

**SIEMENS**

*Ingenuity for life*

...your knowledge and skills  
...network management, industrial security, switching,  
...wireless, mobile applications, redundancy and more.



*[Handwritten Signature]*  
...e, Signature

Your network.  
Your expertise.  
Your certification.

Industrial Networks Education

[siemens.com/industrial-networks-education](http://siemens.com/industrial-networks-education)

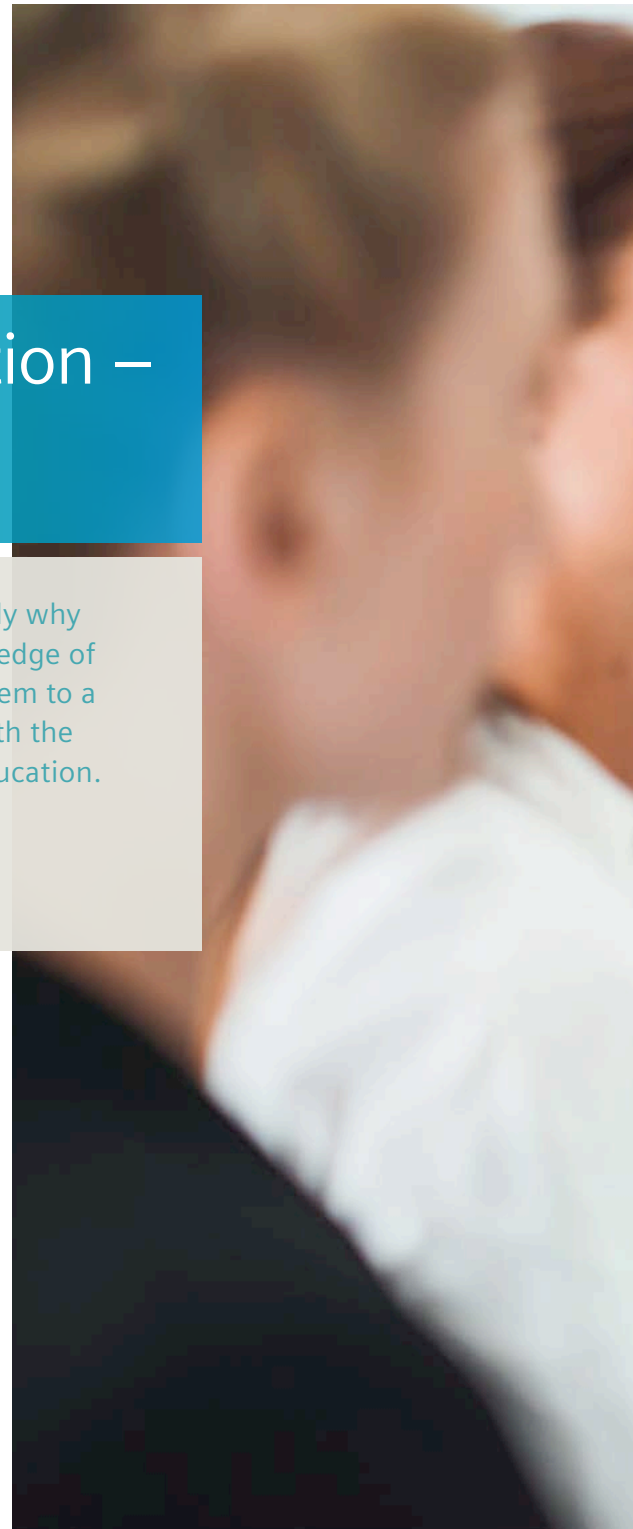
# Industrial Networks Education – looking to the future

The future of industry lies in digitalization. And that's exactly why powerful industrial networks are essential – as is the knowledge of how to plan and implement these networks and connect them to a corporate network. Siemens supports you in these areas with the targeted training courses offered by Industrial Networks Education.

