

Academic Program Review: Self-Study

2008-2009, 2009-2010, 2010-2011, 2011-2012, 2012-2013

Instructions: The following pages will guide your submission of your comprehensive self-study. Please type your responses directly into the document. The completed self-study instrument and all attachments must be submitted to the Academic Program Review Coordinator by September 1.

Program Under Review:	
Degree(s): Dietetic Technician Associate of Applied Science	Major Code 1310
Contact Information for lead on Self-Study:	
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Program Mission	
What is the mission of the program: 2008 through 2013	
CAC Mission 2011-2013 Adopted 2011-2012 catalog	Central Arizona College engages our diverse communities in quality learning experiences for lifelong success by providing accessible, educational, economic, cultural, and personal growth opportunities.
DTP Mission 2008-2013	The Mission for the Dietetic Technician Program (DTP) for Central Arizona College is to provide quality, nutrition education and training for a diverse student population to become competent entry-level Dietetic Technician practitioners through the following pathways: The Dietetic Technician A.A.S. Degree Program and the Dietetic Technician Advanced Internship Program.
Current Missions	
CAC Mission 2011-2013 Adopted 2011-2012 catalog	Central Arizona College engages our diverse communities in quality learning experiences for lifelong success by providing accessible, educational, economic, cultural, and personal growth opportunities.
DTP Mission	The Dietetic Technician Program (DTP) at Central Arizona College provides accessible, quality, nutrition education and training for a diverse student population to become competent entry-level Dietetic Technician practitioners.

Describe how the program mission aligns with the College's Mission:

In November 2011 CAC adopted a new mission that went into effect for the 2011-2012 academic years. The publication of the ACEND 2012 Standards in June 2012 presented the opportunity to align the DTP Mission with the CAC mission.

In April of 2012, at the DEP/DTP Advisory Committee Meeting the members opted to create a task force to work on the review and revision of DEP and DTP mission, vision, goals and objectives. By fall 2012, a draft mission and vision were presented by the task force to the DTP Director. During the April 2013 DEP/DTP Advisory Committee Meeting, the approval of the mission and vision was tabled pending some minor wording changes. On May 29, 2013 the Advisory Committee approved the new mission, vision, goals and objectives. The new mission, vision, goals and objectives are presented in Standards 4 through 7.

Both the 2008-2013 and the 2013-2018 mission statements are compatible and consistent with CAC. The emphasis of the DTP mission statement is consistent with preparing graduates for entry-level practice as Dietetic Technicians, Registered. The mission, goals and objectives are the same for both pathways, DTP Pathway I and DTP Pathway II.

What are the outcomes for the degree or certificate: See Program Assessment Summary Matrices Assessment Period from 2008 to 2013 Compilation of Data for the outcomes. (Attachment A)
Dietetic Technician AAS degree 2013-2018

DTP Mission	The Dietetic Technician Program (DTP) at Central Arizona College provides accessible, quality, nutrition education and training for a diverse student population to become competent entry-level Dietetic Technician practitioners.
DTP Goal#1	Graduates of the Dietetic Technician Program will have demonstrated the CAC Common Student Learning Outcomes: Cultural and Civic Engagement, Integrative Knowledge, Personal and Professional Skills, Reasoning Skills at the "proficient" level.

Objectives:		1. Students completing a seminal course in their program of study will demonstrate at least a “developing” level of skill for all the <i>CAC Common Student Learning Outcomes</i> .
		2. Students completing their capstone project will demonstrate at least a “proficient” level of skill for all the <i>CAC Common Student Learning Outcomes</i> .
DTP Goal #2	Graduates of the Dietetic Technician Program will have demonstrated at entry-level all competencies required for their program of study as evidenced by timely program completion, passing the credentialing exam and obtaining employment.	
Objectives:		1. DTP students will graduate within 150% of the specified amount of time for their program of study (3 years).
		2. The first-time pass rate for DTP graduates taking the registration examination will be at least 75%.
		3. At least 70% of DTP graduates who seek employment in dietetics will be employed within twelve months of program completion.
DTP Goal #3	Graduates of the Dietetic Technician Program will be professionally engaged in Nutrition, Food, Dietetics or Wellness.	
Objectives:		1. At twelve-months at least 50% of the DTP graduates will be members of the Academy of Nutrition and Dietetics and/or other professional associations related to Nutrition, Food, Dietetics or Wellness.
		2. At twelve-months at least 10% of the DTP graduates will have matriculated in a 4-year degree program.

Who is responsible for reviewing and updating the outcomes:

Lisa Koehring, MS, RD, CDM, CFPP, SNS

Dietetic Education Program Director

Program Enrollment and Graduation Trends

Summarize the program enrollment trends for the past 3 years: [Average DT enrollment over the last 17 terms is 131 students.](#)

Term	Semester	DT Enrollment
200901	2008 Fall	67
200902	2009 Spring	80
200903	2009 Summer	53
201001	2009 Fall	106
201002	2010 Spring	122
201003	2010 Summer	74
201101	2010 Fall	146
201102	2011 Spring	139
201103	2011 Summer	89
201201	2011 Fall	161
201202	2012 Spring	192
201203	2012 Summer	94
201301	2012 Fall	193
201302	2013 Spring	196
201303	2013 Summer	132
201401	2013 Fall	175
201402	2014 Spring	203

What factors are influencing enrollment trends:

The DT Program enrollments have been on the incline over the last 5 years. Current enrollment hovers around 200 students. Factors influencing the enrollment trends are:

1. High unemployment rates
2. Availability of financial aid
3. Increase interest in health and wellness careers
4. Online/Distance format of the DT AAS degree

How has the program typically recruited students:

The CAC DTP student recruitment is accomplished in four different ways. Typically, potential students find the CAC DTP on the ACEND website which directs them to email www.nutrition@centralaz.edu. Second, past and present students refer prospective students to the CAC DTP.

Colleges and universities not using the online modality for their DTP often recommend the CAC program to potential students. The fourth main recruitment method is accomplished with a Google search. The CAC DTP link is the seventh website on the first page of the web search for "Dietetic Technician Programs Online".

The DTP Director develops all of the DTP marketing tools and decides what information is made available on the DTP web pages. At least annually, the marketing materials and web pages are reviewed by the Director to determine if adjustments need to be made related to revised curriculum, changes in CAC processes and accreditation information from ACEND.

<http://www.eatright.org/BecomeanRDorDTR/content.aspx?id=8474>

<http://www.centralaz.edu/nutrition/DTAAS>

Discuss the program graduation rate trends for the past 3 years:

Dietetic Technician AAS degree graduation rates increase with enrollment. Previously allowing the students up to five-years to graduate from this program has not helped increase the graduation rates. Beginning fall 2014 the DT AAS students will be limited to three-years to complete the program. This was a recommendation resulted from the Accreditation Council of Education in Nutrition and Dietetics 10-year self-study completed November 2013.

<i>Academic Year</i>	<i># of Graduates</i>
2003-2004	3
2004-2005	4
2005-2006	7
2006-2007	3
2007-2008	5
2008-2009	3
2009-2010	8
2010-2011	17
2011-2012	12
2012-2013	23
Total	85

Program Curriculum

Discuss the strengths and weaknesses of the current program curriculum for each degree/certificate. Compare the CAC program to three other similar programs (ideally a program in Arizona, but out of state if necessary).

At CAC the minimum number of credit hours to earn an AAS degree is 64. The CAC DTP AAS contains 31 didactic and 7 supervised practice internship credits. The 26 general education course credits meet the CAC requirements for an AAS degree including math, English, communications, biology and chemistry as well as the institutional wide requirement for computer competency and physical activity.

- 31 core didactic nutrition credits include metabolic nutrition, cultural competence, and nutrition throughout the lifecycle, foodservice management and nutritional literacy among others.
- 7 non-didactic credits
 - NTR295 Dietetic Technician Professional Practice Internship 60 supervised practice hours, 1 credit
 - NTR296 Dietetic Technician Internship 390 supervised practice hours, 6 credits
- 26 credits of general education courses

All DTP majors are advised and encouraged to take all of their nutrition courses at CAC. The nutrition courses can be completed in five semesters part-time leading to the sixth semester and the balance of the 450 supervised practice internship. Prior to entering the terminal internship, students must have completed all degree requirements, applied for graduation and be approved by the DTP program director to register for the internship. Prior approval of the preceptors and host facilities takes place at least one semester before the enrollment in the supervised practice internship.

