Instructional Technology Collaborative Programs

Fall 2024

- About the Collaborative Programs in Educational Technology
- Masters in Instructional Technology - 33 credits
- Educational Specialist in Instructional Technology - 30 credits
- Certificate in Classroom Technology Integration - 12 credits
- Certificate in Instructional Design - 12 credits
- Certificate in Computational Thinking for Educators - 12 credits
- Certificate in Library and Media Specialist - 15 credits

Instructions on How to Register

- Degree and Certificate Students
- Non-Degree Students

EDT 520: Digital Age Teaching and Learning Methods
Instructor: Mia Morrison

Format: 100% Online with some synchronous meetings
In this foundational course, students will explore how digital tools allow for new models of teaching and learning in diverse learning environments such as the traditional classroom setting, libraries, coaching models, and industry training. Students will engage in a critical review of how technology has been used, and explore current trends in educational settings. Students will discuss relevant theories of cognition, explore issues of access and equity, and consider how curriculum, instruction, and assessment might be designed with the support of technology. The learning environment for the course will model different engagement, instructional, and assessment strategies including readings, multiple modes of discussion and reflection, practical applications, design projects, and social networks.
Prerequisite: None

EDT 531: Studio in Computing for Learning
Instructor: Andrew Wallace

Format: 100% Online with some synchronous meetings
Maker spaces have proliferated in our schools, libraries, and elsewhere in our communities. Similarly, toys and kits for children now include programming, circuits, single-board computers, sensor kits, robotics, drones, and more. This course serves as an introduction to computational

thinking and computer science as both a delivery mechanism and a 21st century skill within all contexts of educational practice including classrooms, libraries, and additional diverse learning environments. This course will help students develop approaches and strategies for utilizing what have become consumer-level electronic and computational tools in problem- and project-based learning scenarios. Students will learn to help others engage with technology in the learning process as creators. In so doing, they will heighten their awareness of programming and the capacities of computer hardware.
Prerequisites: EDT 520 and matriculation in MED in IT, EdS, or Instructional Technology Graduate Certificate Programs; or instructor permission

EDT 541: Advanced Instructional Design
Instructor: Peter Schilling

Format: 100% Online with some synchronous meetings
This advanced course extends students' knowledge of the theory and practice of instructional design as well as introduces students to the practice of research in instructional design. Students will design original 2D and 3D models of physical spaces as well as plan types of instruction and learning that their designs would facilitate. Students will also work with technology mediated approaches to instruction and plan curricula that helps students master content and skills appropriate for the 21st Century information culture. Throughout, students will critically assess the efficacy of their own and each other's designs to meet learning objectives. The course will have synchronous and asynchronous elements. Students will also work independently as well as in small groups on projects.
Prerequisites: EDT 540 or Permission of Instructor

EDT 560: Assessment in the 21st Century Classroom
Instructor: Mia Morrison

Format: 100% Online with some synchronous meetings
In this course, students will first analyze traditional vocabulary used for assessment and learning. They will then consider the implications of integrating technology and digital assessment tools in the pK12 classroom, both positive and negative, to support knowledge acquisition, skill building and creativity. Students will look through a variety of lenses for students' understanding and assessment including ISTE, SAMR, and Bloom's among others.
Prerequisites: EDT 520 or permission of instructor.

EDT 563: Future Ready: Embedding Design Thinking in The Learning Process
Instructor: Daniel Ryder

Format: 100% Online with some synchronous meetings
As modern education grows complex, educators need strategies to inspire authentic learning experiences, to motivate colleagues and students, and to spark innovative solutions. Empathy fueled, human centered problem solving -- *design thinking* -- provides the mindset and framework for developing innovations at any scale and managing project based learning in any environment. This course provides a critical investigation into the principles of design thinking and how to apply them to your professional life. Participants will engage in iterative cycles of a design process and explore how both high- and low technologies can support the outcomes of design thinking.
Prerequisite: None

