

ARTG 131

3D Game Art Production

Units: 5 | **Quarter:** Summer 2019

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Course Description

In this studio course, students will learn the highly technical and fundamental skills in the production of 3D art assets for video games. The course will cover the essential steps in the 3D art pipeline, starting with basic 3D modeling, UV unwrapping, the creation of texture maps, and finally, game engine implementation. This course will focus on developing an understanding of the processes and creative thinking necessary to produce industry-level artwork rather than specific software. Students will be provided with video lectures and demos, and can expect to produce weekly assignment to practice basic skills and concepts covered.

A note on this syllabus:

This document is a living document. While the course's topic and main structure are final, most of the material herein, including the course schedule and readings are liable to change throughout the quarter. The instructor will periodically revise this document to take into account student input and to better fit the student body's interests and composition. Please check the syllabus regularly for updated content and revised schedule.

Learning Objectives

Upon completion of this course, you will have:

- Acquired basic knowledge of the 3D game art pipeline for video games.
- Become better-familiarized with industry-standard software like Adobe Photoshop, Autodesk Maya, and Substance Painter.
- Produced a variety of high-quality 3D artwork.
- Acquired better understanding of career paths in 3D game art and how to look for, and display quality work online.

Course Expectations

1. Watch all provided video lectures closely.
2. Download and install all necessary software.
3. Back up your work regularly.
4. Complete assignments on time.
5. Participate regularly in the course's discussion forum (Discord server).
6. Spend a minimum of 15 hours per week on video lectures, reference materials, and practice.

7. Be proactive in troubleshooting software and artwork without relying on the instructor or TA(s) alone.
8. Look for further resources outside of those provided in the course to complement your learning process, as is standard practice in industry.
9. Participate in online project critiques, providing feedback about other students' work.
10. Read the entire syllabus and refer to it during the quarter.
11. Be proactive in communicating and arranging to meet with the instructor or TA(s) if you're having difficulties with the course.

Course Structure

- Video and written lectures providing concept overviews, techniques and relevant links to further information on the subject.
- Video of Instructor-led technical demonstrations and step by step instructions to guide students through learning the software and techniques required to complete assignments.
- Weekly assignments to develop the student's understanding and mastery of demonstrated techniques.
- Discussion board access for peer critiques and access to the instructor.

Class Governance

This isn't your usual passive, sit back and respond course. While the professor will provide the structure and bring in most of the content for the course, you will be expected to use and pursue material from other sources to supplement your studio practice. Being a proactive learner is one of the most important skills you can have as an artist. This is a point of emphasis in this course.

Required Software

- [Adobe Photoshop CC](#) or equivalent 2D image creation software that supports layers.
- [Autodesk Maya 2019 or later](#) - Student Version
- [Substance Painter 2019+](#) - Free Educational License, Latest Version
- [Unity Game Engine](#) - Personal License, Latest Version

Materials

Required:

- A 3-button mouse or equivalent.

Highly Encouraged:

- Drawing tablet, such as Wacom or Huion (any size is fine).
- Sketchbook/Notebook for sketches and written notes.

Assignments and Assessment

Weekly Assignments

Throughout the quarter you will be asked to practice your newly-learned skills on a weekly basis. These assignments will correspond small steps in the pipeline, focused on a particular skill.

Final

Graded as a weekly assignment. A fully-realized 3D model and base in engine, including proper UV mapping, and multiple texture maps.

Participation

Your participation grade is part of your assignment grade. It is a combination of your level of activity on class forums and your willingness to actively contribute to peer-to-peer feedback and troubleshooting throughout the quarter.

Grading Breakdown

Assignment	Grading
Weekly Assignments	100%
Participation	Included in the total

Assessment

Weekly Assignments are graded using the “Excellent / Good / Good enough / Poor” system:

<i>Excellent</i>	Extra time and effort spent, work goes beyond the minimum
<i>Good</i>	Meets basic requirements, well-executed, little-to-no errors
<i>Good enough</i>	Meets basic requirements, hasty execution, a few errors
<i>Poor</i>	Missing components of the assignment, lots of errors

Each submission is graded based on quality of craft, attention to detail, quality of presentation, and demonstration of overall time and effort spent on the project.

