

City & Guilds 2850-10 Level 1 Certificate in Engineering at Chichester College



Course Handbook

This course contains 11 units as part of two qualifications.

City & Guilds Level 1 Certificate in Engineering, and EAL Level 1 NVQ Certificate in Performing Engineering Operations.

All units of both Qualifications will need to be completed to progress to a Level 2 Qualification in Engineering.

City & Guilds Level has three units:

101 - Working in Engineering

1. Know safe working practices.
2. Know the engineering environment.
3. Understand the importance of maintaining working relationships.
4. Know the sectors within engineering.
5. Know key engineering materials.
6. Know basic engineering information technology requirements.

106 - Carrying out electrical assembly.

1. Be able to prepare for building electrical circuits.
2. Be able to build electrical circuits.
3. Be able to check completed circuits.

115 - Communicating using CAD systems.

1. Be able to prepare for communication.
2. Be able to use CAD software for engineering purposes.
3. Be able to use communication software for engineering purposes.

Assessments

You will be assessed by an online exam (GOLA) for **unit 101**.

Practical assessments and written short answer question papers for the other two units.

These are all graded at **Pass, Merit or Distinction**.

EAL Level 1 has eight units:

Unit QPE02/001 Working Safely in an Engineering Environment.

1. A series of Knowledge Questions (K Questions) to ascertain your knowledge of Health and Safety etc.

Unit QPE01/002N Carrying out Engineering Activities Efficiently and Effectively:

1. A series of K Questions to ascertain your knowledge of the progression between education and employment.

Unit QPE01/003N Using and Communicating Technical Information.

Unit QPE01/004N Making components using hand tools and fitting techniques.

1. Be able to prepare for fitting activities.
2. Be able to use simple fitting techniques to produce components.
3. Be able to check components for correct size.
4. State the need for good housekeeping in the workplace.
5. Use equipment safely.
6. Restore the work area using the correct procedures for the disposal of waste.

Unit QPE01/012N Carrying out sheet metal cutting, forming and assembly activities.

1. Use simple methods of fabrication assembly.
2. Assemble simple non self-secured joints.
3. Assemble simple self-secured joints.
4. Use mechanical joining methods.
5. Use the resistance spot welding process.
6. Produce sheet metalwork assembly.
7. State the need for good housekeeping in the workplace.
8. Use equipment safely.
9. Restore the work area using the correct procedures for the disposal of waste.

Unit QPE01/017N Using semi-automatic Mig welding equipment.

1. Know how to prepare MIG welding equipment and tools for safe use.
2. Know how to use equipment safely for MIG welding low carbon Steel.
3. Be able to produce welded joints safely using MIG welding.
4. State the need for good housekeeping in the workplace.
5. Use equipment safely.
6. Restore the work area using the correct procedures for the disposal of waste.

Unit QPE01/023N Carrying out Electronic Assembly.

1. Be able to prepare for building electrical circuits.
2. Be able to build electrical circuits.
3. Be able to check completed circuits.
4. State the need for good housekeeping in the workplace.
5. Use equipment safely.
6. Restore the work area using the correct procedures for the disposal of waste.

Unit QPE01/027N Carrying out Composite Moulding Activities.

1. Be able to prepare for composite moulding activities.
2. Be able to use a variety of methods to produce a composite product.
3. Be able to check components for correct size.
4. State the need for good housekeeping in the workplace.
5. Use equipment safely.
6. Restore the work area using the correct procedures for the disposal of waste.

Assessments

You will be assessed by completing three practical tasks for each practical unit, along with a series of K Questions to ascertain your knowledge of each practical subject. the need to extract data from a variety of sources.

As part of your study programme you will be required to carry out at least 15 hours of work experience at an industrial placement. This is to be organized by the student, but some leads are available. This will have to be authorised by the College for you to attend to ensure that safety and legal requirements have been met. This is done via filling out a form & handing it to the study programme leader, at least 2 weeks before the placement begins..



This will not only give the student an insight to the working world but could possibly lead to future employment opportunities.

Enrichment

During your time at college you will be given the opportunity to attend Industrial trips to local business that will give you some career guidance. As well as an end of year experience, currently Go-Karting.



Progression

On successful completion of all the units of the course you would be able to move on to:-

- City & Guilds 2850-24 Level 2 Diploma in Engineering (Manufacturing Technology).
- Level 3 BTEC Diploma or T Level L3 – Academic.
- An Apprenticeship
- Full time employment.

