

SAULT COLLEGE OF APPLIED ARTS AND TECHNOLOGY

SAULT STE. MARIE, ONTARIO



**SAULT
COLLEGE**

COURSE OUTLINE

COURSE TITLE: Game Art Studio 3

CODE NO. : VGA304

SEMESTER: 16F

PROGRAM: Video Game Art

AUTHOR: Matias Kamula

DATE: June, 2016

PREVIOUS OUTLINE DATED: Aug.
2014

APPROVED: "Colin Kirkwood"

June/16

DEAN

DATE

TOTAL CREDITS: 6

PREREQUISITE(S): Game Art Studio 2

HOURS/WEEK: 6

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I. COURSE DESCRIPTION: In this advanced session of Game Art Studio, participants will be faced with the challenges of learning high poly sculpting, re-topology and creating optimized game assets. Another emphasis of the course will be learning advanced workflows for Next-Gen game art pipelines.

II. LEARNING OUTCOMES AND ELEMENTS OF THE PERFORMANCE:

Upon successful completion of this course, the student will demonstrate the ability to:

1. Design, digitally sculpt, re-typologize and assemble polished and efficient 3D game models

Potential Elements of the Performance:

- Design and create visually appropriate game assets including 2D concepts, 2D textures, and 3D base meshes
- Demonstrate the ability to sculpt a high poly 3D mesh
- Demonstrate the ability to re-typologize a high poly 3D mesh to make an efficient low poly 3D game mesh
- Demonstrate the ability to extract surface texture detail from a high poly 3D sculpted game mesh
- Demonstrate the ability to assemble a final low poly optimized game mesh complete with texture maps

2. Create and produce optimized, efficient 3D game meshes ready for game animators

Potential Elements of the Performance:

- Understand typology as it pertains to 3D game meshes
- Show the ability to create a clean, efficient 3D game mesh
- Work within low polygon limitations to create clean deformable 3D game mesh joints ready for animation
- Demonstrate the ability to model clean, efficient hard surface 3D game meshes

3. Demonstrate the ability to efficiently transfer and use 3D game meshes and 2D assets from content creation programs alongside game assets created inside a 3D game engine

Potential Elements of the Performance:

- Understand how to export 3D meshes and 2D from content creation programs
- Demonstrate how to efficiently import, setup, manage and use 3D meshes and 2D game assets in a 3D game engine

- Demonstrate working knowledge of game engine asset creation tools to make game assets inside a 3D game engine
 - Design and layout a 3D game scene using a combination of game assets from both inside and outside of a 3D game engine
4. Develop perspective in the role of game artists and art within development team and projects objectives by working effectively as a game artist within a team environment
Potential Elements of the Performance:
- Demonstrate the ability to apply effective business practices and time management skills appropriate to his/her position in the game art industry
5. Learn how to create and use 2nd UV channels, and light maps in 3D game engines and content creation programs
Potential Elements of the Performance:
- Demonstrate the ability to create and export a 2nd UV channel in a 3D content creation program
 - Demonstrate the ability to import, manage and use a 2nd UV channel in a 3D game engine
 - Demonstrate the ability to render and apply light maps to 3D assets in a 3D game engine
 - Design and produce a fully light 3D game scene complete with light maps

III. TOPICS:

1. Introduction to digital sculpting
2. High poly digital sculpting
3. High poly vs low poly
4. Creating optimized, low poly game models
5. Low poly asset creation process
6. Creating next gen characters
7. Introduction to light maps, 2nd UV channels and 3D game engines

IV. REQUIRED RESOURCES/TEXTS/MATERIALS:

V. EVALUATION PROCESS/GRADING SYSTEM:

Assignments/Projects = 100% of final grade

Assignments/projects will constitute 100% of the student's final grade in this course. A missing assignment is equivalent to course objectives not achieved which results in an "F" (fail) grade for the assignment/project.

