# Microsoft Power BI Masterclass



### **Course Details**

Course Name Microsoft Power BI Masterclass
Duration 5 Days
Course Code AFBMPBM
Assumed Knowledge Basic understanding of Power BI

#### **Course Aims**

Join us for a five-day learning journey that distills the essence of our Power BI training into a single course, aimed at giving you the tools to handle almost any reporting challenge. We will work alongside you to discover the full Power BI workflow, from bringing together the raw data to producing amazing, professional reports and how to share them with your audience. Along the way, you will cement your knowledge with real life examples, discussions on approach and methodology and a hands-on approach to your learning experience.

#### What You Will Learn

In this Power BI course, you'll discover how to harness the full potential of data: from connecting and transforming raw inputs using Power Query to mastering Data Analysis Expressions (DAX) for useful measures and calculated columns. You'll delve into data modeling, create compelling visualisations, and design interactive reports tailored for your audience. By the end, you'll be equipped to tell powerful data stories, optimise report performance, and publish your insights, becoming a proficient Power BI practitioner.

#### Skills

- Learn to connect various data sources and transform using Power Query
- Use Data Analysis Expressions (DAX) to create powerful measures and calculated columns.
- Understand data modeling concepts and complex relationships
- The art of building interactive reports and choosing the best visualisations for your data
- Explore custom visuals and advanced design techniques, including layers and bookmarks
- Publishing reports, manage data refreshes, and optimising within the Power BI service
- Develop your data storytelling and learn advanced sharing and presentation techniques
- Troubleshooting reports and resolve common issues

### Target Audience

This course is aimed towards individuals that have a basic understanding of the Power BI report building process and are looking to develop their skills further to support their role or career progression.





#### **Course Content**

#### Module 1 - Introduction to Power BI

Topic A What is Microsoft Power Platform, Fabric and Power BI

Topic B Power BI licensing, set-up and connections

Topic C Power BI architecture

Topic D Power BI Desktop Overview

Topic E Power BI Online Service Overview

Topic F Sharing Power BI data

# Module 2 – What's a Data Wrangler?

Topic A So what's a Data Wrangler?

Topic B Excel or Power BI? The right tool for the right job

Topic C What is ETL?

Topic D How ETL is implemented in Power BI

Topic E A Dashboard or Report? Plan your

project

# Module 3 - Connecting to Data Sources and Preparing Data

Topic A Overview of Power Query

Topic B Data sources and limitations

Topic C Connection Types

Topic D Connecting to Data

Topic E Preparing data in Power Query

Topic F Pros and cons to different data sources

# Module 4 – Going Further With Data Transformation

Topic A Data transformation best practices

Topic B Power Query next steps

Topic C Data Profiling and Quality

Topic D Using advanced transformations

Topic E Adding indexes, and why they matter

Topic F Date and Time

Topic G Split columns

Topic H Standard operator columns

Topic I Merging, Appending, or Referencing

Queries

#### Module 5 – The Power Of Datasets

**Topic A** Is it Dataset or Semantic Model, or Semantic Layer?

Topic B Data Source considerations

Topic C On Premises vs Cloud sources

Topic D Understanding Gateways

#### Module 6 – Advanced Data Connections

Topic A When to use Live Data?

Topic B Live vs Realtime data

Topic C DirectQuery, Live Connections and composite

models

# Module 7 – Deep Dive Power query

Topic A Handling changes in data sources

Topic B Making changes to a gateway

Topic C Mcode Basics and Custom Functions

# Module 8 – Data Modelling basics

Topic A Introduction to Data Modelling concepts

Topic B Setting relationships manually or automatically

Topic C Hierarchies overview

# Module 9 – Mastering Models

Topic A Complex data relationships

Topic B Many To Many

Topic C Multiple fact tables

Topic D Optimising performance

# Module 10 - Setting Up Relationships and Building Visualisations

Topic A Overview of the different views

Topic B Creating folders, bins, measures table and

hierarchies

Topic C Build Relationships

Topic D Adding Visualisations

Topic E Edit Interactions

Topic F Setting up your report theme

Topic G Filtering levels and options

Topic H Drill through

Topic I Drill Up / Down





#### Module 11 - Introduction to DAX

Topic A The difference between a measure and a calculated column

Topic B Quick Measures

Topic C Basic DAX calculations

Topic D Creating KPI's Topic E Visual calculations

Topic E visual calcalacions

#### Module 12 – Advanced DAX

Topic A Advanced DAX functions and use cases

Topic B Advanced Measures

Topic C The importance of Context

Topic D DAX time intelligence use cases

Topic E Third Party tools

# Module 13 – Taking your reports further

Topic A Audience consideration

Topic B Report Building and design best practices

Topic C Which visualisation to use and when?

