MODULE SPECIFICATION

Part 1: Information			
Module Title	Audio for Games		
Module Code	UFCFA6-15-3	Level	Level 6
For implementation from	2019-20		
UWE Credit Rating	15	ECTS Credit Rating	7.5
Faculty	Faculty of Environment & Technology	Field	Computer Science and Creative Technologies
Department	FET Dept of Computer Sci & Creative Tech		
Module type:	Standard		
Pre-requisites	Audio Process Design and Implementation 2019-20		
Excluded Combinations	None		
Co- requisites	None		
Module Entry requirements	None		

Part 2: Description

Educational Aims: See Learning Outcomes.

Outline Syllabus: Games development and production:
Typical games development roles. Development workflow. Platforms: desktop computers, consoles and handheld devices. Development systems: game engines, middleware.

Asset management:
Audio assets: copyright and licensing. Naming systems and databases. Audio compression formats.

Dialogue production:
Recording dialogue. Actor selection and direction. Localisation of audio assets in games (i.e., multiple languages).

Generative techniques:
Terminology: generative, interactive, adaptive, non-linear. Stochastic techniques: randomness, probability, weighted randomness / probabilities distributions, Markov models. Algorithmic techniques: rules, linear mapping, exponential mapping, arbitrary mapping.

Generative music:

History of interactive, generative and stochastic music. Applying generative techniques to music.

Interactive sound effects:
Recording Foley and other sound effects. Sound design. Making believable sound effects in an interactive or game context. Applying generative techniques to sound effects. Controlling continuous sounds: wind, rain, engines. Triggering sounds: weapons, footsteps, thunder, doors.

Testing and quality:
Importance of testing. Test suites. User testing. Quality control.

Teaching and Learning Methods: Theoretical and conceptual aspects of the module will be introduced by lecture on a weekly basis and, where appropriate, contextualised with practical demonstrations of application. Relevant reading material and sections from the course text should be read in preparation for each lecture. On average this will require a total of 1.5 hours study each week.

Learners will apply the conceptual elements of taught material in weekly practical sessions where abilities in problem solving and implementation surrounding audio technology concepts will be developed. Learners are required to complete exercises, extend ideas, and develop further understanding independently of the timetabled sessions. On average this will require a total of 2 hours study each week.

Assignments will be staged throughout the year which will require students to complete additional unsupervised learning. Typically this will require 2 hours study each week although it should be anticipated that the majority of this time will be biased towards the assignment deadlines.

Contact time: 36 hours
Assimilation and development of knowledge: 74 hours
Exam preparation: 10 hours
Coursework preparation: 30 hours
Total study time: 150 hours

Part 3: Assessment

The assignments and presentation will be used to assess learners' practical skills in the application of music and audio technology systems. This will involve demonstrating an ability to create an extended piece of work beyond the examples seen in lectures and practicals. The assignment activities will be staged in order to allow progressive development of skills and understanding.

Formative assessment will be provided as part of the practical sessions. Individual feedback will be provided on the assignment and presentation.

Assessment criteria will be supplied with the assignment specification and in example exam papers.

First Sit Components	**Final Assessment**	**Element weighting**	**Description**
Practical Skills Assessment - Component B		75 %	Practical assignment and write up
Performance - Component A	✓	25 %	Interactive music presentation
Resit Components	**Final Assessment**	**Element weighting**	**Description**
Practical Skills Assessment - Component B		75 %	Practical assignment and write up
Examination - Component A	✓	25 %	Exam (120 mins)

Part 4: Teaching and Learning Methods

Learning Outcomes

On successful completion of this module students will achieve the following learning outcomes:

Module Learning Outcomes	Reference
Record, edit and prepare dialogue assets for playback in an interactive context such that the flow of speech is natural and believable	MO1
Select, assemble and process sound effects assets for a range of game oriented sound types	MO2
Utilise game audio middleware tools to implement believable soundscapes in games with specific reference to mixing, 3D audio behaviour and randomisation of appropriate parameters	MO3
Deconstruct musical material for interactive playback to create dynamic soundtracks	MO4

Contact Hours

Independent Study Hours:	
Independent study/self-guided study	114
Total Independent Study Hours:	114
Scheduled Learning and Teaching Hours:	
Face-to-face learning	36
Total Scheduled Learning and Teaching Hours:	36
Hours to be allocated	150
Allocated Hours	150

Reading List

The reading list for this module can be accessed via the following link:

https://uwe.rl.talis.com/modules/ufcfa6-15-3.html

Part 5: Contributes Towards

This module contributes towards the following programmes of study: