



Garage Work, Mechanics and Agricultural Engineering

The Work

Are you interested in engines such as motor vehicles or agricultural machines?
Do you enjoy practical work with your hands?

Many of these jobs are practical, working in car service repair workshops or elsewhere.

What's Happening?

The motor industry - over the last ten years there has been a shift towards the use of software and electronics in modern vehicles. The need for people with these skills is increasing, with less demand for mechanical skills. Those wishing to work as technicians need to have good IT skills and training to a recognised level. The motor industry in the UK has declined significantly over the last few decades.

Agricultural engineering - land-based service technicians work on a wide range of specialist vehicles and machines used in farming, forestry, horticultural businesses, ground care and sports facilities including golf courses and parks. There are around 20,000 land-based service technicians working in the UK.

Land-based engineering - offers the engineer a range of careers. From design and development of new equipment and technology to maintenance, diagnosis, repair and technical support of high and low technology machinery found in the land-based industries, such as agriculture, forestry, horticulture and amenities. The work may involve field testing and evaluation, technical support, and the education of customers and operators. In the UK there are nearly 4000 land-based engineering businesses. Land-based engineering is a growing sector, with a national shortage of people with engineering skills at all levels, so job opportunities are good. (See www.afuturein.com).

Possible Job Titles

Auto Electrician
Car Valet
Construction Plant Mechanic
Land-based Engineer
Land-based Service Technician

Motor Vehicle Technician
Tyre/Exhaust Fitter
Warehouse Worker/Manager
Vehicle Breakdown Engineer
Vehicle Parts Operative

For information about these jobs see the **Engineering** section of the Connexions Resource Centre.

Your Options at 16 and 17

- **Further education at school or college** – continue to study, full or part-time, for a career or keep your future options open and simply continue to improve your qualifications.
- **Apprenticeships** (Level 2)/Advanced Apprenticeships (Level 3) – learn new skills with an employer, gain qualifications and get some real work experience. You will receive a wage, or, if you are eligible, an Education Maintenance Allowance of up to £30 a week.
- **Job** – regular, paid work that, with training, can lead to recognised qualifications.
- **e2e** (Entry to Employment) & **Pre-e2e** – programmes to help you prepare for a job, an Apprenticeship or further education.

For details of all these options speak to your Connexions personal adviser or see page seven – Easy ways to get useful information.

Section 1

Further education: what's available locally and how to apply.

- This sheet lists full-time vocational courses. Other courses and ways of learning may be available.
- [Futures4Me](#) – explore all post-16 learning and training opportunities available in the West of England.
- Contact colleges/sixth form colleges for information and an application form. They all have websites.
- Go to open evenings and information events. See page seven – Easy ways to get useful information.
- Ask colleges/sixth form colleges how well previous students have done on their courses.
- Use your school's Connexions Information Centre for information about local colleges and sixth forms.
- Higher education, Apprenticeships, a job with training, self-employment or time out to travel or do voluntary work are all options after college/sixth form college.
- Education Maintenance Allowance (EMA) is a weekly payment to help with costs if you go into the sixth form, college or go into training. Other financial support exists to help with travel, specialist courses, books and equipment and childcare. Terms and conditions apply to all. For more information - <http://moneytolearn.direct.gov.uk>

CITY OF BRISTOL COLLEGE – ORPEN PARK CENTRE

7 Orpen Park, Ash Ridge Road, Bristol BS32 4QD

Tel: 0117 312 5000

Website: www.cityofbristol.ac.uk

Heavy Vehicle – Technical Certificate Level 2

(1 year). No formal qualifications required. You will require a personal interview. On this course you'll learn all you need to know about the repair and servicing of trucks and you'll get hands-on experience by working on a wide range of commercial vehicles. To put your recently acquired skills to good use you will be encouraged to attend a work placement with a local company.

CITY OF BRISTOL COLLEGE – PARKWAY TRANSPORT TECHNOLOGY CENTRE

New Road, Stoke Gifford, Bristol BS34 8SF

Tel: 0117 312 5000

Website: www.cityofbristol.ac.uk

Body Refinishing – Technical Certificate Levels 1, 2 and 3

(1 year). No formal qualification needed but you will require a personal interview. Body refinishing is a specialised trade and one in high demand. So we've worked closely with employers to make sure we teach you the skills needed when you start work. You'll learn all about modern accident repair procedures, application of modern two pack and waterborne paint. You'll get hands-on experience in our workshop and learn theory in the classroom.

