required funding support for staff in charge of marketing or support in implementing activities; possibly cultivating organic onion, organic chives, ciboulette (ném); Initial high investment cost; labor intensive; not much difference between organic & non-organic product markets yet (from July 2019-July 2022) which caused unstable consumption. From July 2022, when there was a stable market, there was not enough vegetable for sale while there were flooding and other climate-related issues.
7	18-Oct-22	People's Committee of Sia town, Quang Dien			1	1	2	2	2	Very good for environment & CC response; enhanced knowledge;
8	18-Oct-22	People's Committee of Sia town, Quang Dien	R3	T6	2	2	2	2	3	Very difficult to replicate given financial constraint

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
9	18-Oct-22	Quang Dien DoET	R1	T3	1	1	2	2	3	Good technical support; good training on swimming; good SAG operation; project materials put into library for reading; integrated into extracurricular activities but hard to maintain given budget constraint
10	19-Oct-22	District DARD, Phu Loc town	R3	T5	1	1	2	2	2	More aquatic resources thanks to the project support; enhanced awareness (no using pulses, less thieves in protected areas, but some still using small mesh); good coordination among parties; strict and tight project cost norms
11	19-Oct-22	District DARD, Phu Loc town	R3	T6	2	2	2	2	3	Extremely difficult to change local awareness at the start (not started until the 10th meeting, and refused to continue after the failure of first crop, same productivity but too labor intensive), but now they not only maintain the peanut model, but also using organic method for other crops; previously domestic consumption only if no trademark for peanut oil, but recently HueViet bought it at a double price compared to traditional peanut oil; possible replication if a long term project; good coordination among parties, otherwise, the project could not be successful; improved capacity, but not outstanding change
12	19-Oct-22	Loc Dien Secondary School, Loc Dien commune, Phu Loc	R1	T3	1	1	2	2	3	Enhanced awareness (turn off lights when not in use, understanding CC, environmental protection, using fewer plastic bags, water saving, recycling, self-protection when there is a natural disaster, etc.); changes caused by SAG's activities; knowledge shared with parents and family members; but time-consuming and costly activities; the project topics would be integrated into contests after the project; now no enough trash bins for sorting garbage, lack of funding for sorting garbage
13	19-Oct-22	Trung Luong FA, Trung Chanh village, Loc Dien commune, Phu Loc		T1	1	2	2	2	2	Enhanced knowledge (evacuation before storms, moving boats to shelters, reducing waste)
14	19-Oct-22	Trung Luong FA, Trung Chanh village, Loc Dien commune, Phu Loc	R3	T5	1	2	2	2	3	Improved knowledge about FCZ management and conservation; improved environment thanks to support for water treatment; protected fishing area and prevented thieves; more aquatic resources; but financial constraint due to various expenditures (machinery, equipment, ...), lack of patrol funding and boats, protective fences, and protective clothing, self-paid for patrol; expected patrol tools (raincoat, machines), stocking more fingerlings given damage by recent storms, bigger mesh

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
15	19-Oct-22	Boat shelter, Trung Chanh village, Loc Dien commune, Phu Loc	R2	T4	1	2	3	2	2	Narrow path; good quality; useful to save boats, especially in rainy season but too low if serious flooding
16	19-Oct-22	Women Union Fatherland Front, Farmer Association, Dong An village, Loc Dien commune, Phu Loc	R3	T6	2	2	2	2	3	(No OA model piloted) Received good and practical training on compost fertilizer and supported with materials; but facing difficulties (small garden, regular flooding which damaged the fertilizer, better to have iron roof to cover the composting area rather than tarpaulins which were quickly damaged) and not replicated in the community yet; not able to produce organic pesticides yet; one HH making compost to grow purple sweet potato could earn 5 mil VND/crop of 9 months
17	19-Oct-22	Organic peanut model, My Hai Cooperative, Giang Hai commune, Phu Loc	R3	T6	2	2	2	2	4	Good training; reduced environment pollution; adopted the OA method to other crops which helped reduced production cost; Local residents were not willing to pay for higher price of organic product, and were not well aware of OA product benefits. Most of oil products were mainly used for domestic consumption or giving to friends; but not able to sell products yet, so no revenue; possibly making loss if including all costs; being tired and exhausted at first, but feeling better after the 7th crop; weak marketing and consumption; unlikely to continue the model due to difficulties in selling products, high investment cost; farmers without alternative income will find it hard to maintain the model without support; the project should continue to support until the products can be sold on market.
18	19-Oct-22	Fishermen, Giang Hai commune, Phu Loc	R3	T1	1	1	1	1	2	Improved knowledge and skills thanks to training (evacuation before storms, following suggestions related to natural disaster broadcasted on radio, television)
19	19-Oct-22	Fishermen, Giang Hai commune, Phu Loc	R3	T5	1	1	1	1	3	Very useful support (stocking fingerlings, fishing tools), appreciated by local residents as it benefited the entire community/village; increasing harsh climate; fewer aquatic resources, costly reparation of things, more water pollution due to too much fertilizer; expected support for 30 resettlement HH
20	19-Oct-22	CAS, Phu Loc town	R3	T6	2	2	2	2	3	Obtained knowledge of organic peanut production, making compost, herbal pesticides; remarkable productivity; improved ecosystem on the production field; good support by local authorities and hardworking farmers; Faced challenges in early phase due to labor intensive/time-consuming for tending; more familiar with conventional farming

