

Purpose statement

The following purpose is for the City & Guilds Level 3 Advanced Technical Diploma in Engineering (540) - (601/4507/9)

Area	Description
OVERVIEW	
Who is this qualification for?	This qualification is for you if you are looking to start in the advanced manufacturing and engineering sector. It covers a range of topics allowing you to experience the different disciplines and skills requirements within the sector. There are no entry requirements for this qualification.
What does this qualification cover?	 You will study theoretical aspects of the subject and apply them to practical tasks. Compulsory topics include: engineering materials electronics, control and instrumentation mechanical structures and dynamics manufacturing methods in engineering engineering design engineering mathematics and statistics engineering workshop practice innovation and new technologies. You will also be able to choose one from a number of optional topics, which focuses on technical skills required within the engineering industry. These include:
	automotive engineering
	marine engineering
	rail engineering
	You will study both the practical use and underpinning knowledge of the subject, which may involve local employers providing real examples as part of the training. It is expected that you will visit or have visits from employers who can provide demonstrations and talks on the industry, which may also be a relevant work placement with an employer.
WHAT COULD THIS QUALIFICATIO	IN LEAD TO?
Will the qualification lead to employment, and if so, in which job role and at what level?	 The City & Guilds Level 3 Advanced Technical Diploma in Engineering (540) could lead to employment opportunities for you as: motorsports technician marine engineer electronics maintenance technician

Why choose this qualification over similar qualifications?	City & Guilds offers three sizes of Level 3 qualification in Engineering: Certificate, Diploma, and Extended Diploma.
	You would take the Certificate if you want an introductory qualification to develop some of the basic skills and knowledge required by employers in the Engineering sector. The Certificate is likely to be taken alongside other programmes such as GCSEs or AS Levels over a one-year course of study.
	You would take the Diploma if you want to develop a broader set of skills and knowledge and learn about a specific Engineering sector such as Marine Engineering. The Diploma is likely to be taken alongside other programmes such as GCSEs or AS Levels over a one-year course of study.
	You would take the Extended Diploma if you want to specialise in advanced manufacturing job roles, including learning about the different sectors, robotics and developing your project management skills. The Extended Diploma is likely to be taken as part of a full-time two year programme of study, or alongside other qualifications such as AS or A Levels over a longer period of time.
Will the qualification lead to further learning?	When you have achieved this qualification you have a choice of seeking employment or going on to further learning. Examples include:
	 Higher Apprenticeship in Advanced Manufacturing Engineering.
	 Foundation Degree FdSc Automotive Management & Technologies.
	• Foundation Degree FdSc Mechanical Technology.
WHO SUPPORTS THIS QUALIFICATION?	
Employer/Higher Education Institutions	The following employers support this qualification: EDF Energy, Amec Foster Wheeler, Bosch Thermotechnology, Celbius, MBDA.
FURTHER INFORMATION	Please refer to the Qualification Handbook, available on the City & Guilds website, for more information on the structure of this qualification, the content of the units, and assessment.