98-127: Game Creation

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Course Description

In this course students will learn the basics of game creation. The course is intended for both beginners and experienced game designers. In addition to project work done in class, students will learn fundamental tools like Unity, Audacity, and Photoshop.

Required Materials

The cluster computers are available to work on and should be used for special software, but we still recommend that students bring their own laptops to work on for convenience.

Prerequisite Knowledge

Students of all ranges of experience are invited to come and learn. No expertise is assumed.

Key topics

- 1. Unity
- 2. Game Production Pipeline
- 3. User Experience
- 4. Principles of Animation
- 5. Practical Techniques of Game Creation

Course Relevance

The intent of this course is to expand the community of game makers at CMU to those who are interested in making games but may not have had the inclination to pursue it through more intensive means such as G.C.S. or Ideate.

The course also serves as an additional place for those already involved in the community to learn and collaborate. Tutorials and projects done in the student organization Game Creation Society will mirror and compliment work done in class.

Course Goals

- 1. Learn the basic tools of Game Development
- 2. Learn the fundamentals of Design and Game Feel
- 3. Explore the various disciplines involved in Game Creation
- 4. Create a working game that demonstrates these principles

Assessment Structure

Exercises will be done in class to explore development tools and students will be required to complete a mid semester and final assignment.

Design Document

The mid-semester assignment is an original detailed design document. Students will have to reason about scope, game loops, and detailed mechanic descriptions. The assignment is meant to make students think carefully about all the parts of a game. It is also an opportunity to be creative and express the ideas that you would like to see in a game. Time in class will be allocated to work on this, but students are encouraged to work on it outside of class if they feel inspired.

Final Project

Students will team up to collaborate on a final project. Using supplied behaviours, images, and sounds, students will build a game. The design is up to the students and serves as a chance for students to demonstrate the principles covered previously in class. Making a game is a laborious enterprise even with assets from the instructors, so students are encouraged to meet and work outside of class.