Assignment Submission Policy

All assignments are due by the end of the corresponding week, unless otherwise noted. Digital files must be uploaded to the course’s Canvas page, *using the correct file format* specified by the assignment prompt. Assignments submitted using the incorrect file format will not be accepted.

Missing an Assignment Deadline, Incompletes

The only acceptable excuses for missing an assignment deadline are personal mental or physical illness or a family emergency. Students must inform the instructor before the assignment due date and present verifiable evidence in order for a deadline extension to be granted.

Late Assignments

Assignments turned in after the assignment deadline without prior permission from the instructor, will incur a penalty of 10% of the total available points for the assignment, for each day or part of a day that the assignment is late, up to a maximum 40% deduction.

Plagiarism and Academic Misconduct

Submission of another artist's work as if it were your own will be dealt with severely. It will result in automatic failure for the course and formal academic disciplinary hearings, which can result in expulsion from the University of California. This course encourages the use of multiple sources for *inspiration* and *reference* for pedagogical purposes and allows the use of existing material as *placeholder content*. But use of someone else's work in your assignment submissions is *not permitted*. We do not condone nor cynically overlook misrepresentation of intellectual property.

Other forms of academic dishonesty are equally unacceptable. See additional information in *Academic Misconduct Policy for Undergraduates*:
https://www.ue.ucsc.edu/academic_misconduct.

Discrimination, sexual assault, and harassment are not tolerated by the university. The UCSC community has a number of resources for reporting and support: <https://titleix.ucsc.edu/>

Support Systems

Disability Resources Center (DRC)

If you are a student with a disability who requires accommodations to achieve equal access in this course, please submit your Accommodation Authorization Letter from the [Disability Resource Center](#) (DRC) to me privately during my office hours or by appointment, preferably within the first two weeks of the quarter. At this time, we would also like us to discuss ways we can ensure your full participation in the course. We encourage all students who may benefit from learning more about DRC services to contact DRC by phone at 831-459-2089 or by email at drc@ucsc.edu.

Learning Support Services (LSS)

Provides support for students who need help with scholarly writing (as well as other skills and disciplines). Check with your advisor or program staff to find out more. <https://lss.ucsc.edu/>

Diversity and Inclusion

In making art, games, and interactive media in a professional and ethical way, it is important that you consider the context in which they exist. When conceptualizing and producing your projects, you should consider who is depicted, how this work will impact others, what kinds of individuals and communities are represented in your work, and what point of view your work expresses. We consider understanding context to be an integral part of the work of artists and game designers.

Safe Spaces

In this class, we make a commitment to fostering a welcoming and supportive environment where students of all identities and backgrounds can flourish. This means that we will issue content warnings as appropriate, use preferred pronouns, and respect self-identifications. While debate and discussion are welcome, please remain aware of the implications of your words and the images that you include in your work. If the instructor or another student points out that something you have said or shared with the group might be offensive or discriminatory, avoid being defensive; this is a valuable opportunity for us to grow and learn together. If you have a concern about any aspect of the class, you are encouraged to speak with the instructor.

Disruptive Student Behavior

Behavior that persistently or grossly interferes with classroom activities, including class forums, is considered disruptive behavior and may be subject to disciplinary action. Such behavior inhibits other students' ability to learn and an instructor's ability to teach. A student responsible for disruptive behavior may be banned from the online forums at the discretion of the instructor or TA(a) pending discussion and resolution of the problem and may be reported for disciplinary action.

Suggested Weekly Workflow

1. Monday

- a. Log on to Canvas, check what's new.
- b. Log on to Discord, answer questions, post content.
- c. Read every page, including the assignment description.
- d. Watch a video lecture and/or demo.

2. Tuesday through Friday

- a. Watch video lectures/demos.

- b. Work on assignment alongside speedmodeling/painting demos.
- c. Log on to Discord daily to post/answer questions and content.
- d. Attend office hours.
- e. Submit assignment!

3. Weekends

- a. Rest and recover!

Course Schedule

- *Course schedule and assignment prompts are on Canvas.*
- Assignments are due by Sunday, 11:59pm, unless otherwise noted.
- Modules unlock Monday mornings. Some modules last 2 weeks.

It was a pleasure working with you.

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