

# New Technologies for Teaching and Learning Certificate



## Transform Your Teaching and Training with New Technology

SDSU's **New Technologies for Teaching and Learning Certificate** is a nine-month, four-course certificate program designed to help educators and trainers learn how to use the latest tools and technologies to make their classrooms more exciting, and more importantly, more accessible to all types of learners.

Your online courses are led by internationally-recognized educational experts from SDSU's Learning Design and Technology Program, who bring decades of professional experience to every course. Through their guidance, you'll be able to facilitate higher student achievement and stronger learning outcomes, setting your learners up for success that reaches far beyond the classroom.

### Estimated Cost

\$6,588

### Min. Completion Time

9 months

### Course Format

Online

### Want to Learn More?

For additional information, please email [globalcampus@sdsu.edu](mailto:globalcampus@sdsu.edu) or call (619) 594-7700.

### Program Highlights

- Four fully online courses
- Earn an educational technology certificate in nine months
- For-credit program — earn 3 units per course
- Design Lab with hands-on projects from global organizations
- Highly-credentialed instructors with years of educational experience
- Access to Adobe Creative Suites and Microsoft 360
- Apply up to 9 units towards SDSU's M.A. in Learning Design and Technology

### Student Testimonial



*"My courses increased my self-confidence to learn new software and acquire basic skills in related areas, such as photography, graphic design, video editing, game design, and web design. I also worked on multiple*

*research projects, two of which were presented at international conferences and resulted in publications."*

— **Elizabeth Damiano, LMS Administrator and Digital Learning Specialist**

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## Courses

### Games, Play, and Learning | LDT 515

LDT 515 provides a broad overview of games of many types. You'll learn to analyze existing games in terms of mechanics and their emotional and cognitive outcomes. You'll learn hands-on how digital games are created by using a game development platform. You'll examine issues of violence in games and synthesize current research on the topic. You'll also design a tabletop game to teach a specific topic. Finally, you'll participate in role play to develop an understanding of the strengths and limitations of game-based learning in education.

**Instructor:** Dan McDowell, M.A.,  
Director of Learning and Innovation, Grossmont  
Union High School District

### Mixed Reality, Virtual Worlds, and Future Learning | LDT 525

Someday soon, you'll pull a visor over your eyes and forget where you are. You'll use this headset to play games, explore other parts of the world, hobnob with friends, and learn new skills. While covering your eyes and ears, you'll open yourself up to worlds that could barely be imagined by your parents. Virtual reality, augmented reality, and virtual worlds are moving from the labs and geeks to the mainstream. How will this change entertainment, news, and education? In LDT 525, you'll explore these questions. We will survey the current hardware (e.g., Oculus, Hololens, HTC), create immersive virtual tours, and design a learning environment in a virtual world.

**Instructor:** Kevin White, M.A.,  
STEM/Social Science Teacher, The Learning  
Choice Academy

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### Mobile Application Development for Learning | LDT 630

This course will provide an overview of recent and near-future developments in the realm of mobile learning. You'll learn about new technologies, implementation and policy issues, and platforms and methods for creating mobile learning environments and courses. You'll exit the course with new vocabulary and an improved ability to select and design mobile learning solutions, which can be apps, mobile websites, mobile courses, or mobile training modules. This course will also explore augmented reality technology and its use in teaching and learning.

**Instructor:** Minjuan Wang, Ph.D.,  
Professor of Learning Design and Technology,  
Program Coordinator, SDSU

### Advanced Seminar in New Technologies | LDT 700

This course analyzes current trends and near-future technologies with implications for teaching and learning. These include artificial intelligence, machine learning, voice-driven environments, and personalized learning. You'll critique these technologies through lenses of practicality, ethics, and social impact and generate ideas for their ideal use.

**Instructor:** Kevin Storm Jorgensen, M.A.,  
Senior Operations Training & Development  
Specialist, General Dynamics NASSCO