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
										practice so hard to persuade to join the pilot; modest production and market; lower productivity of organic peanut compared to conventional farming in early stage; weakness of recording; higher price of organic oil caused difficulties for consumption; Important to conduct awareness raising, provide technical training and initial support of organic fertilizers; strong support from local authorities and cooperatives; good recording of the production process, identify price for organic product; no parallel production, isolation fence required.
21	19-Oct-22	Organic vegetable model, My Loi Agricultural Cooperative, Vinh My Commune, Phu Loc	R3	T6	3	3	3	3	4	High cost of organic certification; unfavorable climate; unstable yield which made companies reluctant to sign a consumption contract; in general area and yield were not large enough; forced to sell at lower price because the vegetable did not look as good as non-organic vegetable; not able to access market due to no packaging; OA farmers were interested in OA, but the more they were interested in OA, the poorer they were; unlikely to continue the model without the project support; expected to support with certification, materials and seedlings and agricultural extension funding.
22	19-Oct-22	Phu Loc DoET	R1	T3	1	1	2	2	3	Good training on swimming; enhanced knowledge; good SAG operation; no such activities without the project support; integrated into extracurricular activities but limited budget for continuation
23	19-Oct-22	Giang Hai CPC, Phu Loc district	R3	T6	2	2	2	2	3	Hard to persuade local people to join the pilot at initial stage (still using conventional practice if no project due to local budget unavailability to promote OA); enthusiastic cooperative leaders who encouraged local HHs and guided them; good achievement despite challenge; normal oil 140,000 VND/liter vs. 210,000 VND/liter organic; possibly damage by flooding; sustainability if being a long-term OA support; required more support because of local budget constraint
24	19-Oct-22	Giang Hai CPC, Phu Loc district	R3	T5	1	1	2	2	3	Scattered activities if no project; lack of funding for stocking fingerlings
25	19-Oct-22	Giang Hai CPC, Phu Loc district	R1	T3	1	1	2	2	2	Enhanced awareness
26	19-Oct-22	Giang Hai CPC, Phu Loc district	R1	T1	1	1	1	1	2	Enhanced awareness (now local residents followed instructions quickly without much explanation); good design of interventions; good coordination

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
27	19-Oct-22	Giang Hai CPC, Phu Loc district	R2	T4	1	1	2	2	2	Good support and guidance from TAO expert; good consultation with local community to select sub-projects
28	19-Oct-22	Upgrading Khe Mieu Irrigation Canal, Vinh Giang Commune, Phu Loc	R2	T4	2	2	2	2	2	Not applied (NA)
29	19-Oct-22	Boat shelter in Hien Hoa village 2, Vinh Hien Commune, Phu Loc	R2	T4	1	2	1	2	2	NA
30	20-Oct-22	Ha Giang and Ha Trung FA, Vinh Ha commune, Phu Vang	R1	T1	1	2	2	2	2	Enhanced awareness (evacuation before storms)
31	20-Oct-22	Ha Giang and Ha Trung FA, Vinh Ha commune, Phu Vang	R3	T5	1	2	2	3	3	Good support (boat, fingerlings, poles); protected fishing area and prevented theft; more aquatic resources; improved capacity in protecting and developing aquaculture, environmental pollution reduction and adaptation to CC; but degraded project boat, lack of funding for patrol, self-paid for monitoring the lagoon, lack of protection fence and clothing; expected to construct more concrete poles as protection fence (5-10m in distance), life-jackets, boat (to replace the degraded one), petrol for patrol
32	20-Oct-22	CAS, Phu Vang	R3	T6	1	2	2	2	3	Cancelled OA modes (vegetable, chicken) because of failure to comply with technical requirements and inputs (vegetable: lack of manure, Covid outbreak's effect on consumption and price, thieves, lack of enthusiasm, labor intensive for tending/ chicken: cages damaged by flooding, financial constraint, organic feeds, unforeseen difficulties); Enhanced knowledge of OA production; interested in OA production, and adopted OA practice to other crops; higher productivity over crops (0.17 ton/sao in 2019 to 0.25 ton/sao in 2022); Higher organic rice price compared to normal rice price (organic 25,000 VND/kg vs. 16-18.000 VND/kg non-organic rice; HueViet bought organic paddy of 11.000 VND/kg vs. non-organic paddy of 6,000 VND/kg). Before 2021, HueViet bought 100% (6 tons), but in 2022 it bought three tons only, and the remaining was bought by the cooperative. Some used organic rice for domestic consumption.

