

Internet of Things Foundation

Duration 2 Days

COURSE DESCRIPTION

The Internet of Things Foundation course provides an overview and insight into the emerging technology.

The course covers the basic concepts, terminology, and key components of IoT. It explains the business perspectives of IoT including the advantages of early adoption and monetization models. It further expands on the technologies enabling IoT and the various challenges to expect. Several scenarios describe the use cases and applications of IoT that result in smart applications and services to inspire organizations making the move to IoT. The course provides future insights in IoT and forecasts the status of the connected world in 2020.

This interactive and thought-provoking course includes:

- Group discussions
- Lab activities to allow you to experience IoT applications: These are in-class lab exercises which will allow participants to experience IoT applications.
- Case scenarios around IoT
- Module End Questions

COURSE OBJECTIVES

At the end of this course, you will be able to:

- Define concepts and terminologies of IoT.
- Examine new devices and interfaces that are driving IoT growth.
- Relate to business perspectives of IoT (advantages of early adoption of IoT technologies).
- Predict implications of IoT for your business.
- Examine the role of enabling technologies for IoT, such as cloud computing and Big Data.
- Identify security and governance issues with IoT.
- Examine future growth opportunities of IoT in the coming years.

COURSE OUTLINE

Course Introduction

Concepts and Terminologies

- Introduction: Internet, Things, and IoT
- IoT Types, History and Evolution of IoT
- Cyber-Physical Systems and Differences Among IoE, M2M, and IoT
- Facts and Figures Around IoT and IoT Application Areas

Business Orientation

- Drivers of IoT
- Benefits of a Connected World
- IoT Business: Opportunities, Benefits, and Challenges
- IoT Monetization Strategies and Models

Basic Building Blocks of IoT–Architecture

- Architecture of IoT Components
- Network Protocols Within IoT

Enabling Technologies of IoT + Lab Activities

- Role of Social Media and Mobility in IoT
- Defining SMOACT
- Role of Big Data and Analytics in IoT
- Role of Cloud Computing in IoT

IoT Security and Top Governance Issues

- IoT Security Challenges
- Causes of IoT Security Breaches
- IoT Security Risks

IoT Case Studies and Future Predictions

- IoT Usage Scenarios
- IoT Growth Perspectives
- IoT Future Predictions

Exam Preparation**PREREQUISITES**

There are no formal prerequisites for the exam, but the participants must be conversant with cloud concepts and vocabulary.

EXAMINATION

Successfully passing (65%) the 75-minute exam, consisting of 25 multiple-choice questions, leads to the Internet of Things Foundation Certification.

WHO SHOULD ATTEND

- Software Engineers
- Application Developers
- IT Architects
- System Administrators