



**College of Education and Human Development  
Division of Special Education and disAbility Research**

Spring 2016

EDSE 517 690: Computer Applications for Special Populations

CRN: 21075, 3 - Credits

<b>Instructor:</b> Dr. Kristine Neuber	<b>Meeting Dates:</b> 01/14/16 - 03/17/16
<b>Phone:</b> 703-993-5254	<b>Meeting Day(s):</b> Asynchronous
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<b>Office Hours:</b> By Appointment	<b>Meeting Location:</b> NET

***Note:** This syllabus may change according to class needs. Students will be advised of any changes immediately through George Mason e-mail and/or through Blackboard.*

**Course Description**

Lecture and laboratory course for teachers of special populations in applications of computer technology for instructional programs and computer skills. Students learn to use computer technology designed for special populations.

Hours of Lecture or Seminar per week: 3

Hours of Lab or Studio per week: 0

**Prerequisite(s):** Graduate standing, or permission of instructor

**Co-requisite(s):** None

**Advising Contact Information**

Please make sure that you are being advised on a regular basis as to your status and progress through your program. Mason M.Ed. and Certificate students should contact the Special Education Advising Office at (703) 993-3670 for assistance. All other students should refer to their faculty advisor.

**Nature of Course Delivery**

Learning activities include the following:

1. Learning modules lectures, discussion, activities, and participation.
2. Software and hardware demonstrations
3. Video and other media supports
4. Group and independent laboratory exploration activities
5. Class presentations

### **DELIVERY METHOD:**

This course will be delivered online using an **asynchronous** format via the Blackboard learning management system (LMS) housed in the MyMason portal. You will log in to the Blackboard course site using your Mason email name (everything before “@masonlive.gmu.edu) and email password. The course site will be available on **Monday January 11, 2016**.

### **TECHNICAL REQUIREMENTS:**

To participate in this course, students will need the following resources:

- High-speed Internet access with a standard up-to-date browser, either Internet Explorer or Mozilla Firefox. Opera and Safari are not compatible with Blackboard;
- Consistent and reliable access to their GMU email and Blackboard, as these are the official methods of communication for this course
- Students may be asked to create logins and passwords on supplemental websites and/or to download trial software to their computer or tablet as part of the course requirements.
- The following software plug-ins for Pcs and Macs respectively, available for free downloading by clicking on the link next to each plug-in:
  - Adobe Acrobat Reader: <http://get.adobe.com/reader/>
  - Windows Media Player: <http://windows.microsoft.com/en-US/windows/downloads/windows-media-player>
  - Apple QuickTime Player: [www.apple.com/quicktime/download/](http://www.apple.com/quicktime/download/)
- A headset microphone for use with the Blackboard Collaborate web conferencing tool

### **EXPECTATIONS:**

- **Course Week:**
  - **Asynchronous:** Because online courses do not have a “fixed” meeting day, our online course modules will typically start on **Monday**, and **finish** on **Sunday**. **Dates are specifically listed in the Course Schedule on the last page of this document.**
- **Log-in Frequency:** Refer to the asynchronous bullet below is your course is asynchronous or the synchronous bullet if your course is synchronous.
  - **Asynchronous:** Students must actively check the course Blackboard site and their GMU email for communications from the instructor, at a minimum this should be 2 times per week.

- **Participation:** Students are expected to actively engage in all course activities throughout the semester, which include viewing of all course materials, completing course activities and assignments, and participating in course discussions and group interactions.
- **Technical Competence:** Students are expected to demonstrate competence in the use of all course technology. Students are expected to seek assistance if they are struggling with technical components of the course. Contact ITU (<http://itservices.gmu.edu/help.cfm>) at (703) 993-8870 or [support@gmu.edu](mailto:support@gmu.edu).
- **Technical Issues:** Students should expect that they could experience some technical difficulties at some point in the semester and should, therefore, budget their time accordingly. Late work will not be accepted based on individual technical issues.
- **Workload:** Expect to log in to this course **at least two times a week** to read announcements, participate in the discussions, and work on course materials. Remember, this course is **not** self-paced. There are **specific deadlines** and **due dates** listed in the **CLASS SCHEDULE** section of this syllabus to which you are expected to adhere. It is the student's responsibility to keep track of the weekly course schedule of topics, readings, activities and assignments due.

**Netiquette:** Our goal is to be **collaborative**, not combative. Experience shows that even an innocent remark in the online environment can be misconstrued. I suggest that you always re-read your responses carefully before you post them to encourage others from taking them as personal attacks. **Be positive in your approach to others and diplomatic with your words.** I will do the same. Remember, you are not competing with each other but sharing information and learning from one another as well as from the instructor.