Strengths	The major strength of the DTP curriculum design is that it is designed to accommodate both the Arizona and the out-of-state students alike. Whether a student is completing the program entirely at CAC or a combination of CAC courses and courses from their home state colleges, the curriculum is assessable and the tuition is affordable even for out-of-state students.
Challenges	Many prospective DTP students want all of their transfer credits approved without going through the CAC transcript evaluation process. These prospective students want a commitment from the college before they apply for admissions.
Weaknesses	At CAC it may take several weeks or months for transfer credits to be evaluated. The transcript evaluation process at CAC may delay the new student's entry into the DTP.

Attachment B shows a comparison between the two other AZ based DTPs and one that is out of state.

Discuss how the program gets feedback on its program and curriculum from external **sources, such** as advisory boards or employers.

At CAC there are numerous opportunities to work collaboratively with peers and stakeholders. The DTP Advisory Committee meets twice a year and a group of DI Directors from around the state also meet regularly. The topics discussed in these meeting almost always centers on program evaluation, planning or the accreditation process. The DTP Advisory Committee members represent internal and external constituency groups including past and present students.

Discuss any external accreditations which the program has. Are there any available accreditations which the program does not have, but may benefit from seeking?

Dietetic Technician AAS degree is accredited by the Accreditation Council for Education in Nutrition and Dietetics (ACEND) www.eatright.org/ACEND. Upon successful completion of the program, graduates will be eligible to take the Registration Examination from the Commission on Dietetic Registration (CDR) www.cdrnet.org. A passing score is required to become a Dietetic Technician, Registered (DTR). The DTP is in process with the 10-year self-study accreditation. The Self Study Report completed on August 25, 2013 and the Site-Visit was completed on November 17 – 19, 2013. The response has been forwarded to the program review team. The program will be reviewed at the July 2014 Accreditation Council for Education in Nutrition and Dietetics meeting. The DT Program is not seeking additional accreditations at this time.

Discuss how the program meets current or future needs for the job market in the county or state of Arizona:

Future Changes Driving Dietetics Workforce Supply and Demand: Future Scan 2012-2022
Marsha Rhea, MPA, CAE; Craig Bettles, MA

EXECUTIVE SUMMARY

The dietetics profession faces many workforce challenges and opportunities to ensure that registered dietitians (RDs) and dietetic technicians, registered (DTRs) are at the forefront of health and nutrition. The profession must prepare for new public priorities, changes in population, and the restructuring of how people learn and work, as well as new advances in science and technology. In September 2010, the Dietetics Workforce Demand Task Force, in consultation with a panel of thought leaders, identified 10 change drivers that affect dietetics workforce supply and demand. This future scan report provides an overview of eight of these drivers. Two change drivers—health care reform and population risk factors/nutrition initiatives—are addressed in separate technical articles. A change matrix has been included at the end of this executive summary. The matrix contains a summary of each change driver and its expected impact and is designed to present the drivers in the context of a larger, dynamic system of change in the dietetics profession. The impact of any of these change drivers individually and collectively in a dynamic system is uncertain. The outcome of any change driver is also uncertain. The dietetics profession faces many choices within each change driver to meet the workforce challenges and seize the opportunities for leadership and growth.

J Acad Nutr Diet. 2012;112(suppl 1):S10-S24.

The table below represents the most recent graduate data available from the EMSI report.

Graduates				
Degree/Certificate	Total # of graduates in 5 years 2008-2009 through 2012	Arizona		Out of State
	Central Arizona College	Pinal County	Other Counties	
Dietetic Technician AAS degree	53	2	5	46
Dietary Manager Training Program	22	1	15	6
Community Nutrition Worker	51	11	30	11
Diabetes Care and Education	17	1	8	8

If your degree is a transfer degree please answer the following question:

Identify specific baccalaureate programs for which this program is intended for transfer to:

The following information is provided on the www.centralaz.edu/nutrition/DTAAS website in the FAQ section:

I would like to take the Dietetic Technician (DT) program first, but my goal is to become a Registered Dietitian (RD). Would the DT program transfer to a university?

This program is not designed to be an RD transfer program at this time. We suggest you first consult a university that offers an ACEND accredited RD program. You can access the Accreditation Council for Education in Nutrition and Dietetics (ACEND) website <http://www.eatright.org/ACEND/>

In addition, the University of Medicine and Dentistry of New Jersey (UMDNJ) - Rutgers School of Environmental and Biological Sciences: Department of Nutrition has a distance learning transfer program designated specifically for DTR's to become RDs. <http://nutrition.rutgers.edu/index.html> <http://shrp.umdni.edu/dept/nutr/BSHS/degree.html> School of Health Related Professions has a distance learning transfer program designated specifically for DTR's to become RDs.

Does the Central Arizona College DT AAS degree transfer to any other Bachelor programs?

Central Arizona College maintains Articulation Agreements with Arizona Colleges and Universities

http://centralaz.edu/home/student_resources/university_transfer.htm

Arizona State University Department of Nutrition, Bachelor of Applied Science in Food Service Management accepts the full transfer of the Dietetic Technician AAS degree from Central Arizona College.

As part of our Operational Plan the program will be looking to universities that offer distance Registered Dietitian Programs that our DT graduates may be able to transfer to.

Program Resources

Discuss the adequacy of the financial and budgetary resources available to the program over the past 3 years:

To support the growth of the DTP and the rise in enrollment, the DEP budget has increased from \$424,193.00 in 2008-2009 to \$589,049.00 in 2012-2013, a 39% increase over the last five years. The budget currently supports a fulltime staff of three, part time adjunct faculty, teaching assistants and part-time program specialists. The full-time positions include the DEP/DTP Director; one master's-level, Dietetic Technician, Registered (DTR) Preceptor and a Program Assistant. Funds are available for professional development travel including attendance at the Academy of Nutrition and Dietetics FNCE and the DEP Area IV meetings. The budget is for adjunct faculty, part-time staff, office supplies, travel, and lab and instructional supplies. Excluding budgeted salaries and benefits, the director manages an annual budget in excess of \$300,000.

Discuss the adequacy of the human resources available to the program over the past 3 years:

The Dietetic Education Program (DEP) Director serves as the DTP Director. DEP employs one full-time support staff and one full-time preceptor. Approximately 20% of the DTP Director time is dedicated to the administration of the DTP. The full-time preceptor is allocated 40% or .4 FTE for Dietetic Technician advising.

Over the past ten-years, with few exceptions, the DTP has been able to employ a full complement of adjunct faculty who hold at least a master's degree and are Registered Dietitians (RD), Dietetic Technicians, Registered (DTR) or Certified Dietary Mangers (CDM). During the last five-years, all supervised practice experiences have been planned, monitored, and evaluated by a PhD, RD whose previous experience includes being the Director of a master's RD program.

Discuss the adequacy of the technological resources available to the program over the past 3 years:

Blackboard and email helpdesks are available to assist students. Students may access the Helpdesk services by telephone, email or by coming to the on-campus offices district-wide. The Blackboard Learning Management System staff helps students, train faculty and employ new Blackboard technologies, such as Collaborate. Blackboard Collaborate combines the capabilities of industry leaders like Wimba and Elluminate. Blackboard Collaborate provides a comprehensive online learning and collaboration platform designed specifically for education. In May 2007, a full-time academic Online General Education Advisor was hired by CAC to work with both local and distance students. The Online Advisor General Education has been well received and is especially helpful when there is a high volume of student inquiries.

Discuss the adequacy of the physical (building space, classrooms, labs, etc) resources available to the program over the past 3 years:

The infusion of bond money to build and renovate the CAC district-wide campuses has allowed the DTP to offer more face to face classes in locations not previously available. New office spaces were created allowing the DTP Preceptor/Advisor to have a private office which is important when advising students. The DTP Program Assistant has been able to relocate to the renovated Nursing and Health Careers building where

resources can be shared.

