

# INSTRUCTIONAL TECHNOLOGY M.S.

Degree: Master of Science

<https://www.towson.edu/coe/departments/learning-technologies/grad/instructiontechms/>

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The Master of Science degree in Instructional Technology is an applied professional program that helps to educate leaders in three technology fields: training and development, school library media, and educational computing and media.

The Instructional Technology graduate program is intended for both current professionals in the fields of media, design, computing, education and libraries as well as those who are seeking advanced degrees and an upgrade in their skills and knowledge base related to technology. The program is hands-on and practical with a considerable focus of most courses being inventive and authentic learning projects.

Students select one of three concentrations. The first, Instructional Design and Development, offers a flexible program of study designed to develop instructional design and media-related competencies for those who wish to work in training or instructional settings in business, industry, government, the military or medical education. The second, School Library Media, meets the Maryland State Department of Education requirements for the Library Media Specialist Certification and is designed for students who wish to serve as directors of school library centers. The third, Educational Technology, is designed for those who wish to integrate technology into classroom teaching or to coordinate the planning and integration of educational technologies at the school, district or state level.

The program is most often completed by students on a part-time basis, although full-time study is encouraged. A majority of the graduate students in the Instructional Technology program are full-time working professionals who take classes in the late afternoon or early evening. Professionals seeking to advance or change careers comprise a substantial portion of the student population in the Instructional Technology program. These include students who intend to become school library media specialists, industry training specialists and leaders in educational computing and technology.

Please note that only one degree in Instructional Technology can be awarded; students who complete more than one concentration in Instructional Technology will earn only one degree.

This program is approved to be offered fully online. Both the Instructional Design and Development concentration and the Educational Technology

concentration are available to be taken fully online or face-to-face, with courses offered in synchronous and asynchronous formats.

## Requirements

### Admission Requirements

Application deadlines and a full listing of materials required for admission can be found on the website.

## Instructional Design and Development Concentration Requirements

### Non-Thesis Option (minimum 36 units)

Code	Title	Units
<b>Level I: Core</b>		
EDUC 755 or ISTD 663	ADULT LEARNING THEORIES INTRODUCTION TO LEARNING SCIENCES	3
ISTD 541	FOUNDATIONS IN LEARNING TECHNOLOGY AND DESIGN	3
ISTD 655	DEVELOPING DIGITAL MULTIMEDIA MATERIALS FOR LEARNING DESIGN	3
ISTD 667	INSTRUCTIONAL DESIGN AND DEVELOPMENT	3
<b>Level II: Advanced Core</b>		
ISTD 715	PROJECT MANAGEMENT	3
ISTD 767	ADVANCED INSTRUCTIONAL DESIGN AND DEVELOPMENT	3
<b>Level III: Research Core</b>		
EDUC 605	INFORMING EDUCATIONAL PRACTICE TO EFFECT CHANGE	3
ISTD 685	RESEARCH IN INSTRUCTIONAL TECHNOLOGY	3
ISTD 787 or ISTD 797	INSTRUCTIONAL TECHNOLOGY CAPSTONE GRADUATE INTERNSHIP IN INSTRUCTIONAL TECHNOLOGY	3
<b>Electives</b>		
Individually selected electives at the 600-700 level		9
<b>Total Units</b>		<b>36</b>

### Thesis Option (minimum 36 units)

Code	Title	Units
<b>Level I: Core</b>		
EDUC 755 or ISTD 663	ADULT LEARNING THEORIES INTRODUCTION TO LEARNING SCIENCES	3
ISTD 541	FOUNDATIONS IN LEARNING TECHNOLOGY AND DESIGN	3
ISTD 655	DEVELOPING DIGITAL MULTIMEDIA MATERIALS FOR LEARNING DESIGN	3
ISTD 667	INSTRUCTIONAL DESIGN AND DEVELOPMENT	3
<b>Level II: Advanced Core</b>		
ISTD 715	PROJECT MANAGEMENT	3
ISTD 767	ADVANCED INSTRUCTIONAL DESIGN AND DEVELOPMENT	3
<b>Level III: Research Core</b>		