### **Learner Outcomes**

Upon completion of this course, students will be able to:

- Demonstrate an understanding of the history of assistive technology.
- Describe and implement a comprehensive set of procedures for software review and evaluation for specific populations.
- Describe and utilize key devices and software tools designed to help individuals with disabilities in educational settings including learning, physical, sensory, and intellectual disabilities.
- Describe key features in selecting and using an augmentative and alternative communication device for an individual
- Define the issues related to the accessibility of the Internet by individuals with disabilities.
- Evaluate and select appropriate web-based activities for individuals with disabilities.

- Adapt and modify general education curriculum and class activities using assistive technology to meet the needs of diverse learners.
- Design an appropriate technology integrated lesson plan for a specific special education population.

### **Required Textbooks**

Dell, A.G., Newton, D., & Petroff, J. (2012). *Assistive technology in the classroom: Enhancing the school experiences of students with disabilities (2nd ed)*. Upper Saddle River, NJ: Pearson.

### **Digital Library**

Effective summer 2015, the Division of Special Education and disAbility Research will discontinue the use of the Pearson Digital Library. No further registrations will be accepted. Students who hold current subscriptions will continue to have access to the library for the remainder of their subscription time. However, no further updates will be made to the digital library. During this time, should a textbook be revised or a new book is adopted for a class where the text is included in the digital library, Pearson will have options available to you and will provide you with an individual e-text or, if there is no e-text, a printed copy. Students, who have purchased a 3-year subscription directly through Pearson Education, will also have an option to obtain a prorated refund. However, 3-year subscription access cards purchased via the GMU bookstore will need to speak with a George Mason Bookstore Representative. Please be aware that the issuance of a refund, in this case, is at the discretion of the George Mason bookstore. Concerns or questions may be directed to Molly Haines at [Molly.Haines@pearson.com](mailto:Molly.Haines@pearson.com).

### **Required Resources**

- Students are required to have consistent and reliable access to a computer with a high-speed internet connection.
- Students may be asked to create logins and passwords on supplemental websites and/or to download trial software to their computer or tablet as part of the course requirements.
- Students are required to have a computer microphone and computer webcam.

### **Course Relationships to Program Goals and Professional Organizations**

This course is part of the George Mason University, Graduate School of Education (GSE), Masters in Special Education Program. This program complies with the standards for teacher licensure established by the Council for Exceptional Children (CEC), the major special education professional organization. The CEC standards that will be addressed in this class include Standard 2: Learning environments; Standard 5: Instructional planning and strategies.

### **GMU Policies and Resources for Students:**

- a. Students must adhere to the guidelines of the George Mason University Honor Code [See <http://oai.gmu.edu/the-mason-honor-code/>].
- b. Students must follow the university policy for Responsible Use of Computing [See <http://universitypolicy.gmu.edu/policies/responsible-use-of-computing/>].
- c. Students are responsible for the content of university communications sent to their George Mason University email account and are required to activate their account and check it regularly. All communication from the university, college, school, and program will be sent to students solely through their Mason email account.
- d. The George Mason University Counseling and Psychological Services (CAPS) staff consists of professional counseling and clinical psychologists, social workers, and counselors who offer a wide range of services (e.g., individual and group counseling, workshops and outreach programs) to enhance students' personal experience and academic performance [See <http://caps.gmu.edu/>].
- e. Students with disabilities who seek accommodations in a course must be registered with George Mason University Disability Services and inform their instructor, in writing, as soon as possible. Approved accommodations will begin at the time the written letter from Disability Services is received by the instructor. <http://ods.gmu.edu/>.
- f. Students must follow the university policy stating that all sound emitting devices shall be turned off during class unless otherwise authorized by the instructor.
- g. The George Mason University Writing Center staff provides a variety of resources and services (e.g., tutoring, workshops, writing guides, handbooks) intended to support students as they work to construct and share knowledge through writing [See <http://writingcenter.gmu.edu/>].

### **Professional Dispositions**

Students are expected to exhibit professional behaviors and dispositions at all times.