Body Repair – Technical Certificate Levels 1, 2 and 3

(1 year). No formal entry requirements, but you will require a personal interview and to show commitment. Body repair is a specialised trade and one in high demand. So we've worked closely with employers to make sure we teach you the skills needed when you start work. You'll learn all about modern accident repair procedures. You'll get hands-on experience in our workshop and learn theory in the classroom. It's a tough course and you'll need commitment and determination to succeed.

Light Vehicle – Technical Certificate Level 1

(1 year). Entry requirements are 3 GCSEs or an Entry Level 3 qualification as well as an appropriate standard of Literacy and Numeracy. You will need commitment and determination to succeed and a personal interview. If you're looking to break into the mechanical or electrical trades then this course is the place to start. As you'd expect our course is hands-on and most of your time will be spent in our workshops where you'll gain a broad range of skills. In addition to developing practical skills, you'll also be working on improving your English, Maths and Computing.

Light Vehicle – Technical Certificate Level 2

(1 year) Entry requirements are 3 GCSEs grade C or above or an appropriate Level 1 qualification. This course will give you a good all-round understanding of the skills associated with the repair and maintenance of light vehicles including electrical, and enable you to build on the skills you gained in the Level 1 course. You'll get hands-on experience by working on a wide range of vehicles and test rigs and by the end of the course should be able to carry out most servicing and repair tasks as well as having a better chance of employment in the motor trade.

Light Vehicle – Technical Certificate Level 3

(1 year) Entry qualifications are Motor Vehicle qualification at Level 2, commitment and determination to succeed and a personal interview. On this course you will build on the skills and experience you gained from the Level 2 course. The course has a focus of diagnostic techniques on both mechanical

and electrical/electronic systems and you will get hands-on experience by working on a wide range of vehicles, test rigs and diagnostic boards.

Vehicle Repair Technology – BTEC National Certificate/Diploma

(1 year). Entry requirements are 5 GCSEs grade C or above, including Maths and English. This course is for anyone who wishes to pursue a career in the motor vehicle industry and will provide all the technical requirements to enable you to enter the motor vehicle repair industry at Technician level. The course will include both theoretical and practical assignments based around a range of motor vehicle systems.

CITY OF BRISTOL COLLEGE – SOUNDWELL CENTRE

St Stephens Road, Soundwell, Bristol BS16 4RL

Tel: 0117 312 5000

Website: www.cityofbristol.ac.uk

Light Vehicle – Technical Certificate Level 1

(1 year). Entry requirements are 3 GCSEs or an Entry Level 3 qualification as well as an appropriate standard of Literacy and Numeracy. You will need commitment and determination to succeed and a personal interview. If you're looking to break into the mechanical or electrical trades then this course is the place to start. As you'd expect our course is hands-on and most of your time will be spent in our workshops where you'll gain a broad range of skills. In addition to developing practical skills, you'll also be working on improving your English, Maths and Computing.

Light Vehicle – Technical Certificate Level 2

(1 year). Entry requirements are 3 GCSEs grade C or above or an appropriate Level 1 qualification. On this course you'll learn all you need to know about the repair and servicing of light vehicles.

CITY OF BRISTOL COLLEGE – SOUTH BRISTOL SKILLS ACADEMY

Whitchurch Lane, Bristol, BS14 0JZ

Tel: 0117 312 5000

Website: www.cityofbristol.ac.uk

Light Vehicle – Technical Certificate Level 1

(1 year). Entry requirements are 3 GCSEs or an Entry Level 3 qualification as well as an appropriate standard of Literacy and Numeracy. You will need commitment and determination to succeed and a personal interview. If you're looking to break into the mechanical or electrical trades then this course is the place to start. As you'd expect our course is hands-on and most of your time will be spent in our workshops where you'll gain a broad range of skills. In addition to developing practical skills, you'll also be working on improving your English, Maths and Computing.

Light Vehicle – Technical Certificate Level 2

(1 year). Entry requirements are 3 GCSEs grade C or above or an appropriate Level 1 qualification. You'll need commitment and determination to succeed and will be asked to attend a personal interview and assessment test. This course will give you a good all-round understanding of the skills associated with the repair and maintenance of light vehicles including electrical, and enable you to build on the skills you gained in the Level 1 course. You'll get hands-on experience by working on a wide range of vehicles and test rigs and by the end of the course should be able to carry out most servicing and repair tasks as well as having a better chance of employment in the motor trade.

Light Vehicle – Technical Certificate Level 3

(1 year) Entry qualifications are Motor Vehicle qualification at Level 2, commitment and determination to succeed and a personal interview. On this course you will build on the skills and experience you gained from the Level 2 course. The course has a focus of diagnostic techniques on both mechanical and electrical/electronic systems and you will get hands-on experience by working on a wide range of vehicles, test rigs and diagnostic boards.