EDUC 605	INFORMING EDUCATIONAL PRACTICE TO EFFECT CHANGE	3
ISTC 685	RESEARCH IN INSTRUCTIONAL TECHNOLOGY	3
ISTC 897 or ISTC 898	INSTRUCTIONAL TECHNOLOGY THESIS	6
<b>Electives</b>		
Individually selected electives at the 600-700 level		6
<b>Total Units</b>		<b>36</b>

## School Library Media Concentration Requirements

Prerequisites: Completion of the following courses or their equivalents:

Code	Title	Units
SCED 200	FOUNDATIONS OF EDUCATION	3
ISTC 301/501	INTEGRATING INSTRUCTIONAL TECHNOLOGY	3
PSYC 201	EDUCATIONAL PSYCHOLOGY	3
SPED 301	INTRODUCTION TO SPECIAL EDUCATION	3

### Thesis Option (minimum 36 units)

Code	Title	Units
<b>Level I</b>		
ISTC 615	COLLECTION DEVELOPMENT	3
ISTC 653	THE ORGANIZATION OF KNOWLEDGE	3
ISTC 667	INSTRUCTIONAL DESIGN AND DEVELOPMENT	3
<b>Level II</b>		
EDUC 717	CHILDREN'S LITERATURE AND OTHER MATERIALS FOR TEACHING READING	3
ISTC 541	FOUNDATIONS IN LEARNING TECHNOLOGY AND DESIGN	3
ISTC 651	INFORMATION LITERACY AND ACCESS	3
ISTC 702	EDUCATIONAL LEADERSHIP AND TECHNOLOGY	3
SCED 518	YOUNG ADULT LITERATURE	3
<b>Level III</b>		
ISTC 601	SCHOOL LIBRARY MEDIA ADMINISTRATION	3
ISTC 789	PRACTICUM AND PORTFOLIO IN SCHOOL LIBRARY MEDIA	3
ISTC 897	INSTRUCTIONAL TECHNOLOGY THESIS	6
<b>Total Units</b>		<b>36</b>

### Non-Thesis Option (minimum 36 units)

Code	Title	Units
<b>Level I</b>		
ISTC 615	COLLECTION DEVELOPMENT	3
ISTC 653	THE ORGANIZATION OF KNOWLEDGE	3
ISTC 667	INSTRUCTIONAL DESIGN AND DEVELOPMENT	3
<b>Level II</b>		

EDUC 717	CHILDREN'S LITERATURE AND OTHER MATERIALS FOR TEACHING READING	3
ISTC 541	FOUNDATIONS IN LEARNING TECHNOLOGY AND DESIGN	3
ISTC 651	INFORMATION LITERACY AND ACCESS	3
ISTC 702	EDUCATIONAL LEADERSHIP AND TECHNOLOGY	3
SCED 518	YOUNG ADULT LITERATURE	3
<b>Level III</b>		
ISTC 601	SCHOOL LIBRARY MEDIA ADMINISTRATION	3
ISTC 789	PRACTICUM AND PORTFOLIO IN SCHOOL LIBRARY MEDIA	3
ISTC 685	RESEARCH IN INSTRUCTIONAL TECHNOLOGY	3
Individually selected elective units at the 600-700 level		3
<b>Total Units</b>		<b>36</b>

## Educational Technology Concentration Requirements

### Thesis Option (minimum 36 units)

Code	Title	Units
<b>Level I: Core</b>		
ISTC 541	FOUNDATIONS IN LEARNING TECHNOLOGY AND DESIGN	3
ISTC 663	INTRODUCTION TO LEARNING SCIENCES	3
ISTC 667	INSTRUCTIONAL DESIGN AND DEVELOPMENT	3
<b>Level II: Advanced Core</b>		
ISTC 603	FOUNDATIONS OF DISTANCE EDUCATION	3
ISTC 702	EDUCATIONAL LEADERSHIP AND TECHNOLOGY	3
ISTC 731	THEORY AND PRACTICE FOR INTEGRATING DIGITAL RESOURCES INTO LEARNING AND TEACHING	3
<b>Level III: Electives</b>		
Individually selected electives at the 600-700 level (2)		6
<b>Level IV: Research Core</b>		
EDUC 605	INFORMING EDUCATIONAL PRACTICE TO EFFECT CHANGE	3
ISTC 685	RESEARCH IN INSTRUCTIONAL TECHNOLOGY	3
ISTC 897 or ISTC 898	INSTRUCTIONAL TECHNOLOGY THESIS	6
<b>Total Units</b>		<b>36</b>

