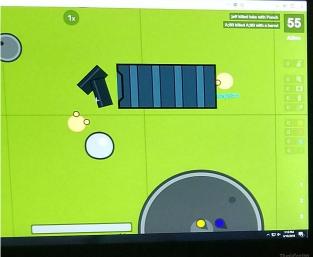
BUSINESS, MANAGEMENT, MARKETING AND TECHNOLOGY GAME DESIGN & PROGRAMMING ACADEMY





PROGRAM LOCATION Davenport University (shuttle available)

SESSION OFFERED

AVERAGE LECTURE DAYS/WEEK 4-5 days

AVERAGE LAB DAYS/WEEK 4 days

HOMEWORK Weekly

REQUIRED READING College level textbook 25+ pages/week

DAVENPORT UNIVERSITY

1x

15 65

EXPLORE THE POSSIBILITIES. FAST TRACK YOUR FUTURE.

This program introduces students to the game development process from storyboarding the initial concept to the final marketing documentation. During this program, students will utilize multiple game development methodologies to move a project through the major stages of game design with each student assuming one or more of the development team roles. Student will also explore the tools, platforms, and techniques required to develop applications for highly mobile and compact devices. Mobile applications will be designed, developed, tested, and deployed that provide computing services to the mobile user. Throughout this program students will survey the main components of the business systems cycle. The five phases of the systems development life cycle (SDLC) (systems planning, system analysis, systems design, systems implementation, and system operation and support) will be investigated.

EXPECTED STUDENT OUTCOMES

- Describe the game development process from pre-production to post-production
- Demonstrate the use of prototyping and storyboarding in the development of a game
- Describe software troubleshooting and debugging techniques
- Describe the team roles required to support the development
 of a game
- Demonstrate the ability to create a budget that reflects the estimated work required to complete the project
- · Configure a mobile application development environment
- Discuss the software architecture and design principles of mobile applications
- · Design, implement and test mobile applications
- Design appropriate user interfaces for varying screen sizes and orientations
- Discuss security and privacy implications relative to application development
- Use the C# language for structured and interactive programming
- Demonstrate the knowledge of input and output on a program
- Describe how systems analysts interact with users, management, and other information systems professionals in a typical business organization

CAREERS

Software Developer Game Designer Computer Programmer Defense Intelligence Analyst Computer Systems Analyst Web Developer

MEDIAN WAGE

Software Developer: \$51.38 hourly, \$106,860 annually Computer Programmer: \$38.39 hourly, \$79,840 annually Defense Intelligence Analyst: \$37.56 hourly, \$78,120 annually Computer Systems Analyst: \$41.93 hourly, \$87,220 annually Web Developer: \$31.79 hourly, \$66,130 annually

EMPLOYMENT OUTLOOK

Average, 5-9% - Faster than average, 10% to 14%

CERTIFICATIONS None

SUCCESS INDICATORS

Familiar with basic computer skills and application of skills to solve business problems, detailed oriented, an analytical thinker, action oriented, dependable and effective in team setting.

STUDENT LEADERSHIP

Students have the opportunity for leadership, competition, and community service through membership in DECA.

12 COLLEGE CREDITS

CISP 111 - Requirements Planning & Development CSCI 231 - Introduction to Programming CSCI 258 - Introduction to Game Design & Theory CISP 340 - Mobile Applications Development

ACADEMIC RIGOR

CAPITAL REGION TECHNICAL EARLY COLLEGE

Students enrolled in this program may choose to participate in the Capital Region Technical Early College (CRTEC). Capital Region Technical Early College is a high school-to-college program where students start in grade 11 and leave in grade 13 with a college degree or certification. The program gives students relevant career-related experience.

