

Big Data Foundation

Course Information

Certification : Big Data Foundation (CCC)

Duration: 2 days

Domain : Cloud Computing

Delivery Method : Classroom

Accreditor : CCC

Available Languages : English

Purchase Options : Pay per Use

Course Description:

The Big Data foundation course provides you with an understanding of Big Data, potential data sources that can be used for solving real business problems, and an overview of data mining and the tools used in it.

This is a fundamental course with practical exercises designed to provide you with hands-on experience in using two of the most popular technologies in Big Data processing – Hadoop and MongoDB. You will get the opportunity to practice installing these two technologies through lab exercises. The exercises expose you to real-life Big Data technologies with the purpose of obtaining results from real datasets from Twitter.

After completing the course, you will be equipped not only with fundamental Big Data knowledge, but will also be introduced to a working development environment containing Hadoop and MongoDB, installed by yourself. This practical knowledge can be used as a starting point in the organizational Big Data journey.

Audience:

This course is best suited to Information Technology professionals who possess intermediate to advanced programming, system administration, or relational database skills and are looking to move into the area of Big Data. These include:

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

The course can also be of benefit to other professionals, such as business analytics and research analytics, who possess strong Information Technology skills and have a deep interest in Big Data analytics and the benefits it can bring to an organization.

Learning Objectives:



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

- Explain Big Data, its origin, and its characteristics.
- Discuss about the tools applicable to Big Data processing.
- Explain data mining.
- Discuss the popular Big Data technologies – Hadoop and MongoDB.
- Discuss the Big Data projects and the main players involved.
- Identify and obtain relevant datasets when looking at a business problem.
- Install and manage Big Data processing environments based on Hadoop or MongoDB at a departmental level.

Prerequisites:

None

Course Materials:

- For Participants
 - Coursebook (eBook or printed)
 - Labs
- For Instructors
 - Presentations
 - Instructor Guide (eBook)
 - Labs

Lab Details

Course Agenda:

Day1	Day2
1. Course Introduction	5. Big Data Technologies – Hadoop
2. Big Data Fundamentals	6. Big Data Technologies – MongoDB
3. Big Data Sources	7. Exam Preparation Guide
4. Data Mining – Concepts and Tools	

Course Outline:

Module 1: Course Introduction

- Let's Get to Know Each Other
- Course Learning Objectives



- Course Agenda
- Activities
- Exam
- Course Book
- CCC – Accreditor of the Course
- Certification Value

Module 2: Big Data Fundamentals

- Overview
- Big Data – History, Overview and Characteristics
- Big Data Technologies – Overview
- Big Data Success Stories
- Big Data – Privacy and Ethics
- Big Data Projects

Module 3: Big Data Sources

- Enterprise Data Sources 30
- Social Media Data Sources 34
- Public Data Sources

Module 4: Data Mining: Concepts and Tools

- Data Mining – Introduction
- Data Mining – Tools

Module 5: Big Data Technologies – Hadoop

- Hadoop Fundamentals
- Install and Configure
- MapReduce
- Data Processing with Hadoop

Module 6: Big Data Technologies – MongoDB

- MongoDB Fundamentals
- Install and Configure
- Document Databases
- Data Modeling with Document Databases

Exam Preparation Guide

- Qualification Learning Objectives
- Learning Level of the Syllabus
- Certification
- Exam Instructions
- Tips for Exam Taking



Exam Information

Exam Facts

Delivery	Online / Paper based
Format	Closed book
Proctoring	Web proctored / In-class proctored
Duration	60 minutes, 15 additional time for non-native candidates
# of questions	40, simple multiple choice (1 mark per question)
Pass Grade	65% (26 out of 40)

