Physical Sciences GEN ED 1 Report 2014-15 (Brief)

Process

We used long answer form, pre- and post-assessments to investigate the student learning of course outcomes that relate to general education SLOs related to critical thinking in multiple sections of Chemistry 201 and Astronomy 201. We then used these assessments to identify common areas of growth.

Results

We identified two common areas of growth in which student's struggle with critical thinking: 1) Students attempt to answer questions using fact memorization instead of reasoning; 2) Students include irrelevant information in their reasoning.

Improvements

The faculty in the Department of Physical Sciences and Engineering collaborated to compile a list of teaching methods they use to promote critical thinking related to the areas of growth, as well as the resources that are available for all faculty to use in order to implement such strategies. We then outlined this information in a document that will be distributed to all faculty in the department.