Certification & Training on CDMA Basics to Advance Course Duration (1 Month)

Course Content

1).Overview…………………………(1 Day)
- Concepts of CDMA.
- Spread spectrum technology.
- Key characteristics of CDMA.
- Comparison with FDMA & TDMA.

2).Coding Basics…………………(2 Days)
- CPN Codes and their characteristics
- Orthogonal Code and its characteristics
- Walsh code generation techniques.
- Use of codes in CDMA.

3).CDMA Channels………………(3 Days)
- Physical and logical channels.
- Forward Link Channels.
- Reverse Link Channels.
- Control and traffic channels.
- Rate sets and Multiplexing.

4).Physical Layer Operations……………(2 Days)
- Variable Rate Coding.
- Encoding and interleaving.
- Walsh Spreading.
- Scrambling PN Spreading.
- Orthogonal Modulation.

5).Call Processing……………………………(4 Days)
- Call processing state machine.
- System determination & acquisition.

- Idle mode operations.
- System access operations.
- Call Setup and release operations.
- Mobile initiated call Setup.
- Mobile terminated call Setup.

6).Mobility and Handoffs.........................(2 Days)
- Registration.
- Idle handoffs.
- Soft and softer handoffs.
- Hard handoffs.

7).Power Control......................................(2 Days)
- Need and benefits of power control.
- Reverse link power control.
- Forward link power control.

8).1x EV-DO Introduction.........................(2 Days)
- Introduction to 1xEV-DO
- Motivation for 1xEV-DO
- 1xEV-DO standards
- 1xEV-DO data rates in forward and reverse directions
- How are higher data rates achieved in 1xEV-DO

9).1xEV-DO Architecture.......................(2 Days)
- Overview of the 1xEV-DO architecture competitors
- New 1xEV-DO components and interfaces

Holiday for Test Preparation..............(2 Days)
Course Assessment through written test & mock interview