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
										Small pilot organic rice area (5/236 ha), making loss if calculating labor cost; PGS certification lasting for six months only; planned to maintain the model because rice was strength of the district; hard to expand the model without certification; Marketing and consumption being the most difficult stages; consumers being not well aware of OA.
33	20-Oct-22	OA, Vinh Ha commune, Phu Vang	R3	T6	2	2	2	2	3	(No OA model piloted) Received good and practical training on compost fertilizer and supported with materials and onsite training; saved cost; possibly making use of agriculture by-products; but facing difficulties (low land, labor intensive, transportation cost due to required larger quantity of fertilizer; required knowledge and passion, and dare to take risk, difficult to buy probiotics at localities which was normally sold in Hue city; lack of material to make compost fertilizer (less manure due to smaller scale of livestock given diseases, weather, price fluctuation), poor soil fertility, regular flooding; small pilot which could not be communicated for replication yet; required more training for more people; possibly continue to make compost fertilizer because of its benefits.
34	20-Oct-22	Organic rice Phu My, Phu My commune, Phu Vang	R3	T6	2	2	2	2	3	Improved knowledge and skills (making compost fertilizer); better soil fertility, and better health and environment; increasing productivity over crops (0.2 ton/500m ² in 2019, 0.22 tons/500m ² , then 0.24 ton/500m ² , and 0.26 ton/500m ² in 2022); reduced cost due to less fertilizer and pesticide cost; organic rice paddy can be sold at 7,000 VND/kg compared to normal paddy of 6,000 VND/kg. Paddy price of the first five crops were stable due to the contract signing, but after that, the cooperative could buy it at 5,000 VND/kg only; not able to sell at higher price despite marketing; lower price if no PGS certification; low consumption, and used for domestic consumption if not able to sell all; less profit compared to non-organic rice except for committed purchase by companies; no profit without the project support/ organic farmers will face difficulties if there is no project support; not replicated into community yet.

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
35	20-Oct-22	Phu My Secondary School, Phu My commune, Phu Vang	R1	T3	1	1	2	2	3	Equipped with swimming skills; improved knowledge and skills for both teachers and students; the project topics were integrated into teaching lessons and extracurricular activities, the project communication materials were put into library for reading; shared knowledge with other people and encouraged them to protect environment by taking specific actions (sorting garbage), expected to provide more training for other teachers on environment and CC, and more funding for extracurricular activities and training for students, given budget constraint
36	20-Oct-22	Le Binh FA, Phu Xuan Commune, Phu Vang	R1	T1	1	1	2	2	3	Enhanced awareness (evacuation before storms)
37	20-Oct-22	Le Binh FA, Phu Xuan Commune, Phu Vang	R3	T5	1	1	2	2	3	Relevant to their needs (boats, fingerlings, training); improved FCZ management capacity; protected aquatic resources and prevented thieves; more aquatic resources, less rubbish; but still illegal fishing sometimes, polluted water due to wastewater, unstable livelihoods, good training but could not compared with local residents' experience, lack of funding; expected to get larger mesh, trash bins in villages (instead of main roads in the commune only), mangrove plantation, more concrete aggregation devices, higher capacity boat.
38	20-Oct-22	Phu Loc DoET	R1	T3	1	1	2	2	3	Good training; enhanced knowledge; good coordination among parties; required funding for scale up or continuation
39	20-Oct-22	Phu My CPC, Phu Vang district	R3	T6	2	2	2	2	3	Good project interventions/ support and appreciated by local farmers (hard to develop OA if no project); difficult to follow OA production due to high cost, technical requirements (esp. initial stage), and low consumption and price; expected more support after the project completion to maintain the model;
40	20-Oct-22	Upgrading Mai Vinh sluice gate, Vinh Xuan Commune, Phu Vang	R2	T4	1	2	2	2	3	NA
41	20-Oct-22	Repairing and reinforcing stone embankment, Phu Dien Commune, Phu Vang	R2	T4	1	2	2	2	3	NA