**Expertise in industrial networks.**

## **Certification according to international standards**

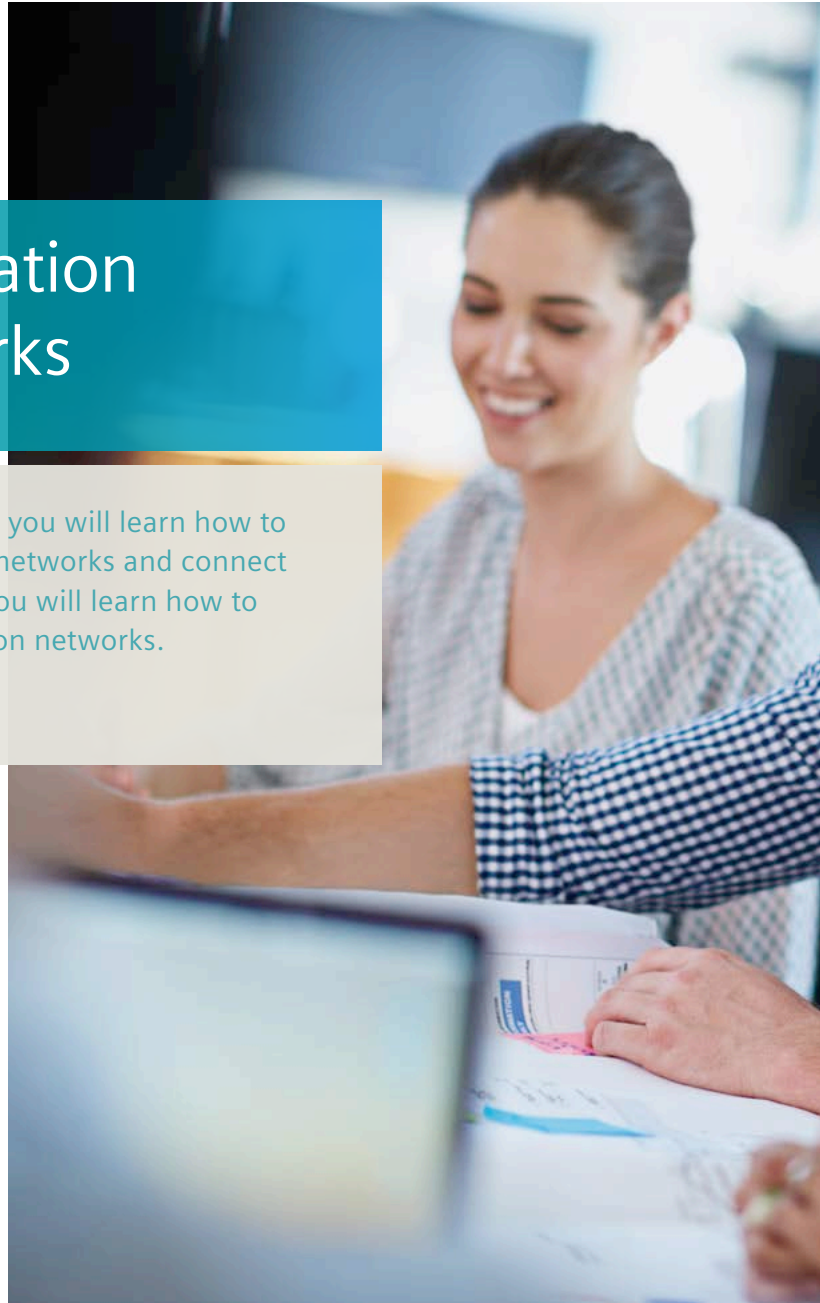
You can obtain a certification at the end of nearly all training courses in industrial networks. These are based on international Industrial Ethernet standards. Learn about our wide range of education and training courses and ensure your professional success in the future. We will be happy to accompany you along the way!





# Training and certification for industrial networks

In our Industrial Networks Education courses, you will learn how to plan and implement wired and wireless data networks and connect them to a corporate network. Furthermore, you will learn how to secure, diagnose, and optimize communication networks.





### **Optional: Siemens Initial Training for Industrial Networks (Siemens ITIN)**

These training courses are designed to teach beginners the fundamentals of industrial communication networks. In the web-based training course (WBT), you will learn the basics of creating Ethernet-based networks – and deepen this knowledge based on typical examples from industrial practice. In addition, the course will explain the key transmission media, devices, architectures, and technical terminology. The class room training Ethernet Fundamentals in Industrial Networks course provides a complete overview of network technologies and mechanisms that form the foundation for today's digital communication. Have you ever heard of the OSI reference model? This course will take you on a tour through all seven layers.

### **Siemens Certified Professional for Industrial Networks (Siemens CPIN)**

These training courses will prepare you for your practical work with industrial networks. You will learn the basic skills for planning, implementing, and securing simple industrial networks. In addition, you will also receive training on how to connect them to a corporate network. The courses are aligned with international Industrial Ethernet standards and take into account open and flexible architectures. You can obtain a certification at the end of each course.

