



The Automation School™

Spring 2023 Course Catalog

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Learn how to setup, configure, and program the **Allen-Bradley MicroLogix** Programmable Logic Controllers using RSLogix 500 or RSLogix Micro in **PLC Basics**

Level 1 Lesson Topics:

(Included with Standard and Extended courses)

Hardware

- What a PLC is
- Where PLCs are used
- Anatomy of a PLC
- Styles and Types
- Common Inputs and Outputs
- PLCs used in this course
- MicroLogix Hardware Tour
- Programming Cables
- Manuals and Documentation

Numbers and Data

- Numeral Systems & Types of Numbers
- Digital Information & Data Types

Ladder Logic and RSLogix Software

- What Ladder Logic is & How it works
- PLC Scan Detailed
- Download and Install Software
- Using RSLogix Micro
- Browsing Data and Program Memory

Communications

- RSLinx Emulate Setup
- RSLinx Serial Setup
- RSLinx Ethernet Setup

Basic Programming

- Basic Bit Instructions
- Motor Control

Level 2 Lesson Topics:

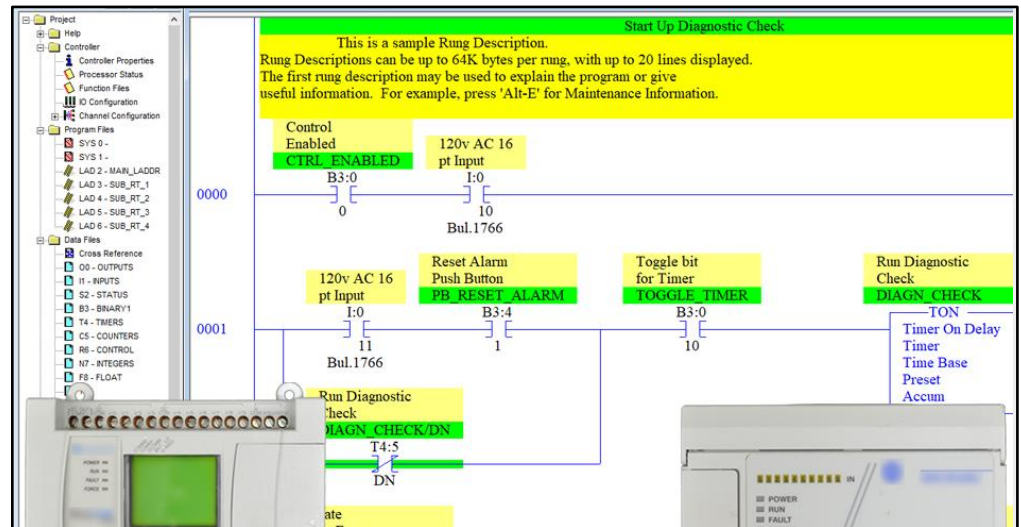
(Included with Extended course only)

Photo Eyes, Timers, and Counters

- Bin Full Detection
- Sense Jam, No parts
- Elapsed Run Time
- Delay Time
- Part Counting
- Copy Part Counts
- Conditional Resets
- Extra credit lessons

Math and Compare

- Using ADD and SUB instructions
- Using MUL and DIV instructions
- Using GRT and LES instructions



PLC Basics, Second Edition is designed for those students who have basic electrical knowledge, and want to learn how to setup, program, and troubleshoot PLCs - perfect for new PLC users! The specific PLCs covered in this course (pictured above) include the Allen-Bradley MicroLogix 1100 and 1000, both of which can be programmed using the free RSLogix Micro Starter Lite software.

What students will learn:

- What a PLC is
- Styles and Types of PLCs
- Numbering Systems and Data Types
- What Ladder Logic is and how it works
- How to setup Serial and Ethernet Communications
- Creating, Testing, and Troubleshooting MicroLogix Programs in RSLogix
- How to integrate Push Buttons and Pilots Lights with PLC Logic
- How to use PLCs in a Motor Control circuit
- And much more in the Extended Edition

Who should take this course:

- Anyone with basic electrical knowledge who would like to learn how to use, program, and troubleshoot Programmable Logic Controllers (PLCs.)

What students need to complete hands-on exercises:

- Windows 7, 8, or 10 PC with Ethernet or USB port and an internet connection
- Free RSLogix Micro Starter Lite programming software (how to get is covered in course)
- A MicroLogix 1000 or MicroLogix 1100, and compatible PC and Cables on students PC, or
- Free RSEmulate 500 Emulation software to simulate the PLC (how to get is covered in course)

Course Editions (Note: Online courses include instructor support, completion certificate, and lifetime access)

- **TAS-PLC21-O** PLC Basics Second Ed. Standard Online Course (Level 1 Topics, upgradeable to Extended) **\$49⁹⁹**
- **TAS-PLC22-O*** PLC Basics Second Ed. Extended Online Course (Level 1 and Level 2 Topics) **\$99⁹⁹**

* For a Limited Time: Includes a free copy of our Ultimate Micro online course launching into early access in Fall of 2023

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Learn how to setup, configure, and program Allen-Bradley Micro800 Nano Programmable Controllers using CCW in Nano Basics

Level 1 Lesson Topics:

(Included with Standard and Extended courses)

Hardware

- Micro800 Controllers
- Selecting Components
- Hardware Unboxings
- Local Rockwell Representative

Software

- Downloading CCW Software
- Installing CCW on Windows 7, 10
- Update: Windows Patch Issues

Communications

- RSLinx Classic Configuration
- Setting up USB Comms
- Setting up Ethernet Comms
- Flashing Firmware

Programming

- Motor Control using Ladder Diagram routines.
- Part Sensing (LD) with Photo Eyes
- Machine Runtime using FBD
- Part Counting using FBD
- Performing Calculations using ST
- Exporting and Importing Programs

Level 2 Lesson Topics:

(Included with Extended course only)