Motorcycle – Technical Certificate Level 1

(1 year). No formal entry qualifications however you will need a basic level of English and Maths as well as a keen interest and a mechanical aptitude. You will be required to attend a personal interview and will need commitment and determination to succeed. If you want to work in a motorcycle dealership, this is the course for you. There's no better way to learn than hands-on experience and much of your time will be spent in our workshop, backed up with theory sessions. You'll get to work on a wide range of motorbikes, from scooters to superbikes, and cover aspects of engine chassis and electrical repair.

Motorcycle – Technical Certificate Level 2

(1 year). Entry requirements are 3 GCSEs grade C or above or an appropriate Level 1 qualification. You'll need commitment and determination to succeed and will be asked to attend a personal interview and assessment test. You will improve your level of skill and develop your career within the trade. The course provides hands-on experience in our workshop, backed up with theory sessions.

Motorcycle – Technical Certificate Level 3

(1 year). Entry requirements are to have completed Motorcycle Level 2. If you want to improve your skills, develop your career within the trade and gain further qualifications, this is the course for you.

NORTON RADSTOCK COLLEGE

South Hill Park, Radstock, Bath BA3 3RW

Tel: 01761 433161

Website: www.nortcoll.ac.uk

Vehicle Maintenance and Repair – FLT, ABC, Level 1

(1 year). Entry requirements: interview and assessment. Students will study basic Motor Vehicle Maintenance and Repair combined with health and safety, personal and social skills and a variety of other supporting subjects.

Vehicle Fitting – IMIAL Award

(1 year). Entry requirements: please contact the college for details. An introductory Level 1 course covering the types of motor vehicle jobs found in quick-fit garages such as exhausts, tyres, shocks etc. Would suit someone wishing to work in this part of the motor vehicle industry or as a stepping-stone to more involved vehicle maintenance and repair.

Vehicle Maintenance and Repair – Levels 1, 2 and 3

(1-2 years). No formal entry requirements - will have to attend for interview and assessment. Gain knowledge and experience of the repair and servicing of light vehicles and the relevant key skills.

Pre Apprenticeship Programme 14+ – Level 1

(1 year). Leads into NVQ or a full time programme in Motor Vehicle maintenance and repair.

What's available outside the area?**BICTON COLLEGE**

East Budleigh, Budleigh Salterton, Devon EX9 7BY

Tel: 01395 562400

Website: www.bicton.ac.uk

Land-based Technology – First Diploma Level 2

(1 year). Entry requirements 4 GCSEs at Grade D or above, to include Maths, English and Science, or NVQ 1 or equivalent, or appropriate experience and knowledge gained in a related working environment. Entrance to the course is by interview. A variety of engineering related subjects are studied together with Key Skills at an appropriate level. In addition, there will be a five week period of industrial work experience and an opportunity to choose from optional units.

Land-based Technology – National Diploma Level 3

(2 or 3 years). Entry requirements are 4 GCSEs Grades A - C, including English, Maths and Science, or a good pass in a related NVQ 2, or BTEC First Diploma or City and Guilds National Certificate or equivalent. Entrance to the course is by interview. You will study a wide range of engineering subjects. Students will also complete a ten-week period of work experience. There are opportunities to gain other nationally recognised qualifications such as key skills, food hygiene, welcome host and First Aid.

Land-Based Service Engineering – Apprenticeship Level 2

(2 years). Entry requirements GCSEs and Initial Assessment Level 1 would be an advantage along with relevant experience and knowledge of your chosen industry. Entrance to the course is by interview. You will require a good reference and a suitable work placement. Bicton College can help you to find one.

Plant Maintenance Engineering – Apprenticeship Level 2

(2 years). Entry requirements GCSEs and Initial Assessment Level 1 would be an advantage along with relevant experience and knowledge of your chosen industry. Entrance to the course is by interview. You will require a good reference and a suitable work placement. Bicton College can help you to find one.

Land-Based Service Engineering – Advanced Apprenticeship Level 3

(2 years). Entry requirements GCSEs and Initial Assessment Level 2 would be an advantage along with relevant experience and knowledge of your chosen industry. Entrance to the course is by interview. You will require a good reference and a suitable work placement. Bicton College can help you to find one.

HARTPURY COLLEGE

Hartpury House, Gloucester GL19 3BE

Tel: 01452 702132

Website: www.hartpury.ac.uk

Agricultural Engineering (Dealerships) – BTEC National Award

(1 year). Entry requirements are 2 GCSEs grade C, one of which must be in English, Maths or Science

or a relevant further education qualification. The course will cover both the theory and practice of engineering and workshop skills, including Vehicle Electrical and Electronic Systems, Vehicle Technology and Workshop Practice.

