

Program Assessment Form (Non-Academic Program)

Aquaculture and Natural Resources

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General Information (Program Assessment Form (Non-Academic Program))

Standing Requirements

NMC MISSION STATEMENT & ESIP (COLUMN 1 OF THE 5-COLUMN MODEL)

NMC Mission Statement: Northern Marianas College, through its commitment to student learning, provides high quality, affordable and accessible educational programs and services for the individual and people of the Commonwealth. ESIP for Aquaculture and Natural Resource Program: The Aquaculture & Natural Resources (A&NR) Program at Northern Marianas College's Cooperative Research, Extension, & Education Service (NMC CREES) is the division responsible for the development of aquaculture in the Commonwealth of the Northern Mariana Islands (CNMI). A&NR is unique within CREES, in that by virtue of CNMI Public Law 15-43, it is also the designated government lead agency for aquaculture development in the territory. As such, A&NR is responsible for conducting research and providing technical assistance and education to individuals or groups interested in starting aquaculture enterprise through its extension arm

OUTCOMES (COLUMN 2 OF THE 5-COLUMN MODEL)

Aquaculture and Natural Resource Program Outcome Set

Aquaculture PLO 1

ANR will continue to research and develop aquaculture practices and capacity for CNMI adoption.

Mapping

Aquaculture and Natural Resource Program Outcome Set: Aquaculture PLO 1, Aquaculture PLO 2, Aquaculture PLO 3, Intended Program/Service Outcomes (ANR PLO)

Aquaculture PLO 2

ANR will educate CNMI residents on aquacultural practices.

Mapping

No Mapping

Aquaculture PLO 3

ANR will facilitate the adoption and continued use of aquaculture systems.

Mapping

No Mapping

Intended Program/Service Outcomes (ANR PLO)

Updated 2/13/21 The Aquaculture and Natural Resources (A&NR) program, in the planned program year, intends to increase the number of commercial and subsistence producers in the CNMI.

Mapping

No Mapping

Aquaculture SLO

SLO #1

Students will be able to name the different water quality requirements for Rabbitfish, SLO

Mapping

No Mapping

SLO #2

Students will be able to identify the different components of a Recirculating Aquaculture Systems (RAS), SLO

Mapping

No Mapping

2020-2021 Assessment Cycle (2018-2019 Assessment Cycle)

MEANS OF ASSESSMENT AND SUCCESS CRITERIA (ASSESSMENT PLAN)

Mission Statement

NMC Mission Statement: Northern Marianas College, through its commitment to student learning, provides high quality, affordable and accessible educational programs and services for the individual and people of the Commonwealth. ESIP for Aquaculture and Natural Resource Program: The Aquaculture & Natural Resources (A&NR) Program at Northern Marianas College's Cooperative Research, Extension, & Education Service (NMC CREES) is the division responsible for the development of aquaculture in the Commonwealth of the Northern Mariana Islands (CNMI). A&NR is unique within CREES, in that by virtue of CNMI Public Law 15-43, it is also the designated government lead agency for aquaculture development in the territory. As such, A&NR is responsible for conducting research and providing technical assistance and education to individuals or groups interested in starting aquaculture enterprise through its extension arm

Measures

Aquaculture and Natural Resource Program Outcome Set

Outcome

Outcome: Intended Program/Service Outcomes (ANR PLO)

Updated 2/13/21

The Aquaculture and Natural Resources (A&NR) program, in the planned program year, intends to increase the number of commercial and subsistence producers in the CNMI.

Measure: Internal Document: Tracking Number of Commercial and Subsistence Farmers (updated measure 2/13/21)

Indirect - Other

Details/Description:	The Aquaculture and Natural Resources (A&NR) program will measure the success of its Program Learning Outcomes (PLO) by comparing the number of subsistence and commercial farmers before and after face-to-face workshops, webinars, trainings or one-on-one consultations. The establishment of these farms will be made possible from the transfer of knowledge and technology gained.
Acceptable Target:	Increase the number of commercial and subsistence producers in the CNMI by 2 and 5 respectively in any of its programmatic areas: mariculture, aquaculture, aquaponics, and hydroponics. Reach a total of 100 potential commercial and subsistence producers.
Ideal Target:	Increase the number of commercial and subsistence producers in the CNMI by 2 and 5 respectively in any of its programmatic areas: mariculture, aquaculture, aquaponics, and hydroponics. Reach a total of 100 potential commercial and subsistence producers.
Implementation Plan (timeline):	Internal tracking sheet is done throughout the year.
Key/Responsible Personnel:	Michael M. Ogo: Aquaculture Specialist, Program Leader

Measure: Means of Assessment and Success Criteria (previous measure--pls disregard)

