

| Date: | | Program Name: | | CIP Code: | | | Department: | |
|------------------------|--|---|--|---|--|---|-------------|--|
| Domain | Program-Level Student Learning Outcome (From ALC or ALP) | Year 1 2019-2020 | Year 2 2020-2021 | Year 3 2021-2022 | Year 4 2022-2023 | Year 5 2023-2024 | | |
| Content | Demonstrate competence in practical aspects of chemistry, including: Laboratory skills, Selection and proper use of modern instruments, Proper calibration practices, and/or Computer-based data acquisition | | | Data Collection: CHM 3400C and CHM 3741L Measure: Instructor report/lab reports Gather baseline data | Reflect on results: CHM 3400C and CHM3741L Implement improvement decision | Data Collection: CHM 3400C and CHM 3741L Measure: Instructor report/lab reports Gather impact data | | |
| Communication | Communicate professionally about chemistry through writing in an accepted scientific format and orally in a public venue | Data Collection: CHM 4930 and CHM 4130 Measure: Student Presentation (rubric). Gather baseline data | Reflect on results: CHM 4930 and CHM 4130 Implement improvement decision | Data Collection: CHM 4930 and CHM 4130 Measure: Student Presentation (rubric). Gather impact data | | | | |
| Critical Thinking | Use chemical literature effectively and efficiently by demonstrating basic techniques in on-line searches for specific reference/review articles | | Data Collection: CHM 4611 and CHM 4930 Measure: Assignment (rubric) Gather baseline data | Reflect on results: CHM 4611 and CHM 4930 Implement improvement decision | Data Collection: CHM 4611 and CHM 4930 Measure: Assignment (rubric) Gather impact data | | | |
| Integrity / Values | Recognize ethical components in complex situations | | Data Collection: CHM 4931 and CHM 4455/L Measure: Student responses via writing and group discussions Gather baseline data | Reflect on results: CHM 4931 and CHM 4455/L Implement improvement decision | Data Collection: CHM 4931 and CHM 4455/L Measure: Student responses via writing and group discussions Gather impact data | | | |
| Project Management | Design and execute projects reasonably for available time constraints | Data Collection: CHM 3741L and CHM 4130L Measure: Lab report (rubric). Gather baseline data | Reflect on results: CHM 37141L and CHM 4130L Implement improvement decision | Data Collection: CHM 3741L and CHM 4130L Measure: Lab report (rubric). Gather impact data | | | | |
| Hazard/Risk Management | Handle hazardous materials safely | | | Data Collection: CHM 3740L and CHM 4610L Measure: Instructor feedback with pre/post assignment Gather baseline data | Reflect on results: CHM 3740L and CHM 4610L Implement improvement decision | Data Collection: CHM 3400C and CHM 4610L Measure: Instructor feedback with pre/post assignment Gather impact data | | |

Assessment Activity (Examples)

Gather baseline data
(Revise rubric; gather data)
Implement actions for improvement
Follow-up assessment (impact data)

Direct Measures:
Exam questions
Student paper (rubric)
Presentation (rubric)

Methods of Assessment

Indirect Measures:
Focus group
Exit interview
Alumni survey

External Direct Measures:
Supervisor/Employer feedback
External Professional Exam

Revised 30 July 2019