Discuss the adequacy of the academic support resources available to the program and its students over the past 3 years:

The resources available to online students are extensive and ever expanding. Of particular interest are the Online 24/7, Free Tutoring and the online library services. Students requesting tutoring services are contacted within 48 hours. The Library "sample" information below is a snapshot of what is available to all students regardless of course modality.

Discuss the adequacy of the student support resources available to the program and its students over the past 3 years:

Student Services has implemented many changes over the last few years. Some of which are; students can now register, order books and obtain final grades online. The implementation of online registration and other student-centered services has positively affected the DTP allowing students to select classes, register and order books 24/7.

Program Effectiveness

Describe how well degree program graduates achieve the college's general education outcomes during the past 3 years:

See Attachment C

Describe how you measure the success of degree and certificate program graduates in achieving the program outcomes and how well students have achieved these outcomes during the past 3 years.

See Attachment D

If your degree is a transfer degree please answer the following questions:

What percentage of the program enrollees transfer to a baccalaureate level institution?

At this time only anecdotal information on transferring to a baccalaureate level program is available. Based on this anecdotal information 30-40% of DTP graduates go on to a 4-year program, primarily to obtain eligibility to become a Registered Dietitian (RD).

As stated in the 2013-2018 DTP goals, the program will be working hard to track this matriculation data.

DTP Goal #3	Graduates of the Dietetic Technician Program will be professionally engaged in Nutrition, Food, Dietetics or Wellness.	
	Objectives:	<p>3. At twelve-months at least 50% of the DTP graduates will be members of the Academy of Nutrition and Dietetics and/or other professional associations related to Nutrition, Food, Dietetics or Wellness.</p> <p>4. At twelve-months at least 10% of the DTP graduates will have matriculated in a 4-year degree program.</p>

Describe the level of success programs students achieve at transfer institutions.

No data available.

Describe the success of students who do not transfer to baccalaureate level institution in obtaining a job in the field of study upon graduation: Data collected from 2008-2013 related to graduate employment is displayed in the table below:

DT Pathway I Graduate employment Over a five-year period, 70% or more of DTP graduates who sought employment in dietetics will be employed within three months of program completion.	Quantitative- Number of graduates who did and did not seek employment in dietetics within 3 months of program completion.	Short Term Strategies: Mailing graduate surveys via USPS Emailing fillable graduate surveys Long-Term Strategies: Implement the use of social media e.g. Skype, Face Book, LinkedIN to stay connected with graduates	Three months post-graduation Surveys	Of 63 students, 30 students completed the surveys, 16 were employed within 3 months of completing the program. Based on Surveys received, 53% were employed within 3 months of program completion
DT Advanced Pathway II Graduate employment Over a five-year period, 70% or more of DTP graduates who sought employment in dietetics will be employed within three months of program completion.	Quantitative- Number of graduates who did and did not seek employment in dietetics within 3 months of program completion.	Short Term Strategies: Mailing graduate surveys via USPS Emailing fillable graduate surveys Long-Term Strategies: Implement the use of social media e.g. Skype, Face Book, LinkedIN to stay connected with graduates	Three months post-graduation Surveys	Two DT Advanced graduated one employed and one unknown

If you degree or certificate leads directly in to the work place please answer the following questions:

Describe the success of students in obtaining a job in the field of study upon graduation:

See table above.

How many certificate completers continue their studies at CAC:

n/a

How many degree completers continue their studies another institution:

No data available.

Program Continuous Quality Improvement

Discuss how the program has used learning outcome assessment results to improve instruction over the past 3 years:

Prior to 2008 the assessment tools provided to the interns and the preceptors were subjective. The competency was stated with minimal directions and the preceptor was asked to rate the intern on a scale of 1-4, with 4 described as "Competent- can complete the skill with little or no supervision." Since the preceptors are located across the United States it was not clear to the DTP Director and faculty as to whether individual preceptors were able to objectively evaluate the intern's competency level. The concern was whether all of the interns were being evaluated fairly and equitably in the variety of facilities and locations. This is an important concern and a challenge for a distance DTP.

In 2008 after the completion of the PAR and the adoption of the 2008 ERAS faculty and the DTP Director and Internship Instructor evaluated and recreated the entire internship along with the competency assessment tools. Projects were created following the DT exam domains. Each of the five projects contain the competency, directions, assignments and rubrics to evaluate the demonstration of the competency as "Needs improvement, Entry-Level or Exceeds Entry Level". The implementation of rubrics to guide the preceptors provided a more objective method of assessing interns across the internship and the country. At the time that the ACEND 2012 Standards were adopted the entire internship was rewritten the Internship Instructor and DTP Director decided to delete the "Exceed Entry Level" rubric evaluation and keep the "Needs improvement or Entry-Level" evaluations only.

The CAC DTP implores numerous type of evaluations throughout the didactic and finally in the supervised practice internship. Traditional evaluation of student progress takes place in the didactic portion of this program. Examples of these evaluations are presentations, course projects, discussions, quizzes and exams.

Prior to 2009 interns were required to submit a portfolio detailing their activities in the supervised practice internship. The portfolios were monitored during the internship by the Preceptors and submitted to the DTP Director at the end of the supervised practice. At that end point evaluating the intern's progression and providing feedback was irrelevant. However, the improvements in the ability to inter-act with students online has dramatically enhanced the DTP Director's capability to evaluate, document and assist in the progression of student learning and demonstration of competency.

In 2008-2009 a DTP Internship Instructor was hired to evaluate and manage the supervised practice internship. The Internship Instructor has been able to stay connected with the interns and Preceptors assisting with refining, clarifying and defining acceptable progress in the internship. The DTP Director has been able to retain the Internship Instructor hired in 2008-2009 which has resulted in the consistency of intern evaluation and continuous quality improvement in the internship.

One of the continuous quality improvement initiatives that support the pass rate improvement plan is scheduled to begin in fall 2013. During finals week, the interns will be required to take a practice exam and a final exam. The implementation of this evaluation tool serves several purposes. This newly implemented final exam requirement is part of the DTP Pass Rate Improvement Plan. The exam is intended to mitigate credentialing exam test taking barriers. The exam test taking barriers are discussed in Standard 6 of this self-study.

First, the exam is designed to cover the Dietetic Technician exam domains. It is online or computer based like the actual DT registration exam administered by CDR. It contains 125 questions and is timed. The DTP believes that this exam will be a good predictor for the first-time test takers for both the graduate and the DTP. Second, the exam may alleviate some of the test anxiety of the graduate. Thirdly, the exam will illuminate domain areas that need to be a study focus in preparation for the actual exam. If trends in domain performance are evident the DTP can initiate a continuous quality improvement process in the didactic and the internship that addresses and supports the knowledge, skills and abilities areas of the DTP student. Lastly, there is a strong anecdotal reporting that graduates of both DTP and DI programs will take the test, to test it then study the domains that they did not do well in.

Strengths	The DTP continuously assesses the student's outcomes and implements interventions and improvement as part of the continuous quality improvement cycle.
Challenges	One of the challenges is locating, creating and then implementing performance evaluation tools in addition to what is already being used in the DTP.
Weaknesses	A formal evaluation process needs to be implemented as discussed in Standard 5 Program Goals which states "The challenge will be in designing the evaluation tools to measure the CSLO at the developing and proficient levels."

Discuss how the program has used operational planning goals to achieve quality improvement over the past 3 years:

The adoption of the Quality Matters Higher Education Rubric 2011-2013 Edition provides the framework for the implementation of the measurable student learning outcomes. Specifically, the Quality Matters General Standard 2 states, "Learning objectives are measurable and clearly stated". Thirdly, data and feedback collected are evaluated by the DTP Director, faculty and staff members. Lastly, changes are implemented to complete the continuous quality improvement cycle.

The Dietetic Technician Internship provides a good example of the assessment process. Each semester assessment for all competencies has progressed and strengthened from the preceptor submitted rubrics to the Internship Instructor's assessment of assignments. The internship

rubrics have been continuously refined and made more specific. Interns are now actively involved in this as each semester one of their discussion assignments is to improve and clarify one of the project learning assignments and its corresponding rubric. Intern input has resulted in greater clarity and the sharing of examples has improved quality. College wide goals for reading, math and critical thinking have been added as integral parts of the assessment rubrics. Assessments are now done at least weekly in the internship rather than only at the end of a project which was the case prior to 2008.

