

CSE 3902: Class Introduction

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About Your Instructor

Ohio State Alumni

- Graduated BSc in Computer Science and Engineering, Spring 2007
- Graduated Ph.D. in Computer Science and Engineering, Autumn 2012

Professional Activities

- NVIDIA, Senior Compiler Software Engineer, 2012 - Current
- Ohio State University, Senior Lecturer, 2022 - Current

Topics

Software Quality

- Cohesion
- Coupling
- Maintainability

Design Patterns

- Factory
- Singleton
- ...

Development Practices

- Agile
- Sprints

2D Graphics

- Audio
- Input
- Sprites

C#

- Basic Language Structure

MonoGame

- API
- Content Pipeline

Course Organization

Project-based and group-based with a focus on *sprints*

Each sprint builds upon the last

- Each sprint is not a clean slate, do not fall behind!

First half of term is lecture-heavy

- Introduction of key topics
- Design patterns, software engineering, game fundamentals
- Start group work

Second half of term is group work

- Fewer lecture topics, more in-class group work and code review

Short, online quiz every Wednesday

- Closed-note, closed-book
- Covers basic topics and concepts discussed since last quiz
- May go back to topics several weeks prior!

Course Organization

Individual learning is a big part of this course! You will be expected to:

- Use “C# in a Nutshell” to become comfortable with C#
- Use online resources to learn the different MonoGame APIs
- Use “Head-First Design Patterns” to ready more information about the design patterns presented in class

Group activity is a big part of this course, too!

- If you dislike your team and go off doing your own thing, you will not succeed
- Please report issues with group work instead of just redoing everything yourself!

Grading Policy

- Lab/Project/Sprints - 65%
 - Sprint 0 - 10%
 - Sprint 1 - 0%
 - Sprints 2 through 5 - 55%
- Quizzes - 15%
- Final Exam - 20%

Each group sprint will have two components:

- Functionality Check-In
 - Approximately 75% of functionality should be complete
 - Bugs may be present
- Final Submission
 - All functionality must be complete
 - Major bugs must be fixed
 - Small bugs can remain if properly tracked as GitHub Issues

Grading Policy

The final project grading will be split into:

- Group Evaluation
- Individual Assessment

The Group Evaluation is the final score associated with the group project. This score forms the basis for your grade, but is not directly part of your grade.

The Individual Assessment is a *weight* applied to your group grade based on your contributions to the team, and instructor and peer evaluation. It is important that you show continued, high-quality contributions to your team project in the form of code commits.