SIEMENS

SIMATIC WinCC on the Machine Level in the TIA Portal, System Course (TIA-WCCM1)

Short Description

When operator control of basic functions of a small machine or of complex processes is needed – the HMI is the interface between operator and automation. You will gain knowledge of how to flawlessly create operating screens for Basic Panels, Comfort Panels, Mobile Panels and Runtime Advanced with WinCC (TIA Portal).

Objectives

You will learn how to design, create and dynamize operating screens. You will learn how to log messages and values and to design and implement the corresponding archives. You can effectively use the engineering phase thanks to what you have learned about reliably operating the system.
After attending the course, you can do the following:
• Efficiently and reliably operate SIMATIC WinCC based on the "TIA Portal" engineering platform.
• Design operating screens (screens, pop-up screens and templates).
• Create screen navigation. (permanent area and slide-in)
• Configure alarms and messages that communicate the current machine status to the operator.
• Implement archiving concepts for alarms and values that allow you to look back into the past of your machine and to identify potential improvements.
• Access specific values from the SIMATIC S7 and display and further process them in the operator control and monitoring system (HMI).

Target Group

You are tasked with creating and/or editing HMI projects. Whether you are someone who is just getting started or has already been exposed to the subject of HMIs, this course will provide you with new information so that you can work confidently with WinCC (TIA Portal).
• Programmers
• Commissioning engineers
• Configuring engineers
• Service personnel
• Maintenance personnel
• Service personnel
• Operators

Content

Product version: WinCC V18
• System overview of TIA Portal, SIMATIC WinCC (machine-level)
• Creating a SIMATIC WinCC project
• Configuration of connection to the SIMATIC S7 automation system
• Basics of graphic image creation for operator control and monitoring
• User administration
• Alarm display, alarm logging, alarm configuration
• Tag logging, trend configuration, trend display
• Recipes
• Use of various HMI stations
• Deeper understanding of contents through practical exercises on SIMATIC S7-1500 system model

Prerequisites

Basic knowledge of automation technology

Note

WinCC (TIA Portal) is divided generally into the machine-level area and SCADA systems.
In this course, you will work with the SIMATIC WinCC Comfort and SIMATIC WinCC Advanced (both products are based on the TIA Portal). In the course, you will work with a Comfort Panel and a Runtime Advanced PC single-user system that communicates with a SIMATIC S7-1500.
As a supplement to this course, we offer the WinCC (TIA Portal) advanced course TIA-WCCM2.
For SIMATIC WinCC Professional (SCADA system software based on TIA Portal), we offer the course TIA-WCCS.
For SIMATIC WinCC V7.x (SCADA system), we offer the system course ST-BWINCCS as well as the advanced course ST-WINOND.
For additional courses on SIMATIC WinCC V7.x, visit our Learning Path "SIMATIC WinCC V7.x".

Type

Face-to-face training

Duration

3 days

Language

en

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