Describe other ways the program has engaged in continuous quality improvement:

The DTP curriculum is reviewed annually by the Director, faculty and staff. Revisions are a result of the accumulation of ideas, changes in accreditation standards, innovations, student evaluations, market changes and trends and stakeholders including the DTP Advisory Committee Members. The DTP made curriculum changes in three out of the last five years. This process is described in Standard 14, Guideline 14.1 a through d. The development and revision of curriculum at CAC follows detailed procedures.

Program Alignment with Institutional Goals

Describe how the program has directly or indirectly is helping the College achieve each of its current strategic goals. If you believe the goal is inapplicable to the program indicate so.

Strategic Goal 1: Ensure broad access to high-quality innovative educational programs, services and training opportunities for Pinal County residents:

[See DEP Operational Plan 2012-2013 Attachment E](#)

Strategic Goal 2: Improve student retention, persistence, completion and job placement:

[See DEP Operational Plan 2012-2013 Attachment E](#)

Strategic Goal 3: Ensure a safe, sustainable environment that promotes learning, communication, diversity and satisfaction among students, faculty and staff:

[See DEP Operational Plan 2012-2013 Attachment E](#)

Strategic Goal 4: Enhance our physical and technological infrastructure to support changes in the learning and work environment:

n/a

Strategic Goal 5: Expand partnerships with Universities to provide advanced degrees to Pinal County residents:

[See DEP Operational Plan 2012-2013 Attachment E](#)

Strategic Goal 6: Obtain approval from the state and regional accreditation body to offer baccalaureate degrees at CAC:

n/a

Strategic Goal 7: Optimize fiscal resources that support the needs and expectations of students and the community:

n/a

Strategic Goal 8: Contribute to the economic vitality, workforce development, and job training needs of Pinal County and surrounding region:

[See DEP Operational Plan 2012-2013 Attachment E](#)

Program Assessment Summary Matrices Assessment Period from 2008 to 2013

Program Review Attachment A

Background: The Program Goals Assessment Planning Matrices are used to document whether the program is meeting its goals over a five-year period. At the end of five years, the fully-completed form should be used as evidence of the degree to which the program is achieving outcomes that support the goals.

Directions: Write the program's goals; then list the desired outcome measures that accompany each one. Describe the data to be assessed and its source for each outcome measure. Specify the assessment methods and identify the individuals or groups responsible for ensuring that assessments take place along with the timeframe for collecting the data. The actual outcomes will be recorded over the five-year lifetime of the plan.

Mission of the Dietetics Program (Standard 4)

DTP Mission 2008-2013

The Mission for the Dietetic Technician Program (DTP) for Central Arizona College is to provide quality, nutrition education and training for a diverse student population to become competent entry-level Dietetic Technician practitioners through the following pathways: The Dietetic Technician A.A.S. Degree Program and the Dietetic Technician Advanced Internship Program.

Program Goal, Objectives and Assessment (Standards 5, 6, 7 and 8)

Goal #1: To prepare graduates who are ready to become competent entry-level dietetic technicians.

A) Objectives (Guideline 7.1a)	B) Data Assessed and the Data Source (Guideline 7.1b & c)	C) Data Assessment Method(s) (Guideline 7.1d)	D) Assessed by: (Guideline 7.1e)	E) Actions to Assure that the Outcome Is or Will Be Met (Guideline 8.2)	F) Timeframe (Finished?) (Guideline 7.1f)	G) Actual Outcome (Guideline 7.2 b)
DT Pathway I Program completion 50% of students enrolled in the DTP will complete all program requirements within five years of enrolling in the DTP	<u>Quantitative</u> – Number of students enrolled each academic year in the DT Internship (NTR296) Time required for each student to graduate	Banner report and excel spreadsheet tracking form of DT majors	Dietetic Education Program (DEP) staff	Short Term Strategies: Mailing retention letters to non-continuing DT majors each semester. Long-Term Strategies: 2012-2013 implement and enforce the 5-year time limit for NTR & CHM courses	End of each semester after graduation is posted	
		Graduate Transcripts (CASA)	Program Director		December 2008 / May 2009	2/3 = 67%
		Graduate Report (CASA)			December 2009 / May 2010	6/8 = 75%
		Confirmation of Degree posted in Banner (print screen)			December 2010 / May 2011	17/17 = 100%
		Calculations of the difference in years between first NTR course enrollment and graduation			December 2011 / May 2012	10/12 = 83%
		Graduate Survey Q#2			December 2012 / May 2013	22/23 = 97%
					Met 84% over past five years	
	Qualitative- Reasons why students fail to complete the program within five years (e.g. transfer, financial issues, dismissed, personal reasons etc.)	Graduate Survey Q#3 <i>DT Internship through Graduation process</i> <i>Graduate Tracking sheet</i>	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Mailing retention letters to non-continuing DT majors each semester	Three months post graduation Surveys	Of 63 students, 6 students did not complete within 5 years. The top three reasons given by graduates were: <ul style="list-style-type: none"> • Family obligations • Difficulty finding an RD Preceptor and Facility • Personal Issues

A) Objectives (Guideline 7.1a)	B) Data Assessed and the Data Source (Guideline 7.1b & c)	C) Data Assessment Method(s) (Guideline 7.1d)	D) Assessed by: (Guideline 7.1e)	E) Actions to Assure that the Outcome Is or Will Be Met (Guideline 8.2)	F) Timeframe (Finished?) (Guideline 7.1f)	G) Actual Outcome (Guideline 7.2 b)
DT Advanced Pathway II Program Completion	N/A	N/A	N/A	N/A	N/A	N/A
DT Pathway I Graduate employment Over a five-year period, 70% or more of DTP graduates who sought employment in dietetics will be employed within three months of program completion.	Quantitative- Number of graduates who did and did not seek employment in dietetics within 3 months of program completion.	Graduate Survey Q#8	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Mailing graduate surveys via USPS Emailing fillable graduate surveys Long-Term Strategies: Implement the use of social media e.g. Skype, Face Book, LinkedIN to stay connected with graduates	Three months post graduation Surveys	Of 63 students, 30 students completed the surveys, 16 were employed within 3 months of completing the program. Based on Surveys received, 53% were employed within 3 months of program completion
DT Advanced Pathway II Graduate employment Over a five-year period, 70% or more of DTP graduates who sought employment in dietetics will be employed within three months of program completion.	Quantitative- Number of graduates who did and did not seek employment in dietetics within 3 months of program completion.	Graduate Survey Q#8	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Mailing graduate surveys via USPS Emailing fillable graduate surveys Long-Term Strategies: Implement the use of social media e.g. Skype, Face Book, LinkedIN to stay connected with graduates	Three months post graduation Surveys	Two DT Advanced graduated one employed and one unknown
DT Pathway I Pass rate of first-time test takers on the registration examination Over a five-year period, the pass rate for DTP graduates taking the registration examination for the first time will be at least 80%.	Quantitative - Number of graduates who take the registration examination.	Score Reports for the Registration Examination for Dietetic Technicians (ACT)	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Monitor Registration Examination for Dietetic Technicians (ACT) Report Long Term Strategies: Require exit packet to be completed before the end of the internship to reduce the time that the graduates names are submitted to CDR.	February and August ACT Report Implemented Fall 2010	Data not available from CDR DTP graduates receive eligibility to take the registration exam in 2-3 weeks instead of 1-2 months.
	Qualitative – Reasons why graduates delay taking the registration exam	Graduate Survey Q#6	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Mailing graduate surveys via USPS Emailing fillable graduate surveys Long-Term Strategies: Implement the use of social media e.g. Skype, Face Book, LinkedIN to stay connected with graduates	Three months post graduation Surveys	Of 63 students, 30 students completed the surveys. The top three reasons given by graduates were: <ul style="list-style-type: none"> • Need more time to study • Test anxiety • Working too many hours