Topic D Using the Visualisations marketplace

# Module 14 – Visualisation deep dive

Topic A Groupings, analysis, predictions, and sparklines

Topic B Advanced interactivity

#### Module 15 – Custom Visuals

Topic A What are custom visuals?

Topic B Business use cases for custom visuals

Topic C R or Python and how they're

implemented

Topic D Overview of the installation process

Topic E Creating a simple custom visual

#### Module 16 – Design Deep Dive

Topic A Exploring visual formatting

Topic B Designing in 3D

Topic C Advanced actions and bookmarks

Topic D Mobile formatting tips and tricks

### Module 17 – Considering your audience

Topic A The importance of roles

Topic B Using and testing roles

# Module 18 – Enhancing reports with Co-Pilot

Topic A Co-Pilot overview

Topic B Narrative Visuals and Q&A/Synonyms

# Module 19 - Report Optimisation and Publishing to Power BI Service

Topic A Publishing reports and sharing Information

Topic B Refreshing data

Topic C Performance analyser

Topic D Row level security

Topic E Creating a Dashboard

Topic F Managing alerts

Topic G Q&A feature

# Module 20 – Going Further with the Power BI service

Topic A Service Deep Dive and refreshing datasets

Topic B Overview of web, portal and embedded publishing

Topic C Using Dataflows

Topic D Advanced editing using the service

Topic E Advanced sharing options and considerations

Topic F Paginated Reports and use cases

### Module 21 – Becoming a Data Storyteller

Topic A What is data storytelling?

Topic B Data Storytelling techniques

Topic C Advanced Sharing and Presenting

Topic D PowerPoint presenting with integrated

reports

# Module 22 – The development Journey

Topic A Development methodology overview

Topic B DEV, TEST, and PROD

Topic C Creating development pipelines in fabric

Topic D Managing a deployment

# Module 23 – Advanced Troubleshooting

Topic A Advanced troubleshooting and support pathways



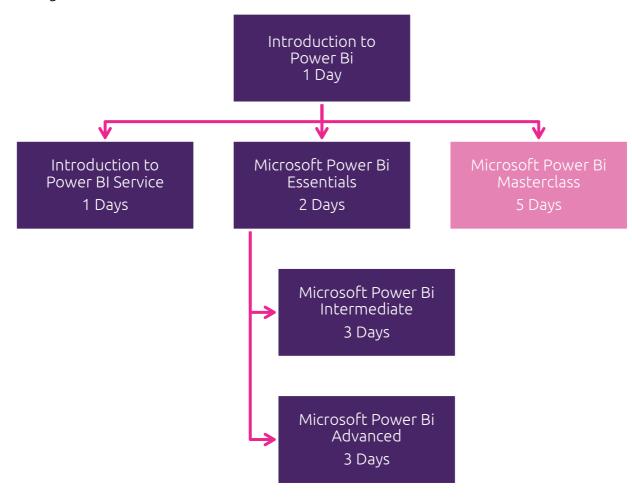


# **Course Progression**

Power BI is a powerful tool for data analysis and visualisation that can help you gain insights and make informed decisions. At Appetite, we understand the significance of learning the full depth of using Power BI in a modern organisation. That's why we offer a range of courses from introduction to advanced, covering topics such as data modelling, DAX, visualisations, dashboards, reports, and more. We can guide you from having no prior knowledge to building very detailed reports using some advanced skills.

Whether you want to learn the basics of Power BI, or take your skills to the next level, we have a course for you. Our courses are interactive, engaging, and can also be tailored to your needs. You'll learn from our experienced trainers who will share their best practices and tips for success. By the end of the course, you'll be able to apply your learning to your own data and scenarios and create stunning and impactful reports that will impress your colleagues and stakeholders.

Join us in discovering the power of Power BI and enhancing your data literacy by taking one of the following courses.







# **About Appetite**

### Audacious, Human, Purposeful, Rigorous, Kind

Our company values underpin everything we do and are at the heart of our business.

Established in 2016, Appetite is passionate about helping people and organisations use technology as a force for good with values and culture being a guiding force for how we achieve this.

We will help you engage with your colleagues and customers through technology and our people – our difference makers – will be pivotal in helping you to achieve this.

We help companies to simplify technology and get the most out of Microsoft Cloud technologies to grow. We provide easier to access data analytics, faster business processes, better workflows and productivity, and a better understanding of how your business is performing.

#### Accreditation

We adhere to several elite standards giving you the confidence that you are working with a partner who strives to be the very best, by continuously improving our management system and processes we work to the highest possible standard.









