



**UTC  
SWINDON**

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**INNOVATIVE, EMPLOYER-FOCUSED  
SCHOOL FOR 14 TO 19 YEAR OLDS**

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# **PROSPECTUS 2018-19**



# ENTER A WORLD OF NEW OPPORTUNITIES...

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# BE INSPIRED

As you approach the beginning of GCSEs or Post-16, you'll be facing some important choices about your learning. You'll know that getting these decisions right will set you on the path to a great career. We're really pleased that you're thinking of coming to UTC Swindon and taking advantage of the many opportunities we can offer you.

With us, you'll be able to follow your areas of interest in either Engineering or Digital Technologies while studying GCSEs, A-levels and developing invaluable practical and work-readiness skills from the best in the industry that will give you a competitive advantage. This is because UTC Swindon has the support of local, high profile industry and academic partners who help to shape the curriculum and work closely with our students.

We believe that students who attend UTC Swindon, which has recently joined the Activate Learning Education Trust, are given the best start in a variety of progression routes. Last year our students progressed on to university, an apprenticeship, a sponsored degree programme or employment.

UTC Swindon will offer you something different. And we expect you to want something different:

- to follow your interest in Engineering or Digital Technologies while studying for your GCSEs or A-levels
- to embrace opportunities to work through challenges and projects set by our industry partners
- to want the best chance of moving into employment or further and higher education in your chosen field

If you want to benefit from the latest technology, be in an environment that feels more like being at work than school and benefit from our industry links, then UTC Swindon could be for you.

We hope our guide will inspire you to find out more about the great opportunities we have to offer at UTC Swindon and we would warmly welcome you to join us in September 2018.

Jon Oliver, College Principal



Joanne Harper, Executive Principal



# ACTIVATE LEARNING EDUCATION TRUST

UTC Swindon is a member of Activate Learning Education Trust, a Multi Academy Trust (MAT) established by Activate Learning.

Activate Learning Education Trust exists to deliver excellence in education and transform lives through learning. Our schools to date are UTC Swindon, UTC Reading, UTC Oxfordshire, Bicester Technology Studio and The Bicester School.

As a member of Activate Learning Education Trust, UTC Swindon benefits from the following:

- Excellent leadership being spread across all partner schools
- Leadership development that happens across all partner schools
- Sharing of resources without any barriers
- Shared contracts across the group, reducing costs
- Having a greater 'clout' across the whole group's community



ACTIVATE LEARNING EDUCATION TRUST'S CORE PURPOSE IS TO DELIVER EXCELLENT TEACHING, LEARNING AND ASSESSMENT AND A HIGH QUALITY LEARNER EXPERIENCE, UNDERPINNED BY HIGH EXPECTATIONS AND FOSTERING HIGH ASPIRATIONS FOR ALL.

UTC SWINDON PROVIDES A HIGH QUALITY TECHNICAL EDUCATION, CO-CREATED WITH EMPLOYERS, GIVING STUDENTS A CLEAR LINE OF SIGHT TO WORK. THROUGH THE LEARNING PHILOSOPHY, STUDENTS ARE ABLE TO FULFIL THEIR POTENTIAL AND DEVELOP INTO POSITIVE, MOTIVATED, EMPLOYABLE YOUNG PEOPLE WHEN THEY LEAVE EDUCATION.



**Lee Nicholls**  
Executive Director, Activate Learning  
CEO, Activate Learning Education Trust



# OUR LEARNING PHILOSOPHY

At UTC Swindon, our approach to teaching and learning is driven by a distinctive Learning Philosophy.