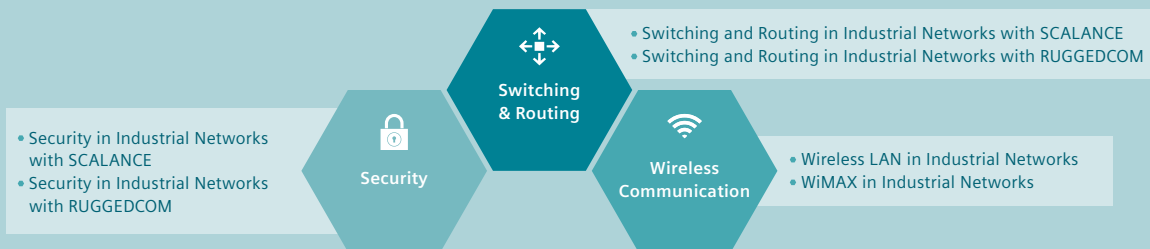
### **Siemens Certified Expert for Industrial Networks (Siemens CEIN)**

These courses will round out your knowledge and will additionally provide you with expertise in industrial networks. With the training and certification program, you can count on an outstanding qualification, a unique combination of both in-depth and broad knowledge. You will acquire comprehensive expertise in a special field which you can selectively expand through multidisciplinary training courses. Building on the content of the professional certificate, you will deepen your knowledge and skills through additional supplementary training courses in which you will learn how to secure, diagnose, and optimize communication networks. The combination of individual training certificates will make you a Siemens Certified Expert for Industrial Networks.

