



CIST-210 – Emerging Technologies

Technology

Effective Term & Year: Fall 2024

Course Outline Review Date: 2029-03-01

Program Area: Information Technology

Description:

In this course students will study new and emerging technologies, and will examine how these technologies can change existing markets and development environments. Students will gain experience in working with software and/or hardware that can be classified as part of the emerging technology paradigm. This may include cloud computing, machine learning, virtualization technologies, or simulation technologies.

Program Information:

This course is required for the second year of the Computer Information Systems Technology program.

Delivery Methods: Hybrid – On-campus (Face-to-Face) and Online

Credit Type: College of the Rockies Credits

Credits: 3

Instructional Activity and Hours:

| Activity | Hours |
|---|-------|
| Classroom, Directed Studies or Online Instruction | 30 |
| Seminar/Tutorials | |
| Laboratory/Studio | 30 |
| Practicum/Field Experience | |

| | |
|-----------------------|-----------|
| Co-op/Work Experience | |
| Other | |
| Total | 60 |

Course Requisites:

- Completed the following:
 - [CIST106](#) – Programming in C++ (3)
 - [CIST107](#) – Introduction to Internet Programming and Web Applications (3)

Flexible Assessment: Yes

Students are able to request formal recognition of their prior learning or experience outside the classroom. Challenge examination, portfolio-assisted assessment, or work-based assessment are used to identify, assess, and recognize prior skills, competencies, and knowledge to achieve course credit. Tuition fees apply, refer to [Policy 2.5.5 Prior Learning Assessment and Recognition \(PLAR\)](#) or contact an education advisor for more information.

Course Transfer Credit:

For information about receiving transfer credit for courses taken at either British Columbia or Alberta institutions, please see <https://www.bctransferguide.ca/> or <https://transferalberta.alberta.ca> . For more transfer credit information, please visit <https://www.cotr.bc.ca/Transfer>

All requests for course transfer credit from institutions in British Columbia or elsewhere should go to the College of the Rockies Enrolment Services office.

Textbook Resources:

Textbook selection varies by instructor and may change from year to year. At the Course Outline Effective Date the following textbooks were in use:

N/A

Please see the instructor's syllabus or check COTR's online text calculator <https://textbook.cotr.bc.ca/> for a complete list of the currently required textbooks.

Learning Outcomes:

Upon the successful completion of this course, students will be able to

- explain the dynamics of emerging technologies;
- identify emerging technologies that are changing the marketplace;
- identify the processes required to implement emerging technologies;
- develop a plan for introducing a new technology in a simulated workplace setting; and
- implement the new technology in a simulated workplace setting.

Course Topics:

- The dynamics of emerging technologies
- Emerging technologies and marketplace
- Implementing emerging technologies
- Implementing the new technology in the simulated workplace setting

See instructor's syllabus for the detailed outline of weekly readings, activities and assignments.

Evaluation and Assessments

Assessment Type: On-Campus (face-to-face)

| Assessment Type | % of Total Grade |
|-------------------|------------------|
| Assignments – Lab | 20% |
| Project | 20% |
| Midterm Exam | 30% |
| Final Exam | 30% |
| Total | 100% |

Grade Scheme

| A+ | A | A- | B+ | B | B- | C+ | C | C- | D | F |
|------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-----|
| >=90 | 89-85 | 84-80 | 79-76 | 75-72 | 71-68 | 67-64 | 63-60 | 59-55 | 54-50 | <50 |

Evaluation Notes: A grade of "D" grants credit, but may not be sufficient as a prerequisite for sequential courses.

Evaluation Notes Comments:

Please see the instructor's syllabus for specific classroom policies related to this course, such as details of evaluation, penalties for late assignments and use of electronic aids.

Exam Attendance:

Students must attend all scheduled exams at the appointed time and place. Instructors may approve an alternate exam to accommodate an illness or personal crisis. Department heads will consider other written requests. Any student who misses a scheduled exam without prior approval will receive a “0” on the exam.

Academic Policies:

College of the Rockies policies related to courses can be found at <https://cotr.bc.ca/about-us/college-policies/> and include the following:

- Policy 2.1.4 Course Audit
 - Policy 2.4.1 Credential Framework
 - Policy 2.4.3 Students with Documented Disabilities
 - Policy 2.4.4 Student Rights, Responsibilities and Conduct
 - Policy 2.4.8 Academic Performance
 - Policy 2.4.9 Student Feedback and Concerns
 - Policy 2.4.11 Storage of Academic Works
 - Policy 2.5.3 Student Appeal
 - Policy 2.5.5 Prior Learning Assessment and Recognition (PLAR)
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Course Changes:

The College of the Rockies updates course outlines regularly to meet changing educational, employment and marketing needs. The instructor will notify students in writing of any updates to this outline during the semester. The instructor reserves the right to revise, add or delete material while meeting the learning outcomes of this course outline.