A) Objectives (Guideline 7.1a)	B) Data Assessed and the Data Source (Guideline 7.1b & c)	C) Data Assessment Method(s) (Guideline 7.1d)	D) Assessed by: (Guideline 7.1e)	E) Actions to Assure that the Outcome Is or Will Be Met (Guideline 8.2)	F) Timeframe (Finished?) (Guideline 7.1f)	G) Actual Outcome (Guideline 7.2 b)																					
	Quantitative- Number of graduates who pass the registration examination the first time they take it.	Score Reports for the Registration Examination for Dietetic Technicians (ACT)	Program Director	Short Term Strategies: Require interns to purchase electronic exam review materials during the internship. Long Term Strategies: Implement exit exam in internship.	February and August ACT Report	<table border="1"> <thead> <tr> <th>Years</th> <th>Students taking exam</th> <th>1st Time Pass Rates One Year Window</th> </tr> </thead> <tbody> <tr> <td>2013</td> <td></td> <td>%</td> </tr> <tr> <td>2012</td> <td><u>11</u></td> <td>55%</td> </tr> <tr> <td>2011</td> <td><u>15</u></td> <td>67%</td> </tr> <tr> <td>2010</td> <td><u>4</u></td> <td>34%</td> </tr> <tr> <td>2009</td> <td><u>3</u></td> <td>67%</td> </tr> <tr> <td>2008</td> <td>4</td> <td></td> </tr> </tbody> </table>	Years	Students taking exam	1 st Time Pass Rates One Year Window	2013		%	2012	<u>11</u>	55%	2011	<u>15</u>	67%	2010	<u>4</u>	34%	2009	<u>3</u>	67%	2008	4	
Years	Students taking exam	1 st Time Pass Rates One Year Window																									
2013		%																									
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2008	4																										
DT Advanced Pathway II Pass rate of first-time test takers on the registration examination Over a five-year period, the pass rate for DTP graduates taking the registration examination for the first time will be at least 80%.	Quantitative - Number of graduates who take the registration examination.	Score Reports for the Registration Examination for Dietetic Technicians (ACT)	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Monitor Registration Examination for Dietetic Technicians (ACT) Report Long Term Strategies: Require exit packet to be completed before the end of the internship to reduce the time that the graduates names are submitted to CDR.	February and August ACT Report Implemented Fall 2013	Both DT Advanced graduates from 2008-2013 took the registration examination																					
	Qualitative – Reasons why graduates delay taking the registration exam	Graduate Survey Q#6	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Mailing graduate surveys via USPS Emailing fillable graduate surveys Long-Term Strategies: Implement the use of social media e.g. Skype, Face Book, LinkedIN to stay connected with graduates	Three months post graduation Surveys	One of two graduate surveys received in March 2010 The reasons given by the graduate were: <ul style="list-style-type: none"> • Family obligations • Financial concerns • Need more time to study • Personal issues • Test anxiety 																					
	Quantitative- Number of graduates who pass the registration examination the first time they take it.	Score Reports for the Registration Examination for Dietetic Technicians (ACT)	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Require interns to purchase electronic exam review materials during the internship. Long Term Strategies: Implement exit exam in internship.	February and August ACT Report	Two DT Advanced graduates from 2008-2013 One passed, one failed = 50% pass rate																					

Goal # 2: To prepare graduates who will use E-learning opportunities to enhance the breadth and/or depth of their knowledge of dietetics.

A) Objectives (Guideline 7.1a)	B) Data Assessed and the Data Source (Guideline 7.1b & c)	C) Data Assessment Method(s) (Guideline 7.1d)	D) Assessed by: (Guideline 7.1e)	E) Actions to Assure that the Outcome Is or Will Be Met (Guideline 8.2)	F) Timeframe (Finished?) (Guideline 7.1f)	G) Actual Outcome (Guideline 7.2 b)
DT Pathway I Over a five year period, 85% of graduates will expand the breadth and/or depth of their professional knowledge through their use of E- learning opportunities.	Number of graduates who use E-learning opportunities to enhance the breadth and/or depth of their knowledge of dietetics	Graduate Survey Q#13	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Graduate surveys mailed twice annually. Long Term Strategies: Send electronic surveys. Use social media to keep in touch with graduates	Annually in September and April.	Of 63 students, 30 students completed the surveys, 19 answered YES, 2 answered NO, and 8 left it blank. Based on Surveys received, 63% of graduates expanded the breadth and/or depth of their professional knowledge through their use of E-learning opportunities.
DT Advanced Pathway II Over a five year period, 85% of graduates will expand the breadth and/or depth of their professional knowledge through their use of E- learning opportunities.	Number of graduates who use E-learning opportunities to enhance the breadth and/or depth of their knowledge of dietetics	Graduate Survey Q#13	Program Director Dietetic Education Program (DEP) staff	Short Term Strategies: Graduate surveys mailed twice annually. Long Term Strategies: Send electronic surveys. Use social media to keep in touch with graduates	Annually in September and April.	One out of two potential surveys were returned. The one survey did indicate using E-learning opportunities to enhance the breadth and/or depth of their knowledge of dietetics. Of those surveys returned the actual outcome = 100%

Curriculum Comparison Report

color blue: new changes since 2009 comparison

DT Program Review Attachment B

Name of Program: Dietetic Technician – AAS

Central Arizona College	Paradise Valley Community College & Chandler/Gilbert Community College	Community College of Allegheny County,	Gaston College
Arizona	Arizona	Pennsylvania	North Carolina
Dietetic Technician (2013-2014 ac. year)	Dietetic Technology	Dietetic Technician	Dietetic Technician
Associate of Applied Science (AAS)	Associate of Applied Science (AAS)	Associate Degree (AS)	Associate of Applied Science (AAS)
<i>distance education</i>	<i>face to face</i>	<i>some distance education</i>	<i>distance education – independent stud</i>
Total credits: 65	Total credits: 63-72	Total Credits: 72	Total Credits: 72
	FON225 Research in Complementary and Alternative Nutrition Therapies (3)	DIT208 Community Nutrition (4)	
	HCC145AA* (1) Medical Terminology for Health Care Workers I	ALH140 Medical Terminology (3)	
CUL105 Food Safety Foundations OR NTR105 ServSafe Cert. (1)	FON104 Certification in Food Service Safety and Sanitation (1)	DIT125 Food Protection Certification (2)	DET 115 Dietetic Technician II (2)
NTR150 Overview of Nutrition Profession (1)	FON125 Introduction to Professions in Nutrition and Dietetics (1)	DIT214 Dietetic Seminar (1) DIT102 Dietetic/Food Service Orientation (3)	included in DET 110 Dietetic Technician I (8) (NTR150, NTR123, NTR200)
NTR200 Nutrition (3)	FON241 Principles of Human Nutrition (3)	DIT106 Fundamentals of Nutrition (3)	included in DET 110 Dietetic Technician I (8) (NTR150, NTR123, NTR200)
NTR129 Introduction to Health Care for Nutrition Professionals (3)			included in DET 120 Dietetic Technician III (9) (NTR129, NTR191, NTR222)
NTR142 Applied Food Science (3)	FON142ABApplied Food Principles (3)	DIT104 Foods (4) (3) DIT105 Foods Lab (1)	
NTR123 Nutrition Throughout the Life Cycle (3)			included in DET 110 Dietetic Technician I (8) (NTR150, NTR123, NTR200)
NTR223 Food Service Management (3)	FON207 Introduction to Nutrition Services Management (3)	DIT210 Human Resource Management for Dietetics (3) DIT212 Food Service Systems (3) DIT110 Food Service Production & Purchasing (3)	DET 220 Dietetic Technician V (10)
NTR201 Nutrition Literacy (1)			
NTR or CUL 1 credit elective			
NTR232a Food and Culture			