Analog and Expansion I/O

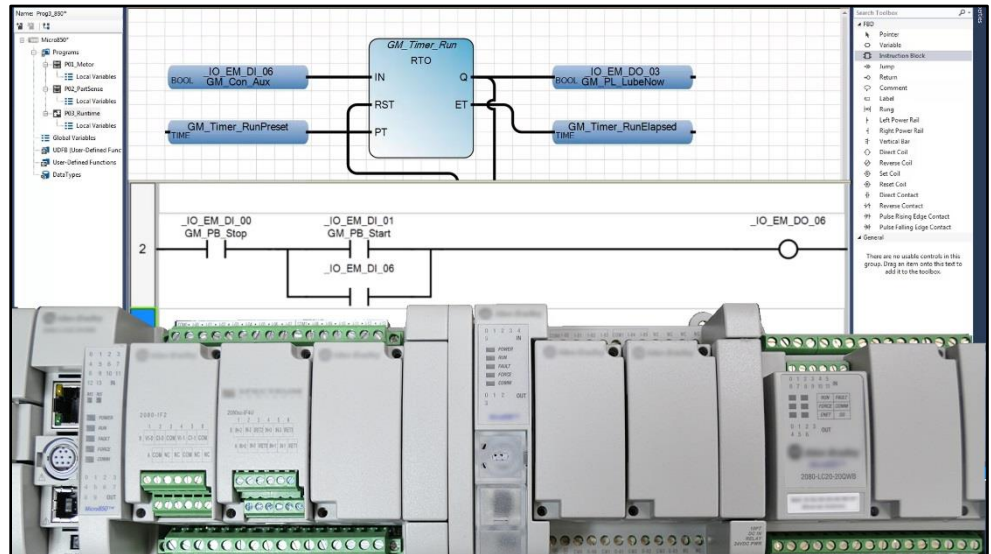
- Using and Scaling Analog Inputs
- Using and Scaling Analog Outputs
- Using Universal Analog Inputs
- Using Plugin and Expansion I/O
- Using Serial Plug-In with Modbus

Variable Frequency Drives

- Controlling VFDs over Modbus
- Setting up VFDs on Ethernet
- Controlling VFDs over Ethernet

Human Machine Interfaces

- Creating a PanelView 800 Project
- PanelView 800 Motor Control Screen
- PanelView 800 Download & Test



Nano Basics is designed for those students who have basic PLC knowledge and would like to learn how to setup, program, and troubleshoot the Allen-Bradley Micro800 line of Nano Programmable Controllers using Connected Components Workbench.

What students will learn:

- Understand the design of the Micro800 Family of Nano PLCs
- How to choose Micro800 components and configure a system
- How to get the free programming software and how it works
- How to setup Micro800 and RSLinx Ethernet and USB communications
- How to Flash Controller Firmware over Ethernet and USB
- How to create and test a Motor Control routine in Ladder Logic
- How to create and test a Part Sensing routine using Photo Eyes
- How to create and test a Machine Runtime routine in Function Block
- How to create and test a Part Counting routine in Function Block
- How to create and test a Mathematical Calculation routine in Structured Text
- How to Export and Import Micro800 Programs using CCW
- And much more in the Extended Edition!

What students need to complete hands-on exercises:

- Windows 7, 8, or 10 PC with Ethernet or USB port and an internet connection
- Free Connected Components Workbench programming software (how to get is covered in course)
- An Allen-Bradley Micro800 with USB or Ethernet communications, or
- Free Micro800 PLC Simulator included in Connected Components Workbench

Course Editions (Note: Online courses include instructor support, completion certificate, and lifetime access)

- **TAS-NAN21-O** Nano Basics Standard Online Course (Level 1 Topics, upgradeable to Extended) **\$49.99**
- **TAS-NAN22-O*** Nano Basics Extended Online Course (Level 1 and Level 2 Topics) **\$99.99**

* For a Limited Time: Includes a free copy of our Ultimate 800 online course launching into early access in Fall of 2023

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Learn how to setup, configure, and program Allen-Bradley CompactLogix Small Programmable Automation Controller in Compact Basics

Level 1 Lesson Topics:

(Included with Standard and Extended courses)

Hardware

- Finding and Using Product Manuals
- Overview of Five Generation of Hardware
- CompactLogix Controller Architecture, OS
- Selecting System Components, Using IAB
- 1769, 1734, 5069 I/O Setup, Forcing

Software

- History, Packages and Versions
- RSLogix and Studio 5000 First Look
- RSLinx Driver Setup and using BOOTP
- ControlFlash and Firmware Files

Communications

- Ethernet - Multicast vs Unicast
- Distributed Ethernet I/O
- Testing and Troubleshooting I/O
- How to setup RSLinx Classic Drivers
- Flashing Controller and Module Firmware

Programming

- Controller Properties
- Tasks, Programs, Routines, Tags
- Controller and Program Tags
- Logix Ladder Logic Diagram Routines (LD)
- Creating a Motor Control Ladder Routine
- Using Photo Eyes for Part Sensing (LD)
- Track Production with Timers and Counters
- How to Code Building to a Preset
- Controller Time and using the GSV
- Creating and Using Trends
- How to Code Jogs & Single Cycles
- Migrating Projects to the 5380

Level 2 Lesson Topics:

(Included with Level 2 course only)

Advanced Programming

- How Function Block (FBD) Routines work
- Machine Maintenance Routine (FBD)
- Material Sensing Routine (FBD)
- Machine Alarm Routine (FBD)
- Feed and Eject Routine (FBD)
- How Structured Text (ST) Routines work

Planned "Future" Lessons

- Structured Text Routines
- User Defined Data Types (UDT)
- Sequential Function Charts (SFC)
- Add-on Instructions (AOI)
- PlantPax Process Objects
- Produced and Consumed Tags
- Messaging Controllers
- PowerFlex VFD Integration
- Using FBD for VFD Motor Control
- PanelView Plus Motor Control Screen
- PanelView 5000 Motor Control Screen



Our CompactLogix Level 1 Course (Compact Basics) is designed for those students who are already familiar with PLCs, and would like to learn how to setup, program, and troubleshoot the CompactLogix using RSLogix 5000 and Studio 5000

What students will learn in the Level 1 Course:

