Developmental Studies Student Learning Report (rev. 7/14)

Fall 2017 – Spring 2018

School of Arts and Sciences

BIOL 0123 – Science Proficiency

Effectively assessing a degree program should address a number of factors:

1) Valid student learning outcomes should be clearly articulated;
2) Valid assessment measures should be used, consistent with the standards of professional practice;
3) There should be evidence that assessment data are being used by faculty to make necessary instructional or assessment changes; and there should be evidence that instructional or assessment changes are being implemented to improve student learning.

PART 1 (A & B)

Relationship of Degree Program Learning Outcomes to Departmental and University Missions

A. Clearly state the school, department and degree program missions.

University Mission	School Mission	Department Mission	Degree Program Mission
Our mission is to ensure students develop the skills and knowledge required to achieve professional and personal goals in dynamic local and global communities.	Central to the mission of the School of Arts and Science is the preparation of students to achieve professional and personal goals in their respective disciplines and to enable their success in dynamic local and global communities. Seven departments comprise this School, the Departments of Biology, Communications, English		Our mission in Developmental Education is to ensure that skill deficient students develop the math and science skills necessary to be successful in their college-level classes to promote their future personal and professional success in their local and global communities.

University Mission	School Mission	Department Mission	Degree Program Mission
	and Humanities, Fine Arts, History and Political Science, mathematics and Physical Sciences, and Psychology and Sociology. These departments pledge to deliver existing and newly developed programs that meet student demands, and to be responsive to the evolving culture of academia in general and the sciences in particular. Our Strategy is to foster an academic setting of diverse curricula that inherently incorporates an environment of service and collegiality.		

B. Clearly state school purposes, department purposes and degree program student learning outcomes. Align student learning outcomes with their appropriate school and department purposes, and these outcomes and purposes with their appropriate university commitments.

University Commitments	School Purposes	Department Purposes	Student Learning Outcomes
To provide quality associate, baccalaureate, and graduate degree opportunities and educational experiences which foster student excellence in oral and written communications, scientific reasoning and critical and creative thinking.	The School will offer developmental courses that will prepare students for college careers that will enhance their quality of life. This will be accomplished by honing and developing analytical and communication skills.	The Biology Department will provide a remedial course to provide knowledge of basic concepts and principles of physical and life sciences. This course will facilitate the students preparation to succeed in future science course work by strengthening scientific analytical skills, creative problem solving, critical thinking and data gathering as well as process thinking..	1) Students will demonstrate mastery of scientific principles necessary for entry-level collegiate study.
To promote an atmosphere of academic and intellectual freedom and respect for diverse expression in an environment of physical safety that is supportive of teaching and learning.			
To provide a general liberal arts education that supports specialized			

University Commitments	School Purposes	Department Purposes	Student Learning Outcomes
academic programs and prepares students for lifelong learning and service in a diverse society.			
To provide students with a diverse, innovative faculty dedicated to excellence in teaching, scholarly pursuits and continuous improvement of programs.			
To provide university-wide student services, activities and resources that complement academic programs.			
To support and strengthen student, faculty and administrative structures that promote shared governance of the institution.			
To promote and encourage student, faculty, staff and community interaction in a positive academic climate that creates opportunities for cultural, intellectual and personal enrichment for the University and the communities it serves.			

PART 2

Discussion of Instructional Changes Resulting from 2016-2017 Developmental Studies Student Learning Report

List and discuss all instructional or assessment changes proposed in Part 5 of last year's Degree Program Student Learning Report, whether implemented or not. Any other changes or assessment activities from last year, but not mentioned in last year's report, should be discussed here as well. Emphasis should be placed on student learning and considerations such as course improvements, the assessment process, and the budget. If no changes were planned or implemented, simply state "No changes were planned or implemented."

Instructional or Assessment Changes	Changes Implemented (Y/N)	Impact of Changes on Degree Curriculum or Budget
No changes were proposed to the Science Proficiency component.		

PART 3

Discussion of the University Assessment Committee's 2016-2017 Peer Review Report

The University Assessment Committee in its Developmental Studies Peer Review Report provided feedback and recommendations for improvement in assessment. List or accurately summarize all feedback and recommendations from the committee, and state whether they were implemented or will be implemented at a future date. If they were not or will not be implemented, please explain why. If no changes were recommended last year, simply state "No changes were recommended."

