# AUTOMATION TECHNOLOGY PROGRAM

# TECHNICAL CERTIFICATE IN INDUSTRIAL CONTROL SYSTEMS

(Concurrent students who earn a Certificate of Proficiency in Industrial Control Systems may progress to earn a Technical Certificate in Industrial Control Systems by completing the remaining required courses below.)

## Curriculum

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

#### **1st Semester**

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
Total Hours	15

## **2nd Semester**

Course Number and Name	Credits
ICS 1143 Introduction to Digital Logic	3
ICS 1253 Networking II	3
ICS 2203 Computer System Components	3
ICS 2213 Semiconductors II	3
Total Hours	12

# **3rd Semester**

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