ASSOCIATE OF APPLIED SCIENCE IN INFORMATION TECHNOLOGY

Information technology provides systematic foundations that include methodologies and models for conceptualizing the complex dynamics of the Information Technology environment as it applies to information systems design and implementation.

IT professionals possess the right combination of knowledge and practical, hands-on expertise to take care of both an organization's information technology infrastructure and the people who use it. They assume responsibility for selecting hardware and software products appropriate for an organization. They integrate those products with organizational needs and infrastructure and install, customize and maintain those applications, thereby providing a secure and effective environment that supports the activities of the organization's computer users. In IT, programming often involves writing short programs that typically connect existing components (scripting).

Planning and managing an organization's IT infrastructure is a difficult and complex job that requires a solid foundation in applied computing as well as management and people skills. Those in the IT discipline require special skills – in understanding, for example, how networked systems are composed and structured, and what their strengths and weaknesses are. There are important software systems concerns such as reliability, security, usability, and effectiveness and efficiency for their intended purpose; all of these concerns are vital. These topics are difficult and intellectually demanding.

The program supports work processes and employee performance enhancements; is designed to improve overall workgroup and individual productivity; and addresses the creation, distribution, storage, and use of information in all its states. Business processes are incorporated as an integral part of all course content. Information Technology encompasses:

- Client/Server Side Computing
- Project Management
- Multimedia
- Networks
- Database Systems
- System Analysis
- Information Security
- Network/ Cybersecurity
- Application Development
- E-Commerce Programming

IT graduates of the AAS degree program may continue their studies towards a bachelor's degree in a computer or information technology area or may obtain full-time employment as database specialist, help desk support, network technicians, web/digital designers, and in other closely related fields.

IT graduates of the BSAS degree program may obtain full-time employment as web & multimedia designers/developers, network administrators, computer programmers, application developers, database managers, computer systems analysts, cybersecurity specialist, and in other closely related fields.

Associate Degree Program

Graduates of the associate degree program can pursue careers in service and support of information systems, as well as continuing on to a bachelor's degree in information technology. This degree may be earned in four semesters if students average 15-16 hours per semester.

Students wishing to receive the Associate of Applied Science in information technology must complete the following:

COURSE	TITLE	S.H.
FIRST YEAR REQUIREMENT -STUDENT SUCCESS		
YSU 1500	Success Seminar	1-2
or SS 1500	Strong Start Success Seminar	
or HONR 1500	Intro to Honors	
General Education Requirements		
ENGL 1550	Writing 1	3-4
or ENGL 1549	Writing 1 with Support	
ENGL 1551	Writing 2	3
CMST 1545	Communication Foundations	3
MATH 1552	Applied Mathematics for Management	4
Select 2 courses from 2 of the domains: AH, SS, or NS (one must include a lab)		6
Major Requirements		
CSIS 1525	Survey of Modern Operating Systems	3
CSIS 1570	Web Systems and Technologies	3
CSIS 1590	Survey of Computer Science and Information Systems	3
CSIS 1595	Fundamentals of Programming and Problem-Solving 1	2
CSIS 1595L	Fundamentals of Programming and Problem-Solving 1 Lab	1
CSIS 2605	Fundamentals of Programming and Problem- Solving 2	2
CSIS 2605L	Fundamentals of Programming and Problem- Solving 2 Lab	1
CSIS 2620	System Configuration and Maintenance	3
INFO 3704	Business Communication	3
or ENGL 3743	Introduction to Public, Professional and Technical Writing	
CSIS 3722	Development of Databases	3
CSIS 3731	Human-Computer Interaction	3
CSIS 3755	Information Assurance	3
CSIS 3782	Cisco Networking Academy 1	3
Additional Course Work to total 60 s.h.		
Free Electives		7
Total Semester Hours		**60-62**

Year 1

Fall		**S.H.**
YSU 1500 or SS 1500 or HONR 1500	Success Seminar or Strong Start Success Seminar or Intro to Honors	1-2
ENGL 1550 or ENGL 1549	Writing 1 or Writing 1 with Support	3-4
CSIS 1590	Survey of Computer Science and Information Systems	3
CSIS 1595	Fundamentals of Programming and Problem-Solving 1	2
CSIS 1595L	Fundamentals of Programming and Problem-Solving 1 Lab	1
CMST 1545	Communication Foundations	3
MATH 1552	Applied Mathematics for Management	4
	Semester Hours	**17-19**
Spring		
ENGL 1551	Writing 2	3
CSIS 1525	Survey of Modern Operating Systems	3
CSIS 1570	Web Systems and Technologies	3

CSIS 2605	Fundamentals of Programming and Problem-Solving 2	2
CSIS 2605L	Fundamentals of Programming and Problem-Solving 2 Lab	1
General Ed Course		3
	Semester Hours	**15**
Year 2		
Fall		
CSIS 2620	System Configuration and Maintenance	3
CSIS 3722	Development of Databases	3
CSIS 3731	Human-Computer Interaction	3
CSIS 3782	Cisco Networking Academy 1	3
Free Elective		3
	Semester Hours	**15**
Spring		
CSIS 3755	Information Assurance	3
INFO 3704 or ENGL 3743	Business Communication or Introduction to Public, Professional and Technical Writing	3
General Education Course		3
Free Elective		3
Free Elective		1
	Semester Hours	**13**
	Total Semester Hours	**60-62**

Learning Outcomes

1. The Associate program in Information Technology provides preparation for student's basic knowledge of technologies in the implementation and troubleshooting of networks.
2. The Associate program in Information Technology provides preparation for student's basic knowledge of technologies in designing databases and extracting information using appropriate programs or applications.
3. The Associate program in Information Technology provides preparation for student's basic knowledge of technologies in assessing information management processes and procedures and the application of technologies.
4. The Associate program in Information Technology provides preparation for student's basic knowledge of technologies in developing interactive programs.