Next Generation Networks (NGN)

Course Overview

“The next generation networks will deliver broadband data and multimedia services to users over a common Multi-Service Infrastructure. Circuit switched voice services will replaced with IP packet switched infrastructures that will carry TV, video multi-media and Voice over IP. The key to this new soft-switch technology will be the protocols that run between the Media Gateway Controllers and the switched core. The heart of the service will be IP running over MPLS and Gigabit Ethernet or SDH. “

NGN training course introduces by CODEC Networks present the technical features, applications and design considerations of new and emerging network technologies and develop a comfortable, practical understanding of how each technology is best applied.

Course Overview and Objective

After completing this course, students will learn:

- A working knowledge of emerging network technologies, how they are used, what their advantages or disadvantages are, and what their future offers.
- A comfortable understanding of applicable terminology, which is critical to a successful learning experience.
- An appreciation that appropriate network performance is always the result of deliberate, continuing management and reengineering efforts never a one-time design initiative.
- An understanding of the process of evaluating technologies with a view to judging their suitability for specific purposes, and recognizing associated risks.
- Consider the business potential for current and future services
- Summarize architecture and technology options for Multi-Service Networks
- Identify the key technologies for core, access and infrastructure
- Examine benefits and limitations of SDH, ATM, IP, VoIP and Media Distribution
- Provide an understanding of likely future service demands

Pre-Requisites

Basic knowledge of networking fundamentals, data networking or telecommunications principles is required prior to attending this course. Introduction to Data communications and Networking is also recommended as a minimum level of experience

Who should attend?

Candidates who are interested in understanding the next generation networks topics, architectures and implementation issues

This course benefits the candidates who are planning to pursue his/her career in following functional areas: project and product management, hardware and software development, system engineering, testing and verification, network planning and operations engineering

The Specified Program Enables Participants to Seek Jobs In

- Network Administrator
- Network Analyst or Architects
- Network Managers
- Network Engineers or Operators
- Network Planning & Optimization Lead / Specialist
- Technical Staff
Course Duration: 2 Days (Sixteen Hours Workshop)

Course Content

- Introduction To Next Generation Networks (NGN)
- Broadband Wireline And Wireless Alternatives
- Wireless Access Technologies
- Overview Of TCP/IP And Packet Core
- Advanced IP Networking
- Overview Of Voice And Video Transport Over IP
- NGN Requirements, Architecture And Protocols

- Next-Generation Network And Service Management
- NGN Architectural Components
- NGN Standards And Protocols
- NGN Applications And Architecture
- SATCOM And Broadband Wireless Architecture
- NGN Operations And Management