1. What student learning outcomes were assessed this year, and why?

The Student Learning Outcome (SLO) that were assessed for the 2014 – 2015 academic year was the “Critical Thinking” outcome, specifically:

- Students will demonstrate the ability to use critical and creative thinking to solve problems.

The reason for selecting this outcome was twofold: (1) it is an important measure in the future success of our graduates, particularly with regard to the distinction that the CWU EMS Paramedicine Program has over other programs nationwide. Regulatory, accreditation, and certification agencies within the discipline of emergency medical services (EMS) have recently underscored the importance of this measure of competency within the profession, so much so that a new educational paradigm is being implemented nationwide to develop and measure this aspect of competency; and (2) this measure is important to assess the potential success of our student in our newly proposed curricula that invokes greater clinical autonomy and an expansion of healthcare into preventative and primary care areas. In order for our student to progress into the expanded roles of the evolving profession, they must demonstrate adequate problem-solving, deductive reasoning, critical thinking, and creative thinking abilities.

Measuring these SLOs will be accomplished by comparing individual student performances to established performance guidelines. These guidelines were developed by the national regulatory and credentialing agency of the National Registry of EMTs. The performance measurement instrument enables student performances to be quantitatively evaluated based upon specific (and standardized) criteria with numerical values assigned to each. As students perform tasks that require these critical thinking skills, the faculty member will document the degree of satisfaction with which the student met the prescribed performance measure using a numerical value. This process will enable a quantitative value of performance for each student as well as each class in aggregate form.

The University Strategic Core Themes to which these SLO assessments have applicability are:

- **Objective 1.1**: Enhance student success by continually improving the curricular, co-curricular, and extracurricular programs.
- **Objective 2.3**: Ensure that CWU has an inclusive and diverse curriculum.
- **Objective 4.1**: Enhance the commitment and the level of collaboration between the university and external communities.
By invoking the national standards and prescriptive goals of the NREMT, as well as the National Association of EMS Educators (NAEMSE), and the Committee on Accreditation of Educational Programs for the EMS Professions (CoAEMSP), the EMS Paramedicine Program at CWU is conforming to the mission and vision of the profession while promoting advancement and collaboration with these recognized entities. This places the Program, as well as the students, in a preferential advantage over other programs/students within the profession.

2. How were the student learning outcomes assessed?

   A) What methods were used?

   As mentioned, the students’ performances in team leadership, critical thinking, and problem-solving abilities are assessed using a standardized evaluative instrument that is developed by the NREMT. This assessment will enable numerical values for each student which can be collected in aggregate for each class and each academic year to measure trends and progression toward our benchmarks.

   In addition, students that have graduated and working within the EMS profession are evaluated through employer surveys. A portion of those survey inquiries include a valuation of each employee (CWU graduate) performance in clinical acumen, skill performance, and critical thinking and leadership potential.

   The in-class performance evaluations are conducted as a direct assessment, whereas the graduate-employer survey is an indirect assessment. In both cases, the measurement assesses both cognitive performance as well as attitude performance (in the form of leadership, critical thinking, and problem-solving potentials).

   In the classroom/practical psychomotor lab settings, the student benchmarks for the Program is 85%. For the graduate-employer survey responses, the benchmark is 70%. For the 2014-2015 academic year, the student cohort actual performance (in aggregate) for the in-class performance assessment was 100% and the graduate-employer survey performance was also 100% (in this instance, the employers rated each of the CWU graduates as either above average or excellent in their performances in order to achieve a satisfactory benchmark).

   In summary, 100% of our students in the 2014-2015 academic cohort performed to 100% of the assessment instruments (exceeding our 85% benchmark) and 100% of our graduates that year were evaluated by their employers as performing at “above average” or “exceptional” in the cognitive and affective domains of performance.

   B) Who was assessed?

   The students in the first year of the EMS Paramedicine major (the 2014 – 2015 cohort) were measured in the in-classroom performance assessment. This assessment evaluated cognitive performance (compliance to expected objectives), leadership performance (ability to
demonstrate satisfactory leadership potential based upon established standards), and critical-
thinking and problem-solving skills (ability to resolve unanticipated problems, correlate
findings, synthesize resolutions, etc.). The number of students in this cohort at the time of
measurement was 24.

In addition, the graduates of the previous cohort (2013 – 2014) were evaluated through the
graduate/employer surveys. This assessment utilized the employers to evaluate each graduate
in the areas of cognitive performance, team leadership, and critical thinking skills. The number
of graduates at the time of measurement was 21. The survey response rate for this group was
97.6%.

C) When was it assessed?

The assessments were conducted at two separate times and stages of educational progression.
The in-class student assessments that were conducted during the psychomotor lab sessions were
executed progressively through each academic quarter (formative) with a summative assessment
performed at the end of each quarter during the 2014 – 2015 academic year. In addition, the
cohort was also evaluated using a comprehensive final (summative) at the conclusion of the
academic year.

The graduate-employer surveys of the previous program cohort (2013 – 2014) were conducted in
November and December of 2015. These students remain as students in the major (second year
of the major, or seniors), have “graduated” from the certification portion of the major (first year
of the major), are working as paramedics while continuing their major requirements via an online
format.

3. What was learned?

The results of the assessments demonstrated unequivocally that our students are meeting the
Critical Thinking objective of “Students will demonstrate the ability to use critical and creative
thinking to solve problems.” We were able to verify, in the classroom, that our students are
performing to the expected national standard and that our graduates, in the workplace, were
meeting the expectations of their employers with regard to critical thinking, problem-solving,
and leadership performances.

To illustrate, the NREMT assessment instrument requires a total accumulated point value of
between 40 and 54 for each student per assessment. Our students consistently performed
between 50 and 54 on all of the assessments with nearly 87% scoring 54 on the assessment
instruments. The graduate/employer assessment cannot be analyzed with that level of detail;
however, 100% of the employer respondents scored our students in the “4” (above average) or
“5” (exceptional) range in a scale of 1 to 5 for each measure of performance in the cognitive and
affective domains. In both cases, the students outperformed our benchmarks and expectations
considerably.
These results suggest that our current methodologies of education with regard to students acquiring the skills necessary for critical thinking, problem-solving, and providing team leadership are successful and we should continue with our current plan.

4. What will the department or program do as a result of that information?

As mentioned above, the Program will continue with the current strategy to ensure that our students (graduates, in particular) will possess the necessary skills and abilities to perform exceptionally in critical thinking, problem-solving, and leadership domains.

The Program will continue to monitor the students’ progression in these areas on a continual basis, both for instructional adjustments as well as for programmatic success assessments. These assessments are required by the regulatory and accrediting standards and must be documented in the original format for each individual student. The results for each student are maintained in separate files for each student and are subject to review by the accreditation reviewers upon each site visit, as well as reported in aggregate form annually.

5. What did the department or program do in response to previous years’ assessment results, and what was the effect of those changes?

These results are consistent with previous academic year results and continue to demonstrate our effectiveness in these prescribed areas. No changes are deemed necessary at this time. No other actions will be taken other than to continue to monitor these performances with future cohorts.

6. Questions or suggestions? Contact Tom Henderson (henderst@cwu.edu) or Bret Smith (bpsmith@cwu.edu)

No questions or suggestions at this time.

Respectfully submitted,

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