

# **Course objectives**

Learn to use a variety of data techniques drawn from the fields of machine learning, data visualisation, Big Data and many others to interpret large and complex datasets in an applied setting. Participants in this course will delve further in data analysis with prior knowledge in Python programming, and enhance their analytical skills.

Learning objectives:

- An introduction to large scale data analysis with Cloud Computing by harnessing the power of virtual machines deployed on the Amazon Web Services cloud
- Build a strong analytical mindset along with the technical skills to uncover, analyse and evaluate patterns from data
- Complete a practical capstone project to add to their portfolio to showcase their Python and Data Analysis competencies

## **Course outline**

- Module 1: Applying Data Analytics to Sales and Marketing through Linear Models
- Module 2: Avoiding Pitfalls in Business Analysis through Model Specification
- Module 3: Business Intelligence with Web Scraping and Text Mining
- Module 4: Storytelling with Advanced Data Visualisations
- Module 5: Understanding Big Data with Cloud Computing
- Module 6: Executing Projects in Applied Data Analytics

### Course details 1 week

Certificated by Singapore Management University (SMU)

### Who should attend

- Data science professionals seeking to apply Python to real world data problems e.g. business intelligence analysts, data engineers
- Managers looking into costs and performance hurdles in predictive modelling
- Anyone with an interest in learning about the advanced data analysis techniques and applying it in practice

#### **Pre-requisites**

Experience in Python programming (equivalent to that attained in Professional Certificate in Python Programming programme) is essential.

**Tool** NLTK package, Plot.ly package, Dask Dataframes , etc.

### **Model of training** Classroom, Field trip