Indirect - Other

Details/Description: The Aquaculture and Natural Resources (A&NR) program will measure the success of its Program Learning Outcomes (PLO) by way of pre and post tests results of 80% or better in face to face or virtual workshops, trainings, and webinars; by 90% adoption of knowledge and technologies at the client's farm site; and through 90% survey results

Acceptable Target:

Ideal Target:

Implementation Plan (timeline):

Key/Responsible Personnel: Aquaculture specialist, Program Leader Michael M. Ogo

Measure: Pre & Post-Test Results (updated measure 2/13/21)

Direct - Student Artifact

Details/Description: The Aquaculture and Natural Resources (A&NR) program will measure the success of its Program Learning Outcomes (PLO) by way of increasing knowledge gained by clients by comparing scores of pre and post test from face-to-face or virtual workshops, trainings, and/or webinars. The goal is for clients to then adopt and apply this knowledge at farm sites, thereby increasing the number of commercial and subsistence producers in the CNMI.

Acceptable Target: Clients will score at least at least 80% or better on the knowledge post-test. Pre-tests may be compared to the post-test to show growth in knowledge.

Ideal Target: Clients will score 90% or better on the knowledge post-test.

Implementation Plan (timeline): Pre and post tests are given before and after face-to-face or virtual workshops, trainings, and/or webinars.

Key/Responsible Personnel: Michael M. Ogo:
Aquaculture Specialist, Program Leader

Measure: Satisfaction Survey Results (updated measure 2/13/21)

Indirect - Survey

Details/Description: The Aquaculture and Natural Resources (A&NR) program will measure the success of its Program Learning Outcomes (PLO) through a satisfaction survey given after face-to-face or virtual workshops, trainings, and/or webinars. The goal is for clients to then adopt and apply this knowledge at farm sites, thereby increasing the number of commercial and subsistence producers in the CNMI.

Acceptable Target: At least 80% of clients will report they are satisfied or highly satisfied on a satisfaction survey taken after face-to-face workshops, webinars, trainings or one-on-one consultations.

Ideal Target: At least 90% of clients will report they are satisfied or highly satisfied on a satisfaction survey taken after face-to-face workshops, webinars, trainings or one-on-one

	consultations.
Implementation Plan (timeline):	Satisfaction surveys are given after face-to-face workshops, webinars, trainings or one-on-one consultations.
Key/Responsible Personnel:	Michael M. Ogo: Aquaculture Specialist, Program Leader

SUMMARY OF DATA COLLECTED AND USE OF RESULTS (ASSESSMENT FINDINGS OR COLUMNS 4 & 5 OF THE 5-COLUMN MODEL)

Finding per Measure

Aquaculture and Natural Resource Program Outcome Set

Outcome

Outcome: Intended Program/Service Outcomes (ANR PLO)

Updated 2/13/21

The Aquaculture and Natural Resources (A&NR) program, in the planned program year, intends to increase the number of commercial and subsistence producers in the CNMI.

Measure: Internal Document: Tracking Number of Commercial and Subsistence Farmers (updated measure 2/13/21)

Indirect - Other

Details/Description:	The Aquaculture and Natural Resources (A&NR) program will measure the success of its Program Learning Outcomes (PLO) by comparing the number of subsistence and commercial farmers before and after face-to-face workshops, webinars, trainings or one-on-one consultations. The establishment of these farms will be made possible from the transfer of knowledge and technology gained.
Acceptable Target:	Increase the number of commercial and subsistence producers in the CNMI by 2 and 5 respectively in any of its programmatic areas: mariculture, aquaculture, aquaponics, and hydroponics. Reach a total of 100 potential commercial and subsistence producers.
Ideal Target:	Increase the number of commercial and subsistence producers in the CNMI by 2 and 5 respectively in any of its programmatic areas: mariculture, aquaculture, aquaponics, and hydroponics. Reach a total of 100 potential commercial and subsistence producers.
Implementation Plan (timeline):	Internal tracking sheet is done throughout the year.
Key/Responsible Personnel:	Michael M. Ogo: Aquaculture Specialist, Program Leader

Findings for Internal Document: Tracking Number of Commercial and Subsistence Farmers (updated measure 2/13/21)

No Findings Added

Measure: Means of Assessment and Success Criteria (previous measure--pls disregard)

Indirect - Other

Details/Description: The Aquaculture and Natural Resources (A&NR) program will measure the success of its Program Learning Outcomes (PLO) by way of pre and post tests results of 80% or better in face to face or virtual workshops, trainings, and webinars; by 90% adoption of knowledge and technologies at the client's farm site; and through 90% survey results

Acceptable Target:

Ideal Target:

**Implementation Plan
(timeline):**

**Key/Responsible
Personnel:** Aquaculture specialist, Program Leader Michael M. Ogo

Findings for Means of Assessment and Success Criteria (previous measure--pls disregard)

No Findings Added

Measure: Pre & Post-Test Results (updated measure 2/13/21)

Direct - Student Artifact

Details/Description: The Aquaculture and Natural Resources (A&NR) program will measure the success of its Program Learning Outcomes (PLO) by way of increasing knowledge gained by clients by comparing scores of pre and post test from face-to-face or virtual workshops, trainings, and/or webinars. The goal is for clients to then adopt and apply this knowledge at farm sites, thereby increasing the number of commercial and subsistence producers in the CNMI.

