

# B.Sc Information Systems & Technology





#### PROGRAM DESCRIPTION

The Bachelor of Science in Information Systems & Technology program delivers a blend of technical specialties alongside core business concepts, which are increasingly useful in the global interconnected knowledge-based economy.

#### **DEGREE REQUIREMENTS**

**150 UNITS** 

9 UNITS

GENERAL EDUCATION REQUIREMENTS 39 UNITS STRATEGIES FOR UNIVERSITY SUCCESS 3 UNITS

SUS 1010 Strategies for University Success

RESEARCH METHODS 3 UNITS

GRM 2000 Introduction to Research Methods

SYMBOLIC SYSTEMS AND INTELLECTUAL SKILLS 12 UNITS

Written, Analytical, Critical Thinking Skills 6 Units

ENG 1106 Composition I (WI) ENG 2206 Composition II (WI)

Quantitative and Technological Skills 6 Units

IST 1020 Introduction to Information Systems

MTH 1109 College Algebra

## LANGUAGE STUDIES 6 UNITS

Students must have credit for a foreign language or must take up to a two-course foreign language sequence of one language.

USIU-Africa offers courses in Arabic, French, Japanese, Spanish, Swahili and Chinese.

## COMMUNITY SERVICE OR COMMUNITY PROJECT 3 UNITS

CMS 3700 Community Service

## THE SENIOR EXPERIENCE 3 UNITS

The Senior Experience is required for each undergraduate degree program.

SEN 4800 Integrated Senior Seminar

## GENERAL EDUCATION ELECTIVES

Students are required to pick **2 elective courses (6 Units)** from the other schools. **One of the courses should be an upper level course**. Lower Level courses are coded 1000-2999 while upper level courses are coded 3000 - 4999

The following Chandaria School of Business Lower Elective course is compulsory.

BUS 1010 Introduction to Business Organizations

## CHANDARIA SCHOOL OF BUSINESS UPPER LEVEL ELECTIVES

MGT 4030: Cross Cultural Management

BUS 4090: Strategic Management

## SCHOOL OF HUMANITIES AND SOCIAL SCIENCES LOWER LEVEL ELECTIVES

PSY 1101: Introduction to Psychology

PHL 1104: Introduction to Philosophy

SOC 2201: Introduction to Sociology

### **UPPER LEVEL ELECTIVES**

GEO 3000: Geography and the Environment

PSY 3135: Psychology of Communication

SOC 3301: Social Problems

PHL 3310: Ethics and Value Theory

SOC 3500: Social Conflict & Resolution

LIT 4815: Oral Literature



MAJOR 96 UNITS

#### **LOWER DIVISION CORE COURSES**

#### **24 UNITS**

APT	1040	Introduction to Web Applications & Design
MTH	2055	Hardware and Software Practicum
IST	2010	Computer Organization & Assembly Programming
APT	1030	Fundamentals of Programming Languages
IST	1025	Introduction to Programming
IST	2045	Introduction to Computer Networks
IST	2060	Data Structures and Algorithms
МТН	2010	Probability & Statistics

### **UPPER DIVISION CORE COURSES**

#### **72 UNITS**

APT	3050	Introduction to Project Management
APT	3065	Mid-Term Project
APT	3080	Management Information Systems
BUS	3010	Business Law
BUS	3020	Production and Operations Management
BUS	4070	Business Values and Ethics
MGT	3010	Overview of Management Practice
IST	3005	Application of Social Media for Business
IST	3015	Business Data Analytics
IST	3020	Principles of Operating Systems
IST	3040	Digital Lab
IST	3050	Introduction to Security Systems
IST	4020	Systems Analysis and Design
IST	4030	Database Management Systems
IST	4035	Advanced Web Design and Applications
IST	4040	Decision Analysis
IST	4060	Telecommunications and Networks
IST	4070	Object-Oriented Programming
IST	4072	Object-Oriented Analysis and Design
IST	4075	Mobile Applications Development
IST	4078	IT Innovation and Entrepreneurship
IST	4900	Information Technology Project
IST	4910	Information Systems Internship
MKT	3010	Principles of Marketing



#### CONCENTRATION COURSES

#### 15 UNITS

Information Systems and Technology majors must take Applications, Networking or Forensic Information Technology and Cybercrime as their concentration or area of specialization.

#### **APPLICATIONS**

APP 4010	Software	Engineering

APP 4020 Design & Development of Cloud Applications

APP 4035 Web Application Development Frameworks

APP 4070 System Programming

APP 4080 Collaborative (Team Work in) Software Development

#### **NETWORKING**

DST 4010 Distributed Systems

NET 4020 Network Management and Security

NET 4030 Internet Architecture and Protocols

APP 4035 Web Application Development Frameworks

NET 4050 Sensor Networks and Internet of Things

#### FORENSIC INFORMATION AND CYBERCRIME

FIC 4010 Information System Security

FIC 4020 Forensic Accounting and Fraud Investigation

FIC 4030 Information Systems Audit

FIC 4040 Information Technology and Cybercrime

FIC 4050 Computer Forensics and Investigation

#### **CAREER OPTIONS**

- Network Administrator
- Information Systems Manager
- Information Systems Developer
- Mobile Applications Developer
- Systems Analyst
- Information Systems Project Manager
- IT Consultant
- Systems Administrator
- Web Applications Developer
- Information Systems Auditor

#### **CONTACTS**

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