No	Date	Commune- District	Result	Task	Evaluation					Observation & comments
					Rel.	Coh.	Effe.	Effi.	Sus.	
42	20-Oct-22	Construction and upgrading of Khe Tam drainage and water supply system, Vinh An Commune, Phu Vang	R2	T4	1	2	1	2	2	Good quality
43	21-Oct-22	Provincial DONRE, TT Hue	R1	T2	2	2	3	3	3	Improved knowledge and capacity; good expertise of TAO but very difficult to consult leader; good effect though more could have been done within time and budget; one cancelled activity (50% budget) which reduced its effectiveness; provincial budget available to maintain the work, but depending on funding and feasibility

(Legend: Rel. – Relevance; Coh. – Coherence; Effe. – Effectiveness; Effi. – Efficiency; Sus.- Sustainability)

The evaluation team conducted a FGD with teachers and a mini KAP survey with students from three different schools - Phu My, Dang Dung, and Loc Dien Secondary Schools during the field mission 18-21 October 2022. Overall, the aim of the discussion and KAP survey was to understand the opinions of staff, teachers, and students towards the project activities, and identify changes driven by project interventions, and suggestions on similar activities.

FGD with teachers

A number of project activities, such as organizing extracurricular activities (painting, “ring golden bell”, making recycled products) and training on CC and DRR, were held at the schools. The SAGs implemented various activities, including communication campaign at school to raise awareness of students on CC effects, DRR, disaster resilience skills, environment protection, encouraging their families and other people to protect the environment, and training other students. The SAG members were actively involved in keeping their schools and living places clean.

The project activities were implemented as planned, despite some delays and adjustments caused by the Covid pandemic. For example, some activities were done online instead, which were said to be less effective. Parents were concerned when their children participated in the project activities with a large number of people.

The project activities were rated by the schools as useful, and were integrated into the school extracurricular activities, communication, green clubs. After the end of the project, the SAGs still maintain their activities regularly. However, the continuation and scale up would be challenged by limited funding, time, and facilities. The schools expected to receive more training, and suggested diversifying means and forms of communication.

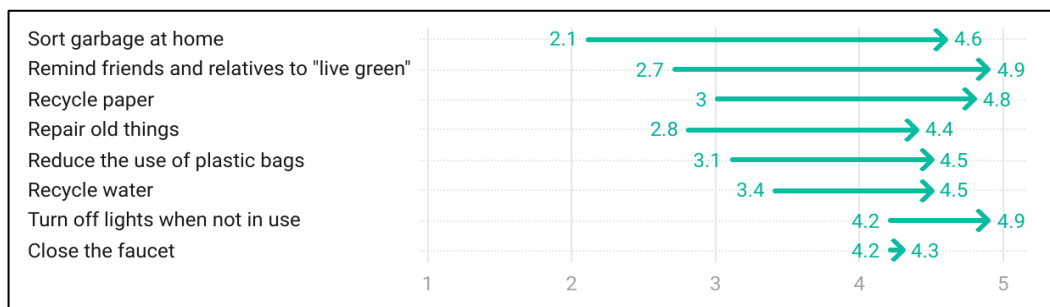
Mini KAP survey with students

When being asked if some selected project activities (i.e., golden bell, painting, “I learn to live green”) were useful, most of them rated either “useful” or “very useful”.

Outside of school, students introduced what they had learnt to their friends and family, and relayed that reactions to their newly-acquired ideas were positive and proactive. Some of them followed the suggestions, and shared with many others.

After their participation in project activities, the students’ self-reported behavior in a number of environmentally-positive activities improved considerably, as shown in the graph below.

Figure 1: KAP Survey results



(Scale: 1 = 'Never', 2 = 'Rarely', 3 = 'Sometimes', 4 = 'Often', and 5 = 'Always')

The average self-reported behavior of students increased across all environment-related activities, with particularly impressive increments in the behavior concerning sorting garbage (from 2.1 to 4.6), reminding friends and relatives to “live green” (from 2.7 to 4.9), and recycling paper (from 3.0 to 4.8). Overall, then, these results show that the project activities was successful in positively impacting the environmental attitudes and behaviors of students.

The surveyed students expressed positive opinions towards the SAG's activities and contribution to a number of positive changes at schools such as students being more aware of CC risks and impacts, students being more conscious about their positive role as disseminators of environmentally-positive practices, and students’ classrooms and school being greener and cleaner.

