

Biology | 2013-2014 Assessment Report

1. Please give a brief overview of the data you collected. This can be in any form you feel is appropriate, such as a table, a short narrative of results, statistical analysis, highlighting findings that were of particular interest, etc. In short, it doesn't matter how you submit your findings.

Cell Biology Lab (Biology 308, Professor Warren Johnson), Spring 2014

Students were assessed for their ability to perform and interpret the data for 1) colorimetric quantitative assays for protein, DNA, and RNA, 2) SDS-PAGE of protein samples, 3) Agarose Gel electrophoresis of nucleic acids, 4) stain and analyze blood cells, 5) prepare and analyze spinach chloroplasts, 6) prepare and analyze nucleosomes, and 7) perform a Western blot analysis of a protein sample. All 18 students in the course accomplished all seven of these at grade level A.

Advanced Microbiology Lab (Biology 402, Professor Brian Merkel), Spring 2014

Students were assessed for their ability to discuss, apply and interpret the data for 1) Mammalian cell culture system for evaluating T helper cell activation by B a lymphocyte hybridoma, 2) Mammalian cell culture system for measuring superoxide anion production by a human promyelocytic neutrophil cell line, 3) Enzyme-Linked Immunosorbent Assay (ELISA) for Interleukin 2 (IL-2), and 4) Identifying bacteria of clinical concern from the skin, throat, urine and gut of humans.

Achievement Level Number of Students Percentage of Students

Excellent	19	83
Very Good	3	13
Good	0	0
Above Average	0	0
Average	0	0
Below Average	0	0
Poor	1	4
Unacceptable	0	0

2. How will you use what you've learned from the data that was collected? The faculty will discuss the data during the fall of 2014. A plan will result from these discussions.