



ART 2310

Division: Fine Arts

Department: Visual Art

Course: ART 2310

Title: Animation I

Catalog Description:

This course will provide students with a progressive foundation in digital animation. Students will study the dynamics of kinetics, character development, 3D rendering, camera, and audible applications, as they relate to this dynamic, time-based medium. Utilizing these principles, this course will culminate with the production of a short, comprehensive, portfolio worthy, 3D animation. A lab fee is required for this course.

General Education Requirements: N/A

Semesters Offered: TBA

Credit/Time Requirement: Credit: 3.0; Lecture: 3.0; Lab: 3.0

Clock/Hour Requirements: 0

Offered for Non-Credit: No

Prerequisites: ART 1110 and 1300

Justification:

Computer-generated animation is a growing and exciting field. It is paramount that art students understand both how to use these technologies and understand their implications and outcomes in contemporary art. Students interested in seeking a career in the digital film and video game industry will benefit greatly from this course, as will students who are serious about figurative fine arts. Animation I is taught at most higher education institutions as a fundamental building block in the study of animation and human body dynamics.

Student Learning Outcomes:

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

- Display a visual understanding of Newton's Laws of Physics and how they impact our visual perception of movement
- Navigate basic animation tools and pipelines in Autodesk Maya for the Macintosh and PC
- Produce simple animation rigs and prepare a 3D model for animation
- Display a visual understanding of weight and distribute (squash and stretch) on a 3D model
- Demonstrate a fundamental understanding of Phonemes and Visemes
- Understand animation language and terminology that is standard in the film and video game industry
- Critique peer and personal animation work and learn how to incorporate feedback quickly for a rapid turnaround

- Set up and render a 3D scene with a camera, a representative environment and a character and render said scene to final film output

Content:

This course will include lecture, discussion/critique, and studio lab time in the application of the following concepts:

- Animating a simple object with proper weight and distribution
- Animating a simple object with "cartoon physics"
- Adding character to an inanimate object (the Sack Test)
- Character animation: Walk and run cycles, Lip syncing (Phonemes and Visemes), Fundamental character acting
- Fundamental rendering and camera techniques

General Education Outcomes:

- 4) Retrieve, evaluate, interpret, and deliver information through a variety of traditional and electronic media.

Each unit will require students to retrieve, manipulate, and output information as they progress through the course. Each assignment will require students to create, share, and critique their work with peers and the instructor, as well as return and improve their work based on feedback received. Students will learn to show their work often, with the goal of discovering areas of improvement early in the process and increasing animation efficiently.

- 9) Respond with informed sensitivity to an artistic work or experience.

Students will participate in daily (per class session) theater, where they will have the opportunity to show, critique, and evaluate work of their peers. Through lectures, discussions, and practical application, students will develop the ability to critically analyze the work of others and be more critical of their own work during production in an effort to enhance the quality and potential of each work.

Key Performance Indicators:

Timing, layout, and Dope Sheet unit - 10%

Tools and pipeline unit - 10%

Acting and animation unit - 15%

Class participation and critique - 15%

Object animation unit - 15%

Character animation unit - 15%

Final portfolio - 20%

Percentages are approximate

Representative Text and/or Supplies:

Each student will be required to have an external digital storage device.

Optimum Class Size: 12

Maximum Class Size: 16

Signatures:

I hereby submit this course syllabus:

Adam Larsen, MFA, Associate Professor

I hereby find this course consistent with the goals and resources of the Visual Art Department:

Brad Taggart, MFA, Assistant Professor, Chair

I hereby find this course consistent with the goals and resources of the Fine Arts Division:

Vance Larsen, MM, Associate Professor, Dean

I have discussed the need for library resources related to this class with the person submitting the syllabus:

Lynn Anderson, MLIS, Technical Services Librarian (Main Campus)

Michelle Olsen, MLS, Campus Librarian (Richfield Campus)