The following semester grades will be assigned to students:

Grade	Definition	<i>Grade Point Equivalent</i>
A+	90 – 100%	
A	80 – 89%	4.00
B	70 - 79%	3.00
C	60 - 69%	2.00
D	50 – 59%	1.00
F (Fail)	49% and below	0.00
CR (Credit)	Credit for diploma requirements has been awarded.	
S	Satisfactory achievement in field /clinical placement or non-graded subject area.	
U	Unsatisfactory achievement in field/clinical placement or non-graded subject area.	
X	A temporary grade limited to situations with extenuating circumstances giving a student additional time to complete the requirements for a course.	
NR	Grade not reported to Registrar's office.	
W	Student has withdrawn from the course without academic penalty.	

VI. **SPECIAL NOTES:**

Attendance:

Sault College is committed to student success. There is a direct correlation between academic performance and class attendance; therefore, for the benefit of all its constituents, all students are encouraged to attend all of their scheduled learning and evaluation sessions. This implies arriving on time and remaining for the duration of the scheduled session.

1. **COURSE OUTLINE AMENDMENTS:**

The faculty member reserves the right to change the information contained in this course outline depending on the needs of the learner and the availability of resources.

2. **Retention of Course Outlines:**

It is the responsibility of the student to retain all course outlines for possible future use in acquiring advanced standing at other postsecondary institutions.

3. Prior Learning Assessment:

Students who wish to apply for advance credit transfer (advanced standing) should obtain an Application for Advance Credit from the program coordinator (or the course coordinator regarding a general education transfer request) or academic assistant. Students will be required to provide an unofficial transcript and course outline related to the course in question. Please refer to the Student Key Dates Calendar for the deadline date by which application must be made for advance standing.

Credit for prior learning will also be given upon successful completion of a challenge exam or portfolio. Student Services can provide information regarding the Prior Learning Assessment and Recognition policy or it can be viewed on the student portal.

Substitute course information is available in the Registrar's office.

4. Student Portal:

The Sault College portal allows you to view all your student information in one place. **mysaultcollege** gives you personalized access to online resources seven days a week from your home or school computer. Single log-in access allows you to see your personal and financial information timetable, grades, records of achievement, unofficial transcript, and outstanding obligations. In addition announcements, news, academic calendar of events, class cancellations, your learning management system (LMS), and much more is available. Go to <https://my.saultcollege.ca>.

5. Communication:

The College considers **Desire2Learn (D2L)** as the primary channel of communication for each course. Regularly checking this software platform is critical as it will keep you directly connected with faculty and current course information. Success in this course may be directly related to your willingness to take advantage of this Learning Management System (LMS) communication tool.

6. Accessibility Services:

If you are a student with a disability (e.g. physical limitations, visual impairments, hearing impairments, or learning disabilities), you are encouraged to discuss required accommodations with the Accessibility Services office. Call Ext. 2703 or email studentsupport@saultcollege.ca so that support services can be arranged for you.

7. Audio and Video Recording Devices in the Classroom:

Students who wish to use electronic devices in the classroom will seek permission of the faculty member before proceeding to record instruction. Students with disabilities who require audio or visual recording devices in the classroom as an accommodation will receive approval from their counsellor once the Audio and Video Recording Devices in the Classroom Policy has been reviewed by the student. Recorded classroom instruction will be used only for individual academic use and will not be used for any other purpose. Recordings may only be used for individual study of materials presented during class and may not be published or distributed. Intentional misuse of audio and video recordings or intentional misrepresentation when requesting the use of a device for recording shall constitute a violation of this policy and laws protecting intellectual property.

8. Academic Dishonesty:

Students should refer to the definition of “academic dishonesty” in the *Student Code of Conduct*. Students who engage in academic dishonesty will be issued a sanction under the Student Code of Conduct which could lead to and include expulsion from the course/program. In order to protect students from inadvertent plagiarism, to protect the copyright of the material referenced, and to credit the author of the material, students must use a documentation format for referencing source material.

9. Tuition Default:

Students who have defaulted on the payment of tuition) as of the first week of November (fall semester courses), first week of March (winter semester courses) or first week of June (summer semester courses) will be removed from placement and clinical activities due to liability issues. This may result in loss of mandatory hours or incomplete course work. Sault College will not be responsible for incomplete hours or outcomes that are not achieved or any other academic requirement not met as of the result of tuition default. Students are encouraged to communicate with Financial Services with regard to the status of their tuition prior to this deadline to ensure that their financial status does not interfere with academic progress.