

## Curriculum Structure and Credit Hours

The BSAI requires the completion of 120 credit hours of coursework. In addition, after completing 90 credit hours, the student must complete a 16-week internship program (at least 30 contact hours per week). This internship experience is equivalent to three credit hours, making the total completion requirement 123 credit hours.

## Program Structure

The B.Sc. degree in Artificial Intelligence requires 120 credit hours. After completing 90 credit hours, the student must complete a 16-week internship program (sector normal hours). This internship experience is equivalent to three credit hours, making the total completion requirement 123 credit hours.

Type of Courses	Credit hours
1. General Education Requirements	
(a) University Compulsory Courses	18
(b) University Elective Courses	12
2. BSAI Program Courses	
(a) Mathematics and Statistics Courses	9
(b) Program Core Courses	72
(c) Program Elective Courses	9
(d) Internship	3
<b>Total Credit Hours</b>	<b>123</b>

## Program Courses

### 1. University General Education Courses

#### (a) University Compulsory Courses (18 Cr.Hrs.)

Course No.	Course Title	Th.	Lab .	Tut.	Cr. Hrs.	Prerequisite
AUL100	Introduction to University Life	1	0	0	0	-
EMS 112	Emiratis Studies	3	0	0	3	-
ENG 104	Advanced English Writing	3	0	0	3	-
ENG211	Public Speaking	3	0	0	3	-
THI212	Critical thinking and Quantitative Reasoning	3	0	0	3	-
INN311	Innovation & Sustainable Entrepreneurship	3	0	0	3	60 Credits Hours
STA 114	General Statistics	2	2	0	3	-

**(b) University Elective Courses (12 Cr.Hrs.)**

Course Code	Course Title	Th .	Lab .	Tut.	Cr. Hrs.	Prerequisite
<b>1. Humanities / Arts (3 Credit Hours)</b>						
ART 111	Introduction to Arts	3	0	0	3	-
COM103	Introduction to Film Studies	3	0	0	3	-
FRE211	Conversational French	3	0	0	3	-
HPS111	History and Philosophy of Science	3	0	0	3	-
ISL114	Islamic Culture	3	0	0	3	-
LAW 106	Human Rights	3	0	0	3	-
WLT115	World Literature	3	0	0	3	-
<b>2. Natural Sciences (3 Credit Hours)</b>						
AST211	Astronomy	3	0	0	3	-
BIO111	General Biology	2	2	0	3	-
CHM111	General Chemistry	2	2	0	3	-
ENV113	Science of energy and Global Environment	3	0	0	3	-
FUT101	The Science of the Future	3	0	0	3	-
GEO102	Planet Earth	3	0	0	3	-
PHY111	General Physics	3	0	0	3	-
<b>3. Social or Behavioral Sciences (6 Credit Hours)</b>						
COM102	Media Culture	3	0	0	3	-
CRM101	Introduction to Criminology	3	0	0	3	-
LAW112	Work Ethics	3	0	0	3	-
LED111	Leadership and Team Building	3	0	0	3	-
PSY111	General Psychology	3	0	0	3	-
SSW111	Social Responsibility	1	4	0	3	-

**1. Artificial Intelligence Program Compulsory Courses**

**(a) Mathematics and Statistics Courses (9 Cr. Hrs.)**

Course No.	Course Title	Th.	Lab.	Tut.	Cr. Hrs.	Prerequisite
DAT201	Linear Algebra	3	0	2	3	INT101

INT101	Calculus for Information Technology	3	0	2	3	-
INT202	Discrete Mathematics	3	0	2	3	INT101

**(b) Program Core Courses & Internship (75 Cr. Hrs.)**

Course No.	Course Title	Th.	Lab.	Tut.	Cr. Hrs.	Prerequisite
BAI211	Artificial Intelligence Fundamentals	2	2	0	3	DAT205
BAI301	Deep and Reinforcement Learning	2	2	0	3	DAT405
BAI302	Evolutionary Computation	2	2	0	3	BAI211
BAI311	Natural Language Processing	2	2	0	3	BAI301
BAI312	Machine Learning Operations	2	2	0	3	DAT323, BAI301
BAI313	Computer Vision and Pattern Recognition	2	2	0	3	BAI301
BAI402	AI for Robotics	2	2	0	3	BAI313
BAI411	Internet of Things	2	2	0	3	INT309
BAI490	Artificial Intelligence Summer Internship	16 weeks-Sector normal hours min 30 hours per week			3	90 Cr. Hrs.
BAI498	Capstone Project I	0	6	0	3	90 Credit Hours
BAI499	Capstone Project II	0	6	0	3	BAI498, BAI312
DAT204	Data Engineering	2	2	0	3	INT209
DAT205	Programming for Data Analytics I	2	2	0	3	INT100
DAT302	Programming for Data Analytics II	2	2	0	3	DAT205
DAT323	Big Data Technologies	2	2	0	3	INT302, DAT204
DAT405	Machine Learning	2	2	0	3	DAT205, STA114
INT100	Introductory Programming	2	2	2	3	-
INT201	Object-Oriented Programming	2	2	2	3	INT100
INT205	Fundamentals of Data Communications and Networking	2	2	0	3	INT201
INT209	Data Structures	3	0	2	3	INT201
INT301	Operating Systems	2	2	0	3	INT201
INT302	Database Management Systems	2	2	0	3	INT209

INT303	Fundamentals of Information Security	3	0	0	3	INT205
INT306	Computer Ethics and Professional Practices	3	0	0	3	INT303
INT309	Cloud Computing	2	2	0	3	INT303

**(c) Program Elective Courses (9 Credit Hours)**

Course No,	Course Title	Th.	Lab	Tut.	Cr. Hrs.	Prerequisite
BAI430	Semantic Web	3	0	0	3	BAI311
BAI431	Social Network Analysis	3	0	0	3	INT209
BAI432	Recommender Systems	3	0	0	3	DAT405
BAI435	AI Applications in Finance, Legal, and Industry	3	0	0	3	BAI312
BAI436	Advanced Drone Technology and Autonomous Systems	3	0	0	3	BAI402
BAI437	Special Topics in Artificial Intelligence	3	0	0	3	
BAI438	Human-Computer Interaction	3	0	0	3	BAI312
BAI439	Extended Reality	3	0	0	3	BAI313
INS402	Business Intelligence and Data Warehousing	2	2	0	3	INT302
INT435	Game Programming	2	2	0	3	INT201
INT456	Blockchain and Cryptocurrency Security	3	0	0	3	INT303