

Information Technology

Animation and Game Developer

Associate in Applied Science



Program Description:

Students who receive an A.A.S. in Information Technology (IT) will possess a broad base of computer skills and knowledge. The curriculum is designed to maintain maximum flexibility in order to compete in the changing workforce. Today's games are very complex. They require teams of programmers, designers, artists, testers, advertisers, and producers to organize and develop them. Training needed for game development is enormous, warranting a complex education of multiple courses in multiple fields. The Animation and Game Developer curriculum is designed to provide training in principles and techniques used to create interactive 2D and 3D computer games.

Students can learn:

- Design Software
- Programming Languages
- Modeling and Animation Skills
- Web graphic design
- Game Engines used to Design and Develop Games

IT 299, an internship course taken over the course of a student's four semesters, requires the student to apply knowledge and skills acquired in the classroom to a real-world employment environment.

Career Outlook:

According to the U.S. Dept. of Labor Occupational Outlook Handbook, 2008-09, employment in professional, scientific, and technical services will grow by 28.8 percent and add 2.1 million new jobs by 2016. Employment in computer systems design and related services will grow by 38.3 percent and add nearly one-fourth of all new jobs in professional, scientific, and technical services. Employment growth will be driven by the increasing reliance of businesses on information technology and the continuing importance of maintaining system and network security. Management, scientific, and technical consulting services also will grow at a staggering 78 percent and account for another third of growth in this super sector. Demand for these services will be spurred by the increased use of new technology and computer software and the growing complexity of business.

One of the most important requirement needs as an IT student is the willingness to learn and to keep on learning throughout one's professional career. The IT Division can provide students with the knowledge and skills to start on that path. The successful student will provide the energy, enthusiasm, and drive to continue to acquire new knowledge and skills in order to succeed in the rapidly changing world of Information Technology.

Salary Forecast:

According to November 2006 West Virginia Bureau of Labor Occupational Employment and Wage Estimates for the Metropolitan Area of Huntington-Ashland, WV-KY-OH, Median annual earning of computer support specialists/programmers was \$37,875 in 2008. The average salary for the entire state of West Virginia in the computer support specialists/programmer area was \$41,820.

Program Admission Requirements:

The college adheres to an open admission policy which means applicants with a high school diploma or a GED are eligible for admission. Applicants with neither a high school diploma nor a GED may be admitted on a conditional basis.

Contact Information:

Dr. Randall Jones • Corbly Hall, Room 314
Phone: 304-696-3059 or 1-866-N-ROLLED (1-866-676-5533)
E-mail: jonesr@mctc.edu

Patrick Smith • Corbly Hall, Room 309
Phone: 304-696-4633
E-mail: smith288@mctc.edu

Major Code – CI20 • Concentration Code – CI28 Animation and Game Developer

FIRST YEAR	
<p>Fall Semester¹</p> <p>ENL 111 Written Communication 3</p> <p>IT 101/102 Fundamentals of Computers (EDGE) 3</p> <p>IT 110 Computer Skills for Designers 3</p> <p>IT 171 Introduction to Gaming Concepts I 3</p> <p>IT 298 Gaming & Design Internship¹⁰ 1</p> <p>MAT Approved Math Elective * 3</p> <p>TOTAL CREDITS..... 16</p>	<p>Spring Semester</p> <p>ENL 115 Written Communication II 3</p> <p>IT 107 Fundamentals of Internet..... 3</p> <p>IT 115 Introduction to BASIC²..... 3</p> <p>IT 271 Introduction to Gaming Concepts II⁵ 3</p> <p>IT 298 Gaming & Design Internship¹⁰ 1</p> <p>SCI 201 Integrated Science 4</p> <p>TOTAL CREDITS 17</p>
SECOND YEAR	
<p>Fall Semester</p> <p>ENL 231 Technical Report Writing³ 3</p> <p>IT 212 Publishing on the Internet⁴ 3</p> <p>IT 215 Advanced Programming⁷ 3</p> <p>IT 250 Applications to Databases² 3</p> <p>IT 298 Gaming & Design Internship¹⁰ 1</p> <p>TOTAL CREDITS..... 13</p>	<p>Spring Semester</p> <p>IT 213 Web Graphic/Design⁴ 3</p> <p>IT 242 Emerging Web Technologies⁸ 3</p> <p>IT 272 Intro to 3D Modular Programming⁹ 3</p> <p>IT 277 Management Information Systems¹¹ 3</p> <p>IT 298 Gaming & Design Internship¹⁰ 1</p> <p>SS 210 Fundamentals of Sociology 3</p> <p>TOTAL CREDITS 16</p>
HOURS REQUIRED FOR GRADUATION: 62	

Employment Opportunities:

- Programmer
- Web /game designer
- Product tester
- Animation designer
- Project manager
- Software publishers
- Educational support services

Earn A Degree Graduate Early (EDGE):

This program provides students the opportunity to receive credit for their high school EDGE courses.

Contact Information:

Dr. Randall Jones • Corbly Hall, Room 314
 Phone: 304-696-3059 or 1-866-N-ROLLED (1-866-676-5533)
 E-mail: jonesr@mctc.edu

Patrick Smith • Corbly Hall, Room 309
 Phone: 304-696-4633
 E-mail: smith288@mctc.edu

1. Students are expected to have basic knowledge of computers including operating systems such as Windows XP or Vista and Microsoft Office 2003 or Office 2007 before entering this program. The student must register for IT 101 during his or her first semester or successfully pass a challenge exam for IT 101.

2. IT 115 and IT 250 have a prerequisite of IT 101.

3. ENL 231 has a prerequisite of ENL 111 or COM 111. (ENG 354 is required only if planning to continue with BS degree.)

4. IT 212 and IT 213 have a prerequisite of IT 107.

5. IT 271 has a prerequisite of IT 171.

6. MAT 146, MAT 215, and MAT 205 have a prerequisite of MAT 145. (Select one based on program track – see advisor)

7. IT 215 has a prerequisite of IT 115.

8. IT 242 has a prerequisite of IT 212.

9. IT 272 has a prerequisite of IT 215.

10. Permission of Program Coordinator is required in order to enroll in IT 298.

11. IT 277 to be taken in last semester or permission.