- Understanding the design and different models of CompactLogix Controllers
- The difference between RSLogix 5000 and Studio 5000
- How to size a system, choose components, and configure Controllers, I/O, and Comms
- How to setup Ethernet, Serial DF1, and USB drivers in RSLinx Classic
- How to setup, configure, and edit RSLogix/Studio 5000 projects
- How to add, edit, and test Local I/O, and Distributed Ethernet I/O
- Understanding Controller and Program tags, and how to create and edit Tags and Aliases
- How to setup, configure and edit Tasks, Programs, and Routines
- How to create and troubleshoot Motor Control Ladder Routines
- How to create and troubleshoot Part Sensing Routines
- How to use Timers and Counters to Track Production
- How to create and troubleshoot code to Build to a Preset Number of Parts
- Controller Time and using the GSV Instruction, Creating and Using Trends
- Considerations when Migrating Projects to the 5380

What students need to complete the optional hands-on exercises:

- Windows 10 PC, preferably with an Ethernet or USB Port and an internet connection
- An Allen-Bradley CompactLogix Controller (may also require a power supply & end cap)
- A licensed version of RSLogix/Studio 5000 that supports your CompactLogix Controller

Note: There are no free editions of the programming or emulation software, however 30 day trail copies are available directly from Rockwell.

Course Editions (Note: Online courses include instructor support, completion certificate, and lifetime access)

- **TAS-CPX21-O** Compact Basics Level 1 Online Course (Level 1 Topics, upgradeable to Level 1 and 2) **\$99⁹⁹**
- **TAS-CPX22-O*** Compact Basics Level 1 & 2 Online Course Bundle (Level 1 and Level 2 Topics) **\$149⁹⁹**

* For a Limited Time: Includes a free copy of our Ultimate Compact online course launching into early access in Fall of 2023

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Learn how to setup, configure, and program the **Allen-Bradley ControlLogix Family** of Programmable Automation Controllers in **PAC Basics**

Level 1 Lesson Topics:

(Included with Standard and Extended courses)

Hardware

- Design of System
- Overview of System Components
- ControlLogix Controller Anatomy
- Manuals and Documentation

Software

- Packages and Versions
- RSLogix 5000 vs Studio 5000
- Update: Windows Patch Issues
- RSLogix and Studio 5000 First Look
- Controller Properties
- Tasks, Programs, Routines, Tags

Communications

- Ethernet and ControlNet Addressing
- How to setup RSLinx Classic Drivers
- Flashing Controller and Module Firmware

Programming

- Adding Local, Ethernet, and ControlNet I/O
- Testing and Troubleshooting I/O Config
- Controller and Program Tags
- How Ladder Logic Diagrams (LD) differ in ControlLogix compared to A-B PLCs & SLCs
- Creating a Motor Control Ladder Routine
- Using Photo Eyes for Part Sensing (LD)
- How Function Block (FBD) Routines work
- Create a Machine Runtime FBD Routine
- How User Defined Data Types (UDT) work
- Create and use UDTs in Part Counting

Level 2 Lesson Topics:

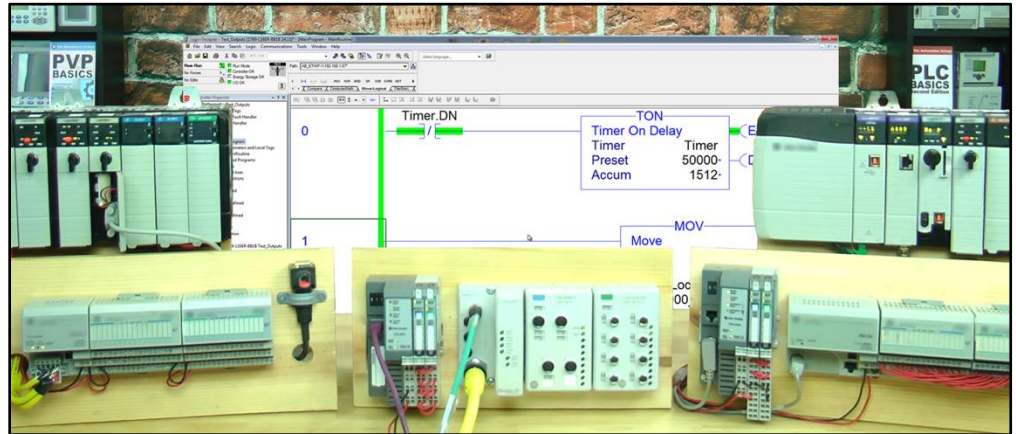
(Included with Extended course only)

Advanced Programming

- How Structured Text (ST) Routines work
- Calculate Scrap Ratios using ST Routine
- Sequential Function Chart (SFC) Routines
- Part Count, Copy, Reset Routine using SFC
- Changing a Project's Version
- Duplicating and Re-using Code
- How Add-on Instructions (AOI) work
- Create, Download, and Use AOIs
- Using PlantPAx Objects AOIs
- Using Produced and Consumed Tags
- Messaging ControlLogix Controllers
- Messaging Controllers over DF1
- Messaging Controllers over DH+
- Messaging Controllers over Ethernet
- Bonus: Legacy PLC Comm Setup

VFD Integration (Digital Only)

- PowerFlex VFD Integration
- Using LD and VFDs for Motor Control
- Using FBD for VFD Motor Control
- Controlling VFDs over Ethernet



PAC Basics is designed for those students who are already familiar with PLCs, and would like to learn how to setup, program, and troubleshoot the ControlLogix family of Programmable Automation Controllers (PACs) using RSLogix 5000 and Studio 5000.

