SIEMENS

Online-Training - SIMATIC System Retraining Course for SIMATIC S7-1500 in TIA Portal (TIA-SYSUP)

Short Description

The Totally Integrated Automation Portal (TIA Portal) forms the work environment for integrated engineering with all automation devices – controller, HMI and drives.

In this online training you will learn about the major differences between SIMATIC S7-300/400 and SIMATIC S7-1500, the engineering tools SIMATIC Manager and TIA Portal, as well as STEP 7 V5.x and STEP 7 based on TIA Portal. You will learn the possibilities of the configuration and the advanced programming of a SIMATIC S7-1500 automation system with the "TIA Portal" engineering platform.

In order to provide you with the best possible support and training in your personal learning environment (own office/home office), we have implemented selected courses as digital online trainings for you. We provide you with live theory lectures from our experts, which convey the course content described in the learning objectives in a practical and comprehensive manner, utilizing our virtual exercise environment for practical exercises. In our virtual classroom, our expert is also available to you at any time during your individual practical exercises for in-depth questions and technical discussions.

Objectives

After attending the course, you can:
- Efficiently use the "TIA Portal" engineering platform
- Configure and program components of the SIMATIC S7-1500 automation system with the TIA Portal
- Perform a commissioning of TIA components

You will deepen your theoretical knowledge through numerous practice-oriented exercises in our virtual exercise environment on a TIA plant model. This consists of a SIMATIC S7-1500 automation system, Comfort Panel TP700 and a virtual conveyor belt model.

Target Group

Programmers
Commissioning engineers
Engineering personnel
Service personnel

Content

Engineering tools TIA Portal components: SIMATIC STEP 7 and SIMATIC WinCC
Introduction of the SIMATIC S7-1500 hardware
Configuration of devices and networks of the SIMATIC S7 system family using SIMATIC S7-1500 as an example
Working with the PLC Tag Table in TIA Portal
Program blocks and editor
Advanced programming possibilities of a SIMATIC S7-1500
Troubleshooting with TIA Portal tools and the SIMATIC S7-1500 CPU display
Presentation of the Structured Control Language (SCL) editor
Presentation of the SIMATIC WinCC operator control and monitoring system
Migration of a SIMATIC STEP 7 V 5.x project to SIMATIC STEP 7 based on TIA Portal
Adaption of a SIMATIC S7-300/400 program to the SIMATIC S7-1500
Consolidation of the content through practice-oriented exercises in the virtual exercise environment.

Prerequisites

SIMATIC S7 knowledge according to ST-PRO1 and practical experience in using the knowledge
You can use the available online entry test to ensure that the selected course matches your area of expertise.

- Online Assessment Test

- Technical requirements > VE Lab

Note

In this course you will work with SIMATIC S7-1500 and software SIMATIC STEP 7 based on TIA Portal.

Type

Online-Training

Duration

5 days

Language

en