AUTOMATION TECHNOLOGY PROGRAM

ASSOCIATES DEGREE IN AUTOMATION TECHNOLOGY

Curriculum

The matrix below is a sample plan for all coursework required for this program.

Fall and Spring

Course Number and Name	Credits
ICS 1103 Programming I	3
ICS 1123 Semiconductors I	3
ICS 1153 Networking I	3
ICS 1163 Fundamentals of Electricity I (DC Circuits)	3
ICS 1173 Fundamentals of Electricity II (AC Circuits)	3
TMAT 1203 Technical Mathematics	3
Total Hours	**18**

Fall

Course Number and Name	Credits
ICS 1143 Introduction to Digital Logic	3
ICS 1253 Networking II	3
ICS 1303 PC Maintenance I	3
ICS 2203 Computer System Components	3
ICS 2213 Semiconductors II	3
ENGL 1013	3
Total Hours	**18**

Spring

Course Number and Name	Credits
ICS 2123 Industrial Fluid Power	3
ICS 2133 Introduction to Programmable Controllers	3
ICS 2143 Programmable Controllers	3
ICS 2153 Introduction to Industrial Automation	3
ICS 2163 Industrial Automation	3
Total Hours	**15**

Fall and Spring

Course Number and Name	Credits
Any Approved Social Science [1]	3

Course Number and Name	Credits
BST 1303 Introduction to Computers or CIS 1113 Fundamental Computer Operation	3
ENGL 1023	3
Total Hours	**9**

(Concurrent students who earn a Certificate of Proficiency in Machining Concepts and Operations and a Certificate of Proficiency in Maching Operations Milling and Turning may progress to earn a Technical Certificate in Industrial Electronic Technology then an Associate of Applied Science degree by completing the remaining required courses below. Students pursuing the machining operations path will actually earn 62 hours.)

Certificate of Proficiency in Machining Concepts and Operations

Course Number and Name	Credits
ICS 2513 Blueprint Reading, Precision Measurements, and Safety	3
ICS 2523 Machining Technology	3
Total Hours	**6**

Certificate of Proficiency in Machining Operations Milling and Turning

Course Number and Name	Credits
ICS 2514 Computer Numerical Control (CNC) Milling	4
ICS 2424	4
Total Hours	**8**

Fall

Course Number and Name	Credits
ENGL 1013	3
ICS 2123 Industrial Fluid Power	3
ICS 1163 Fundamentals of Electricity I (DC Circuits)	3
ICS 1173 Fundamentals of Electricity II (AC Circuits)	3
TMAT 1203 Technical Mathematics	3
Total Hours	**15**

Spring

Course Number and Name	Credits
ICS 1123 Semiconductors I	3
ICS 1143 Introduction to Digital Logic	3
ENGL 1023	3
BST 1303 Introduction to Computers or CIS 1113 Fundamental Computer Operation	3
Approved Social Science	3

Course Number and Name	Credits
Total Hours	**15**

Fall

Course Number and Name	Credits
ICS 2133 Introduction to Programmable Controllers	3
ICS 2143 Programmable Controllers	3
ICS 2153 Introduction to Industrial Automation	3
ICS 2163 Industrial Automation	3
ICS 2213 Semiconductors II	3
Total Hours	**15**