What students will learn:

- Understanding the overall design of ControlLogix system and components
- How to configure a system's Controllers, I/O, and Communications Modules
- How to setup Ethernet, Serial DF1, and USB drivers in RSLinx Classic
- The difference between RSLogix 5000 and Studio 5000
- How to setup, configure, and edit RSLogix and Studio 5000 projects
- How to add, edit, and test Local, Ethernet, and ControlNet I/O
- Understanding Controller and Program tags
- How to create and edit Tags and Aliases
- How to setup, configure and edit Tasks, Programs, and Routines
- Understanding how Ladder Logic differs in ControlLogix when compared with other PLCs
- How to create, test, run, and troubleshoot Ladder Diagram Routines
- Understanding Function Block Diagram Routines, and how they Execute
- How to create, test, run, and troubleshoot Function Block Diagram Routines
- How to create and use User Defined Data Types
- And many additional advanced topics in the **Extended Edition**

What students need to complete hands-on exercises:

- Windows 7, 8, or 10 PC with Ethernet or USB
- A CompactLogix or ControlLogix PAC with a communications port compatible with the student's PC (Ethernet, USB, etc.)
- A version of RSLogix 5000 or Studio 5000 that is compatible with the student's PC, and with the student's CompactLogix or ControlLogix PAC

Course Editions (Note: Online courses include instructor support, completion certificate, and lifetime access for a single user)

- **TAS-PAC21-O** PAC Basics Standard Online Course (Level 1 Topics, upgradeable to Extended) **\$99⁹⁹**
- **TAS-PAC22-O*** PAC Basics Extended Online Course (Level 1 and Level 2 Topics) **\$299⁹⁹**

* For a Limited Time: Includes a free copy of our Logix Live 8 hour course filmed in 2021

* For a Limited Time: Includes a free copy of our Ultimate Logix online course launching into early access in Fall of 2023

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S7 PLCs - Level 1

Learn how to setup, configure, and program the **Siemens S7-1200 and S7-1500** families of Programmable Logic Controllers in **S7 PLCs - Level 1**

Level 1 Lesson Topics:

(Lesson list as of March, 2023)

Hardware

- Vital S7 Manuals and Documents
- S7-1500 Overview
- S7-1500 Details
- S7-1500 Tour
- S7-1200 Overview
- S7-1200 Details
- S7-1200 Tour
- Distributed IO
- Component Selection

Memory, Data, Software

- CPU Memory
- Data Blocks, Types, Tags
- Programs, Modes, Execution
- TIA Portal 21 Day Trial
- Automation License Manager
- Remaining Trial Days
- Intro to Using TIA Portal

Communications, Setup, Test

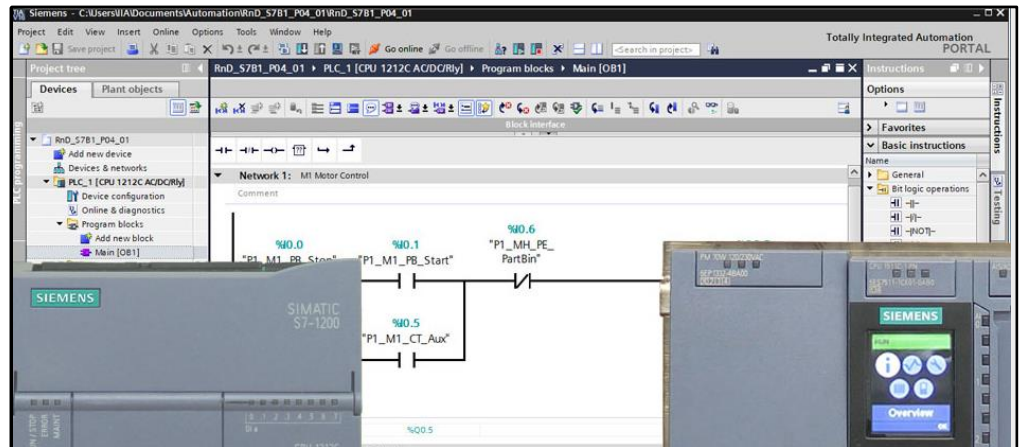
- Identify CPU Model, IP Address, Firmware
- Download and Update CPU Firmware
- Reset CPU Memory
- Resetting to Factory Defaults
- Add, Test, and Force S7-1500 IO
- Add, Test, and Force S7-1200 IO

Programming

- IEC-61131, First Program Details
- Create, Load, Test First Program
- Load and Test First Program with PLCSim
- Boolean Logic, Transition, Latch
- Set, Reset, Edge Detection, Toggle
- First Scan, Clock Bits
- Motor Control, Permissives
- IEC 61131-3 Timers
- TON On Delay, TON Extra Credit
- TOF Off Delay
- TONR Time Accumulator
- Memory Reserve, HMI Start, Etc.
- Counters, Count Up
- Count Down, Count Up Down
- PLC Time, Program Control
- Program: Automatic Mode, Test/Debug
- Program: Maintenance Mode, Test/Debug
- Moving Data & User Data Types
- Math and Comparisons

Bonus Videos

- Bonus 01: SIOS Online Support Interview
- Bonus 02: S7-1200 Prod. Manager Interview
- Bonus 03: S7-1500 Prod. Manager Interview
- Bonus 04: DIO Prod. Manager Interview
- Bonus 05: TIA Portal v17 Interview
- Bonus 06: V17 View of Things Interview
- Bonus 07: PROFINET Interview
- Bonus 08: PROFINET International Interview



S7 PLCs - Level 1 is designed for those students who have some familiar with PLCs, and would like to learn how to setup, program, and troubleshoot the Siemens S7-1200 and S7-1500 family of Programmable Logic Controllers (PLCs) using TIA Portal Step 7.

What students will learn:

- Understanding the overall design of the S7-1200 and S7-1500 system
- TIA Portal license options, including the free 21 day trial, 1 year, and perpetual
- How to connect with PROFINET and change system settings
- How to configure the CPU and flash its firmware
- How to add, edit, test, and force S7-1200 and S7-1500 Signal modules
- Understanding CPU Memory and Data Block Types
- How to setup, configure, and edit Step 7 Projects in TIA Portal
- How to create, download programs to S7-1200, S7-1500, and PLCSim
- Using and troubleshooting Boolean, Transition, and Latching Logic
- Using and troubleshooting Set/Reset, Edge Detection, and Toggle logic
- Using the First Scan and Clock Bits
- Motor Control, Presence Sensing, and Permissives
- Using Timers and Counters in common applications
- Memory Reserve, PLC Time, and Program Control
- Create, Test, and Debug automatic mode logic
- Create, Test, and Debug a maintenance mode logic
- Handling Data, using Math and Comparisons
- Bonus: Eight interviews with Siemens experts on S7 Topics