Central Arizona College	Paradise Valley Community College & Chandler/Gilbert Community College	Community College of Allegheny County,	Gaston College
Arizona	Arizona	Pennsylvania	North Carolina
Dietetic Technician (2013-2014 ac. year)	Dietetic Technology	Dietetic Technician	Dietetic Technician
Associate of Applied Science (AAS) <i>distance education</i>	Associate of Applied Science (AAS) <i>face to face</i>	Associate Degree (AS) <i>some distance education</i>	Associate of Applied Science (AAS) <i>distance education – independent stud</i>
Total credits: 65	Total credits: 63-72	Total Credits: 72	Total Credits: 72
NTR222 Nutrition Assessment (3)		DIT103 Nutrition Assessment (2)	included in DET 120 Dietetic Technician III (9) (NTR129, NTR191, NTR222) included in DET 210 Dietetic Technician IV (9) (NTR222, NTR240)
NTR240 Clinical Nutrition (3)	FON242 Introduction to Medical Nutrition Therapy (3)	DIT114 Medical Nutrition Therapy (4)	included in DET 210 Dietetic Technician IV (9) (NTR222, NTR240)
	FON210 Spts Nutr & Suppl for Phys Act or FON 247 Wt Mgmt Theory		
NTR191 Nutrition Counseling Skill Development (3)			included in DET 120 Dietetic Technician III (9) (NTR129, NTR191, NTR222)
NTR157 Foundations of Dietetic Internship (2)		DIT113 Dietetic Practicum Seminar (2)	
NTR295 Dietetic Technician Professional Practice (1) NTR296 Dietetic Technician Internship (6)	FON244AA Practicum I: Food Service Management Lecture (2) FON244AB Practicum I: Food Service Management Lab (2) FON245AA Practicum II: Medical Nutrition Therapy Lecture (2) FON245AB Practicum II: Medical Nutrition Therapy Lab (2) FON246AA Practicum III: Community Nutrition Lecture (2) FON246AB Practicum III: Community Nutrition Lab (2)	DIT201 Dietetics Supervised Practice 1 (5) DIT209 Dietetic Supervised Practice 2 (4)	DET 225 Dietetic Technician VI (2) Clinical Hours in : DET 110 Dietetic Technician I (8) DET 120 Dietetic Technician III (9) DET 210 Dietetic Technician IV (9) DET 220 Dietetic Technician V (1
RDG094 OR equivalent reading assessment	Critical Reading CRE101 OR Test Exempt 0-3		
<u>Written Communication</u> (3) ENG101 English Composition III OR	<u>First-Year Composition</u> ENG101* or 107* (3)	ENG101 English Composition 1 (3) ENG102 English Composition 2 (3)	ENG 111 Expository Writing (3) ENG 114 Prof Research & Reporting (3)

Central Arizona College	Paradise Valley Community College & Chandler/Gilbert Community College	Community College of Allegheny County,	Gaston College
Arizona	Arizona	Pennsylvania	North Carolina
Dietetic Technician (2013-2014 ac. year)	Dietetic Technology	Dietetic Technician	Dietetic Technician
Associate of Applied Science (AAS) <i>distance education</i>	Associate of Applied Science (AAS) <i>face to face</i>	Associate Degree (AS) <i>some distance education</i>	Associate of Applied Science (AAS) <i>distance education – independent stud</i>
Total credits: 65	Total credits: 63-72	Total Credits: 72	Total Credits: 72
ENG121 Applied Technical Writing	ENG102* or 108* or 111* (3)		
Oral Communication (3) COM100 Fundamentals or Human Com. OR COM206 Public Speaking	Oral Communication COM100, 110, 225* or 230* (3)	SPH101 Oral Communication (3)	
Arts and Humanities (3) courses numbered 100 or above in the following areas: philosophy, art, music, literature, world religions, & theater.	Humanities & Fine Arts (3)		Humanities (3)
Mathematics (3) Math numbered 101 or above OR BUS101	Mathematics MAT120* or Higher (3)	MAT108 Intermediate Algebra (4)	MAT 110 or Higher (3)
Computer Competency (3) AGB124 or CIS120	Business & Personal Computer BPC110 (3) OR BPC101AA & BA* & CA* OR BPC/CIS114++ & BPC/CIS117++ & BPC/OAS130++ or CIS105 (3)	CIT100 Introduction to Computers (3)	
Physical Education (1) PAC Courses numbered 100 or above excluding varsity sports	PED115 (2) Lifetime Fitness		
Social and Behavioral Science (3) PSY101 Introduction to Psychology OR SOC100 Introduction to Sociology	Social & Behavioral Science PSY101 or SOC101 (3)	PSY101 Introduction to Psychology (3)	PSY 150 General Psychology (3) PSY 241 Developmental Psych (3)
Biological or Physical Lab Science (12) CHM130 Fundamental Chemistry BIO160 Intro to Human Anatomy and Physiology BIO205 Microbiology	Natural Science CHM130/130LL* OR CHM151/151LL* (4) Biology BIO160 (4) OR BIO201* & BIO202* (4-8)	BIO103 Human Biology (3) CHM120 Bio-Organic Chemistry (4)	CHM 130 Gen, Org, & Biochemistry (3) CHM 130A Gen, Org, & Biochem Lab (1) BIO 163 Basic Anat & Physiology (5) BIO 275 Microbiology (4)

Program Level Assessment Analysis Form – Part I
(To be completed by Chair/Director or Designee) Attachment C

Program: _____ Dietetic Technician AAS Degree Program March 12, 2014 _____

Number of Student Participants:

Number of Faculty Participants:

Goals: List the specific Program Measurable Student Learning Outcome(s) that will be assessed and indicate the CSLO(s) to which it aligns. (Application Level) CDT 2.2 Use clear and effective oral and written communication. (Application Level) CDT 2.6 Participate in professional and community organizations. (CSLO #3) (Application Level) CDT 2.9 Perform self-assessment, develop goals and objectives and prepare a draft portfolio for professional development as defined by the Commission on Dietetic Registration. (CSLO #3) (Application Level) CDT 4.3 Participate in legislative and public policy activities. (CSLO #1) (Synthesis Level) Clinical and Customer Services: development and delivery of information, products and services to individuals, groups and populations at the dietetic technician level of practice. (CSLO #4) (Application Level) Practice Management and Use of Resources: strategic application of principles of management and systems in the provision of services to individuals and organizations. (CSLO #2)

Information: Describe how you measured achievement of the selected program outcomes. How well did students achieve these outcomes? Specifically, how many students were proficient in the student learning outcome(s)? Did the data reveal any specific trends? What student needs were revealed? The competencies are demonstrated and evaluated using rubrics in the internship supervised practice and through additional assignments. All 85 intern participants demonstrated the PMSLOs in the capstone courses NTR295 and NTR296 at entry-level. Entry-level correlates to the CAC evaluation category of "proficient". The ongoing monitoring, and feedback from internship preceptor evaluations and the dialogue that takes place between the CAC Internship Instructor and the student intern reveals that the student intern could be better prepared for these capstone courses as it relates to the four CSLOs.

Action: Discuss how the program will use the assessment results to improve instruction, curriculum, and student learning. Based on the results described above, the DT Program has taken steps to measure the four CSLOs in seminal and sentinel courses. The DT students are being evaluated in NTR150 Overview of Nutrition Professions fall 2013 and spring 2014 along with the terminal NTR295 and NTR296 internship courses. The DT Program is currently creating a DT Program application process that will incorporate measures for all four of the CSLOs. The pilot of this application process is scheduled for fall 2014.

Lisa A. Koehring, MS, RD

Chair/Director Signature

Dean

Academic Dean Approval

Program Level Assessment Analysis Form – Part II

(To be completed by Academic Dean)

Participating Programs _____

Total Number of Student Participants: Total Number of Faculty Participants:

Goals: List all of the Program Measurable Student Learning Outcomes assessed and the CSLO to which each one was aligned.

Information: Summarize the assessments developed by the Programs. What commonalities were noted among the assessment results? Summarize the action plans developed by the Programs. What were the effects on student learning?

Action: Describe additional changes the Academic Dean will make resulting from what was learned during this assessment effort. What recommendations will be made for added resources? How will those resources improve student learning? How will improvements be addressed in the Operational Plans?

