



Level 3 IT Apprenticeships Overview



Overview of Belfast Met Level 3 IT Level Apprenticeships

An apprentice will be a new or existing employee, in a Northern Ireland-based company, working with experienced staff to learn and develop their skills.

An IT and Telecoms Professional apprentice also receives 'off-the-job' training, usually on a day-release basis with Belfast Metropolitan College, to work towards achieving a vocational two A-Level equivalent OCR Technical Diploma qualification.

Assessors from Belfast Metropolitan College will meet with the apprentice and employer to discuss their training needs and will then develop an appropriate training programme for the apprentice. Belfast Metropolitan College will be with the apprentice throughout their apprenticeship to support them and make sure they are making progress.

The apprentice is with the employer for four days a week and with Belfast Metropolitan College one day a week. The employer will pay the apprentice for their time spent with the training supplier. The apprenticeship programme is free to private sector companies and there are no course or exam fees for the apprentices.

Belfast Met has been offering Level 3 Apprenticeships for the past 13 years. The current programme offers two IT apprenticeship routes. These are Networking Infrastructure and Software Development. Belfast Met will aid employers with the selection process by placing an advert and running aptitude tests (with the aid of MindMill). This process happens over the summer with an October/November start.

Networking Infrastructure Apprenticeship

Year 1

5 week Bootcamp
(MTA Windows OS Fundamentals)

Cyber Security

Computer Networks

MTA Security
Fundamentals

MTA Networking
Fundamentals

Year 2

Global Information

Fundamentals of IT

Project Based Learning incorporating Product Development, Mobile Technology and Internet of Everything units.

MTA Server
Administration
Fundamentals

CompTIA Network+

Apprenticeship in Networking Infrastructure – Unit Overview

Bootcamp

Apprentices will attend a 3 day per week bootcamp for five weeks. The apprentices will study towards the Microsoft Windows OS Fundamentals certification. The topics covered with this certification are Operating System Configurations, Installing and Upgrading Client Systems, Managing Applications, Managing Files and Folders, Managing Devices, and Operating System Maintenance. Apprentices will also cover employment rights and responsibilities.

Cyber Security (Exam)

This unit has been designed to enable students to gain knowledge and understanding of the range of threats, vulnerabilities and risks that impact on both individuals and organisations. Students will learn about the solutions that can be used to prevent or deal with cyber security incidents resulting from these challenges. They will be able to apply your knowledge and understanding of cyber security issues and solutions by reviewing and making recommendations for ways to best protect digital systems and information.

Computer Networks

The purpose of this unit is to give students the practical ability to plan, implement and maintain computer networks. The approach adopted by this unit is 'bottom up' where you begin with a solid set of components, cables and connectors of a network and then progressively build a networking capability. The range of protocols has been deliberately limited to those which are used in the vast majority of computer networks, TCP/IP and Ethernet.

MTA Security Fundamentals



This certification will provide students with a basic knowledge of computer security. Students will learn about the major challenges to computer security and subsequent ways of protecting systems and data against various types of vulnerabilities, threats and attacks and the legal, privacy and ethical issues in computer security.

MTA Networking Fundamentals



With this certification, students will gain a knowledge of how to build and manage Microsoft Windows Servers, Windows-based network operating systems, Active Directory and essential system recovery tools.

Global Information (Exam)

The purpose of this unit is to demonstrate the uses of information in the public domain, globally, in the cloud and across the internet, by individuals and organisations. Students will discover that good management of both data and information is essential, and that it can give any organisation a competitive edge.

Internet of Everything

This unit is about the use of the internet and how it is impacting people and society. Students will learn about the Internet of Everything (IoE) and how it is used. With the knowledge, gained students will carry out a feasibility study for a potential idea. Students will present idea and use their feedback to revise your proposal

Fundamentals of IT (Exam)

This unit will provide a sound understanding of IT technologies and practices essential for IT professionals. Information learnt in this unit will provide a solid foundation in the fundamentals of hardware, networks, software, the ethical use of computers and how business uses IT.

Product Development

The purpose of this unit is to prepare students to undertake product development activities. They will learn about different product design methodologies and the role of the product development life cycle. In addition, they will discover the factors that influence product developments. Whether students are building a network, developing a website, developing a system for data analytics or creating an augmented or virtual reality resource, they are all products. It is therefore important that they understand the processes required for the development of products and that they can apply them to a variety of situations.