District	DA	Budget (EUR)	Of which LuxDev funding	Starting date	Completion date	No. of Infra works	No. of beneficiary HHs	Area of productive land protected (ha)
DA 2019-2020								
Quảng Điền	VIE/433 18 1852	366,775	345,000	1-Jan-19	30-Nov-20	6	2,189	741.00
Phú Lộc	VIE/433 18 1854	369,000	362,000	17-Dec-18	23-Apr-21	5	1,765	191.00
Phú Vang	VIE/433 18 1853	142,000	133,963	17-Dec-18	16-Apr-21	3	798	200.40
DA 2020-2021								
Quảng Điền	VIE/433 20 2529	77,124		3-Dec-21	22-Sep-22	2	1,425	221.00
Phú Lộc	VIE/433 202531	37,670		5-May-21	30-Jun-22	4	-	-
Phú Vang	VIE/433 20 2530	35,641		5-Jan-21	30-Jul-22	4	-	-
Repairing/ upgrading VIE/033 works								
Quảng Điền		443,899		1-Jan-19	22-Sep-22	8	3,614	962.00
Phú Lộc		406,670		17-Dec-18	30-Jun-22	9	1,765	191.00
Phú Vang		177,641		17-Dec-18	30-Jul-22	7	798	200.40

Organic Peanut CBA

The team conducted a CBA of organic peanut model based on the data and information provided by a farmer in Giang Hai commune, Phu Loc district who started the project organic peanut model since February 2020. She cultivated the organic peanut of “Se” variety for two crops per year. Her total farming area amounted to 7.0 “sao” (3,500 m²)²⁰, but the area dedicated to organic farming was 3.6 “sao” in the Winter-Spring crop (main crop) and 1.0 “sao” in the Summer-Autumn crop. It was too hot to cultivate in the summer; thus, most of the organic farming area was used to grow water melon instead to minimize weeds and labor cost for the spring crop. The productivity of organic peanut in the Summer-Autumn crop (40 kg/sao) was much lower than in the Winter-Spring crop (100 kg/sao), given high temperature and damage caused by rats.

Labor, land preparation and fertilizer took up the majority of all costs. Currently, the farmer used all of peanut for domestic consumption, and gave some to her relatives. In case the product was sold on the market, a total profit of 8,740,000 VND or 362 EUR could be gained for the Winter-Spring crop, or of 3,740,000 VND or 155 EUR only if the project support was removed from the calculation. Given a cultivated area of 3.6 sao, and removing project support, these figures translated to a profit of 1,038,889 VND/sao or 43 EUR/sao if sold on the market. Meanwhile, due to the effects of higher temperatures and of other seasonal constraints, the outcome of the Summer-Autumn crop was a total loss of 1,700,000 VND or 70 EUR if the product was sold on the market (taking into account project support, a loss of 3,100,000 VND or 129 EUR).

Performing a counterfactual analysis, it was assessed that, through conventional farming, the labor cost was less than the organic cultivation. The Winter-Spring 2022 crop might have yielded a profit of 910,000 VND/sao or 38 EUR/sao which was lower than the profit gained from the organic peanut production (1,038,889 VND/sao or 43 EUR/sao), and that the profit from OA production is expected to rise more, given the expected process of learning-by-doing in action, and improved soil fertility. Initial support of organic fertilizer and technical training should be vital to encourage the OA development, given high initial investment cost, and labor for tending should be considered in design of a scale-up intervention.

A detailed calculation is presented in the table below.

²⁰ 1 “sao” = 500 m²

ORGANIC PEANUT

		NON-ORGANIC	ORGANIC		Remark
		Winter-Spring crop 2022	Winter-Spring crop 2022	Summer- Autumn crop 2022	
Unit cost	Unit				
Cultivation area	Sao	1.0	3.6	1.0	
Oil press	Kg/l	3.1	3.1	3.1	30-32 litter of oil per 100 kg of peanut
Peanut oil price	VND/l	120,000	170,000	170,000	Market price 170,000 VND/l; 210,000 VND/l if sold to cooperative.
Peanut Residue	Kg	6.5	6.5	6.5	65 kg of residue per 100 kg of peanut
Peanut residue price	VND/kg	10,000	10,000	10,000	
A COST					
Total cost		3,000,000	18,320,000	5,100,000	
Of which, supported by project			5,000,000	1,400,000	100% fertilizer, in kind
Of which, breakdown of cost:					
Seeds			1,440,000		36 kgx40,000 VND/kg; self-purchased except for 1st crop supported by project
Fertilizer			5,000,000		Est. only, used when needed; excl. some project support for fertilizer
Land preparation			4,320,000		0.4 mil VND/day
Herbal pesticides			360,000		Excl. some project support
Oil press			1,440,000		4,000 VND/kg
Labor			5,760,000		0.2 mil VND/day, excl. land work above (est. only)
B REVENUE					
Productivity	Kg/sao	85	100	40	
Output	Kg	85	360	40	
Oil	Litter	28	116	10	
Oil Revenue	VND	3,360,000	19,720,000	1,700,000	
Peanut residue (kg)	Kg	55	234	30	
Revenue from residue	VND	550,000	2,340,000	300,000	
Total revenue	VND	3,910,000	22,060,000	2,000,000	
C INCOME					
Total income	VND/cultivated area				
With project support			8,740,000	(1,700,000)	
Without project support		910,000	3,740,000	(3,100,000)	
Average income	VND/sao				
With project support			2,427,778	(1,700,000)	
Without project support		910,000	1,038,889	(3,100,000)	
Average income	VND/ha				
With project support			48,555,556	(34,000,000)	
Without project support		18,200,000	20,777,778	(62,000,000)	