What students need to complete hands-on exercises:

- Windows 10 PC with Ethernet and an internet connection
- An S7-1200 or S7-1500 PLC, or PLCSim
- A licensed copy of TIA Portal Step 7 that is compatible with the student's PC and PLC, or
- Free 21 Day Trial of TIA Portal Step 7 with PLCSim

Course Editions (Note: Online courses include instructor support, completion certificate, and lifetime access for a single user)

- **TAS-S7C-O*** Siemens S7 PLCs – Level 1 Online Course (S7-1200 & S7-1500 covered) **\$149⁹⁹**

* Price may change without notice. Note: All courses include lifetime access and support

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Learn how to setup, configure, and program the **Allen-Bradley PanelView Plus** using View Studio Machine Edition in **PVP Basics**

Lesson Topics:

Hardware

- PanelView Plus 700-1500
- PanelView Plus 400, 600, Compact
- PanelView Plus Version Support
- PanelView Plus 6 Models
- PanelView Plus 7 Models
- Configuration Menu Settings

Software

- Update: Windows Patch Issues
- Introduction to View Studio ME
- Project System Settings
- HMI Tags
- Graphic Displays

Creating and Editing Applications

- Memory Tags
- Default Graphic Displays
- Panel, Text, and Image Objects
- Numeric and String Displays
- Library and Symbol Factory
- Navigation and Testing Applications
- Numeric and String Inputs
- Fill and other Animations
- Arrange, Align, Substitute

Communications

- RSLinx Enterprise
- HMI Device Tags
- Direct Referencing Logix Tags

Graphic Displays

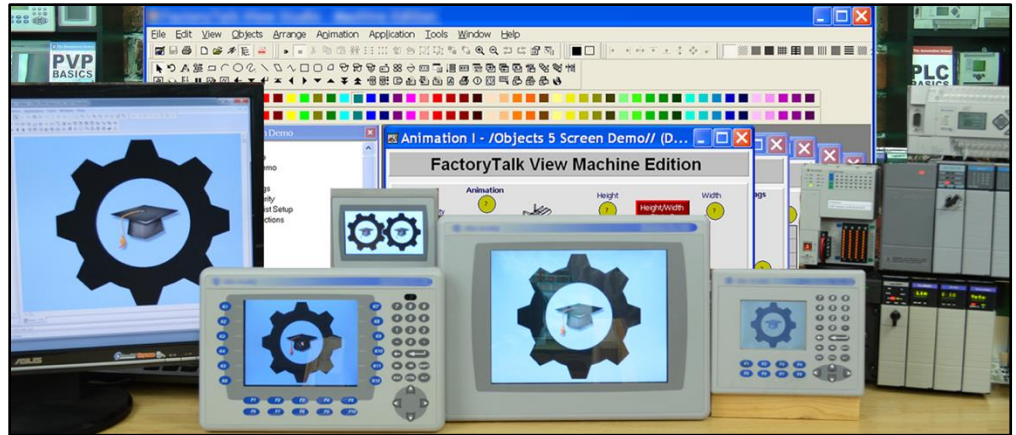
- Display Design
- Find and Replace
- Sliders

Advanced Topics

- Alarms and Alarming
- Using Images on Buttons

Running and Storing Applications

- How to create .MER runtime files
- How to transfer .MER files via RSLinx and the Transfer Wizard
- How to transfer .MERs via Memory Cards
- Correctly backing up an application



PVP Basics is designed for those students who have basic PLC knowledge and would like to learn how to setup, program, and troubleshoot the Allen-Bradley PanelView Plus using View Studio Machine Edition.

What students will learn:

- How to open, edit, and create applications
- How to correctly setup project settings, and what to consider before doing so
- How to setup RSLinx Enterprise Serial and Ethernet communications
- Setup RSLinx Enterprise for use with ControlLogix, CompactLogix, SLC-500, and MicroLogix
- How to create, edit, and use all the different types of HMI Tags
- How to import Tags from RSLinx projects and files
- How to import and export the Tag DB to Excel to speed edits
- How to directly reference PLC Tags online and off
- How to create, edit, and test Graphics, Objects, Symbols, and Libraries
- How to test Displays, as well as test an entire Application on your PC
- How to setup, add, display, and edit Alarms
- How to create and download .MER files over Networks and using Memory Cards
- How to correctly back up and share applications

Who should take this course:

- Anyone with basic electrical knowledge who would like to learn how to use, program, and troubleshoot the Allen-Bradley PanelView Plus HMI using View Studio Machine Edition.

What students need to complete hands-on exercises:

- Windows 7, 8, or 10 PC with a compatible Ethernet or Serial port and an online connection.
- View Studio Machine Edition (lesson about how to get a free demo version is included)
- An A-B PLC or PAC compatible with Student's PC for RSLinx communication lessons
- An Allen-Bradley PanelView Plus for Configuration and Download lessons

Course Editions (Note: Online courses include instructor support, completion certificate, and lifetime access)

- **TAS-PVP11-O** PVP "Core" Basics First Edition Online Course \$49⁹⁹
- **TAS-PVP12-O*** PVP Basics+ Online Course with Ultimate Upgrade \$69⁹⁹

* Includes an upgrade to our Ultimate PVP online course launching into early access in Winter of 2023/24.

