Sul Ross State University

Department of Education

EDUA/EDSR 6381 -Critical Issues in Educational Technology

Summer 2025

Instructor: Brenda Quintanilla, PhD.

Email: brenda.quintanilla@sulross.edu

Summer Virtual Office Hours via Microsoft TEAMS

Course Description:

(3-0) Students will examine their role as the agent of change and how that role affects and influences the diffusion of technology and the delivery of its services in setting. Probable sociological, financial, and educational implications of the application of change will be examined, as well as approaches to reduce the occurrence of undesirable consequences.

Marketable Skills:

The marketable skills focus on the 4C's of 21st Century Skills to include the following 21st century literacies.

Critical Thinking: Students will analyze data, locate solutions to problems, and communicate solutions using a variety of mediums.

Creativity: Students will leverage innovative approaches to think outside the box during problem solving.

Collaboration: Students will apply collaborative workflows when working with others because it is inherent in the nature of how work is accomplished in our civic and workforce lives.

Communication: Students will leverage digital technologies to express thoughts clearly, crisply articulate opinions, communicate coherent instructions, motivate others through powerful speech, visual literacy and academic writing.

Citation

National Education Association. (2012). Preparing 21st century students for a global society: An educator's guide to "the four Cs." Washington, DC. Retrieved from http://www.nea.org/assets/docs/A-Guide-to-Four-Cs.pdf

The ISTE Standards are a framework for innovation in education. These standards help educators and education leaders worldwide prepare learners to thrive in work and life. (www.iste.org/standards)

ISTE Standards for Educators

1. Learner: 1a, 1b, 1c

2. Leader: 2a, 2b, 2c
3. Citizen: 3a, 3b, 3c,
4. Collaborator: 4a, 4b, 4c, 4d
5. Designer: 5a, 5b, 5c
6. Facilitator: 6b, 6c, 6d
7. Analyst: 7a, 7b, 7c

ISTE Standards for Coaches

1. Change Agent: 1b, 1d, 1e
2. Connected Learner: 2b, 2c
3. Collaborator: 3b, 3c,
4. Learning Designer: 4a, 4b, 4c, 4d
5. Professional Learning Facilitator: 5a, 5b, 5c
6. Data-Driven Decision-Maker: 6a, 6b, 6c
7. Digital Citizen Advocate: 7a, 7b, 7c, 7d

ISTE Standards for Educational Leaders

1. Equity and Citizenship Advocate: 1a, 1b, 1c, 1d
3. Empowering Leader: 3a, 3b, 3c, 3d
4. Systems Designer:
5. Connected Learner: 5a, 5b, 5c, 5d

ISTE Standards for Administrators

1. Visionary Leadership: 1a, 1b
2. Digital Age Learning Culture: 2a, 2b, 2c, 2d, 2e
3. Excellence in Professional Practice: 3a, 3b, 3c, 3d
4. Systemic Improvement: 4a, 4b, 4d, 4e
5. Digital Citizenship: 5a, 5b, 5c, 5d

Required Textbook: None-provided by instructor (Open Resources Standards Rubric)

Program SLO Goals:

- Design authentic, learner-driven activities and environments that recognize and accommodate learner variability and accessibility. Students will be able to identify common barriers and issues surrounding improper implementation of technological tools in the educational setting, workplace, and/or professional environments.

Assessments: Digital Portfolio and Case Study

- Effectively model the International Society of Technology Education standards and good digital citizenship to inspire learners to use and integrate technology to create equitable and ongoing access to high-quality learning in an educational setting.

Assessments: Digital Portfolio, Blog, Case Study

- Plan, provide and evaluate the impact of professional learning for professionals and leaders to use technology to advance teaching and learning in an educational setting. Students will use the use both qualitative and quantitative data to inform their own instruction and professional learning.

Assessments: Digital Portfolio, Blog and Case Study

- Understand and apply learning theoretical frameworks and instructional methods to instructional design to facilitate engagement, systemic development, and authentic learning experiences.

Assessments: Digital Portfolio and Case Study

Class will address the following Student Learning Outcomes (SLOs):

This course is designed as an introduction to the field of instructional design and technology.

By the end of the course, students will be able to:

- Discuss the role of technology in educational settings
- Demonstrate an ability to question and critic technology adoption and utilization in an educational setting
- Demonstrate an understanding of the social, cultural, economic, and political context(s) technology decisions are made
- Demonstrate an understanding of the social, cultural, economic, and political effects technology adoption or non-adoption has in educational settings
- Discuss an agent's affects and influences on the diffusion of technology and the delivery of its services in an educational setting.