EDT 572 Teaching Programming in Multiple Paradigms
Instructor: Chris Bennett

Format: 100% Online
This course will introduce students to different programming languages from different paradigms and to appropriate strategies for teaching them. There will be an emphasis on computational problem solving and the key aspects of algorithm development. Students will create unit progressions that allow their learners to work collaboratively and inclusively. This course will consider inclusion in approaches to instruction and assessment.
Prerequisites: EDT 571 or Permission of Instructor

EDT 657: Educational Practicum
Instructor: Mia Morrison
Course Dates:
CRN:
Format: 100% Online with some synchronous meetings
This course is an alternative capstone experience for students in the Instructional Technology master's degree who choose not to seek the Maine Department of Education 680 endorsement prior to graduation. Students will develop and implement an approved project to include the following components: research review; application of research to practice; reflection; and presentation.
Prerequisites: Approval of Practicum Supervisor

LMS 515: Dynamic PK-12 Library Management
Instructor: Iris Eichenlaub

Format: 100% Online with some synchronous meetings
The course covers principles and processes underlying the successful administration of a school library including management, program development, and evaluation of contemporary school libraries. The course explores the changing roles and responsibilities of an effective and proactive school librarian. This course will explore the role of educational technology in the effective management of the PK-12 library.
Prerequisite: None

LMS 520: Digital Age Methods of Teaching in Library and Media Studies

Instructor: Mia Morrison

Format: 100% Online with some synchronous meetings
Library spaces have undergone tremendous change as a result of instructional technology. Using multiple modalities learners will engage with the critical review of various educational technology philosophy, pedagogy, strategies and tools for appropriateness in different library and media settings. Students will examine different digital platforms and apps , resources, and emerging technologies to design and adapt learning experiences for best engagement, encouragement of creativity, and learner ownership and growth
Prerequisite: Graduate Standing or Instructor Permission

LMS 598 (517): Digital Age Methods of Teaching in Library and Media Studies
Instructor: Paula Boyce

Format: 100% Online with some synchronous meetings
This course will be an overview of acquiring, promoting, and engaging with fiction and nonfiction literature appropriate for students in grades PK-12 in the school library. It will provide an in-depth exploration of literature for children and young adults within the context of school libraries. Developmental, cultural, and linguistic needs of all readers will be considered. School librarians as collaborators and literacy leaders will be emphasized.

Looking for a faculty member's email? https://online.umaine.edu/edtechfaculty/

Other Course Options

With permission students may take electives in programs such as Information Systems, Intermedia, Educational Leadership, Adult and Higher Education, Special Education or other fields relevant to professional goals. Speak with an advisor regarding goals and options. Please note that courses in other programs may use different delivery modalities than courses within the EDT program. Also, course prerequisites and capacity may impact ability to enroll in courses outside the EDT program.

- **Adult and Higher Education**
  - University of Maine https://umaine.edu/edhd/graduate/higher-education-masters-cas/
  - University of Southern Maine https://usm.maine.edu/adult-education
- **Educational Leadership**
  - University of Maine https://umaine.edu/edhd/graduate/educational-leadership-masters-cas/
  - University of Maine at Farmington http://www2.umf.maine.edu/gradstudies/courses/
  - University of Southern Maine https://usm.maine.edu/educational-leadership
- **Digital Curation** (Course Prefix DIG) http://digitalcuration.umaine.edu/
- **Information Systems** (Course Prefix SIE) https://umaine.edu/msis/curriculum-and-degree-requirements/

Intermedia (Course Prefix IMD) http://intermediamfa.org/program/curriculum/

- **Special Education**
    - University of Maine https://umaine.edu/edhd/graduate/special-education-masters-cas/
    - University of Maine at Farmington http://www2.umf.maine.edu/gradstudies/sparc/
    - University of Southern Maine https://usm.maine.edu/special-education