Currently, the organic peanut was used for domestic consumption and given to relatives; not sold yet.

The farmer could recall the most two recent crops. Other crops should be similar in terms of cost, and productivity of 80-120kg/sào, depending on crop (est. only).

The team conducted a mini-survey of 12 implementing partners (IPs), including three provincial agencies and nine district agencies in Quang Dien, Phu Loc and Phu Vang districts, to obtain their feedback on the terms and implementation of DAs. With an aim to identify changes and improvements in the DAs performance, we adopted the same set of questions which were used for the VIE/033 final evaluation's IPs survey. The average results of both surveys are presented in the table below.

Table: IPs' feedback on DAs

No.	Statements	VIE/033		VIE/433 (*)	
		Average**	Sample Size (n)	Average**	Sample Size (n)
1	Terms of DAs are complicated .	2.2	5	3.2	10
2	IPs lack personnel to fully implement the DAs' procedures.	2.3	4	3.1	11
3	IPs have sufficient (technical) capacity to carry out the project activities.	1.6	5	1.6	12
4	IPs have sufficient accounting capacity to meet the procedural requirements of DAs.	1.7	6	1.8	12
5	IPs are fully empowered in the implementation of DAs.	1.8	6	1.8	12
6	The project provides sufficient training or guidance on DAs' procedures.	1.8	5	1.7	12
7	DAs make the implementation process faster .	2.0	5	1.7	12
8	DAs make the implementation process easier and more effective .	2.0	5	1.6	11
9	The project budget is managed separately (in parallel) from the IPs' overall budget.	1.6	5	1.6	11

Remarks: (*) District BoETs prepared implementation plans for approval, rather than signing a DA;

(**) 1=strongly agreed; 2=agreed; 3=disagreed; 4=strongly disagreed

Source: Quick survey of selected IPs on DAs

For VIE/033, most of the surveyed IPs stated that “DAs terms were quite complicated, and it took time and effort for them to fully comply with the DAs' requirements, especially at the initial stage, though they received sufficient guidance on the agreement requirements, reporting & implementation procedures.” For VIE/433, they were more familiar with the DAs' terms which could be partly attributed to the gained experience and enhanced capacity after years of working with LuxDev-funded projects.

Several IPs still faced some difficulties in following the DAs terms. It is recommended that (i) a “provision” should be included as a budget line, given inflation and changes in cost units over time [currently it took time and efforts to adjust the budget plan for approval]; (ii) the cost norms (unit costs) should be updated regularly to reflect changes in market prices, and/or there should be a mechanism to accommodate such changes in unit costs; (iii) the payment processing should be speeded up so that the IPs could settle the outstanding payments to their contractors; (iv) it should further specify the approval authority regarding implementation procedures; and (v) there should be a budget line for “management fee”, if allowed by the project policy; or there should be a mechanism to accommodate the cost in consultation with the IPs somehow or to some extent.



G1- Project Documents

Project Document: VIE/433 Climate Adaptation and Resilience in TT Hue Province (Adaptation). Hue, November 2017.

Annual Operational Plan N° 2 (01.01.2020 – 31.12.2020), and N° 3 (01.01.2021 – 30.06.2022) updated 15.2.2021), N° 4 (01.01.2022 – 31.12.2022)

Annual Workplan and Budget 2019-2020, 2021-2022, and 2022

Progress report Q3/2021 and Q2/2022

Output matrix 2021, 2022

Inception Report March 2019

Implementation plans 2019-2022

DAs

Completion Reports

G2- Other Documents

KfW. 2022. Referred to: <https://www.kfw-entwicklungsbank.de/International-financing/KfW-Development-Bank/Evaluations/Evaluation-criteria/>. Accessed on 9 November 2022.

