

## DESN3802: 3D Environments

Newcastle City Precinct  
Semester 2 - 2023



THE UNIVERSITY OF  
NEWCASTLE  
AUSTRALIA

*The School of Humanities, Creative Industries and Social Sciences is committed to providing an inclusive environment in which all cultures are accorded respect and all students and staff are expected to act with honesty, fairness, trustworthiness and accountability in dealings with others. The School recognises and respects the unique histories and cultures of Aboriginal and Torres Strait Islander peoples, their unbroken relationship with the lands and the waters of Australia over millennia, and the validity of Aboriginal ways of knowing. We are dedicated to reconciliation and to offering opportunities for Aboriginal and Torres Strait Islander peoples to access and succeed in higher education.*

## OVERVIEW

### Course Description

3D Environments explores designing objects, environments and scenarios for a range of physical and virtual applications. Students will learn techniques suitable for a variety of outcomes including animation, games and motion graphics with a primary focus on designing environments, digital set design and landscapes. The course introduces students to fundamental concepts related to creating virtual and physical spaces through designing experimental 3D environments. Students will be introduced to virtual production and real-time 3D concepts through games engines. There is a strong focus on analysing and critiquing both historical and contemporary examples of virtual design, installation and light projections.

Student projects may involve work integrated or research integrated learning opportunities; projects that involve external stakeholders; group/collaborative projects; speculative or more theoretically oriented projects; professionally oriented projects; projects based on competition or award briefs.

### Requisites

Students must have successfully completed at least 40 units at the 2000 level to enrol in this course.

### Assumed Knowledge

It is assumed students will have a basic knowledge of digital image manipulation software for either still or moving images.

### Contact Hours

#### Newcastle City Precinct Lecture

Face to Face On Campus  
1 hour(s) per Week for 2 Weeks starting Week 1  
Weeks 1 and 7

#### Self-Directed Learning

Face to Face On Campus  
1 hour(s) per Week for 10 Weeks

#### Tutorial

Face to Face On Campus  
2 hour(s) per Week for 10 Weeks starting Week 2  
Weeks 2-6 and Weeks 8-12

### Unit Weighting Workload

10  
Students are required to spend on average 120-140 hours of effort (contact and non-contact) including assessments per 10

# COURSE OUTLINE

[www.newcastle.edu.au](http://www.newcastle.edu.au)

CRICOS Provider 00109J

unit course.

## CONTACTS

**Course Coordinator** **Newcastle City Precinct**  
Mr Jack Mcgrath  
Jack.Mcgrath@newcastle.edu.au  
Consultation: By appointment, please email to set up a time for a meeting

**Teaching Staff** Other teaching staff will be advised on the course Canvas site.

**School Office** **School of Humanities Creative Industries and Social Sciences**  
NU Space, Level 4  
409 Hunter Street  
Newcastle  
HCISS@newcastle.edu.au  
+61 4985 4500

## SYLLABUS

**Course Content**

- Theory and practise of virtual environment design
- Creating physical and virtual spaces for animation, games and installations
- Virtual production design concepts and principals
- Designing for virtual production content and/or hybrid digital/physical creative projects

**Course Learning Outcomes** **On successful completion of this course, students will be able to:**

1. Create 3D sets, environments and landscapes
2. Analyse, breakdown and critique professional examples of virtual design
3. Apply the fundamentals of environment design to a creative production concept
4. Design physical and virtual spaces for animation, installation, film and games

**Course Materials** **Other Resources:**

- See Canvas for details

## ASSESSMENTS

This course has 4 assessments. Each assessment is described in more detail in the sections below.

	Assessment Name	Due Date	Involvement	Weighting	Learning Outcomes
1	Journal 20%	Friday the 27th of October by 5pm	Individual	20	1, 2, 3
2	Project 1 30%	Weeks 3, 5 & 7 (Friday 5pm)	Individual	30	1, 2, 3
3	Presentation 20%	Week 9 in class	Individual	20	3
4	Project 2 30%	Friday the 27 <sup>th</sup> of October by 5pm	Individual	30	1, 3, 4

**Late Submissions** The mark for an assessment item submitted after the designated time on the due date, without an approved extension of time, will be reduced by 10% of the possible maximum mark for that assessment item for each day or part day that the assessment item is late. Note: this applies equally to week and weekend days.

## Assessment 1 - Journal 20%

<b>Assessment Type</b>	Process Journal
<b>Description</b>	Creation of a process journal that details the decision making, references, experiments, and technical process behind the making of their work throughout the semester. Students must be keeping notes and documenting their work throughout the course in preparation for this task. Detailed brief will be available on Canvas.
<b>Weighting</b>	20%
<b>Length</b>	15-20 A4 pages (landscape)
<b>Due Date</b>	Friday the 27th of October by 5pm
<b>Submission Method</b>	Online
<b>Assessment Criteria</b>	Rubric – See Canvas for details
<b>Return Method</b>	Online
<b>Feedback Provided</b>	Online