### **Core Values Commitment**

The College of Education & Human Development is committed to collaboration, ethical leadership, innovation, research-based practice, and social justice. Students are expected to adhere to these principles. [See <http://cehd.gmu.edu/values/>]

For additional information on the College of Education and Human Development, Graduate School of Education, please visit our website [See <http://gse.gmu.edu/>]

### **Course Policies & Expectations**

*Attendance.*

Students are expected to actively engage in all course activities throughout the semester, which include viewing of all course materials, completing course activities and assignments, and participating in course discussions and group interactions. Grading for work completed in Lectures and Labs is specifically outlined in *Lessons and Labs Participation* within the Other Assignments section of the syllabus. Please note that while only certain learning elements are assessed through “grades”, the instructor can still assess student involvement and engagement using other measures. Blackboard enables the instructor to view such data as login dates, duration of time spent online, access to specific content elements, and more. The instructor will use this data along with course grades to ensure that students are actively engaged in the course. Students struggling to complete work on time or who appear to not be engaging with course content will be asked to conference with the instructor.

*Late Work.*

**All activities and assignments should be submitted through Blackboard by 11:59pm on the due dates indicated.**

#### Module Lessons and Labs

As specified in the *Lessons and Labs Participation* within the Assignments section of the syllabus, all activities must be completed by the specified due date to receive participation points for each Lesson and Lab. Late work will not receive credit. The instructor recognizes that unexpected challenges may arise during the semester and, therefore, will allow students to request a **one-time** extension that they can apply to:

- One specific Lesson (such as physical disabilities lesson) and another for a specific Lab (such as AT for Writing lab). But NOT an entire Unit.
- Students must request the extension by emailing the instructor **prior** to the original due date; requests made after 11:59pm on the specified due date will not be honored.
- Students do not need to receive confirmation from the instructor to assume they have received the extension; it will be automatic as long as it is the first request.
- The deadline for extended work will be the Sunday following the original due date by 11:59pm. All extensions will be tracked in the Blackboard gradebook.

#### Course Assignments (Software Review, Technology Tools, Lesson Plan)

In fairness to students who make the effort to submit assignments on time, there will be a 10% cost reduction per day for late papers. (For example, a 20 point assignment will lose 2 points per day while a 50 point assignment will lose 5 points per day.)

All assignments should reflect graduate-level spelling, syntax, and grammar. If you experience difficulties with the writing process you will need to document your work with the GMU Writing Center during this course to improve your skills. At the instructor’s discretion, students may be given the opportunity to resubmit an assignment. Resubmitted assignments are not eligible for full credit.

## **Tk20 Performance-Based Assessment Submission Requirement**

Every student registered for any Special Education course with a required performance-based assessment is required to submit the *Assistive/Instructional Technology Lesson* to Tk20 through Blackboard (regardless of whether the student is taking the course as an elective, a onetime course or as part of an undergraduate minor). Evaluation of the performance-based assessment by the course instructor will also be completed in Tk20 through Blackboard. Failure to submit the assessment to Tk20 (through Blackboard) will result in the course instructor reporting the course grade as Incomplete (IN). Unless the IN grade is changed upon completion of the required Tk20 submission, the IN will convert to an F nine weeks into the following semester.

## **Grading Scale**

95-100 = A	80-82 = B-
90-94 = A-	70-79 = C
86-89 = B+	< 70 = F
83-85 = B	

## **Assignments**

### **Performance-based Assessment (TK20 submission required).**

The TK 20 assignment for this course is the *Assistive/Instructional Technology Lesson*. Please see the *Other Assignments* section for assignment description.

### **Performance-based Common Assignments (No TK20 submission required).**

Courses with multiple sections often require "common" assignments across sections to ensure consistency in instruction and learning. This course does not require the use of common assignment(s). All course assignments are outlined in the *Other Assignments* section.

## **Other Assignments.**

### **1. Lesson and Lab Participation (40 points; 20 points for Lessons, 20 points for Labs)**

Students are expected to complete activities within the Lesson module and the corresponding Lab module for a specified topic. A Lesson module generally contains readings, videos, and activities that introduce a specific topic. A Lab module generally provides tool demonstrations, user perspectives/experiences, and

opportunity for tool exploration based on a specific topic. Over the course of the semester students are expected to complete 10 Lesson and 10 Lab modules.

Within any specific Lesson or Lab module, students will be presented with a series of activities. Some activities such as viewing a video or reading a chapter in the textbook are categorized as “Read/View”. Other activities such as taking a quiz are categorized as “Complete”. All activities identified as “Complete” must be submitted on-time and be of satisfactory quality to receive participation points for that module. Credit will not be given for partial or late submissions. Please note that while “Read/View” activities are not “graded”, access to them is being tracked through Blackboard and the content is assessed through additional course assignments.

Students will complete Lesson modules across the entire semester (10 Lessons total).

