V1.600

Course Sequence: ***IP for Telecom Professionals***

Module 1: "Quo vadis" / *Module 2:* ***The Basics*** / Module 3: Advanced Issues

Course Duration:

3 days

Course Description:

- This course addresses the needs of engineers and technicians who are already familiar with the mobile and/or telecom environment but who require detailed knowledge of the TCP/IP-protocol suite and its operation and network architecture.
- These 3 days of the course sequence are called "The Basics" and they make the student familiar with all basic aspects of the IP-protocol suite. That includes the interaction between IP and lower layer protocols (⇔ Ethernet, PPP) and upper layer protocols like TCP, UDP and the different application protocols FTP, SMTP, POP3 etc..
- All protocol aspects are related back to real life applications and to the responsible network elements like routers, switches, hubs and bridges.
- Possible network architectures are one major focus of this course.
- One challenge during the course is the live setup and configuration of a LAN with 2 routers, 1 switch, 8 users, FTP-server, DHCP, NAT and WLAN-internet connection.

Pre-Requisites:

- The student should possess detailed knowledge of wireline and/or wireless communications, particularly within the area of operation or engineering.
- Basic knowledge of the TCP/IP-protocol suite and its environment is necessary.

Course Target:

- Most importantly, the student will be confident and self-assured with respect of the IP-protocol suite.
- The student will be perfectly aware of how packets of any kind are constructed, processed and transferred within and between IP-networks.
- The student will obtain detailed understanding of the TCP/IP-protocol suite and of the different capabilities and functions of these protocols.
- After the course the student is enabled to configure, setup, analyze and operate IP-networks.

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Enclosures for the Practical Exercises

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