Mobile Technology

The aim of this unit is to broaden students knowledge and understanding of the wider potential of mobile technologies and its consequences to people and businesses. This unit is as much about new technologies as it is about promoting critical analysis of existing situations and proposing better solutions.

MTA Windows Server Fundamentals



With this certification students will learn how to build and manage Microsoft Windows Servers, Windows based network operating systems, Active Directory domains, users, groups and computers, together with how to perform regular maintenance. Students will also learn how to monitor systems and the invaluable skill of being able to recover lost data.

CompTIA Network+



CompTIA Network+ is a performance-based certification that helps you develop a career in IT infrastructure by validating the hands-on skills needed to troubleshoot, configure, and manage both wired and wireless networks.

Apprentices will chose 4 of the following units to with the assessor.

- Project management
- Business computing
- Systems analysis and design
- Social media and digital marketing
- Developing a Smarter Planet
- Computer systems – hardware
- Computer systems – software
- IT technical support

Software Development Apprenticeship

Year 1

5 week Bootcamp
(MTA Software Development Fundamentals)

Cyber Security

Web Design
Prototyping

MTA HTML5 & CSS
Fundamentals

MTA Security
Fundamentals

Year 2

Global Information

Fundamentals of IT

Project Based Learning incorporating Product
Development, Application Design and Internet of
Everything units.

MTA Database
Administration
Fundamentals

MTA Introduction
to Programming
using Java

Apprenticeship in Software Development – Unit Overview

Bootcamp

Apprentices will attend a 3 day per week bootcamp for five weeks. The apprentices will study towards the Microsoft Software Development Fundamentals certification. This course will give students an introduction to general software development and will then walk them through the basics of general software development, core programming, object-oriented programming, web and desktop applications and more. Apprentices will also cover employment rights and responsibilities.

Cyber Security (Exam)

This unit has been designed to enable students to gain knowledge and understanding of the range of threats, vulnerabilities and risks that impact on both individuals and organisations. Students will learn about the solutions that can be used to prevent or deal with cyber security incidents resulting from these challenges. They will be able to apply your knowledge and understanding of cyber security issues and solutions by reviewing and making recommendations for ways to best protect digital systems and information.

Web Design & Prototyping

In this unit, students will research, design and produce an interactive, responsive website that is specific to a client's needs, culminating in presenting the concept of the website using the prototype to the client. Student will also learn about the security risks in website design and how to minimise these threats.

MTA Security Fundamentals (Exam)

This certification will provide students with a basic knowledge of computer security. Students will learn about the major challenges to computer security and subsequent

ways of protecting systems and data against various types of vulnerabilities, threats and attacks and the legal, privacy and ethical issues in computer security.

MTA HTML5 Application Development Fundamentals (Exam)

With this certification, students will gain an understanding of fundamental HTML5 concepts, including managing the application life cycle, building the user interface with HTML5, formatting the user interface by using CSS, and developing code using JavaScript.

Global Information (Exam)

The purpose of this unit is to demonstrate the uses of information in the public domain, globally, in the cloud and across the internet, by individuals and organisations. Students will discover that good management of both data and information is essential, and that it can give any organisation a competitive edge.

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Application Design

In this unit students will explore potential ideas for a new application and develop the fundamental design for it. They will then develop the designs for an application and how users will interact with it. The designed application can be for any sector and for any purpose. They will have the opportunity to present your ideas, prototype them, and gain feedback before refining your design.

MTA Database Administration Fundamentals (Exam)

This MTA training will help students become familiar with concepts and technologies pertaining to Database Administration. In this course they will learn about relational databases, queries, stored procedures, and the security requirement for databases and the data stored in them.

Assessor Based Units

Apprentices will chose 4 of the following units to with the assessor.

- Data analysis and design
- Project management
- Business computing
- Systems analysis and design
- Social media and digital marketing
- Software engineering for business
- Big Data analytics
- Developing a Smarter Planet

Entry Requirements

Applicants must:

Experience is not required but applicants must possess a minimum of 5 GCSEs of Grade C or above, including English and Mathematics, and a pass at A Level in any subject area OR an equivalent qualification in any discipline.

Specific requirements of the programme:

- Each apprentice either is a new employee or is taking on a new job role, with an existing employer, commensurate to the apprenticeship being pursued.
- An appropriate Apprenticeship Agreement is in place with the employer.

Contact Details

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