University of La Verne

Capstone Assessment of University Values and Competencies: Lifelong Learning (Critical Thinking) Subsection SEPTEMBER 1, 2009



Prepared by: Educational Effectiveness Committee

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Note: This report presents the Lifelong Learning (Critical Thinking) subsection of findings of the full report available at: http://www.laverne.edu/institutional-research/assets/CAPSTONE-FULL-REPORT-08-09%20COMBINED.pdf.

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Purpose

The purpose of the capstone assessment project was to evaluate the extent to which the following learning outcomes and Mission elements are attained in capstone projects at the undergraduate, masters and doctoral levels institution-wide: Diversity and Community, Values Orientation, Life-long Learning (Critical Thinking), and Writing.

Method and Procedure

Through the office of Institutional Research a total random sample of 127 capstone projects were collected from across the university: 41 undergraduate senior projects/papers, 40 masters projects and 46 doctoral dissertations. Five different types of capstone projects were identified: 65 were empirical in nature, 22 were applied, 17 were theoretical, 1 was creative, and 19 were business strategic analyses. The projects were completed between 2006 and 2008, and came from three colleges: College of Arts and Sciences, College of Business and Public Management, and College of Education and Organizational Leadership.

Four learning outcomes were assessed: Diversity and Community, Values Orientation, Lifelong Learning (Critical Thinking) and Written Communication (Mechanics, Organization, Development of Thesis, Project Appropriate Formatting and Citation). Global rubrics accompanied by articulated criteria especially developed for different types of capstone projects addressing each of the learning outcomes were developed and used to assess the projects. The rubric ratings were made on a 4-point scale: 4=Accomplished, 3=Developed, 2=Developing, 1=Undeveloped.

A pilot study was conducted in the summer of 2008 that established the sensitivity of the rubrics to identify the variability in the projects, and reliably assess the degree to which the four learning outcomes were attained in capstone projects. Another sample of projects was collected in 2009 and compared to the 2008 pilot data. Showing no significant differences, the two samples were combined. Group comparisons were made among different degree levels (undergraduate, masters and doctoral) and different types of projects (empirical, applied and other types of projects that combined theoretical, creative and strategic analysis). If 70% or more of the projects received ratings of Accomplished or Developed on a particular learning outcome it was considered high level of attainment; between 50% and 69% was considered moderate level of attainment (needing improvement), and below 50% was considered low level of attainment (needing serious attention).

Findings

Lifelong Learning (Critical Thinking)

For the **overall sample** (N=127), the mean score on Lifelong Learning is 2.68 on a 4-point scale, and 60% of the projects are at the Accomplished and Developed levels. Mean comparisons of **degree levels** show that doctoral dissertations (3.3) are significantly higher than the undergraduate (2.0) and master's (2.8) projects, and the master's level projects are significantly higher than the undergraduate projects. Lifelong Learning skills are present in 89% of the doctoral projects at the Accomplished or Developed levels. However, 61% of masters and 27% of undergraduate projects are at the Accomplished or Developed levels. Mean comparisons of **Types of projects** show that the empirical projects (3.0) are significantly higher than other (2.2) types of projects, and the applied (3.0) projects are significantly higher than the other types of projects, and no different from empirical projects. Lifelong Learning skills are present in 69% of empirical projects at the Accomplished or Developed levels. And, 68% of applied and 41% of other projects are at the Accomplished or Developed levels. **In summary**, it appears that at the institutional level, doctoral dissertations and empirical projects reflect Lifelong Learning skills at high and moderate levels of attainment, respectively. Applied and masters projects show moderate levels of attainment. The other types of projects as well as undergraduate projects reflect Lifelong Learning skills at low levels of attainment.

Recommendations: (a) To improve the institutional level of attainment of the Lifelong Learning skills, as demonstrated in capstone projects, faculty in various colleges should develop action plans to address the issue in applied and other types of projects and in projects at the masters and undergraduate levels; (b) Individual departments across the university are encouraged to use the rubric and the articulated criteria for Lifelong Learning to continuously assess this learning outcome in their capstone courses.