Kevin Hill, Matthew J. Rife, and Tom Twining-Ward. 2015. THE STRATEGIC VALUE of Global Environment Facility-funded Cross-Cutting Capacity Development. Funded by the United Nations Development Programme (UNDP) - Global Environment Facility.

Neetu Choudhary. 2018. Development Governance. Arizona State University. DOI: 10.1007/978-3-319-31816-5_2029-1.

OECD. 2014. Mainstreaming cross-cutting issues –

Lessons from DAC Peer Reviews: Advancing gender equality and environmental sustainability.

OECD. 2022a. Evaluation Criteria. Referred to: <https://www.oecd.org/dac/evaluation/evaluation-criteria-flyer-2020.pdf>. Accessed on 9 November 2022.

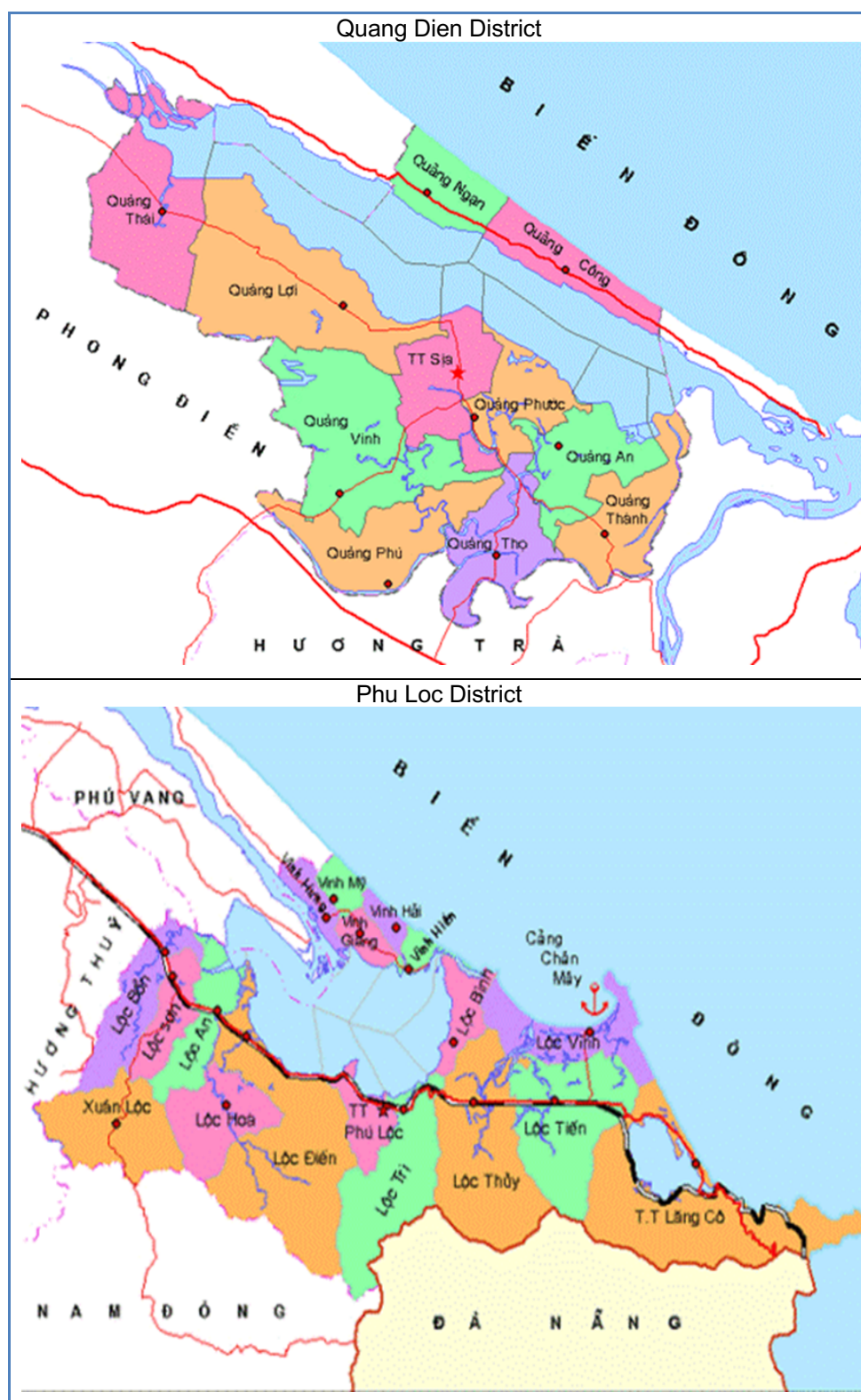
OECD. 2022b. Governance for Development. Referred to: <https://www.oecd.org/development/governance-for-development.htm>. Accessed on 17 November 2022.

