# MONARCH UNIVERSITY American University

## BACHELOR OF INFORMATION TECHNOLOGY (BIT)

**PROGRAM BROCHURE** 

#### **PROGRAM DESCRIPTION**

The Bachelor of Information Technology (BIT) is a comprehensive degree program designed to equip students with the foundational knowledge, practical skills, and analytical capabilities required to excel in the ever-evolving field of information technology. The curriculum blends both theoretical concepts and hands-on experience, to ensure that graduates are prepared to tackle real-world challenges and contribute significantly to the IT industry. Whether the goal is to prepare for a new career or advance with a current employer, IAU's BIT program pushes students to grow professionally.

#### **ADMISSIONS REQUIREMENTS**

Education: IAU requires either evidence of an earned high school diploma, General Educational Development (GED) test, or the successful completion of 12 semester units earned at an appropriately accredited postsecondary institution or foreign equivalent. Exceptions may be made on a case-by-case basis.

Information Technology: Possess computer and internet skills sufficient to effectively participate in IAU's pedagogical model and conduct research at the undergraduate level.

Evidence of English Proficiency: IAU requires writing skills at the appropriate level. Proficiency in reading, writing, speaking, and understanding English is essential to your success at IAU. If English is not the applicant's native language, or if an applicant has not had their secondary education taught in English, they will be required to provide proof of English Proficiency. Since classes are taught in English, an applicant must demonstrate their ability to read, write and speak English.

## BACHELOR OF INFORMATION TECHNOLOGY (BIT)

#### CORE COURSES \*

BIT Components		Sem.Hrs.
General Education Component   12 courses / 36 Sem.Hrs.	Communication & English   3 Courses / 9 Sem.Hrs. (Choose 3, other( can be elective)	s)
	COM 100 Intro to Mass Communication	3
	COM 200 Public Speaking	3
	ENG 100 English Composition	3
	ENG 110 Undergraduate Academic Writing/APA	
	ENG 300 Critical Thinking	
	Social Sciences   3 Courses / 9 Sem.Hrs. (Choose 3, other(s) can be elective)	
	POL 100 Introduction to Political Science	3
	PSY 100 Introduction to Psychology	3
	SOC 100 Introduction to Sociology	3
	SOC 110 Art and Culture	2
	ECN 200 Introduction to Microeconomics	
	Math & Sciences   4 Courses / 12 Sem.Hrs.	
	BUS 150 Business Math	3
	INT 100 Introduction to Information Technology	3
	INT 150 Computer Applications	3
	MAT 200 College Algebra	3
	MAT 220 Introduction to Statistics	
BIT Total Units		120

### BACHELOR OF INFORMATION TECHNOLOGY (BIT)

#### **CORE COURSES \***

BIT Components		Sem.Hrs.
	Cultural Studies  2 Courses / 6 Sem.Hrs. (Choose 2, other(s) can be elective)	
	HIS 100 World History I	3
	REL 100 Introduction to Religion	3
	REL 110 Introduction to the Bible	3
	REL 200 Religions of the World	3
Common Professional Component (CPC)   17 Required Courses / 51 Sem.Hrs.	CSE 100 Fundamentals of Programming	3
	CSE 105 Database Management System	3
	CSE 110 Discrete Structures	3
	CSE 115 Computer Networking	3
	CSE 200 Network and System Administration	3
	CSE 205 Object Oriented programming with J ava	3
	CSE 210 Operating System	3
	CSE 215 Data structures and Algorithms	3
	CSE 220 Principles of Software Engineering	3
	CSE 225 Computer Organization and Architecture	3
	CSE 230 Web Design and Development	3
	CSE 235 Introduction to Cyber Security	3
	CSE 300 Fundamentals of Cloud Computing and Virtualization	3
	CSE 305 Introduction to Artificial Intelligence	3
	CSE 315 Data Warehousing and Data Mining	3
	CSE 405 Software Project Management	3
	MIS 105 Fundamentals of Information Technology	3
BIT Total Units		120

## BACHELOR OF INFORMATION TECHNOLOGY (BIT)

#### CORE COURSES \*

Internship Component   6 Sem.Hrs.The Internship Component requirement can be fulfilled by completing an internship, internship reflection course, or by seeking Prior Experiential Learning credit (PEL).	б
Elective Component   24 Sem.Hrs.The Electives Component requirement can be fulfilled by receiving credit for any undergraduate (<500) course(s) that is/are not a requirement. Concentration Component can be fulfilled by completing the required courses for the concentration.	24
Capstone Component  1 CSE 455 Capstone course/3 Semester Hours	3
BIT Total Units	120