Required Readings: Provided in Blackboard Course (see reference page)

Requirements:

Students will:

- Participate and collaborate in online discussions, assignments, and activities
- Utilize Blackboard on the SRSU website to fulfill course requirements
- Utilize Voicethread links to participate in oral discussions
- Practice professional conduct and ethics and respectful learning exchanges
- Preserve confidentiality of information shared regarding student, family, or school district experiences
- Turn in assignments on or before the due day or be subject to a 5% reduction in grade for each day assignment is late

Course Requirements:

- Participation
    - Students should refer to the *Online Absence Policy* posted in Blackboard under the tab Course Information regarding participation in an online course.
- Daily Readings
    - We will be covering an enormous amount of information in a **VERY** short amount of time because this is 40-day accelerated course. A large part of the

graduate student responsibility in this course will be to devote time to the course information. Please note which and what information will be covered and read ahead to keep up with the rigorous pace of the course.

Grading Policy: All assignments are due on the date posted. Late work WILL NOT be accepted! The only exception to this is medical emergencies (doctor excuse required) or family death (your name must be listed in the obituary).

Assignments	Number	Points	Total
Introductory Discussion	1	25	25
Academic Honesty Assignment	1	25	25
Syllabus Quiz	1	25	25
Blog Posts/Peer Reviews	4	25	100
VoiceThread/Paralay AI/Flip Oral Discussions	4	50	200
Final Project Prep	1	25	25
Final Project	1	100	100
			500

There are 500 points total possible in the course. 450-500 is the A range, 400-449.9 is the B range, 350-399.9 is the C range, 300-349.9 is the D range, and below 300 is an F.

Course Schedule: *All assignments are due on the scheduled date no later than 11:59 pm CST.*

	ASSIGNED WORK	Due Date by:
Unit 0	Course Information & Start Here (Introduce yourself using a 3D Avatar)	July 8
Unit 1	Critical Theory & Critical Issues Post COVID. (Readings, Video & Blog 1)	July 10
Unit 2	Artificial Intelligence/Big Data Introduction, Data Security/Privacy, Data Definitions, Systems, & Analytics (Videos, Readings & Blog 2)	July 13
	Oral Discussion #1	July 17

Unit 3	Bandwidth & Second Level Digital Divide Post COVID (Videos, Readings, Blog 3)	July 21
	Oral Discussion #2	July 24
	Project Preparation #1	July 24
Unit 4	Instruction Innovation, Learning Management Systems & New Learning Models: Competency-Based Learning (Readings)	July 29
Unit 5	E-Learning Support & Digital Literacy (Readings)	July 29
	Oral Discussion #3	July 1
Unit 6	Artificial Intelligence (Readings & Blog 4)	August 2
	Project Prep #2	August 5
Unit 7	Education and Technology: Where Now? (Readings)	August 5
	Oral Discussion #4	August 10
Capstone Artifact	Final Project: 6 Technology Challenges Facing Education	August 13

AI/ChatGPT: Students must obtain permission from me before using AI composition software (like ChatGPT) for any assignments in this course. Using these tools without my permission puts your academic integrity at risk.

COPYRIGHT NOTICE:

My lectures and course materials, including PowerPoint presentations, tests, outlines, and similar materials, are protected by copyright. I am the exclusive owner of copyright in those materials I create. You may take notes and make copies of course materials for your own use. You may not and may not allow others to reproduce or distribute lecture notes and course materials publicly whether or not a fee is charged without my express written consent. Similarly, you own copyright in your original papers and exam essays. If I am interested in posting your answers or papers on the course website, I will ask for your written permission. ©2020

ADA Statement

SRSU Accessibility Services. Sul Ross State University (SRSU) is committed to equal access in compliance with the Americans with Disabilities Act of 1973. It is SRSU policy to provide reasonable accommodations to students with documented disabilities. It is the student's responsibility to initiate a request each semester for each class. Students seeking accessibility/accommodations services must contact Mrs. Mary Schwartze Grisham, LPC, SRSU's Accessibility Services Director or Ronnie Harris, LPC, Counselor, at 432-837-8203 or email mschwartze@sulross.edu or ronnie.harris@sulross.edu. RGC students can also contact Alejandra Valdez, at 830-758-5006 or email alejandra.valdez@sulross.edu. Our office is located on the first floor of Ferguson Hall, room 112, and our mailing address is P.O. Box C122, Sul Ross State University, Alpine. Texas, 79832.