Academic Dean Signature

Chief Academic Officer Approval

DTP Self-Study 2008-2013
Appendix 3B – Written Plan for Ongoing Assessment of DTP Learning Outcomes¹
Program Review Attachment D

1: Scientific and Evidence Base of Practice: general understanding of scientific information and research related to the dietetic technician level of practice

List the 5 competencies/ learning outcomes (Appendix A) CADE 2008 Standards (ERAS)	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2) Project	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	# Exceeds entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2008 & Spring 2009 - 200901-200902 Binders-Separate Data Set Fall 2009 & Spring 2010 - 201001-201002 Assignments with no points Rubrics at Needs Improvement = 0, 1 or 2 points n=9
DT 1.1: Assess data, references, patient education materials, consumer and other information from credible sources. Project 3 201001-201002 Project 2	NTR 230Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 2 2010-2011		XX	XXX XXX X	Interns met DT 1.1 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office. IR print P3 to show improvement from 1 to 2 level from 1 st to 2 nd presentation
DT 1.2: Evaluate consumer information to determine if it is consistent with accepted scientific evidence Project 3 201001-201002	NTR 230Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 2 2010-2011	X	XX X	XXX XX	DP scored “needs improvement” then subsequently “entry-level”
DT 1.3 Collect performance improvement, financial, productivity or outcomes data and compare it to established criteria Project 5	NTR 230Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 2 2010-2011		XX X	XXX XX	
DT1.4 Collect background information and organizes materials to support decisions	NTR 230Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 2 2010-2011		XX XX X	XXX	Interns met DT 1.4 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office.
DT 1.5 Implement actions based on care plans, protocols or policies Projects 4 & 5	NTR 230Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 2 2010-2011		XX X	XXX XXX	

¹ See Criterion 2.4, 2.4.1 through 2.4.4.

2: Professional Practice Expectations: beliefs, values, attitudes and behaviors for the dietetic technician level of practice

List the 11 competencies/ learning outcomes (Appendix A) CADE 2008 Standards (ERAS)	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2)	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	# Exceeds entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2010 & Spring 2011 201101-201102 Assignments with no points Rubrics at Needs Improvement = 0, 1 or 2 points
DT 2.1 Adhere to current federal regulations and state statutes and rules, as applicable and in accordance with accreditation standards and the ADA Scope of Dietetics Practice Framework, Standards of Professional Practice and the Code of Ethics for the Profession of Dietetics Project 2 ADA 2008 Reference in bb	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011				
DT 2.2 Use clear and effective oral and written communication Projects 2,3,4 & 5	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		5	6	Interns met DT 2.2 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office.
DT 2.3 Prepare and deliver sound food and nutrition presentations considering life experiences, cultural diversity, age and educational level of the target audience Project 3	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		8	6	Interns met DT 2.3 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office.
DT 2.4 Demonstrate active participation, teamwork and contributions in group settings Project 4	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		6	8	

List the 11 competencies/ learning outcomes (Appendix A) CADE 2008 Standards (ERAS)	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2)	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	# Exceeds entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2010 & Spring 2011 201101-201102 Assignments with no points Rubrics at Needs Improvement = 0, 1 or 2 points
DT 2.5 Refer situations outside the dietetic technician scope of practice or area of competence to the Registered Dietitian or other professional	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		5	9	
DT 2.6 Demonstrate initiative by proactively developing solutions to problems Project 5	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		9	3	
DT 2.7 Participate in professional and community organizations Project 1	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		13	2	Interns met DT 2.7 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office.
DT 2.8 Establish collaborative relationships with internal and external stakeholders, including patients, clients, caregivers, other health care professionals and support personnel to facilitate individual and organizational goals Projects 4 & 5	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		3	7	
DT 2.9 Demonstrate professional attributes such as advocacy, customer focus, flexibility, openness to change, time management, work prioritization and work ethic within various organizational cultures Project 5	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		4	8	

List the 11 competencies/ learning outcomes (Appendix A) CADE 2008 Standards (ERAS)	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2)	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	# Exceeds entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2010 & Spring 2011 201101-201102 Assignments with no points Rubrics at Needs Improvement = 0, 1 or 2 points
DT 2.10 Perform self assessment, develop goals and objectives and prepare a draft portfolio for professional development as defined by the Commission on Dietetic Registration Project 1	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		13	2	Interns met DT 2.10 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office.
DT 2.11 Demonstrate respect for life experiences, cultural diversity and educational background in interpersonal relationships Project 2, 3 & 4	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 Dietetic Technician Internship; analyzed in year 3 2010-2011		7	6	

3: Clinical and Customer Services: development and delivery of information, products and services to individuals, groups and populations at the dietetic technician level of practice

List the 7 competencies/ learning outcomes (Appendix A) CADE 2008 Standards (ERAS)	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2)	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	# Exceeds entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2011 & Spring 2012 201201-201202 Assignments with no points Rubrics at Needs Improvement = 0, 1 or 2 points
DT 3.1 Perform nutrition screening and identify clients or patients to be referred to the Registered Dietitian Project 2	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		2	3	
DT 3.2 Perform selected (a-d below) activities of the Nutrition Care Process for individuals, groups and populations in a variety of settings under the supervision of the Registered Dietitian in accordance with the Standards of Practice for DTRs in Nutrition Care Project 2	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		2	2	
DT 3.2.a. Collect data for inclusion into the nutrition assessment Project 2	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		2	3	
DT 3.2.b. Compare data collected to established criteria to identify differences Project 2	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		2	3	
DT 3.2.c. Implement designated nutrition interventions Project 2	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		2	3	

List the 7 competencies/ learning outcomes (Appendix A) CADE 2008 Standards (ERAS)	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2)	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	# Exceeds entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2011 & Spring 2012 201201-201202 Assignments with no points Rubrics at Needs Improvement = 0, 1 or 2 points
DT 3.2.d. Collect monitoring data Project 2	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		4	1	
DT 3.3 Provide nutrition and lifestyle education to well populations Project 3	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		2	4	Interns met DT 3.3 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office.
DT 3.4 Promote health improvement, food safety, wellness and disease prevention for the general population Project 3	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		4	2	
DT 3.5 Develop or select print and electronic nutrition education materials for disease prevention and health improvement that are culturally sensitive, age appropriate and designed for the educational level of the audience Project 3	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		2	4	Interns met DT 3.5 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office.
DT 3.6 Perform supervisory functions for production and service of food that meets nutrition guidelines, cost parameters, health needs and is acceptable to consumers based on socio-economic, cultural and religious preferences and practice Project 5	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		2	2	

List the 7 competencies/ learning outcomes (Appendix A) CADE 2008 Standards (ERAS)	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2)	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	# Exceeds entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2011 & Spring 2012 201201-201202 Assignments with no points Rubrics at Needs Improvement = 0, 1 or 2 points
DT 3.7 Modify recipes and menus for acceptability and affordability that accommodate the cultural diversity and health status of various populations, groups and individuals Project 4	NTR 230 Dietetic NTR Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 4 2011-2012		1	1	

4: Practice Management and Use of Resources: application of principles of management and systems in the provision of clinical and customer services to individuals and organizations at the dietetic technician level of practice

List the 8 competencies/ learning outcomes (Appendix A) ACEND 2012 Standards	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2)	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2012 & Spring 2013 201301-201302 Combined competencies into three projects and split out Prof. Practice competencies and created NTR295
CDT 4.1 Participate in quality improvement and customer satisfaction activities to improve delivery of nutrition services NCP Project	NTR 296 Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 5 2012-2013	1	22	
CDT 4.2 Perform supervisory, education and training functions EDU Project	NTR 296 Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 5 2012-2013	0	23	
CDT 4.3 Participate in legislative and public policy activities PP Project	NTR 296 Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 5 2012-2013	0	23	Interns met DT 1.1 as evidenced by work submitted in Blackboard and the entry-level rubric evaluation completed by the Preceptors. Exhibits on-site in the DTP Directors office.
CDT 4.4 Use current informatics technology to develop, store, retrieve and disseminate information and data FSM	NTR 296 Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 5 2012-2013	1	22	
CDT 4.5 Participate in development of a plan for a new service including budget FSM	NTR 296 Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 5 2012-2013	1	22	
CDT 4.6 Assist with marketing clinical and customer services FSM		Internship Faculty & DTP Director	Data collected during and at the end of NTR 230 /296 Dietetic Technician Internship; analyzed in year 5 2012-2013	1	22	