Course Supplement

There is a supplement added to the course –

Currently £250.00. This covers the cost of the equipment you will be given.

- Protective clothing.
- Safety boots.
- Welding mask and gloves.
- Rigger gloves.
- Work gloves
- Electronics tool kit.
- Safety Glasses.
- Bag to carry PPE



Example of Assessment Calendar

				Level 1 Diploma In Engineering				Course Code; MNT173CF1A				Units 102,108,110		
27-Aug-18	Bank Holiday	15-Oct-18	PREPARE FOR ALL UNITS	03-Dec-18	PREPARE FOR ALL UNITS	21-Jan-19	PREPARE FOR ALL UNITS	11-Mar-19	PREPARE FOR ALL UNITS	29-Apr-19	Hand Tools Assessment week	17-Jun-19	Catch up week	
28-Aug-18	Admin Week	16-Oct-18		04-Dec-18		22-Jan-19		12-Mar-19		30-Apr-19		18-Jun-19		
29-Aug-18		17-Oct-18		05-Dec-18		23-Jan-19		13-Mar-19		01-May-19		19-Jun-19		
30-Aug-18		18-Oct-18		06-Dec-18		24-Jan-19		14-Mar-19		02-May-19		20-Jun-19		
31-Aug-18		19-Oct-18		07-Dec-18		25-Jan-19		15-Mar-19		03-May-19		21-Jun-19		
01-Sep-18		20-Oct-18		08-Dec-18		26-Jan-19		16-Mar-19		04-May-19		22-Jun-19		
02-Sep-18		21-Oct-18		09-Dec-18		27-Jan-19		17-Mar-19		05-May-19		23-Jun-19		
03-Sep-18	Induction Week	22-Oct-18		10-Dec-18		28-Jan-19		18-Mar-19		06-May-19	Bank Holiday	24-Jun-19		
04-Sep-18		23-Oct-18		11-Dec-18	PREPARE FOR ALL UNITS	29-Jan-19	Welding Assessment week	19-Mar-19	Welding Assessment week	07-May-19	Hand Tools Assessment week	25-Jun-19	Admin Week	
05-Sep-18		24-Oct-18		12-Dec-18		30-Jan-19		20-Mar-19		08-May-19		26-Jun-19		
06-Sep-18		25-Oct-18		13-Dec-18		31-Jan-19		21-Mar-19		09-May-19		27-Jun-19		
07-Sep-18		26-Oct-18		14-Dec-18		01-Feb-19		22-Mar-19		10-May-19		28-Jun-19		
08-Sep-18		27-Oct-18		15-Dec-18		02-Feb-19		23-Mar-19		11-May-19		29-Jun-19		
09-Sep-18		28-Oct-18		16-Dec-18		03-Feb-19		24-Mar-19		12-May-19		30-Jun-19		
10-Sep-18	Welding/Hand Tools/Sheet Metal Thery	29-Oct-18	PREPARE FOR ALL UNITS	17-Dec-18	Christmas Break	04-Feb-19	PREPARE FOR ALL UNITS	25-Mar-19	PREPARE FOR ALL UNITS	13-May-19	Hand Tools Assessment week	01-Jul-19	Taster Week	
11-Sep-18		30-Oct-18		18-Dec-18		05-Feb-19		26-Mar-19		14-May-19		02-Jul-19		
12-Sep-18		31-Oct-18		19-Dec-18		06-Feb-19		27-Mar-19		15-May-19		03-Jul-19		
13-Sep-18		01-Nov-18		20-Dec-18		07-Feb-19		28-Mar-19		16-May-19		04-Jul-19		
14-Sep-18		02-Nov-18		21-Dec-18		08-Feb-19		29-Mar-19		17-May-19		05-Jul-19		
15-Sep-18		03-Nov-18		22-Dec-18		09-Feb-19		30-Mar-19		18-May-19		06-Jul-19		
16-Sep-18		04-Nov-18		23-Dec-18		10-Feb-19		31-Mar-19		19-May-19		07-Jul-19		