SRSU Distance Education Statement

Students enrolled in distance education courses have equal access to the university's academic support services, such as library resources, online databases, and instructional technology support. For more information about accessing these resources, visit the SRSU website.

Students should correspond using Sul Ross email accounts and submit online assignments through Blackboard, which requires a secure login. Students enrolled in distance education courses at Sul Ross are expected to adhere to all policies pertaining to academic honesty and appropriate student conduct, as described in the student handbook. Students in web-based courses must maintain appropriate equipment and software, according to the needs and requirements of the course, as outlined on the SRSU website. Directions for filing a student complaint are located in the student handbook.

Libraries

The Bryan Wildenthal Memorial Library in Alpine offers FREE resources and services to the entire SRSU community. Access and borrow books, articles, and more by visiting the library's website, library.sulross.edu/. Off-campus access requires logging in with your LobolD and password. Librarians are a tremendous resource for your coursework and can be reached in person, by email (srsulibrary@sulross.edu), or by phone (432-837-8123). No matter where you are based, public libraries and many academic and special libraries welcome the general public into their spaces for study. SRSU TexShare Cardholders can access additional services and resources at various libraries across Texas. Learn more about the TexShare program by visiting library.sulross.edu/find-and-borrow/texshare/ or ask a librarian by emailing srsulibrary@sulross.edu.

New for Fall 2023: Mike Fernandez, SRSU Librarian, is based in Eagle Pass (Building D-129) to offer specialized library services to students, faculty, and staff. Utilize free services such as InterLibrary Loan (ILL) and ScanIt to get materials delivered to you at home or via email.

Academic Integrity

Students in this class are expected to demonstrate scholarly behavior and academic honesty in the use of intellectual property. Students should submit work that is their own and avoid the temptation to engage in behaviors that violate academic integrity, such as turning in work as original that was used in whole or part for another course and/or professor; turning in another person's work as one's own; copying from professional works or internet sites without citation; collaborating on a course assignment, examination, or quiz when collaboration is forbidden. Students should also avoid using open AI sources unless permission is expressly given for an assignment or course. Violations of academic integrity can result in failing assignments, failing a class, and/or more serious university consequences. These behaviors also erode the value of college degrees and higher education overall.

Classroom Climate of Respect

Importantly, this class will foster free expression, critical investigation, and the open discussion of ideas. This means that all of us must help create and sustain an atmosphere of tolerance, civility, and respect for the viewpoints of others. Similarly, we must all learn how to probe, oppose and disagree without resorting to tactics of intimidation, harassment, or personal attack. No one is entitled to harass, belittle, or discriminate against another on the basis of race, religion, ethnicity, age, gender, national origin, or sexual preference. Still, we will not be silenced by the difficulty of fruitfully discussing politically sensitive issues.

Supportive Statement

I aim to create a learning environment for my students that supports various perspectives and experiences. I understand that the recent pandemic, economic disparity, and health concerns, or even unexpected life events may impact the conditions necessary for you to succeed. My commitment is to be there for you and help you meet the learning objectives of this course. I do this to demonstrate my commitment to you and to the mission of Sul Ross State University to create a supportive environment and care for the whole student as part of the Sul Ross Familia. If you feel like your performance in the class is being impacted by your experiences outside of class, please don't hesitate to come and talk with me. I want to be a resource for you.

This course syllabus is intended to be an instructional guide and may be amended at any time.

19 TAC §228.30(b): The curriculum is research-based. TEA Evidence: Syllabi/course outlines with bibliographies/references.

References

Briggs, S., (2104). 10 Most Powerful Uses of Technology for Learning. Retrieved April 1, 2018 from https://www.innovationexcellence.com/blog/2015/03/30/10-most-powerful-uses-of-technology-for-learning/

Glowa, L., (2013). Re-Engineering Information Technology Design Considerations for Competency Education, A CompetencyWorks Issue Brief, International Association for K–12 Online Learning. https://eric.ed.gov/?id=ED561304

Hanover, (2104). Professional Development for Technology Integration. Retrieved April 10, 2018 from https://www.hanoverresearch.com/insights-blog/professional-development-for-technology-integration/

Kamenetz, A., (2015) Virtual Schools Bring Real Concern About Quality. Retrieved April 7, 2018 from https://www.npr.org/sections/ed/2015/02/02/382167062/virtual-schools-bring-real-concerns-about-quality

Meyers, E.M., Erickson, I., & Small, R.V., (2013). Digital literacy and informal learning environments: an introduction, Learning, Media and Technology, 38:4, 355-367, DOI: 10.1080/17439884.2013.783597

Nichols, R.G. & Allen-Brown, V., (2001). Handbook of research for Educational Communications and Technology. D. H. Jonassen (Ed.). Mahwah, NJ: Lawrence Erlbaum Associates.

