

AI & Analytics with Microsoft

Duration: 24 hrs

Course Overview

This 3-day course empowers participants to visualize data using Power BI and explore Microsoft Azure's AI capabilities. Ideal for researchers, analysts, and developers, it covers dashboard creation, cognitive services, machine learning, and real-world use cases to drive intelligent, cloud-based decision-making.

Suggested Audience

University researchers and faculty, IT professionals and developers, Business analysts and decision-makers, Students in data science or AI fields

Course Agenda

Day 1: Data Analytics & Visualization with Power BI

- Introduction to Power BI ecosystem
- Connecting and transforming data (Power Query)
- Data modelling and DAX
- Predictive analytics in Power BI
- Case Study: Sales analytics using Power BI
- Publishing and sharing dashboards (Power BI Service)
- Hands-on: Build Reports and Dashboards using Power BI

Day 2: Introduction to Microsoft Cloud & AI Services (Azure) – Part 1

- Overview of Microsoft Azure and Cloud Concepts
- Introduction to Azure Portal, Resource Groups, and Storage
- Azure AI Overview and Use Cases
- Introduction to Azure Cognitive Services (Vision, Language, Speech)
- Demo: Building a simple AI-powered app using Azure Vision API
- Demo: Building Language Understanding APP
- Demo: Create Custom Models to recognize forms

Day 3: Microsoft Cloud & AI Services (Azure) – Part 2

- AutoML using Azure Machine Learning
- Responsible AI: Ethics and fairness
- Using Azure OpenAI for generative tasks
- Research Enablement: Leveraging Azure for academic/scientific data
- Demo: Create GenAI Apps
- Demo: Use your own data with GPT models
- Wrap up and QnA.