

Software Development Technician (Level 3)



Phase 1

Induction & Initial Assessment



Phase 2

Training modules and contact from Skills Development Coach



Software Development Context and Methodologies (2 Parts)

Programming (3 Parts)

Software Development Fundamentals (3 Parts)



Phase 3

Assessment Gateway



Phase 4

End Point Assessment



Apprenticeship Standard Software Development Technician (Level 3)

Blended Learning breakdown

		Training Centre	Remote
Phase 1	Induction & Initial Assessment		Skills Coach visit
Phase 2	Software Development Context and Methodologies Part 1	3 days	20 hours self-study 4 remote training sessions
	Software Development Context and Methodologies Part 2	3 days	20 hours self-study 4 remote training sessions
	Programming Part 1	3 days	20 hours self-study 4 remote training sessions
	Programming Part 2	3 days	20 hours self-study 2 remote training sessions
	Programming Part 3	3 days	20 hours self-study 2 remote training sessions
	Software Development Fundamentals Part 1	3 days	Training Centre only
	Software Development Fundamentals Part 2	3 days	Training Centre only
	Software Development Fundamentals Part 3 (MTA Software Development Fundamentals C#)	2 days	Training Centre only
Phase 3	Assessment Gateway	Up to 1 week*	Training Centre only
Phase 4	End Point Assessment	3 - 5 days	Training Centre only

*To be arranged by your Skills Development Coach

Course Details



Induction/Initial Assessment

Skills Development Coach will conduct the induction in their first visit

MTA Software Development Fundamentals C#

- Computer storage and data types
- Computer decision structures
- How to identify the appropriate method for handling repetition
- Error handling
- The fundamentals of classes
- Inheritance
- Polymorphism
- Encapsulation
- Application life cycle management
- How to interpret application specifications
- Algorithms and data structures
- Web page development
- Microsoft ASP.NET web application development
- Web hosting
- Web services
- Windows apps
- Console-based applications
- Windows Services
- Relational database management systems
- Database query methods
- Database connection methods



Functional Skills

If required, learners will sit a Maths and/or 3 English exams.

Workshops can take up to 3 days. Each exam takes up to 2 hours.

Software Development Context and Methodologies

- The business context and market environment for software development
- How to recognise that there are different methodologies that can be used for software development
- The roles within the software development team
- The structure of software applications and the particular context for the development platform (whether web, mobile, or desktop applications)
- All stages of the software development lifecycle
- Different types of testing
- How to test code
- The role of configuration management and version control systems and how to apply them



Programming

- How to implement code, following a logical approach
- How code integrates into the wider project
- How to follow a set of functional and non-functional requirements
- The end-user context for the software development activity
- The importance of seamlessly connecting applications to databases and understand types of data storage and their applications
- How to demonstrate knowledge of database normalisation
- Why there is a need to follow good coding practices
- The principles of good interface design
- The importance of building security in to software at the development stage



Assessment Gateway, Assessment Preparation & Administration Week

(Up to 1 week in the training centre)

Preparation week to understand the four elements of the gateway.

Assessment Phase

- Summative Portfolio
- Synoptic Project
- Technical Interview with SME
- Employer Reference

Achievement of Apprenticeship

BCS
Software Development Technician (Level 3)