Feedback and Recommended Changes from the University Assessment Committee	Suggestions Implemented (Y/N)	Changes that Were or Will Be Implemented, or Rationale for Changes that Were Not Implemented
No changes were proposed to the Science Proficiency component.		

PART 4

Analysis of Evidence of Developmental Studies Student Learning Outcomes

For all student learning outcomes (as listed in Part 1 B above), describe the assessment measures and performance standards used, as well as the sampling methods and sample sizes. For each measure, document the results of the activity measured and draw relevant conclusions related to strengths and weaknesses of their performance.

A. Student Learning Outcomes	B. Assessment Measures	C. Performance Standards	D. Sampling Methods	E. Sample Size (N)	F. Results	G. Conclusions	H. Performance Standards Met (Y/N)
1. Students will demonstrate mastery of scientific principles necessary for entry-level collegiate study.	1a. Post-test in Science Proficiency	1a. 65% of the students taking both the pretest and the posttest will score at least 65% on the posttest.	1a. Pre- and Posttest data was collected from on ground sections in fall-2017. Mid-semester employee changes resulted in lack	1a. BIOL0123V n=11	1a. 10/11 students (90.9%) scored 65% or higher on the post test. This is a significant increase over the previously measured year (up from 55%)	1a. Although changes in the teaching staff generated challenges toward completing both the pre/post tests, we were able to demonstrate improvement over the previously measured cohort. Review of extracurricular materials continues.	1a. Y

A. Student Learning Outcomes	B. Assessment Measures	C. Performance Standards	D. Sampling Methods	E. Sample Size (N)	F. Results	G. Conclusions	H. Performance Standards Met (Y/N)
			of Spring 2018 data.				
	1b. Pre/Post Test in Science Proficiency	1b. 70% of the students taking both the pretest and the posttest in Science Proficiency will improve at least 30%.	1b. Pre- and Posttest data was collected from on ground sections in fall-2017.	1b. BIOL 0123 n=11	1b. 2/11 students (18.2%) improved their test score by more than 30%.	1b. This cohort demonstrated higher than normal pretest scores.(mean = 59.6%). Although only 2 students increased by 30% or higher, the cohort increased 16.6% (mean = 76.2%). Overall the cohort demonstrated significant improvement.	1b. N

PART 5

Proposed Instructional Changes Based on Conclusions Drawn from Evidence Presented Above

State any proposed instructional or assessment changes to be implemented for the next academic year. They should be based on conclusions reported in Part 4 (above) or on informal activities, such as faculty meetings and discussions, conferences, pilot projects, textbook adoption, new course proposals, curriculum modifications, etc. Explain the rationale for these changes and how they will impact student learning and other considerations, such as curriculum, degree plan, assessment process, or budget. If no changes are planned, simply state "No changes are planned."

Student Learning Outcomes	Instructional or Assessment Changes	Rationale for Changes	Impact of Planned Changes on Student Learning and Other Considerations.
No changes are planned.			

PART 6

Shared Pedagogical Insight that Improves Student Learning or Classroom Engagement

(OPTIONAL) If your department or a faculty member has developed a method or technique of teaching that seems especially effective in improving student learning or student engagement in the classroom, please provide a brief description below. More detail can be communicated during the face to face peer review session.

Description

PART 7 (A & B)

Assessment Measures and Faculty Participation

A. Assessment Measures:

1) How many different assessment measures were used? Two measures per course.

2) List the direct measures (see rubric): (1) Percentage of students passing the posttest at 65% or higher and (2) the percentage of students improving 30% from pretest to posttest in each of the three courses.

3) List the indirect measures (see rubric):

B.

1) Provide the names and signatures of all faculty members who contributed to this report and indicate their respective roles:

Faculty Members	Roles in the Assessment Process (e.g., collect data, analyze data, prepare report, review report, etc.)	Signatures
Emilie Shelton	Collected BIOL 0123 data	Not available
Dr. Jerry Bowen	Analyzed and Reviewed BIOL 0123 data Completed report	

2) Reviewed by:

Titles	Names	Signatures	Date
Department Head	Dr. Jerry Bowen		6/18/18
Dean	Dr. Keith Martin		6/18/18