Farm Mechanisation – BTEC First Diploma

(1 year). Entry requirements are 2 GCSEs grade D in any subject or a relevant further education qualification. There will be plenty of opportunity to gain practical experience on the College's own Home Farm.

Farm Mechanisation – BTEC National Award

(1 year). Entry requirements are 2 GCSEs grade C, one of which must be in English, Maths or Science or a relevant further education qualification. The course will cover both the theory and practice of working with farm machinery, including workshop skills, machinery operation and crop production.

Farm Mechanisation – BTEC National Diploma

(2 years). Entry requirements are 4 GCSEs grade C in any subject, two of which must be in English, Maths or Science or a relevant further education qualification. Students will be trained in the operation, service and repair of a wide range of arable and grassland machinery. You will also have the opportunity to gain a solid understanding of agricultural principles and practice and management.

What's available outside the area?

SPARSHOLT COLLEGE

Sparsholt, Winchester, Hampshire, S021 2NF

Tel: 01962 776 441

Website www.sparsholt.ac.uk

Farm Mechanisation – First Diploma – Level 2

(1 year). Entry requirements are 4 GCSEs at grade D or above to include English and Maths. The course content is selected to suit those who are interested in agriculture but prefer to specialise in arable production and farm machinery with about half of the timetable being practical activities. Areas studied include crop production, operation and maintenance of farm machinery and basic workshop skills. Progression from this course includes both employment in general farm work and agricultural engineering. Some students go on to take the National Diploma in Land Based Mechanisation.

Agriculture (Land Based Mechanisation) – National Diploma – Level 3

(2 years). Entry requirements are 5 GCSEs at grades A - C, English, Maths and a Science or at least a Merit in a relevant Level 2 qualification. The course covers, both theoretically and practically, the operation, repair and maintenance of land based vehicles from tractors to ATVs (quad bikes) and combine harvesters to utility vehicles. Students also spend time on employer-based training. Progression can include both employment and higher education.

WILTSHIRE COLLEGE LACKHAM

Lacock, Chippenham, Wiltshire SN15 2NY

Tel: 01249 466800

Website: www.wiltshire.ac.uk

Farm Mechanisation – BTEC National Diploma

(2 or 3 years). Entry requirements are 4 GCSEs grades A - C; or BTEC First Diploma at Merit level in a relevant subject area, plus some appropriate work related experience. You will learn how to work effectively with machinery in a range of land based situations, using both farms and workshops. Projects such as grass and maize forage harvesting operations, autumn crop establishment and large-scale materials handling exercises are an essential part of the course.

Land Based Technology – BTEC First Diploma

(1 year). Entry requirements are 4 GCSEs grades A - E (including Maths and Science) and a keen interest in agricultural engineering. The course offers students the opportunity to study the basic construction and operation of vehicle systems. It involves classroom studies, to learn the theoretical aspects of tractor and machinery technology, which are enhanced by practical sessions in the college workshops where actual disassembly and reassembly of tractors and machinery take place.

Land Based Technology – BTEC National Diploma

(2 or 3 years). Entry requirements are 4 GCSEs grades A - C, including Maths and a Science or BTEC National Diploma at Merit level in a relevant subject area. This course is aimed at those students who wish to enter the agricultural engineering or construction plant industries. Includes vehicle systems, engine technology, vehicle electrical and electronic systems, hydraulic/pneumatic principles, mechanical power transmission, vehicle transmissions, CAD, business management together with science and maths.

Section 2

Year 12 (Sixth Form)

- Choose from a wide range of courses including AS/A2 Levels, GCSEs, Diplomas, National Diplomas, NVQs and other work related courses.
- Contact sixth forms for information and an application form. They all have websites.
- Go to open evenings and information events. See page seven – Easy ways to get useful information.
- Ask sixth forms how well previous students have done on their courses.
- Use your school's Connexions Information Centre for information about local sixth forms.
- Additional further education, higher education, Apprenticeships, a job with training, self-employment or time out to travel or do voluntary work are all options after the sixth form.
- Educational Maintenance Allowance is a weekly payment to help you continue to learn or train. EMA is worth up to £30 a week. Other financial support exists to help with travel, specialist courses, books and equipment and childcare. Terms and conditions apply to all. For more information – <http://moneytolearn.direct.gov.uk>

Section 3

Apprenticeships and Jobs

Both of these options allow you to learn new skills with an employer and get some real work experience – but only an Apprenticeship will guarantee you training and the chance to gain qualifications. You will receive a wage, or, if you are eligible, an Education Maintenance Allowance of up to £30 a week. See page seven – Easy ways to get useful information.