List the 8 competencies/ learning outcomes (Appendix A) ACEND 2012 Standards	Didactic and/or supervised practice course in which assessment will occur (Criterion 2.4.2)	Individuals responsible for ensuring assessment occurs (Criterion 2.4.3)	Timeline for collecting formative and summative data (Criterion 2.4.4)	# Not met	# Entry level	E) Resulting data with the date collected for 2 knowledge requirements per domain Fall 2012 & Spring 2013 201301-201302 Combined competencies into three projects and split out Prof. Practice competencies and created NTR295
CDT 4.7 Propose and use procedures as appropriate to the practice setting to reduce waste and protect the environment FSM	NTR 296 Dietetic Technician Internship	Internship Faculty & DTP Director	Data collected during and at the end of NTR 296 Dietetic Technician Internship; analyzed in year 5 2012-2013	1	22	

Central Arizona College Institutional Operational Plan

DT Program Review Attachment E

Department- Division-Unit-Area:

Dietetic Education Program

Academic Year: 2013-2014

Date Submitted:

December 21, 2012

Mid-Year Update Submitted:

November 26, 2013

Submitted By

Lisa Koehring DEP Director, Kim Bentley, Mona Shelton and Michelle Gomez

GOALS

1. **Access:** Ensure broad access to high-quality innovative educational programs, services and training opportunities for Pinal County residents.
2. **Student Success:** Improve student retention, persistence, completion and job placement.
3. **Environment:** Ensure a safe, sustainable environment that promotes learning, communication, diversity and satisfaction among students, faculty and staff.
4. **Infrastructure:** Enhance our physical and technological infrastructure to support changes in the learning and work environment.
5. **Partnerships with Universities:** Expand partnerships with universities to provide advanced degrees to Pinal County residents.
6. **Baccalaureate Degrees at CAC:** Obtain approval from the state and regional accreditation body to offer baccalaureate degrees at CAC.
7. **Asset Management:** Optimize fiscal resources that support the needs and expectations of students and the community.
8. **Workforce Development:** Contribute to the economic vitality, workforce development, and job training needs of Pinal County and surrounding regions.

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Operational Plan Goal	Aligns to Which Strategic Goal(s)	Activities Anticipated	Measures of Success and Baseline Benchmark	Targets	Mid-Year Update	End of Year Update
DEP will obtain Distance Learning Approval from HLC March 2014	1, 2, 8	Submit application to HLC.	HLC approval received.	100%	CAC obtained Distance Learning Approval from HLC March 2013	100% Completed
Obtain Quality Matters Certification for all online Dietary Managers courses, 16.0 credits by Fall 2015 and the core courses for the Dietetic Technician AAS by Fall 2017	1, 2, 3	<ol style="list-style-type: none"> 1. Incorporate Collaborate in core Dietary Managers courses using the QM rubric as a guide. 2. Train online faculty who teach the Dietary Managers curriculum in Quality Matters. <i>Budget impact \$1,200.00.</i> 3. Obtain Quality Matter certification for the 12 credits of core Dietary Managers online courses. <i>Budget impact \$3,600.00.</i> 	<ol style="list-style-type: none"> 1. Collaborate is incorporated Dietary Managers online courses by January 2014. 2. Online faculty trained in QM by June 2014 3. QM certification received by June 2015 for Dietary Managers courses. QM certification received by June 2017 for the Dietetic Technician AAS 	100% for 1 through 3	<ol style="list-style-type: none"> 1. In process 2. Five online faculty trained on the QM rubric June 29, 2013 and two FT DEP staff trained. 3. In process waiting for more online faculty to be trained 	
Deliver 3 Certified Breastfeeding Counselor Course (CBC) seminars using the new curriculum.	1, 2, 8	<ol style="list-style-type: none"> 1. Local and state-wide advertisement of the new CBC curriculum via list serves. 2. Recruit one additional CBC adjunct faculty. <i>Budget impact.</i> 3. Facility use agreements in place. <i>Budget impact \$3,000.00 for three seminars. CBC fee income for three seminars is ~ \$11,000.00.</i> 4. Partner with WIC, hospitals and other AZ public health 	<ol style="list-style-type: none"> 1. Interest in hosting/setting up seminars results in 3 opportunities for delivery. 2. One additional CBC adjunct faculty hired. 3. At least one facility agreement is in place. 4. One of the 3 seminars is a result of partnerships with WIC, hospitals and/or other AZ public health organizations. 	100% for 1 through 4	<ol style="list-style-type: none"> 1. One CBC seminar completed December 9, 2013. 2. In process 3. In process 4. In process 	

Central Arizona College Institutional Operational Plan

DT Program Review Attachment E

Operational Plan Goal	Aligns to Which Strategic Goal(s)	Activities Anticipated	Measures of Success and Baseline Benchmark	Targets	Mid-Year Update	End of Year Update
		organizations for setting up CBC seminars.				
Measured CSLO #3 in an entry level and terminal NTR course. CSLO #3 is Personal and Professional Skills specifically, Communication-Students send and receive visual, written and spoken messages to create meaning, understanding or promote change.	2	<ol style="list-style-type: none"> Develop rubric to evaluate communication, especially written communication. Choose courses to assess. Train faculty on implementation of rubric and related assignments. Develop assessment model and timeline. Report assessment data to CAC. Study results, make improvements, set goals, implements, measure, collect data and continue the cycle. 	<ol style="list-style-type: none"> Completed by fall 2013 semester start. Completed by fall 2013 semester start. Completed by fall 2013 semester start. Completed by fall 2013 semester start. Completed by spring 2014 semester start. Completed by spring 2014 semester start. 	100% for 1 through 6	<ol style="list-style-type: none"> Completed NTR150 and NTR295 entry-level and terminal respectively. Partially completed Completed In process In process 	
Build DTR to RD Career Ladder with AZ State Universities	5	<ol style="list-style-type: none"> Meet with Dietetic Directors from ASU and UofA to develop a career ladder for a DT to RD program. Discuss the results of the meeting with the Nutrition ATF Members. Develop and/or change the Dietetic Technician AAS degree to align with the agreed upon curriculum. 	<ol style="list-style-type: none"> Agreed upon curricular changes to be submitted in ACRES for approval by September 1, 2013. CAC Curriculum Committee approval fall 2013. Transfer pathway approval with ASU and UofA spring 2014. 	100% for 1 through 6	<ol style="list-style-type: none"> N/A N/A TAGS completed with University of Arizona and Arizona State University. 	
Obtain re-accreditation from the Accreditation Council for Education in Nutrition and Dietetics (ACEND) for the Dietetic Technician Program by April 2014.	1, 8	<ol style="list-style-type: none"> Prepare on site documents for accreditation reviewers November 2013. Prepare schedule and provide for student and constituency interviews. Provide follow-up documentation post-accreditation visit. <i>Budget impact \$6,000.00 fee for site visit.</i> 	<ol style="list-style-type: none"> Site documents available. Schedule completed. Post-accreditation visit documentation provided if required. <p>Re-accreditation received by April 2014. Benchmark is the ACEND Program Assessment Review (5-year period) from 2008.</p>	100% for 1 through 5	<ol style="list-style-type: none"> Completed Completed In process 	
Obtain 5-year re-approval from the Association of Nutrition and Foodservice Professionals (ANFP) by January 2014.	1, 8	<ol style="list-style-type: none"> Prepare approval documentation for ANFP Submit approval documentation to ANFP by August 1, 2013. Respond to requests for additional information as may be requested by ANFP. <i>Budget impact \$1,200.00.</i> Place advertisements in national publications related to the fully online Dietary Managers Certificate. <i>Budget impact \$1,200.00.</i> 	<ol style="list-style-type: none"> Approval on first submission. Benchmark is the DEP ANFP approval from 2008. Information request returned within 30 days Track the Dietary Manager inquiries as a result of national advertisements. 	100% for 1 through 4	<ol style="list-style-type: none"> Obtained 5-year re-approval from the Association of Nutrition and Foodservice Professionals (ANFP) on August 21, 2013. Approved for a totally online program. Approval documents submitted on July 7, 2013 N/A no additional information requested by ANFP. In process 	1, 2 & 3 100% completed

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