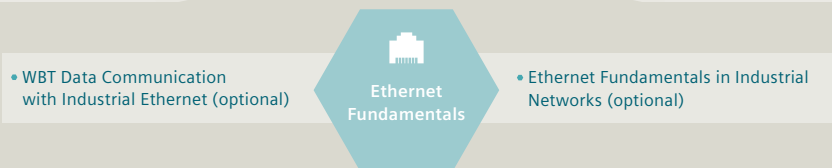
# Modular course offer



Siemens  
CEIN\*\*\*



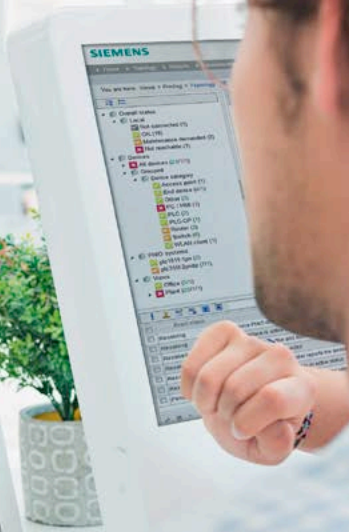
Siemens  
CPIN\*\*



Siemens  
ITIN\*

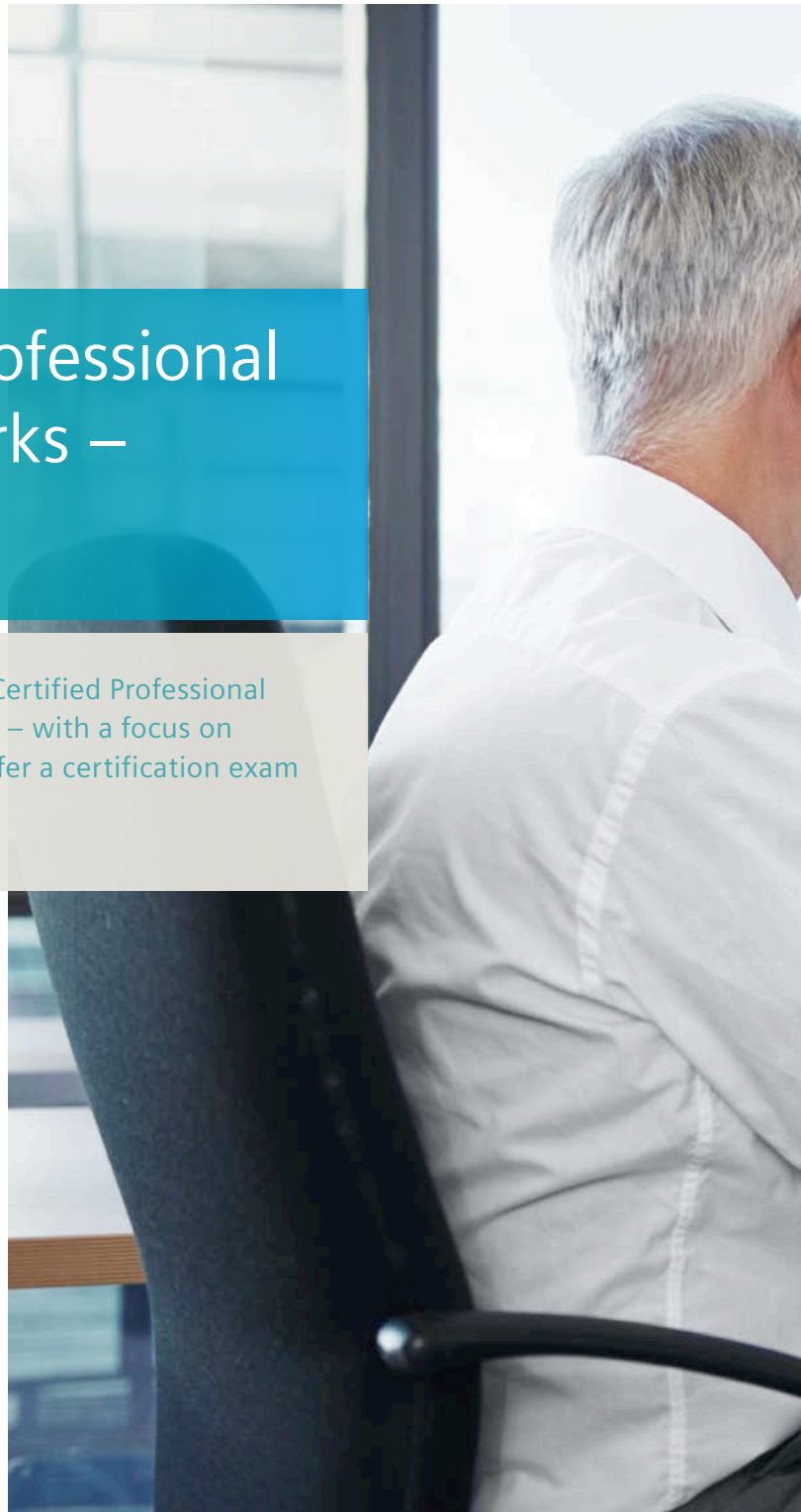
\*Initial Training for Industrial Networks \*\*Certified Professional for Industrial Networks \*\*\*Certified Expert for Industrial Networks

