

# Middle East College

Muscat, (Sultanate of Oman)
Validated Programme Leading to the Award of:
BSc (Hons) Multimedia Technology

## 1. ESSENTIAL QUALITIES AND ATTRIBUTES OF THE PROGRAMME'S GRADUATES

Demand is strong for skilled and knowledgeable graduates in the field of multimedia applications and this programme aims to prepare the student in different multimedia tools and technologies. In particular, students are equipped to develop and use the tools that satisfy the professional requirements in today's web based world.

# 2. RATIONALE OF THE PROGRAMME

In today's world the web has become an integral part of human life. What began as a common and quick reference point for information sharing and communication medium has now started inviting the attention of several people by transforming itself as a source for several activities in different fields such as business, education, games, politics, environment, culture, education and so on.

The role of multimedia becomes significant in the context of effectively using the web. The need for creating sophisticated tool sets and strengthening related research studies has been realised considering the range of users involved.

This programme aims to equip the student to respond to the high needs of the market that has developed on account of the growth in the field of multimedia and related areas. The programme is designed to include the theories and practice that are appropriate to a student at identified levels. Tracing the development of art through different ages the programme moves on to building the required analytical skills and logical ability. The art of programming and ability to develop systems based on requirement specification are an integral part of the programme.

The programme encompasses the key concepts of interactive multimedia, its history, hardware and software, current tools and techniques, creativity and content development. Planning and development of a multimedia production by using the components like graphics, audio, video, text and animation is the objective. All these open several areas of opportunities for qualified and talented people who will address the needs of several activities such as animation specialists, strategy developer, game builder and so on. From a regional perspective, with the increasing using of web the need for content development from a regional perspective has been observed. Furthermore the need to identify good practices across the globe and adapt the same for the regional needs has been considered. In a very innovative way, the programme meets the needs and expectations of the industry, the related community and consumer.

BSc (Hons) - M	lultimedia Technology												
	Year 1	L	C.P	Year 2	L	C.P	Year 3	L	СР	umme	Year 4	L	C.P
Fall Semester	College Mathematics	0	10	Software Engineering	1	10	DESIGN PERSPECTIVES	2	15		Omani Studies	0	10
	Programming Logic Development	0	10	Business Communication	0	10	3-D MODELLING AND ANIMATION	1	15		SPECIAL TOPIC / Systems Project Management	3	15
	English for Special Purpose	0	10	FUNDAMENTALS OF RELATIONAL DATABASE MANAGEMENT SYSTEM	2	15	Advanced Multimedia	2	10		ADVANCED HUMAN COMPUTER INTERACTION	3	15
	DESIGN BASICS	1	15	Object Oriented Paradigm	1	10	Server Side Programming	2	10		Interactive Media	3	10
	GRAPHIC ART	1	15	ELECTIVE - I	1	15	Object Oriented Design using UML	2	10		Project Planning	3	10
		15			60				60	ı z			60
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Spring Semester	Probability and Statistics	0	10	Multimedia	1	10	Business Environment	0	10		Advanced Digital Technologies	3	10
	Introduction to Internet	0	10	Object Oriented Programming	1	10	DIGITAL MEDIA PRODUCTION	2	15		Knowledge-Based Web Design	3	10
	Calculus and Numerical Methods	1	10	Rapid Applications Development	1	10	Internet Programming	2	10		ELECTIVE - III	3	10
	CREATIVE THINKING	0	15	Web Applications Development	1	10	E-Commerce Technologies	3	10		ELECTIVE - III	,	
	INTRODUCTION TO PROGRAMMING	0	15	PROJECT - I	2	20	ELECTIVE - II	2	15		Project Design and Implementation	3	30
			60			60			60				60
	Certificate in Design Technology			Diploma in Multimedia Technology			Advanced Diploma in Multimedia Technology				BSc (Hons) in Multimedia Technology		
WHITE	10	COLLEGE REQUIREMENT		Level 0		110							
TURQUOISE	10	DEPARTMENTAL REQUIREMENT											
YELLOW	13	MAJOR ELECTIVES			Level 1		125						
RED	2	PROJECT											
LAVENDAR	4	ELECTIVES					Level 2	125					
	39												
							Level 3	120					
								480 245					
						Level 2+Level 3							

## 3. PROGRAMME LEARNING OUTCOMES

On successful completion of the programme, students should be able to:

- demonstrate knowledge and understanding of essential facts, concepts, principles and theories relating to multimedia technology.
- 2. deploy appropriate theory, practices and tools for the specification, design, deployment and marketing of a multimedia product.
- 3. evaluate a multimedia product in terms of general quality attributes and assess the extent to which it meets the specification for its current use and future development.
- 4. present succinctly to a range of audiences (orally, electronically or in writing) rational and reasoned arguments that explain the construction, application and value of a multimedia product.
- 5. recognise the professional, commercial and ethical issues involved in the exploitation of multimedia technology and be guided by the adoption of appropriate professional, ethical and legal practices.
- 6. work effectively as a member of a development team, recognising the different roles within a team and different ways of organising teams.

Transferable skills form an integral part of most modules. Self-directed learning and the necessity to work within tight deadlines are essential requirements in all parts of the curriculum. A variety of assessment techniques will ensure that students are given every opportunity to demonstrate skills in these areas.

### 4. PROGRAMME LEARNING OUTCOMES and CORE MODULES MAPPING

MODULE	1	2	3	4	5	6
Introduction to Internet	Х					
Programming logic Development	Х					
Design Basics	Х					
Graphic Art		Х		х		Х
Creative Thinking		Х	Х			Х
Introduction to Programming		Х				
Design Perspectives	Х					
Multimedia		X				х
Object Oriented Paradigm		Х				
Object Oriented Programming		Х				
Rapid Applications Development		Х	Х			
Web Applications Development		Х				Х
Project 1				х	Х	Х
Marketing Management		Х		х		
3-D Modelling and Animation	Х					
Advanced Multimedia		Х				
Active Server Pages		Х				
Object Oriented Design using UML	Х					
Digital Media Production	Х		Х			
Internet Programming		Х				
E-Commerce Technologies					Х	
Systems Project Management				Х	х	
Advanced Human Computer Interaction	Х		Х			
Interactive Media	Х					
Advanced Digital Technologies		Х				
Knowledge Based Web Design	Х		Х			
Project Planning	Χ	Х	Х	Х		
Project Design and Implementation	Χ	X	Х	Х	Х	Х