

Power Automate & VBA Macros for Operational Process Automation

Duration: 4 Days

Course Summary

This training is designed for operations support professionals who perform repetitive, rule-based activities involving emails, Excel files, reporting, data validation, approvals, and information sharing.

Participants will learn how to:

- Identify automation opportunities
- Build Power Automate cloud flows
- Create and modify Excel VBA Macros
- Automate reporting and data processing activities
- Troubleshoot automation failures
- Apply governance and best practices

The course uses common operational business scenarios to connect demonstrations, labs, and discussions.

Pre-Requisites

Participants should have:

- Working knowledge of Microsoft Excel
- Basic familiarity with Outlook, Teams, and SharePoint
- Experience performing operational processes manually

Course Objectives

By the end of this training, participants will be able to:

- Identify processes suitable for automation
 - Design automation workflows
 - Create automated, scheduled, and instant flows
 - Work with conditions, loops, variables, and expressions
 - Create approval and notification workflows
 - Automate Excel-based processes using VBA
 - Build data validation and reporting solutions
 - Troubleshoot and maintain automations
 - Follow governance and documentation best practices
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Course Content

Day 1 – Power Automate Foundations

Module 1 – Introduction to Process Automation

Topics Covered

- Business Process Automation Fundamentals
- Identifying Automation Opportunities
- When to use Power Automate vs VBA
- Process Mapping Basics

Demo

- Manual Process Assessment

Lab

- Identify automation opportunities in an operational process

Module 2 – Getting Started with Power Automate

Topics Covered

- Power Automate Overview
- Automated, Instant and Scheduled Flows
- Triggers and Actions
- Connectors
- Dynamic Content
- Flow Templates
- Monitoring and Run History

Demo

- Automated Email Notification

Lab

- Build an email notification flow

Module 3 – Microsoft 365 Integrations

Topics Covered

- Outlook Integration
- SharePoint Integration
- Excel Online Integration
- Teams Integration

Demo

- Daily Operational Reminder Automation

Lab

- Scheduled Reminder Flow
- Excel-driven Notification Flow

Day 2 – Intermediate Power Automate

Module 4 – Flow Logic & Decision Making

Topics Covered

- Variables
- Conditions
- Switch Statements
- Expressions
- Data Formatting
- Dynamic Content

Demo

- Request Routing Automation

Lab

- Build a routing workflow

Module 5 – Working with Data Collections

Topics Covered

- Apply to Each
- Loops
- Arrays
- Filtering Data
- Excel Table Processing

Demo

- Bulk Record Processing

Lab

- Process multiple records from Excel

Module 6 – Advanced Flow Design

Topics Covered

- Parallel Branching
- Error Handling
- Configure Run After
- Scopes
- Retry Policies
- Flow Optimization

Demo

- Parallel Approval and Notification Flow

Lab

- Build a flow using parallel branches and error handling

Module 7 – Approvals & Notifications

- Approval Concepts
- Multi-stage Approvals
- Escalations
- Teams Notifications

Day 3 – Excel VBA Macros

Module 8 – VBA Fundamentals

Topics Covered

- Macro Recording
- VBA Editor
- Modules

- Procedures
- Running Macros

Demo

- Automated Formatting

Lab

- Record and modify a macro

Module 9 – VBA Programming Basics

Topics Covered

- Variables
- Data Types
- Conditions
- Loops
- Procedures

Demo

- Data Validation Macro

Lab

- Create a validation macro

Module 10 – Data Processing & Reporting with VBA

Topics Covered

- Data Cleansing
- Duplicate Detection
- Lookups
- Consolidation
- Report Generation

Demo

- Monthly Report Consolidation

Lab

- Build a reporting automation macro

Day 4 – Integration, Governance & Support

Module 11 – Power Automate & VBA Integration

Topics Covered

- Automation Architecture Patterns
- Power Automate Desktop Overview
- Power Automate and VBA Integration Scenarios
- End-to-End Automation Design

Demo

- Email Attachment Processing
- Automated Reporting Solution

Lab

- Design an integrated automation solution

Module 12 – Troubleshooting & Support

Topics Covered

- Flow Troubleshooting
- Run History Analysis
- VBA Debugging
- Logging Techniques

Demo

- Resolve automation failures

Lab

- Fix broken flow and macro scenarios

Module 13 – Governance & Best Practices

Topics Covered

- Security & Access Control
- Data Privacy
- Documentation Standards
- Naming Conventions
- Version Control Concepts

Demo

- Governance Review Exercise

Lab

- Document an automation solution

Module 14 – Power Platform Administration Basics

Topics Covered

- Introduction to Environments
- Solutions Overview

- Import and Export Solutions
- Deployment Considerations
- Governance Considerations for Shared Flows