Acceptable Target: Clients will score at least at least 80% or better on the knowledge post-test. Pre-tests may be compared to the post-test to show growth in knowledge.

Ideal Target: Clients will score 90% or better on the knowledge post-test.

**Implementation Plan
(timeline):** Pre and post tests are given before and after face-to-face or virtual workshops, trainings, and/or webinars.

**Key/Responsible
Personnel:** Michael M. Ogo:
Aquaculture Specialist, Program Leader

Findings for Pre & Post-Test Results (updated measure 2/13/21)

Summary of Findings: Pre-Test (scores of pretest) : # of students and score (qty=20 ave)
~30%
Post-test: (scores of post-test): # of students and score
~80%

(one activity)

Recommendations: Preparation and lack of staff can influence the activity.
 Hire more full-time employees (dedicated to the administrative duties of the program).

Reflections/Notes:

Measure: Satisfaction Survey Results (updated measure 2/13/21)

Indirect - Survey

Details/Description: The Aquaculture and Natural Resources (A&NR) program will measure the success of its Program Learning Outcomes (PLO) through a satisfaction survey given after face-to-face or virtual workshops, trainings, and/or webinars. The goal is for clients to then adopt and apply this knowledge at farm sites, thereby increasing the number of commercial and subsistence producers in the CNMI.

Acceptable Target: At least 80% of clients will report they are satisfied or highly satisfied on a satisfaction survey taken after face-to-face workshops, webinars, trainings or one-on-one consultations.

Ideal Target: At least 90% of clients will report they are satisfied or highly satisfied on a satisfaction survey taken after face-to-face workshops, webinars, trainings or one-on-one consultations.

Implementation Plan (timeline): Satisfaction surveys are given after face-to-face workshops, webinars, trainings or one-on-one consultations.

Key/Responsible Personnel: Michael M. Ogo:
 Aquaculture Specialist, Program Leader

Findings for Satisfaction Survey Results (updated measure 2/13/21)

Summary of Findings: Based on webinar, one on one client visits, and program outreach surveys, 95% of those serviced by A&NR expressed satisfaction with services rendered.

Results : Acceptable Target Achievement: Exceeded; Ideal Target Achievement: Exceeded

Recommendations: While many of the clients appreciate the transition to the virtual platform for safety reasons, clients prefer face-to-face workshops, seminars, and trainings with 30% lecture and 70% hands-on activities. After 6 months, CREES should see higher number of participants in the workshops with greater success and fulfillment of the mantra, "learn by doing."

Reflections/Notes:

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Overall Recommendations

No text specified

Overall Reflection

No text specified

OPERATIONAL PLAN (THIS IS WHERE YOU CAN LINK AN OUTCOME TO AN ACTION PLAN WITH OR WITHOUT A SPECIAL BUDGET REQUEST.)

STATUS REPORT (THIS SIMPLY STATES THE STATUS OF YOUR OPERATIONAL PLAN.)

2021-2022 Assessment Cycle (2018-2019 Assessment Cycle)

MEANS OF ASSESSMENT AND SUCCESS CRITERIA (ASSESSMENT PLAN OR COLUMN 3 OF THE 5-COLUMN MODEL)

SUMMARY OF DATA COLLECTED AND USE OF RESULTS (ASSESSMENT FINDINGS OR COLUMNS 4 & 5 OF THE 5-COLUMN MODEL)

USE OF RESULTS

STATUS REPORT

OPERATIONAL PLAN (THIS IS WHERE YOU CAN LINK AN OUTCOME TO AN ACTION PLAN WITH OR WITHOUT A SPECIAL BUDGET REQUEST.)

STATUS REPORT (THIS SIMPLY STATES THE STATUS OF YOUR OPERATIONAL PLAN.)

2019-2020 Assessment Cycle (Actual Cycle) (ACTUAL Data)

MEANS OF ASSESSMENT AND SUCCESS CRITERIA

SUMMARY OF DATA

USE OF RESULTS

STATUS REPORT

USE OF RESULTS

STATUS REPORT