### Non-Thesis Option (minimum 36 units)

Code	Title	Units
<b>Level I: Core</b>		
ISTC 541	FOUNDATIONS IN LEARNING TECHNOLOGY AND DESIGN	3
ISTC 663	INTRODUCTION TO LEARNING SCIENCES	3

ISTC 667	INSTRUCTIONAL DESIGN AND DEVELOPMENT	3
<b>Level II: Advanced Core</b>		
ISTC 603	FOUNDATIONS OF DISTANCE EDUCATION	3
ISTC 702	EDUCATIONAL LEADERSHIP AND TECHNOLOGY	3
ISTC 731	THEORY AND PRACTICE FOR INTEGRATING DIGITAL RESOURCES INTO LEARNING AND TEACHING	3
<b>Level III: Electives</b>		
Individually selected electives at the 600-700 level (3)		9
<b>Level IV: Research Core</b>		
EDUC 605	INFORMING EDUCATIONAL PRACTICE TO EFFECT CHANGE	3
ISTC 685	RESEARCH IN INSTRUCTIONAL TECHNOLOGY	3
ISTC 787	INSTRUCTIONAL TECHNOLOGY CAPSTONE	3
<b>Total Units</b>		<b>36</b>

## Learning Outcomes

### Educational Technology and Instructional Design and Development Concentrations:

1. Demonstrate knowledge of learning design principles and learning sciences in creating equitable, inclusive, and technology-enhanced learning content and environments.
2. Apply pedagogical, technological, ethical, and culturally responsive knowledge in creating emotionally safe learning environments for all students.
3. Apply innovative collaborative approaches and strategies to improve student learning and to enhance school effectiveness.
4. Show evidence of applying research-based practices, formal inquiry strategies, and research data to improve learning design and instruction.
5. Demonstrate leadership in planning and facilitating the use of technology in creating an equitable and inclusive learning environment.
6. Show evidence of advocating and modeling safe, ethical, and responsible digital behaviors in creating learning activities.

### School Library Media Concentration:

ALA/AASL/CAEP School Librarian Preparation Standards (2019)

These standards apply to the candidates preparing to develop and manage school library and information services:

#### Standard 1: The Learner and Learning

Candidates in school librarian preparation programs are effective educators who demonstrate an awareness of learners' development. Candidates promote cultural competence and respect for inclusiveness. Candidates integrate the National School Library Standards considering learner development, diversity, and differences while fostering a positive learning environment. Candidates impact student learning so that all learners are prepared for college, career, and life.

#### Standard 2: Planning for Instruction

Candidates in school librarian preparation programs collaborate with the learning community to strategically plan, deliver, and assess instruction. Candidates design culturally responsive learning experiences using a variety of instructional strategies and assessments that measure the impact on student learning. Candidates guide learners to reflect on their learning growth and their ethical use of information. Candidates use data and information to reflect on and revise the effectiveness of their instruction.

#### Standard 3: Knowledge and Application of Content

Candidates in school librarian preparation programs are knowledgeable in literature, digital and information literacies, and current instructional technologies. Candidates use their pedagogical skills to actively engage learners in the critical-thinking and inquiry process. Candidates use a variety of strategies to foster the development of ethical digital citizens and motivated readers.

#### Standard 4: Organization and Access

Candidates in school librarian preparation programs model, facilitate, and advocate for equitable access to and the ethical use of resources in a variety of formats. Candidates demonstrate their ability to develop, curate, organize, and manage a collection of resources to assert their commitment to the diverse needs and interests of the global society. Candidates make effective use of data and other forms of evidence to evaluate and inform decisions about library policies, resources, and services.

#### Standard 5: Leadership, Advocacy, and Professional Responsibility

Candidates in school librarian preparation programs are actively engaged in leadership, collaboration, advocacy, and professional networking. Candidates participate in and lead ongoing professional learning. Candidates advocate for effective school libraries to benefit all learners. Candidates conduct themselves according to the ethical principles of the library and information profession.