

# **Internet Revolution: Current Status and Future Challenges**

**Instructor: Dr. Borko Furht, Florida Atlantic University**

## **Description:**

In this seminar we first present the state-of-the-art in the Internet technology including a digital nervous system, which is built around the Internet. We then discuss the evolution of Internet systems from Internet Service Providers to Application Service Providers. The first wave of Internet-based business included Internet Service Providers (ISPs) that linked businesses and consumers via the Internet. We are presently at the verge of the second, much larger wave – Application Service Providers (ASPs), which lease software applications to businesses and consumers via the Internet.

The future challenges in three key areas – business-to-business applications, application service providers, and M-business – are presented next. We present key components of B2B including Extranet, eProcurement, and eMarketplace, and discuss the opportunities in these areas. We introduce components of the ASP model and discuss innovative multi-tier Internet architectures for ASPs. We present key technologies that enabled the ASP model, including advances in networking technologies, Internet deliverable software, and improvements in distributed systems management software. We also discuss types of ASP applications, from personal and collaborative to E-commerce, vertical, and analytical applications. We discuss the components of M-business including alternative wireless access technologies, wireless protocol standard, and promising M-commerce applications.

In the final part of the seminar, we present our vision of the future.

## **Seminar Outline**

1. Internet Excitements
2. Internet as Digital Nervous System
3. Evolution of the Internet
4. Business-to-Business Applications
5. Application Service Providers
6. M-Business
7. Future

## **Speaker's Biography:**



Dr. Borko Furht is an internationally respected authority on multimedia, Internet, and communication systems. He is currently professor of computer science and engineering at Florida Atlantic University (FAU) in Boca Raton, Florida. He is the founder and director of the Multimedia Laboratory at FAU, funded by National Science Foundation. Before joining FAU, he was a vice president of research and a senior director of development at Modcomp, a computer company of Daimler Benz, Germany, and a professor at University of Miami in Coral Gables, Florida. He has published numerous scientific and technical papers, many books, and holds several patents. He is an editor-in-chief of two journals - the Journal of Multimedia Tools and Applications (Kluwer Academic Publishers) and the Journal of Computers and Applications (Acta Press). His research interests include multimedia systems, Internet engineering, video coding, and video databases. He presented invited seminars and keynote addresses at many international conferences. He has received several technical and publishing awards, and has consulted for IBM, Hewlett-Packard, Xerox, General Electric, JPL, NASA, Honeywell, and RCA.