Porter, K.E. & Balu, R., (2016). PREDICTIVE MODELING OF K-12 ACADEMIC OUTCOMES: A Primer for Researchers Working with Education Data. Retrieved April 3, 2018 from https://www.mdrc.org/sites/default/files/Predictive_Modeling_of_K-12_Academic_Outcomes.pdf

Seong-Jae Min (2010) From the Digital Divide to the Democratic Divide: Internet Skills, Political Interest, and the Second-Level Digital Divide in Political Internet Use, Journal of Information Technology & Politics, 7:1, 22-35, DOI: 10.1080/19331680903109402

Smith, F., (2015). EDUCAUSE's Top 10 IT Issues of 2015 Define the 'New Normal' for Higher Ed. Retrieved April 7, 2018 from https://edtechmagazine.com/higher/article/2015/01/educauses-top-10-it-issues-2015-define-new-normal-higher-ed

SREB, (2016). Data Privacy and Security. Retrieved April 3, 2018 from https://www.sreb.org/sites/main/files/file-attachments/final2016_edtech_polbrief_004.pdf?1494459390

SREB, (2017) Expanding Accessibility to Digital Spaces Through Improved Policy and Practice Retrieved December 9, 2019 from https://sulross.blackboard.com/bbcswebdav/courses/2019_SPRG_21411_ED_6381/2018_SPRG_21931_ED_6381_ImportedContent_20180107094503/2017_edtech_policybrief_final_5-3%281%29.pdf

SREB, (2018). 10 Issues in Educational Technology, 2108. Retrieved December 7, 2019 from https://www.sreb.org/sites/main/files/file-attachments/10issues_v8-web_version_accessible.pdf?1521568731

SREB, (2018) Emerging Technologies and New Learning Models That Engage Students. Retrieved December 9, 2019 from https://www.sreb.org/sites/main/files/file-attachments/2018_edtech_brief_final_accessible.pdf?1521730786

Su, J., Ng, D. T. K., & Chu, S. K. W. (2023). Artificial Intelligence (AI) Literacy in Early Childhood Education: The Challenges and Opportunities. Computers and Education: Artificial Intelligence, 4. https://doi-org.wmlsrsu.idm.oclc.org/10.1016/j.caeai.2023.100124.

Chiu, T. K. F. (2021). A Holistic Approach to the Design of Artificial Intelligence (AI) Education for K-12 Schools. TechTrends: Linking Research and Practice to Improve Learning: A Publication of the Association for Educational Communications & Technology, 65(5), 796–807. https://doi.org/10.1007/s11528-021-00637-1.

Otto, F., Kling, N., Schumann, C.-A., & Tittmann, C. (2023). A Conceptual Approach to an AI-Based Adaptive Study Support System for Individualized Higher Education. *International Journal of Advanced Corporate Learning*, *16*(2), 69–80. https://doi.org/10.3991/ijac.v16i2.35699.

Chan, C. K. Y., & Tsi, L. H. Y. (2023). *The AI Revolution in Education: Will AI Replace or Assist Teachers in Higher Education?,*

Marín, V. I., Carpenter, J. P., Tur, G., & Williamson-Leadley, S. (2022). Social media and data privacy in education: an international comparative study of perceptions among pre-service teachers. Journal of Computers in Education, 1–27. https://doi-org.wmlsrsu.idm.oclc.org/10.1007/s40692-022-00243-x.

"Higher Education Institutes Must Address Students' Growing Data Privacy Concerns, Says Info-Tech Research Group." PR Newswire, 24 Mar. 2023, p. NA. Gale OneFile: Educator's Reference Complete, link.gale.com/apps/doc/A742859443/PROF?u=txshracd2558&sid=bookmark-PROF&xid=e4c6bc0a. Accessed 2 June 2023.

Marachi, R., & Quill, L. (2020). The case of Canvas: Longitudinal datafication through learning management systems. *Teaching in Higher Education*, *25*(4), 418–434. https://doi.org/10.1080/13562517.2020.1739641