## Assessment 2 - Project 1 30%

<b>Assessment Type</b>	Project
<b>Description</b>	Three 3D environment exercises to be completed and submitted based on tutorial exercises. Detailed briefs will be available on Canvas.
<b>Weighting</b>	30%
<b>Length</b>	15 – 30 seconds each
<b>Due Date</b>	Weeks 3, 5 & 7 (Friday 5pm)
<b>Submission Method</b>	Online
<b>Assessment Criteria</b>	Rubric – See Canvas for details
<b>Return Method</b>	Online
<b>Feedback Provided</b>	Online

## Assessment 3 - Presentation 20%

<b>Assessment Type</b>	Presentation
<b>Description</b>	The Presentation is a proposal for Project 2. The presentation must be accompanied with slides that include evidence of research for the project. More information detailed brief available on Canvas. Slide show presentation must also be submitted to Canvas as a multipage PDF.
<b>Weighting</b>	20%
<b>Length</b>	5-7 minutes
<b>Due Date</b>	Week 9 in class
<b>Submission Method</b>	Online & In class
<b>Assessment Criteria</b>	Rubric – See Canvas for details
<b>Return Method</b>	Online
<b>Feedback Provided</b>	Online & In class

## Assessment 4 - Project 2 30%

<b>Assessment Type</b>	Project
<b>Description</b>	3D Environment major work. The work must demonstrate at least two techniques covered in the course. The work must be no longer than 100secs including titles min 60secs including max of 10 seconds of titles. Detailed brief available on Canvas.
<b>Weighting</b>	30%
<b>Length</b>	60-100 seconds
<b>Due Date</b>	Friday the 27 <sup>th</sup> of October by 5pm
<b>Submission Method</b>	Online
<b>Assessment Criteria</b>	Rubric – See Canvas for details
<b>Return Method</b>	Online
<b>Feedback Provided</b>	Online

# ADDITIONAL INFORMATION

## Grading Scheme

This course is graded as follows:

Range of Marks	Grade	Description
85-100	High Distinction (HD)	Outstanding standard indicating comprehensive knowledge and understanding of the relevant materials; demonstration of an outstanding level of academic achievement; mastery of skills*; and achievement of all assessment objectives.
75-84	Distinction (D)	Excellent standard indicating a very high level of knowledge and understanding of the relevant materials; demonstration of a very high level of academic ability; sound development of skills*; and achievement of all assessment objectives.
65-74	Credit (C)	Good standard indicating a high level of knowledge and understanding of the relevant materials; demonstration of a high level of academic achievement; reasonable development of skills*; and achievement of all learning outcomes.
50-64	Pass (P)	Satisfactory standard indicating an adequate knowledge and understanding of the relevant materials; demonstration of an adequate level of academic achievement; satisfactory development of skills*; and achievement of all learning outcomes.
0-49	Fail (FF)	Failure to satisfactorily achieve learning outcomes. If all compulsory course components are not completed the mark will be zero. A fail grade may also be awarded following disciplinary action.

\*Skills are those identified for the purposes of assessment task(s).

## Communication Methods

Communication methods used in this course include:

## Course Evaluation

Each year feedback is sought from students and other stakeholders about the courses offered in the University for the purposes of identifying areas of excellence and potential improvement.

## Oral Interviews (Vivas)

As part of the evaluation process of any assessment item in this course an oral examination (viva) may be conducted. The purpose of the oral examination is to verify the authorship of the material submitted in response to the assessment task. The oral examination will be conducted in accordance with the principles set out in the [Oral Examination \(viva\) Procedure](#). In cases where the oral examination reveals the assessment item may not be the student's own work the case will be dealt with under the [Student Conduct Rule](#).

## Academic Misconduct

All students are required to meet the academic integrity standards of the University. These standards reinforce the importance of integrity and honesty in an academic environment. Academic Integrity policies apply to all students of the University in all modes of study and in all locations. For the Student Academic Integrity Policy, refer to <https://policies.newcastle.edu.au/document/view-current.php?id=35>.

## Adverse Circumstances

The University acknowledges the right of students to seek consideration for the impact of allowable adverse circumstances that may affect their performance in assessment item(s). Applications for special consideration due to adverse circumstances will be made using the online Adverse Circumstances system where:

1. the assessment item is a major assessment item; or
2. the assessment item is a minor assessment item and the Course Co-ordinator has specified in the Course Outline that students may apply the online Adverse Circumstances system;
3. you are requesting a change of placement; or
4. the course has a compulsory attendance requirement.

Before applying you must refer to the Adverse Circumstance Affecting Assessment Items Procedure available at:

<https://policies.newcastle.edu.au/document/view-current.php?id=236>

**Important Policy  
Information**

The Help button in the Canvas Navigation menu contains helpful information for using the Learning Management System. Students should familiarise themselves with the policies and procedures at <https://www.newcastle.edu.au/current-students/no-room-for/policies-and-procedures> that support a safe and respectful environment at the University.

*This course outline was approved by the Head of School. No alteration of this course outline is permitted without Head of School approval. If a change is approved, students will be notified and an amended course outline will be provided in the same manner as the original.*

© 2023 The University of Newcastle, Australia