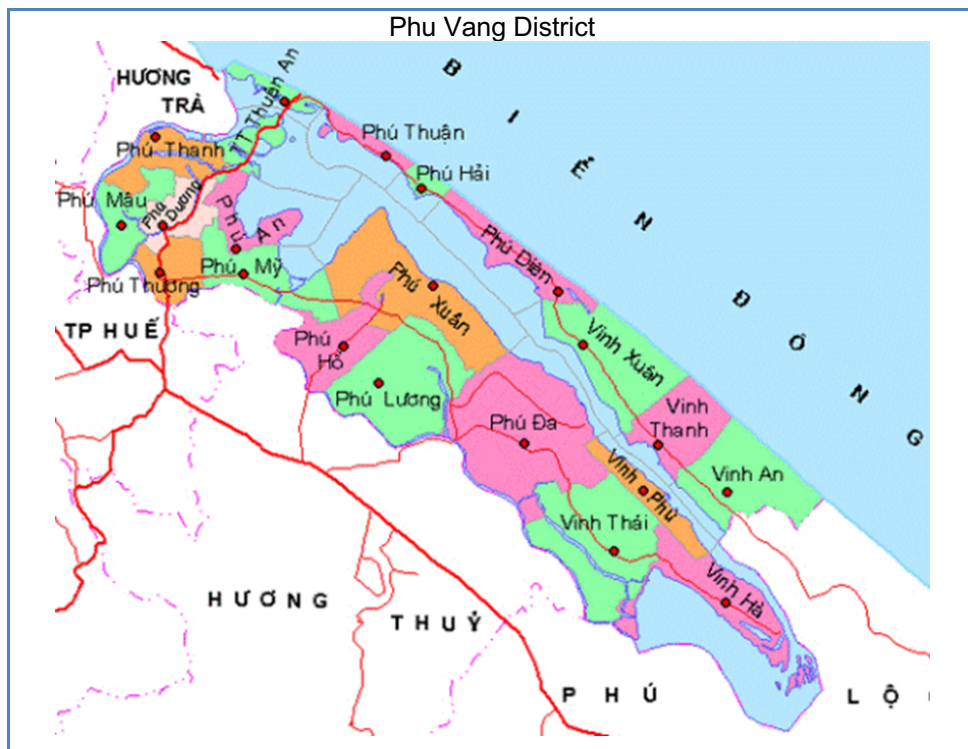
G4- Websites

Quang Dien District map: <https://thuathienhue.gov.vn/vi-vn/Trang-chu/Thong-tin-chung/Ban-do-hanh-chinh/id/B9C1061F-17B2-49C2-B812-1AF7E6CEE694>. Accessed 16 November 2022.

Phu Loc District map: <https://phuloc.thuathienhue.gov.vn/?gd=1&cn=69&cd=20>. Accessed 16 November 2022.

Phu Vang District map: <https://thuathienhue.gov.vn/vi-vn/Trang-chu/Thong-tin-chung/Ban-do-hanh-chinh/id/BDEE62AB-D80F-4A10-B7DE-A94279ED6D04>. Accessed 16 November 2022.







The team conducts FGD with FA in Sia town, Quang Dien District on 18 October 2022



The team visits Quang Dien Key Product Store on 18 October 2022.



The team conducts FGD and mini-KAP survey with teachers and students in Loc Dien secondary school, Loc Dien commune, Phu Loc District on 19 October 2022.



Organic rice from Phu My cooperative is bought by Duyen Anh Restaurant. Photo taken by the team on 20 October 2022.



Boat shelter in Trung Chanh village, Loc Dien commune. The work quality is good. Many boats are there despite narrow path compared to the requirements, given inability to expand agricultural land. Photo taken on 19 October 2022



Upgrading Mai Vinh sluice gate, Vinh Xuan commune. Photo taken on 20 October 2022.



PGS certification is put in front of Phu My Cooperative 1. Photo taken by the team on 20 October 2020.



Agricultural materials store at Phu My Cooperative 1, Phu My 1 commune, Phu Vang District. Photo taken by the team on 20 October 2020.



Repair and reinforce stone embankment in Phu Dien. Photo taken on 20 October 2022.



Construction and upgrading of Khe Tam drainage and water supply system, Vinh An commune. The work quality is good. Photo taken on 20 October 2022.