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Learn to create, edit, and deploy **FactoryTalk View Site Edition** applications using FactoryTalk View Studio in **ViewSE Basics**

Lesson Topics:

Software Overview

- What is ViewSE?
- Navigating View Studio
- Sample Applications
- Restoring Applications

Creating and Editing Applications

- Creating a Local Application
- Creating Graphic Displays
- Display Settings, Objects
- Color and Fill Animation
- Importing and Using Libraries
- Memory Tags, Numeric Inputs, Sliders
- Duplicate, Export, and Import Tags
- Using Tag Substitution
- On-Top Popup Displays
- Using Parameters and Placeholders
- Creating and using Derived Tags and Expressions

Communications

- Configuring RSLinx Enterprise, Classic
- Direct Reference and Device Tags
- Offline Tag Browsing, Tag Importing

Graphic Displays

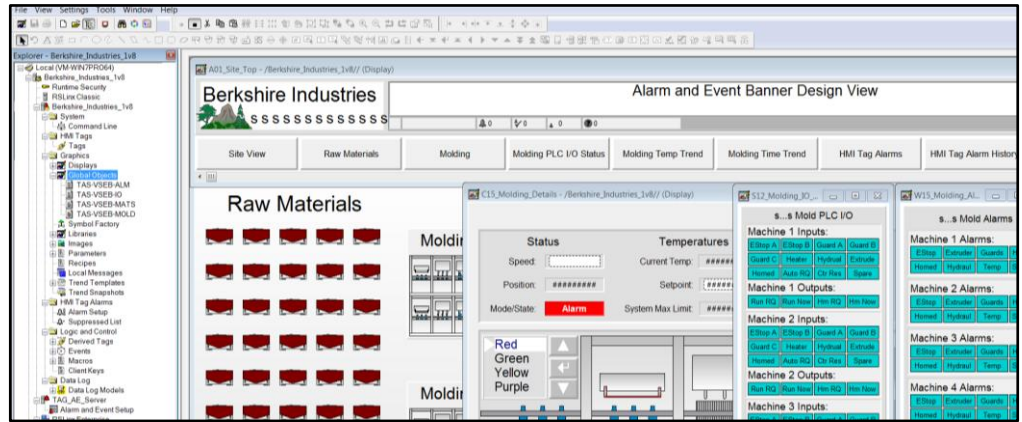
- Display Design and Reuse
- Create and Use Parameter Files
- Using the Command Line and Macros
- Additional Graphical Objects
- Additional Animations
- Building Buttons, Lights, Switches
- Using Global Objects
- Creating Global Objects

Advanced Topics

- Live and Historical Data Trends
- File Set and ODBC Datalogs
- Using Trend Templates
- HMI Tag Alarm Setup, Logs, Objects
- A&E Tag Alarm Setup, Logs, Objects
- A&E Instruction Alarms
- Docked Displays, Find and Replace
- Securing your Application
- Configuring and Publishing ViewPoint

Deploying Applications

- Complete Backup including FTAE, SQL
- OWS Setup and Configuration
- Deploying Application to OWS



ViewSE Basics is designed for those students who want to learn how to create, edit, and deploy **FactoryTalk View Site Edition Local Station** applications using **FactoryTalk View Studio Enterprise**.

What students will learn:

- What FactoryTalk ViewSE is, and how to find its documentation and downloads
- Understanding how ViewSE works, and how to create ViewSE Applications
- Graphic Displays and settings, Object Properties, and In-place Editing
- Testing Displays, Creating Client Files, and Editing running applications
- Using Drawing objects, Library Objects, and the Symbol Factory
- HMI System Tags, Numeric Displays, Color and Fill Animations
- Creating, editing, and duplicating Tags, Importing Displays, Using Numeric Inputs
- Slider Animation, Tag Substitution, Tag Placeholders and Parameters
- Using On Top Displays, Expressions, Derived Tags, and Events
- Setting up RSLinx Enterprise, RSLinx Classic, and Using Direct References and Device Tags
- Offline Browsing and Tag Importing, Creating and Using Parameter Files and Placeholders
- Command Line use, Using and Creating Macros, Using and Creating Global Objects
- Datalogging and Trending, HMI Tag Alarms and Alarm and Event Alarming
- User, Group, and Application Security, Backing up Applications, Using FT ViewPoint
- Setting up an Operator Workstation, Restoring and Running and Application

Who should take this course:

- Anyone who would like to learn how to create, edit, and deploy ViewSE projects.

What students need to complete optional hands-on exercises:

- A compatible Windows PC to install and run "View Studio Enterprise" on
- A working copy of FactoryTalk View Studio Enterprise Edition (see note below)
- An A-B PLC or PAC (lesson included on how to download a free PLC emulator)

Note: There are no free editions of the programming software, but demo editions are available from Rockwell

Course Editions (Note: Online courses include instructor support, completion certificate, and lifetime access for a single user)

- **TAS-VSE21-O** ViewSE Basics Online Course **\$199.99**

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Using CCW with VFDs Quickstart TheAutomationSchool.com

Learn to backup PowerFlex Drives using **Connected Components Workbench (CCW)** over Ethernet, USB, and with the 1203-USB cable in [CCW VFD Quickstart](#)

Lesson Topics:

- Lesson 1: CCW VFD Intro
- Lesson 2.1: Downloading CCW
- Lesson 2.2: Installing CCW
- Update: Win 7/8.1/10 Patch Issues
- Lesson 3.1: Setup Ethernet
- Lesson 3.2: Setup USB
- Lesson 3.3: Setup 1203-USB
- Lesson 4.1: Using Ethernet
- Lesson 4.2: Using USB
- Lesson 4.3: Using 1203-USB
- Lesson 5: Final Lesson
- Update: How To Find Your Local Rep
- Bonus 1: EIP from Keypad
- Bonus 2: EIP via BOOTP

What students will learn:

- Where to download a free copy of CCW
- How to install CCW, including how to work around the .NET issue
- How to download and install drivers and firmware for the 1203-USB cable
- How to setup RSLinx Classic's Ethernet IP and Ethernet Devices Drivers
- How to setup RSLinx Classic's Driver for the 1203-USB cable
- How to download PowerFlex manuals and update files
- How to connect to the PowerFlex 520 series using USB on Windows 10 and 7
- How to use the PowerFlex USB utility to up & download parameters from 520 series VFDs
- How to import, edit, and export PowerFlex USB utility parameter files in CCW
- How to use CCW to upload and download drive parameters over Ethernet
- How to use CCW and the 1203-USB to upload and download drive parameters over DSI
- Bonus: How to set PowerFlex 525's Ethernet Address using its Keypad and BOOTP

Course Editions (Note: Online courses include instructor support, completion certificate, and lifetime access)

- **TAS-VFD11-O** Using CCW with VFDs Quick Start Online Course

\$24.99

 TheAutomationSchool.com/CCWVFD

PLC Hands-On Trainers

 TheAutomationSchool.com

TAS-SC-01 Standard and **TAS-SC-02 Extended** Suitcase Trainers, with your choice of PLC and/or Software, or without:



