

APPROVED

Bachelor of Science (Honours) in Computing in Cloud and Data Centre Operations
Informatics and Creative Arts

Programme Short Title	BSc (Honours) in Computing in Cloud and Data Centre Operations				
Programme Code	DK_ICCDC_8	Mode of Delivery	Full Time On Campus, Part Time On Campus, Modular, Full Time Blended	No. of Semesters	2
Semesters Per Stage	2	NFQ Level	8	Programme Credits	60
Language of Instruction	English				
Field of Study	0613 - Computer Science				
Educational Aim of Programme	The overall aim of this course is to produce Computing graduates with a specialisation in different aspects of Data Centre Operations. They will be capable of thriving in a constantly connected, constantly changing technological landscape. It will enhance their skills with Cloud technologies and techniques while affording them an increased appreciation of the wider social, business, architectural and development context in which they will work. The course will produce perceptive, adaptable graduates, competent to prosper in employment, research or business.				
External Code	Code:				

Programme Learning Outcomes (PLOs)

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

#	Description
PLO1	The learner will have knowledge and understanding of advanced concepts in the following areas: • Computer Systems • Software Engineering • Computing Techniques • Computer Networks • Cloud Architecture • Social and Professional Issues
PLO2	explain concepts and theories of one or more specialist computing area, including state-of-the-art technology;
PLO3	describe the limitations of some current computing theories and knowledge;
PLO4	explain how academic and industrial research leads to new computing knowledge and technologies.
PLO5	model and design complex computer-based systems in a way that demonstrates comprehension of the trade-off involved in design choices;
PLO6	deploy appropriate theory, practices and tools for the specification, design, implementation and evaluation of computer-based systems;
PLO7	apply quality concepts to computing products and processes;
PLO8	analyse the extent to which a computer-based system meets the criteria demanded for its current use and future development;
PLO9	conduct research in topics in computing under close supervision and guidance;
PLO10	locate and evaluate information through online research.
PLO11	evaluate computer based systems in terms of general quality attributions and possible trade-offs presented within the given problem;
PLO12	specify, design and implement computer-based systems;
PLO13	manage a computer-based project throughout all stages of the lifecycle;
PLO14	identify and analyse criteria and specifications appropriate to specific problems with a focus on security and plan strategies for their solution;
PLO15	identify and select appropriate strategies to solve system problems;
PLO16	develop innovative solutions to real-life situations.
PLO17	select and implement measures to address identified risks or safety aspects relevant to computing systems within a given context;
PLO18	apply best practice in a range of real-world contexts;
PLO19	adopt appropriate professional, ethical and legal practices in the exploitation of computer technology;
PLO20	act effectively and choose an appropriate response from a range of possibilities;
PLO21	transfer and apply creative and diagnostic skills in a range of contexts;
PLO22	assess the impact of new technologies in a given environment.
PLO23	work effectively as an autonomous individual;
PLO24	manage issues involved in leading complex groups;
PLO25	work as a member of a development team, recognising the different roles within a team and different ways of organising teams;
PLO26	interact effectively with staff at all levels of an organisation;
PLO27	work in an international context;
PLO28	design and manage small group projects;

PLO29	constructively criticise the work of others.
PLO30	select and apply appropriate research skills;
PLO31	evaluate own strengths and weaknesses;
PLO32	identify limitations of own knowledge;
PLO33	constructively criticise own work;
PLO34	manage one's own learning and development, including time management and organisational skills;
PLO35	apply quality concepts to products and processes of own work.
PLO36	identify and appropriately address ethical issues;
PLO37	describe examples and benefits of diversity and multiculturalism;
PLO38	describe and adapt inter-personal interactions based on knowledge of the cultures and customs of other countries.

Semester Schedules

Stage 1 / Semester 1

Mandatory	
Module Code	Title
COMP I8010	Cloud Architecture
NETW I8001	Cloud Networking
COMP I8004	Data Centre Infrastructure
PROJ I8004	Project
PROJ I8001	Research Methods
COMP I8001	Virtual Server Technology

Stage 1 / Semester 2

Mandatory	
Module Code	Title
BUSS C8017	Business Organisation
COMP I8003	Data Storage Technologies
COMP I8009	Enterprise Governance & Compliance