Local Apprenticeships

Motor Vehicle / Vehicle Maintenance / Vehicle Body and Repair / Vehicle Fitting Operations / Vehicle Maintenance and Repair / Vehicle Body and Paint Operations

- **City of Bristol College**, College Green Centre, St Georges Road, Bristol BS1 5UA. 0117 312 5007. Claire Arbery. claire.arbery@cityofbristol.ac.uk
- **S&B Automotive Academy**, Unit A Princess Street, Bedminster, Bristol BS3 4AG. 0117 953 3001. Jon Winter. jwinter@sandbaa.com

Motorcycle

- **S&B Automotive Academy**, Unit A Princess Street, Bedminster, Bristol BS3 4AG. 0117 953 3001. Jon Winter. jwinter@sandbaa.com

Motor Vehicle/Cycle

- **S&B Automotive Academy**, Unit A Princess Street, Bedminster, Bristol BS3 4AG. 0117 953 3001. Jon Winter. jwinter@sandbaa.com

Local Advanced Apprenticeships

Motor Vehicle / Vehicle Maintenance / Vehicle Body and Repair / Vehicle Fitting Operations / Vehicle Maintenance and Repair / Vehicle Body and Paint Operations

- **City of Bristol College**, College Green Centre, St Georges Road, Bristol BS1 5UA. 0117 312 5007. Claire Arbery. claire.arbery@cityofbristol.ac.uk
- **S&B Automotive Academy**, Unit A Princess Street, Bedminster, Bristol BS3 4AG. 0117 953 3001. Jon Winter. jwinter@sandbaa.com

Motorcycle

- **S&B Automotive Academy**, Unit A Princess Street, Bedminster, Bristol BS3 4AG. 0117 953 3001. Jon Winter. jwinter@sandbaa.com

Motor Vehicle/Cycle

- **S&B Automotive Academy**, Unit A Princess Street, Bedminster, Bristol BS3 4AG. 0117 953 3001. Jon Winter. jwinter@sandbaa.com

For more on Apprenticeships

- www.apprenticeships.org.uk – visit the National Apprenticeship website for information including the National Apprenticeship Vacancy Matching Service (scroll down and click on the 'Apprenticeship Vacancies' link). This service lets you search for Apprenticeship vacancies in a variety of ways, such as by occupational area, provider or by postcode.
- **08000 150 600** – Call the National Apprenticeship Hotline for help and advice.
- If you are still not sure and need help, please contact careers staff in your school/college or your local Connexions West of England Centre (addresses at end of this leaflet).

Time Off for study or training

- The right to Time Off for Study or training is designed to help you if you are aged 16-17, got few if any qualifications at school, and are now employed in a job which offers little or no training.
- For more information – www.connexions-direct.com – look under work schemes>time off for study and training.

Easy ways to get useful information

- www.connexionswest.org.uk – information for 13-19 year olds; vacancies; local support agencies; education & training database; publication downloads.
- <http://options.connexionswest.org.uk> – Your Way Forward - Options @ 16 and 17. Post-16 learning, training and work options; qualifications; sources of finance; useful websites.
- <http://workmatters.connexionswest.org.uk> – Information about working in the local area; how much people earn; number of people employed; types of jobs; useful websites.
- **Futures4Me** – explore all post-16 learning and training opportunities available in the West of England.

Connexions West of England Centres are open Monday – Friday. Contact direct for opening hours.

Bristol
4 Colston Avenue
Bristol BS1 4ST
Tel: 0117 987 3700
Fax: 0117 987 3701
Minicom: 0117 907 4514

Bath & North East Somerset
28 Southgate
Bath BA1 1TP
Tel: 01225 461 501
Fax: 01225 465 619

South Gloucestershire
21-23 High Street
Kingswood
Bristol BS15 4AA
Tel: 0117 961 2760
Fax: 0117 960 7838

South Gloucestershire
28 Gloucester Rd North
Filton
Bristol BS7 0SJ
Tel: 0117 969 8101
Fax: 0117 931 2978

North Somerset
45 Boulevard
Weston-super-Mare
BS23 1PG
Tel: 01934 644443
Fax: 01934 644409

www.connexionswest.org.uk
enquiries@connexionswest.org.uk

Connexions Direct (confidential information, advice and support for young people)
Tel: 080 800 13 2 19. Text: 07766 4 13 2 19. www.connexions-direct.com

The information in this leaflet was correct at the time of writing. Please check details - information dates quickly.

Produced by Red Bridge Solutions Ltd - enquiries@redbridgesolutions.co.uk