<sup>1)</sup> Multidisciplinary training courses

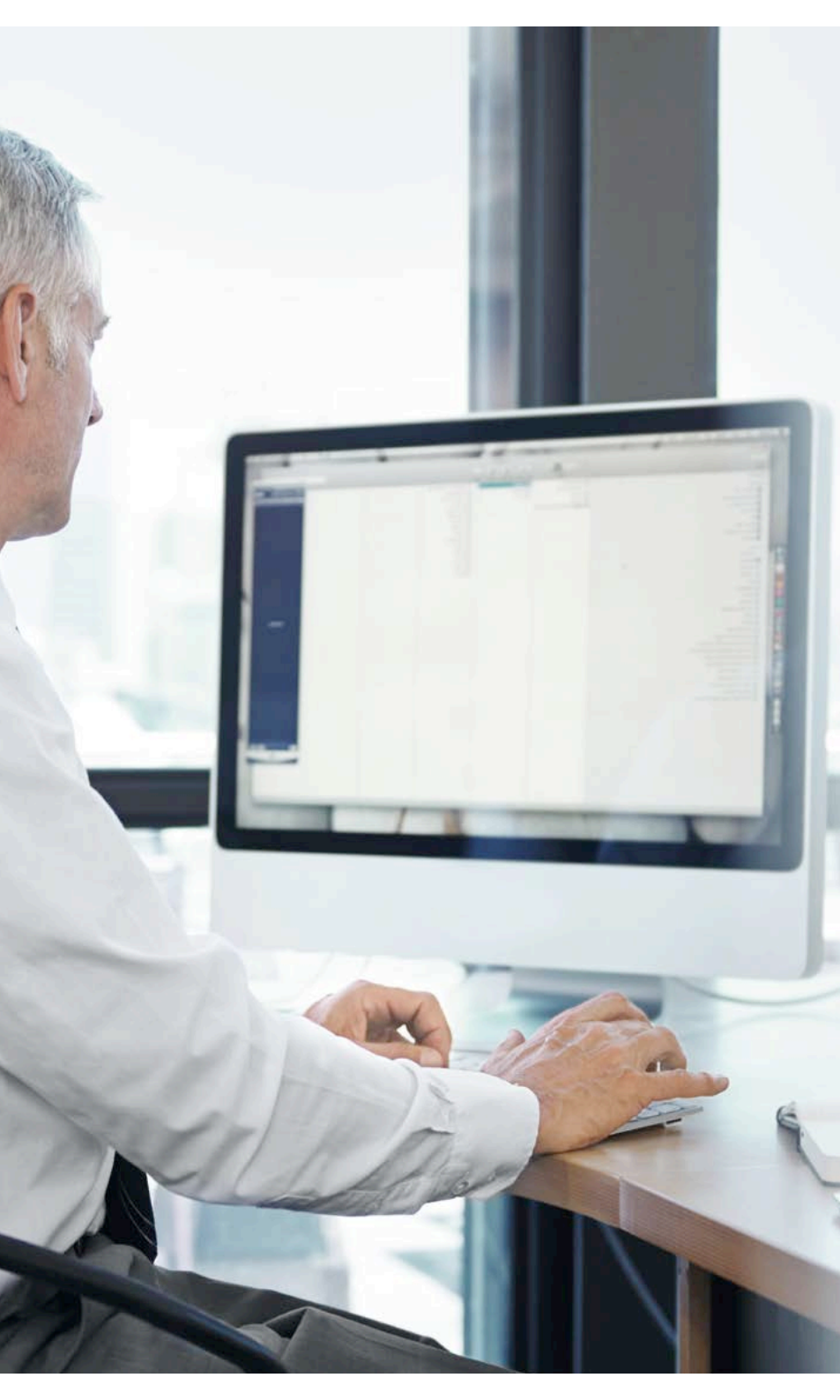


# Siemens Certified Professional for Industrial Networks – Siemens CPIN

You will complete your training as a Siemens Certified Professional for Industrial Networks in three different units – with a focus on SCALANCE or RUGGEDCOM. At the end, we offer a certification exam for each topic.







### Switching and Routing in Industrial Networks

In the switching part, you will learn to set up so-called switched network solutions as well as redundancy mechanisms for increasing failure tolerance – including many practical exercises. The routing part deals with the fundamentals of routing communication and includes practical exercises – along with troubleshooting and diagnosis.

Duration: 5 days



### Wireless LAN/WiMAX in Industrial Networks

In the training course on Wireless LAN in Industrial Networks or WiMAX, you will learn about the special requirements of these technologies through practice in industrial environments. Performance and security in IWLAN and WiMAX are elementary components of this course.

Duration: 3 or 2.5 days



### Security in Industrial Networks

In the training course on Security in Industrial Networks, you will learn protection concepts and apply them in specific, practical exercises. In the end, you will be able to correctly assess threats and initiate countermeasures.

Duration: 3 or 2.5 days

# Siemens Certified Expert for Industrial Networks – Siemens CEIN

There are two certification pathways for the training to become a Siemens Certified Expert for Industrial Networks: “Switching and Routing” covers the knowledge required for the planning, implementation, and operation of wired industrial networks; “Wireless Communication” focuses on maximum flexibility in wireless networks that meet industrial requirements. Each certification pathway is supplemented through training courses from another field or through multidisciplinary training courses that represent a valuable addition to each of the cited certification pathways. You will earn your certificate as a Siemens Certified Expert for Industrial Networks through the combination of several individual certificates.



### **Diagnostics and Optimization of Industrial Networks with SCALANCE**

This course covers diagnostics and optimization of industrial networks. With the help of practical exercises, you will familiarize yourself with the available tools and learn which functions to use to ensure the requisite performance, availability, and security of the network.

**Duration: 3 days**



### **Diagnostics and Optimization of Industrial WLAN**

After this training course, you will be able to properly assess wireless signals. In addition, you will familiarize yourself with the available tools and learn which parameters can be adjusted to ensure the requisite performance of the network. Practical exercises and corresponding checklists round out this training course.

**Duration: 2 days**

## **Multidisciplinary training courses:**



### **Remote Communication in Industrial Networks**

This course provides instruction regarding the planning and implementation of networks for remote communication. In addition, you will learn how to install and commission SINEMA RC solutions, and how to put into practice the associated possibilities and various functions.

**Duration: 3 days**



### **Monitoring and Configuration of Industrial Networks**

This course shows you how to use the SINEMA Server network management software to monitor, diagnose, and document your network from a central location. You will acquire the fundamental knowledge and skills necessary to plan, implement, and manage your network monitoring solution.

**Duration: 3 days**

Find out more at:

[siemens.com/industrial-networks-education](https://www.siemens.com/industrial-networks-education)

Learn about the detailed offering from  
Siemens Industrial Networks Education.  
Build a solid foundation for your long-term  
professional success!



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