17-Sep-18	Welding/Hand Tools/Sheet Metal UPK	05-Nov-18	PREPARE FOR ALL UNITS	24-Dec-18	Christmas Break	11-Feb-19	PREPARE FOR ALL UNITS	01-Apr-19	Sheet Metal Assessment week	20-May-19		08-Jul-19	Summer Break	
18-Sep-18		06-Nov-18		25-Dec-18		12-Feb-19		02-Apr-19		21-May-19	GCSE Maths	09-Jul-19		
19-Sep-18		07-Nov-18		26-Dec-18		13-Feb-19		03-Apr-19		22-May-19		10-Jul-19		
20-Sep-18		08-Nov-18		27-Dec-18		14-Feb-19		04-Apr-19		23-May-19	Catch up week	11-Jul-19		
21-Sep-18		09-Nov-18		28-Dec-18		15-Feb-19		05-Apr-19		24-May-19		12-Jul-19		
22-Sep-18		10-Nov-18		29-Dec-18		16-Feb-19		06-Apr-19		25-May-19		13-Jul-19		
23-Sep-18		11-Nov-18		30-Dec-18		17-Feb-19		07-Apr-19		26-May-19		14-Jul-19		
24-Sep-18	PREPARE FOR ALL UNITS	12-Nov-18	PREPARE FOR ALL UNITS	31-Dec-18	Christmas Break	18-Feb-19	Half Term	08-Apr-19	Easter Break	27-May-19	Bank Holiday			
25-Sep-18		13-Nov-18		01-Jan-19		19-Feb-19		09-Apr-19		28-May-19				
26-Sep-18		14-Nov-18		02-Jan-19		20-Feb-19		10-Apr-19		29-May-19	Half Term			
27-Sep-18		15-Nov-18	Staff Development	03-Jan-19		21-Feb-19		11-Apr-19		30-May-19				
28-Sep-18		16-Nov-18		04-Jan-19	Review Day	22-Feb-19		12-Apr-19		31-May-19				
29-Sep-18		17-Nov-18		05-Jan-19		23-Feb-19		13-Apr-19		01-Jun-19				
30-Sep-18		18-Nov-18		06-Jan-19		24-Feb-19		14-Apr-19		02-Jun-19				
01-Oct-18	PREPARE	19-Nov-18		07-Jan-19		25-Feb-19		15-Apr-19		03-Jun-19				
02-Oct-18	Staff Development	20-Nov-18	Welding Assessment week	08-Jan-19	PREPARE FOR ALL UNITS	26-Feb-19	PREPARE FOR ALL UNITS	16-Apr-19	Easter Break	04-Jun-19	GCSE English	Chichester College	Course Calendar 2020-2021	
03-Oct-18	FOR ALL UNITS	21-Nov-18		09-Jan-19		27-Feb-19		17-Apr-19		05-Jun-19				
04-Oct-18		22-Nov-18		10-Jan-19		28-Feb-19		18-Apr-19		06-Jun-19	GCSE Maths			
05-Oct-18		23-Nov-18		11-Jan-19		01-Mar-19		19-Apr-19		07-Jun-19	GCSE English			
06-Oct-18		24-Nov-18		12-Jan-19		02-Mar-19		20-Apr-19		08-Jun-19				
07-Oct-18		25-Nov-18		13-Jan-19		03-Mar-19		21-Apr-19		09-Jun-19				
08-Oct-18		26-Nov-18		14-Jan-19		04-Mar-19	PREPARE FOR ALL UNITS	22-Apr-19	Bank Holiday	10-Jun-19				
09-Oct-18	PREPARE FOR ALL UNITS	27-Nov-18	PREPARE FOR ALL UNITS	15-Jan-19	PREPARE FOR ALL UNITS	05-Mar-19		23-Apr-19		11-Jun-19	GCSE Maths			
10-Oct-18		28-Nov-18		16-Jan-19		06-Mar-19	Staff Development	24-Apr-19	PREPARE FOR ALL UNITS	12-Jun-19				
11-Oct-18		29-Nov-18		17-Jan-19		07-Mar-19	UNITS	25-Apr-19		13-Jun-19	Catch up week			
12-Oct-18		30-Nov-18		18-Jan-19		08-Mar-19		26-Apr-19		14-Jun-19				
13-Oct-18		01-Dec-18		19-Jan-19		09-Mar-19		27-Apr-19		15-Jun-19				
14-Oct-18		02-Dec-18		20-Jan-19		10-Mar-19		28-Apr-19		16-Jun-19				