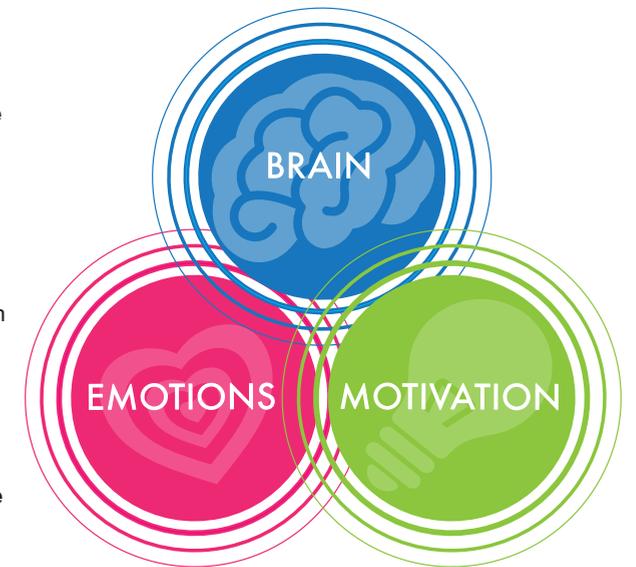
This philosophy has been developed by members of the Activate Learning group and recognises three essential elements for effective learning:

- **BRAIN** – our brains are capable of incredible things. From the study of neuroscience we know how the brain forms networks and how learning takes place when neurons connect. We know how to deepen these connections through ongoing practice and how to replace poor learning with good habits.
- **MOTIVATION** – while our brains may be capable of learning anything, we are only likely to use them if we are motivated to do so. Our approach to learning helps to demonstrate the relevance and impact of new skills and knowledge so that students maintain motivation.
- **EMOTIONS** – the biggest barrier to effective learning is our emotional response. Learning involves taking risks and students must feel safe, secure and confident to do this.

At UTC Swindon, this philosophy translates into an educational experience which offers:

- opportunities to test new skills through practical, real-world projects
- experiences of work which demonstrate the relevance and impact of knowledge
- a focus on developing independent learning skills, communication and teamwork
- a supportive learning environment which encourages students to take risks and learn from mistakes

Find out more about how our Learning Philosophy is inspiring new approaches to teaching and learning throughout this prospectus.



# FIND OUT ABOUT UTCs



[www.utcolleges.org](http://www.utcolleges.org)

A UTC is different from the average school because it has support and backing from local, high-profile industry partners who are involved in the development of the curriculum. Each UTC also has academic partners who help make sure that it really can offer students the best of both worlds.

This means you can take advantage of real-world based study of a UTC's specialist subjects while still taking the GCSEs and A-levels that you would at school.

UTCs are for students aged 14 to 18, as this is the age when you'll have a better idea of what you are really interested in and whether you would enjoy learning in high-tech surroundings.

The UK needs advanced technical skills at all levels if we are to prosper. Whether in manufacturing, wind farms, rail links or high-tech hospitals, we need a workforce that can develop new products, stretch and reuse existing resources, and meet the challenges of the future. UTCs are meeting the needs of the skills gap and by 2018 around 30,000 students will be able to follow this new technical education pathway.



# 1.64 MILLION

THE DIGITAL TECH INDUSTRIES ARE CREATING EMPLOYMENT OPPORTUNITIES 2X FASTER THAN THE NON-DIGITAL SECTOR, ACCOUNTING FOR 1.64M JOBS ACROSS THE UK IN 2016.

# 265,000

SKILLED ENTRANTS ARE REQUIRED ANNUALLY TO MEET THE DEMAND FOR ENGINEERING ENTERPRISES THROUGH TO 2024.

James Jardim left UTC Swindon in summer 2017 having secured an apprenticeship with Rolls-Royce, after competing against around 30,000 applicants across the country.

"I've always been interested in planes, cars and trains, which is why I'm so keen on engineering. Ever since hearing about apprenticeships I've wanted to do that more than going to university. It's the practical side that appeals to me, as well as learning while I'm working and being able to build my skills and relationships within the company for four years which should help me when trying to secure a permanent job afterwards.

"I'm glad I made the decision to join the UTC. When I was being interviewed for my apprenticeship, the company recognised the engineering focus and they were really impressed with the practical skills I've gained, so that was very helpful."

