APPROVED

Award:	Honours Bachelor Degree	**NFQ Level:**	8	**No. of Semesters:**	8
Official Code:	TA_KACOM_B	**Mode of Delivery:**	Full Time	**Embedded Award:**	No
Department:	Computing				

Programme Outcomes

On successful completion of this programme the learner will be able to :

PO1	**Knowledge - Breadth**	
	(a)	Systems development for emerging platforms. 2D and 3D computer graphics. The management of information within the organisation. Object oriented and Distributed information systems. Network design and management. Analysis of the theory of computation and formal specification.
PO2	**Knowledge - Kind**	
	(a)	A detailed knowledge of the technical aspects of developing computer systems. A strong technical base in designing and developing distributed systems solutions. The knowledge relevant to the analysis, design and development of IT solutions to business problems. The knowledge and skills required to understand the impact of IT on organisations. The theory of computation.
PO3	**Skill - Range**	
	(a)	Use a current object oriented database. Design, develop, implement test and debug: - Applications for enterprise software development platforms. - Web services. - Applications for current and emerging mobile platforms - 2D and 3D computer graphic applications. - XML based applications. Design, build and manage a local-area and wide-area network using current and emerging networking technologies. Write a specification for an information system using a formal specification technique. Information management.

PO1	**Knowledge - Breadth**	
PO4	**Skill - Selectivity**	
	(a)	Selection of appropriate development platforms for IS solutions. Management, design and trouble shooting of complex computer networks. Selection of appropriate database technologies. Selection of appropriate systems architectures to meet user requirements.
PO5	**Competence - Context**	
	(a)	An ability to undertake an independent piece of work, and see it through to completion. An ability to research, analyse and apply emerging technologies and applications. An ability to integrate new technologies and solutions with legacy systems. An understanding of group working and dynamics.
PO6	**Competence - Role**	
	(a)	The knowledge and skills to understand the effects of IT on organisations. Interpersonal and communication skills. An understanding of career paths and opportunities open to IT professionals. A motivation and ability for self-development and learning. An ability to work effectively within a team environment.
PO7	**Competence - Learning to Learn**	
	(a)	Problem solving and strategic analysis techniques Time management and self-productivity. Project management. Work effectively both as an individual and within a team environment. Undertake a project independently: plan and manage it and see it through to completion.
PO8	**Competence - Insight**	

PO1	Knowledge - Breadth	
	(a)	An appreciation of the limitations of algorithmic based solutions. An appreciation of the impact of information technology within society.

Semester Schedules

Semester 1

Mandatory	
Module Code	**Module Title**
SWDV H1001	Software Development 1
SYAN H1001	Systems Analysis
COAR H1001	Computer Architecture
WBDB H1002	Web and Database Fundamentals
INFO H1020	Business & Information Systems
MATH H1030	Discrete Mathematics 1

Semester 2

Mandatory	
Module Code	**Module Title**
SWDV H1002	Software Development 2
SYAN H1004	Systems Analysis 2
VSDE H1001	Visual Design
OPSY H1002	Intro. to Operating Systems
COMM H1017	Communications
STAT H1003	Statistics

Semester 3

Mandatory	
Module Code	**Module Title**
SWDV H2001	Software Development 3
SOEN H2001	Software Engineering
NETW H2003	Networking 1
DBAS H2001	Database
MATH H2030	Discrete Mathematics 2
FMNG H2001	Financial Management

Semester 4

Mandatory	
Module Code	**Module Title**
SWDV H2002	Software Development 4
PROJ H2030	Project
NETW H2004	Networking 2
WEBD H2001	Web Design and Development
MNGT H2003	Computer Services Management
MNSC H2001	Management Science

Semester 5

Mandatory	
Module Code	**Module Title**
OOSW H3001	Software Development 5
OOSD H3001	Object Oriented Systems Des 1
DMCO H3001	Distributed & Mobile Computing
ADDB H3001	Advanced Database
WEBD H3001	Web Design & Development 2
LOGC H3001	Logic and Problem Solving

Semester 6

Mandatory	
Module Code	**Module Title**
OOSW H3002	Software Development 6
OOSD H3002	Object Oriented Systems Des 2
PROJ H3030	Project
OPSY H3003	Operating Systems
IENT H3001	Innovation & Entrepreneurship
LINA H3001	Linear Algebra

Semester 7

Mandatory	
Module Code	**Module Title**
ADDB H4001	Advanced Database Applications
OOSW H4001	Software Development 7
COTH H4001	Computational Theory
IMDE H4001	Interactive Media Design
INMG H4001	Infoformation Management
PROJ H4030	Project 1

Semester 8

Mandatory	
Module Code	**Module Title**
DCST H4001	Distr Component SWare Tech
ENAP H4001	Enterprise Applications Arch.
COIS H4001	Co-operative Info Systems
NWMG H4001	Network Management
INME H4001	Interactive Media Development
PROJ H4031	Project

Optional	
Module Code	**Module Title**
WIRE H4002	Wireless Networking