TAS-SC-01 Trainer Only (no PLC/SW): \$1,599⁹⁹



TAS-SC-02 Trainer Only (no PLC/SW): \$2,199⁹⁹

Note: TheAutomationSchool.com is neither affiliated with or an official representative of any third-party company or product mentioned in this document. All trademarks listed are the property of their respective companies

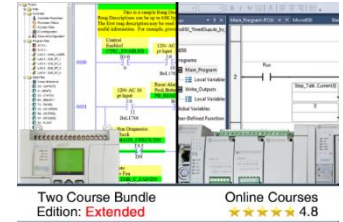
Save up to 58% when you purchase our courses in a bundle:

PLC Course Bundle

This bundle includes our **PLC Basics** Extended Second Edition course along with our **Nano Basics** Extended Edition at a bundle savings of over **37%**:

- **PLC Course Bundle**

\$179⁹⁹



Logix Course Bundle

This bundle includes our **PAC Basics** (ControlLogix) Extended Edition course along with our **Compact Basics** (CompactLogix) Extended Edition course at a bundle savings of over **24%**:

- **Logix Course Bundle**

\$399⁹⁹



HMI/SCADA Course Bundle

This bundle includes our **PVP Basics** (PanelView Plus) course along with our **ViewSE Basics** course at a bundle savings of over **58%**:

- **HMI & SCADA Course Bundle**

\$249⁹⁹



MEGA Course Bundle

This bundle includes all seven of our courses (**PLC, Nano, PAC, Compact, PVP, ViewSE, CCW VFD**) along with two bonus courses at a bundle savings of over **54%**:

- **Mega Course Bundle**

\$549⁹⁹



Ultimate A-B Course Bundle

This bundle includes our Mega Bundle PLUS four new courses (Mastering Logix Applications using PLCLogix 5000, and pre-orders of Mastering Logix Applications using FactoryIO, Ultimate SLC-500, Ultimate PLC-5):

- **Ultimate Course Bundle**

\$649⁹⁹



The Automation School's Group Enrollment Program

The Automation School offers group enrollment to our business customers who need to enroll multiple employees in one or more of our courses.

Employers who utilize group enrollment gain access to several benefits, including group discounts based on the number of students being enrolled.

Our group enrollment program also provides employers with the ability to track student progress using a complimentary "group progress" webpage accessible to designated "group leaders."

This webpage not only allows the tracking of student progress, but also provides individual quiz scores and overall completion status. Access to this level of detail has been especially helpful to employers who incentivize their employees to successfully complete the courses they're enrolled in.

And just like with standard enrollees, students enrolled through the group enrollment process will have access to their courses *for as long as they are employed by the company who enrolled them*, as none of our courses come with any artificial deadlines or expiration dates.

If you're interested in enrolling three or more employees in courses at The Automation School, I invite you to reach out to us for a free group enrollment quote.

Sincerely,

Shawn Tierney,
Instructor and Founder, The Automation School

Common "Group Enrollment" Questions

"What do I need to provide you with in order to enroll a group of employees in online courses at The Automation School?"

First, in order for us to provide you with a group enrollment quote, we'll need to know how many students you want to enroll (minimum of three,) and which courses you wish to enroll them in. This information can be submitted to us using our Group Enrollment Inquiry Form [HERE](#).

Then when you place your group enrollment order, you'll need to provide us with the name and company email address of each student. If you wish to make use of the student tracking webpage, we'll also need at least one group manager's name and email address as well.

"After enrolling a group of employees, if one of them leaves my department or our company can I pass that seat onto to a replacement?"

Yes! As long as the original enrollee has not completed more than 10% of the course, we can pass the former enrollee's seat on to a new employee *totally free of charge!* If the original student has completed more than 10% of the course, their seat can be re-allocated at a pro-rated cost (*i.e. if the previous student completed 50% of the course, reallocating their seat would cost 50% of a new seat*)

"How can I find out more about enrolling a group of my employees in online courses at The Automation School?"

To get in contact with us about group enrollment, just fill out our short Group Enrollment Inquiry form [HERE](#), and we'll typically get in touch with you within one business day!

Training Quote Request Form:

Fill in and email form to Sales@TheAutomationSchool.com, or call us at 413-749-4300