- Students who successfully complete 10 Lesson modules earn 20 points.
- Students who successfully complete 9 Lesson modules earn 17 points.
- Students who successfully complete 8 Lesson modules earn 14 points.
- Students who successfully complete 0-7 Lesson modules earn 0 points.

Students will complete Lab modules across the entire semester (10 Labs total).

- Students who successfully complete 10 Lab modules earn 20 points.
- Students who successfully complete 9 Lab modules earn 17 points.
- Students who successfully complete 8 Lab modules earn 14 points.
- Students who successfully complete 0-7 Lab modules earn 0 points.

All participation points are tracked in the Blackboard gradebook.

The Lesson and Lab modules are organized by module topics and are grouped into 4 larger UNITS based on release date. Units (with all included activities) will become available by 4:30 pm on the specified date stated in the syllabus. All unit activities and course assignments are due by 11:59pm on the scheduled due date stated in the syllabus. Students who submit work on-time and of satisfactory quality will receive full participation points.

2. **Software Review (10 points)** Students will choose a piece of educational software (or mobile app) of interest to review; it should be a recent version. The software review consists of a detailed evaluation checklist. The checklist includes areas for detailed comments and narrative explanations. It will take a significant amount of time to complete the checklist accurately. Students may not review a productivity/utility software program designed to create content (such as Boardmaker, Word, Inspiration/Kidspiration) for this assignment. Please refer to the scoring rubric posted on Blackboard for additional information on this assignment. **(Due January 31)**
3. **Technology Tools Assignment (15 points).** Students will select a broad technology category to research, describe, and analyze based on the needs of an actual student or developed case study. A list of technology categories (i.e. word prediction) will be provided by the instructor. Students will then select two specific technologies within their category (e.g. CoWriter and TextHelp) as part of their analysis. In a 3-4 page paper,

students should provide a description of the overall technology including its intended purpose, audience, and important features. Students then should provide a brief description of each specific technology they have selected along with a comparison of product similarities and differences. Finally the paper should include a recommendation for one of the specific technologies based on the needs of a real client or an invented scenario. Please note: it is anticipated that students will use the Internet and/or product catalogs to obtain product information and descriptions, however students are expected to reference such information using proper APA (6<sup>th</sup> Edition) format including correct referencing both within the narrative and in the reference list. Please refer to the scoring rubric posted on Blackboard for additional information on this assignment. **(Due March 6)**

4. **Assistive/Instructional Technology Lesson (35 points)** Students will design an interactive computer-based lesson that has been adapted for a specific population and includes on-line and off-line products. This lesson should integrate instructional and assistive technology and should engage students actively with the technology. Students will write a lesson plan in paragraph or bulleted format addressing all the required elements provided by the instructor and create an online and off-line product to be used in the lesson. Students will present the lesson and their products during the last week of class. Please refer to the scoring rubric posted on Blackboard for additional information on this assignment. **(Topic Proposal Due February 28, Presentation for Peer Review Due March 13, Narrative and Materials Due March 17,)**

## Schedule

UNIT	Module Available*	Module Topics	Module Due**	Additional Assignments Due**
1	1/14	Course Orientation ( <b>Available 1/11</b> )	1/31	<b>Software Evaluation Checklist Due Sunday January 31</b>
		Lesson and Lab: Introduction to AT		
		Lesson and Lab: Teacher Productivity Tools		
2	2/1	Lesson and Lab: AT for Students with Learning Disabilities-Reading Tools	2/14	<b>Final Project Proposal Due February 28</b>
		Lesson and Lab: AT for Students with Learning Disabilities -Writing Tools		
		Lesson and Lab: AT for Students with Physical Disabilities		
3	2/15	Lesson and Lab: Augmentative and Alternative Communication	2/28	
		Lesson and Lab: AT for Students with Vision & Hearing Impairments		
4	2/29	Lesson and Lab: Math, Science and Social Studies <b>NOTE: This module is scheduled for one week</b>	3/6	<b>AT Tools Assignment Due Sunday March 6</b>
Final Project	3/7	Final Project Preparation and completion Course Evaluations  <b>Please note:</b> You will receive a notification to your GMU email when the official course evaluation is available for this course. You will have 5 days to complete the evaluation. The release date for the evaluation is not in our control.	3/17	<b>Post Final Project Presentation Sunday March 13</b>  <b>Post Final Project Paper &amp; Online/Offline Project by March 17</b>

\*Modules will be made available by 4:30 pm on the scheduled availability date. \*\* All module activities and course assignments are due by 11:59 pm on the scheduled due date.

## Appendix