ANNUAL DEGREE PROGRAM ASSESSMENT, PLANNING AND BUDGET REPORT

2013–2014

Program Description

Agriculture and Natural Resources: *We envision a program that promotes active student engagement by providing high quality instruction in agriculture, horticulture, and natural resources with an emphasis on entrepreneurship and sustainability.*

1. Briefly respond in <u>100 words or less</u> for each cautionary and/or unhealthy Quantitative Indicator (II):

    a. Demand Indicator:

    b. Effectiveness Indicator:

    c. Efficiency Indicator:

2. Industry Validation (check all that apply)(IV–A):

Advisory Committee Meeting(s) _0_, How many? __   Did Advisory Committee discuss CASLO/PLO? Yes__ No_x_

Coop Ed Placements _x_(7)_ Fund raising activities/events <u>x</u> (Campus December and Spring plant Sale, Haiku Flower Festival, CSAs Fall 13 and Spring 14, Famers Markets twice a week in November 13, and several in Spring 14. – Money made provides all supply funds for the program including lab, classroom and computer supplies – between $5,000–$10,000 per Year)   Service Learning __

Provide program services that support campus and/or community __ Outreach to public schools yes(142 pre–schoolers, 100 Kindergardeners – Pumpkin patch; Kalama 7th grade visit; AG 103 HS summer bridge course)

Partner with other colleges, states and/or countries x_(AETI Consortium grant – Malama Ahupuaa) Partner with businesses and organizations __

Other__ Describe_____

3. List PLOs (attach Program Map)(IV):

AG&NR Program Map

Assessment of Intended Program Learning Outcomes														
Courses in Program	AG 122	AG 174	AG 200	AG 201	AG 230	AG 235	AG 250	AG 251	AG 252	AG 260	AG 269	AG 281	AG 264	AG 266
1. *Use basic business principles to manage projects or design a horticultural business enterprise.*	1	1	2	1	3	1	1	2	3	1	0	1	1	1
2. *Recommend cultural practices, solve problems, plan projects, and cultivate horticultural crops in a sustainable manner based on sound biological and technological principles.*	2	2	3	2	0	2	2	3	3	2	0	2	1	2
3. *Explain the relationships between agroecosystems, economics, human culture, and natural environments.*	2	2	2	2	1	2	1	1	1	1	1	3	1	1
(Landscape and Horticulture only)														
4. *Design gardens that demonstrate aesthetic principles.*	0	0	0	0	0	1	3	0	0	1	1	1	0	0
CODE			3 = A focus of course		2 = Evaluate Using Outcome				1 = Not evaluated			0 = Not included		

4. Instrument used for assessment (check all that apply) (IV–B):

Work Sample__   Portfolio__ Project _x_ Exam __ Writing Sample __

Other__   Please explain_____

5. Which course or courses did you use to assess PLOs and CASLO (IV–C)?

   AG 230 – Evaluated PLO #1

   AG 250 – Evaluated PLO #4

   AG 200 – Evaluated CASLO – Information Literacy

6. List strengths and weaknesses found from PLO assessment analysis (IV–E):

   PLO #1: Students do a comprehensive business plan for a farm or landscape business. 67% of students had exemplary plans, 17% created acceptable plans and 17% had unsatisfactory plans. This year the students did a better job than in the past on the financial statements. This was a weak area in the past and still needs some work. We used a slightly improved form and spent more time

developing cash flow statements. More deadlines for various drafts of parts of the plan were instituted. We also used a peer review of the drafts using the same rubric as the instructor so students could get feedback. Despite this, getting students to do each part of the plan in a timely manner was a major weakness. Some students were overwhelmed and just didn't do parts of the plan.

PLO #4: Students do a landscape plan from start to finish. They interview a client, measure the lot, and develop a scale plan. They then present this to the client at the end of the semester. This year was very difficult. Few of the students were long time agriculture majors. Despite a large amount of class time given to students to help them get the project done, only 25% of students were exemplary, 25% of students were acceptable and 50% of students did poorly. This was very much the opposite of the past class in spring 2012. Many of the students had personal issues as well and had poor attendance.

7. List CASLO assessment findings highlights (attach CASLO report) (IV-E):

Students need more help in evaluating research sources. Library resources need to be introduced to students. See attached report.

Some of the evaluators did not completely understand the assignment they were evaluating. One commented that the exemplary example did not include information – but that information was included in another paper – and was not supposed to be in the paper the evaluators looked at. Also ENG 100 was not a prerequisite.

8. Action Plan (III) and Next Steps (IV-G):

a. PLO

PLO #1: Continue to work on the financial budgets. Have students start by creating a planting schedule or landscape maintenance schedule on a calendar. Use a single crop as classroom group exercise to go from planting schedule, sales forecast, cost of production, cash flow statement, income statement and then a balance sheet to illustrate how to develop the various budgets. Continue to use peer reviews to help students with feedback and to encourage students to meet deadlines.

PLO #4: Several curriculum changes need to be made. First need to change to name of the course to Landscape Design and Maintenance so that it reflects the actual course. Current name is the same as a similar course at UH Manoa. Second, reinstitute a prerequisite of AG 269 or AG 265 so students have more background.   Doing a class project early in the semester – having one designed ahead of time – would help them with interpretation of scale plan to site.

b. CASLO

Curriculum change to require ENG 22 as a pre-requisite was enacted. An ENG 100 level concurrent may be required in the future as this is now a requirement for all Associates degrees which it was not in the past. A 100 level technical writing course for CTE students is needed that

follows ENG 22 rather than a 200 level course. Librarian gave a lecture to the students this semester on finding sources and developed a course based web resource for students in this class. An earlier assignment with provided sources assisted with learning to paraphrase. Continued use of turnitin to help students with writing and learning not to plagiarize.

c. Program improvement

Curriculum changes are planned to improve student learning by developing materials for flipped type of instruction. More cooperative course offerings using hybrid delivery between Maui and Molokai is being investigated. Faculty need training in using various tools for these types of delivery.

Facility maintenance is a continuing challenge. Current personnel cannot cover the workload needed to maintain all areas to desired standard. Student help funds are limited currently to grant funds. Student help funds would assist but supervision also takes time and effort with turnover and student schedules. Plans to improve various windbreaks, organize and create better storage spaces are ongoing. The greenhouse needs to be re-braced as a major brace in the back has rusted through. O&M is aware of the situation and has installed temporary bracing.

Faculty limitations. One faculty at Kahului campus can only teach so many courses. Courses are usually limited to every other year offering. This limits the ability to offer enough courses for students to graduate in a timely manner. Lecturers can be difficult to find for the various specialized courses which all have lab preparation as well. A grant funded position allowed a temporary faculty position during 13-14 but has since ended.

9. Chart of resource needs (IV)

Budget request	Amount	Justification for how this will improves learning
Professional Cleaning of mold ceiling of greenhouse and light covers in potting room	$3000	Health and Safety – meet food safety best practices when packing produce for Market and CSA
Faculty – could shared with another appropriate area – biology, SSM, business.	$52,008	–allow courses to be offered more often and more courses offered per semester. Students can graduate in a more timely manner. –additional faculty would assist with other functions such as facility maintenance, curriculum improvement, student recruitment, student advising, community cooperation

*   Roman numerals indicate related category for system input