| QTY | PN / Link | Page | Description | Price Each | Extended Price |
|-----|------------------------------|------|---|-----------------------|----------------|
| ___ | TAS-PLC01-O | - | A-B PLC Basics, First Edition Level 1 (MicroLogix) | \$24 ⁹⁹ | _____ |
| ___ | TAS-PLC10-O | 2 | A-B PLC Basics Second Edition Level 1 (MicroLogix) | \$49 ⁹⁹ | _____ |
| ___ | TAS-PLC11-O | 2 | A-B PLC Basics Second Edition Level 1+2 (MicroLogix) | \$99 ⁹⁹ | _____ |
| ___ | TAS-NAN21-O | 3 | A-B Nano Basics Standard Level 1 Edition (Micro800) | \$49 ⁹⁹ | _____ |
| ___ | TAS-NAN22-O | 3 | A-B Nano Basics Extended Level 1 & 2 Edition (Micro800) | \$99 ⁹⁹ | _____ |
| ___ | TAS-CPX-21-O | 4 | A-B Compact Basics Standard Level 1 Edition (CompactLogix) | \$99 ⁹⁹ | _____ |
| ___ | TAS-CPX-22-O | 4 | A-B Compact Basics Extended Level 1 & 2 Ed (CompactLogix) | \$149 ⁹⁹ | _____ |
| ___ | TAS-PAC-21-O | 5 | A-B PAC Basics Standard Level 1 Edition (ControlLogix) | \$99 ⁹⁹ | _____ |
| ___ | TAS-PAC-22-O | 5 | A-B PAC Basics Extended Level 1 & 2 Edition (ControlLogix) | \$299 ⁹⁹ | _____ |
| ___ | TAS-S7C-O | 6 | Siemens S7 PLCs Level 1 Edition (S7-1200 and S7-1500) | \$149 ⁹⁹ | _____ |
| ___ | TAS-PVP-04-O | 7 | A-B PVP Basics Standard Level 1 Edition (PanelView Plus) | \$49 ⁹⁹ | _____ |
| ___ | TAS-PVP-10-O | 7 | A-B PVP Basics Extended Level 1 & 2 Edition (PanelView Plus) | \$69 ⁹⁹ | _____ |
| ___ | TAS-VSE-21-O | 8 | FT ViewSE Basics (FactoryTalk View Site Edition) | \$199 ⁹⁹ | _____ |
| ___ | TAS-CCW10-O | 9 | A-B CCW VFD Quick Start (PowerFlex with CCW) | \$24 ⁹⁹ | _____ |
| ___ | TAS-SC-01 | 9 | TAS Standard PLC Suitcase Trainer (without PLC or SW) | \$1,599 ⁹⁹ | _____ |
| ___ | TAS-SC-02 | 9 | TAS Extended PLC Suitcase Trainer (without PLC or SW) | \$2,199 ⁹⁹ | _____ |
| ___ | TAS-MLP-21-O | - | Mastering Logix Applications using PLCLogix 5000 (Trial Included) | \$29 ⁹⁹ | _____ |
| ___ | TAS-MLP-21-S | - | Mastering Logix Applications with PLCLogix 5000 Full License | \$294 ⁹⁷ | _____ |
| ___ | TAS-PCB-22-O | - | A-B PLC Course bundle: MicroLogix & Micro800 Extended Ed. | \$179 ⁹⁹ | _____ |
| ___ | TAS-LGB-22-O | - | A-B Logix Course bundle: Control & CompactLogix Extended | \$399 ⁹⁹ | _____ |
| ___ | TAS-PVB-22-O | - | A-B HMI SCADA Course bundle: PanelView Plus & ViewSE | \$249 ⁹⁹ | _____ |
| ___ | TAS-MCB-22-O | - | Mega A-B Online Course Bundle | \$549 ⁹⁹ | _____ |
| ___ | TAS-UCB-22-O | - | Ultimate A-B Online Course and Pre-order Bundle | \$649 ⁹⁹ | _____ |
| | | | | Total | _____ |

Insights in Automation®

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Sign and complete this form to authorize *Insights In Automation* to make a one-time charge to the credit card listed below for training services provided by TheAutomationSchool.com.

By signing this form, you give us permission to charge your account for the amount indicated below for the training services (online and/or DVD courses) listed on the reference quotation.

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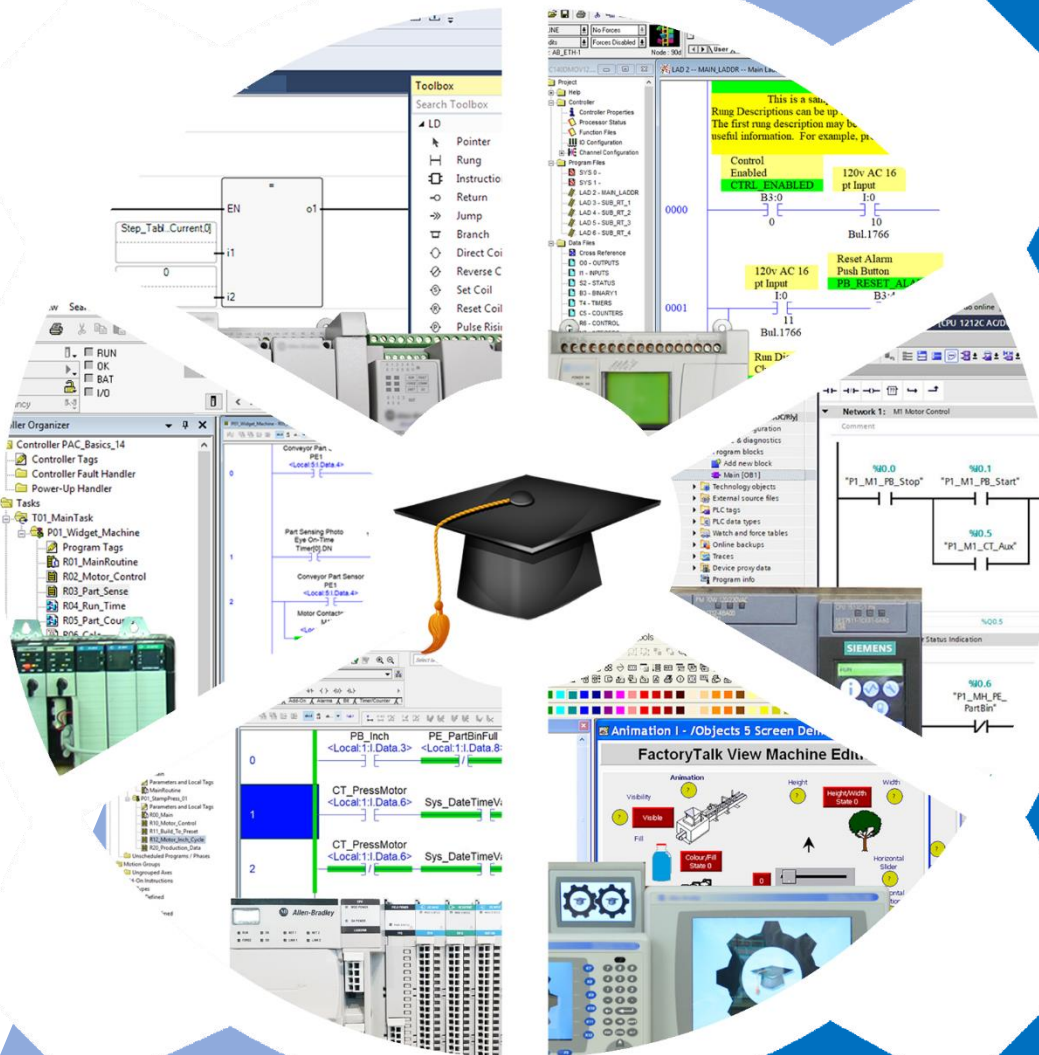
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PO Box 454

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