**James Jardim, former UTC Swindon student and current Rolls-Royce apprentice**



CASE STUDY

# WOMEN IN TECHNOLOGY

UTC Swindon is an inclusive learning environment. We are committed to supporting girls who choose to study STEM subjects and build a career in technical industries. We are a member of WISE, a campaign to promote women in science, technology and engineering. UTC Swindon joined WISE to support the national issue that there are simply not enough women in STEM subjects. As a college specialising in computer science and engineering, it is vital that we bridge the gap and can provide an essential workforce of women into these fields.

## ENGINEERING AND DIGITAL TECHNOLOGIES ARE NOT JUST FOR BOYS

**Myth:** Boys are better at mathematics and science than girls.

**Reality:** Boys and girls are both capable of excelling in mathematics and science. Research by WISE and the Royal Engineering Academy found that girls achieve better or equal grades than boys at GCSE in most STEM subjects, and those that choose STEM at A-levels achieve higher A\*-C grades.

**Myth:** Girls don't like technology.

**Reality:** Girls are very interested in technology, but cultural differences in the way boys and girls are raised typically limit the experiences girls have with different technologies.

**Myth:** Women can't succeed professionally in engineering careers.

**Reality:** Engineering is still a male-dominated profession, but women can and do build successful careers in this field. WISE interviewed 300 female engineers and 98% said their job was rewarding.



STEM SECTORS NEED TO BE ABLE TO DRAW ON THE WHOLE OF THE UK TALENT POOL. ACCORDING TO THE ROYAL SOCIETY OF EDINBURGH, INCREASING THE PARTICIPATION OF WOMEN IN THE STEM LABOUR MARKET COULD BE WORTH AT LEAST £2BN TO THE UK ECONOMY.



WE WANT TO SHOW EVERY GIRL IN THIS COUNTRY, AND HER FAMILY, THAT SHE COULD HAVE A WONDERFUL FUTURE IN SCIENCE AND ENGINEERING.



HRH The Princess Royal, Royal Patron of WISE (WISE annual report 2016)

*Kate Kerrane*

Kate Kerrane completed her studies at UTC Swindon in summer 2017 and was offered an apprenticeship with the Royal Navy. By completing an Aviation Engineering Apprenticeship, Kate will gain a Masters qualification after three years rather than 22 years if she were to join as a Regular.

"I will spend 10 weeks at HMS Riley, which is normal for a Regular, then I will go to HMS Collingwood for 18 months where I'll be learning about all the different parts of helicopters, fixed wing, rotary wing etc. I will then go on deployments and start working through a course, before I'll have to take charge of a group.

"It's all very hands-on and practical, which I like. I don't mind theory and there is some of that, but it's more focused on the practical side which is more suited to me."



CASE STUDY

# ONE THIRD

GIRLS MAKE UP LESS THAN ONE THIRD OF A-LEVEL AND GCSE PHYSICS STUDENTS BUT OUTPERFORM BOYS AT BOTH LEVELS.

# UTC SWINDON GCSE AND A-LEVEL RESULTS 2017

100%

IN 2017, UTC SWINDON  
ACHIEVED AN A-LEVEL  
PASS RATE OF 100% - THE  
BTEC AVERAGE GRADE WAS  
DISTINCTION+.

## Jordan Sanderson

Following his results, Jordan Sanderson is moving on from UTC Swindon to work for Centerprise International.

Jordan said: "UTC Swindon has helped me achieve excellent results, which will support me in the future. I am really pleased with my Triple Distinction\* in engineering."

CASE STUDY

CASE STUDY

## Dan Tischer

UTC Swindon student Dan Tischer achieved a Triple Distinction\* in engineering.

Dan said: "UTC Swindon has really helped prepare me for my future. They have supported me and helped me gain an apprenticeship at Network Rail, which I will start in September."

**DISTINCTION\***

60% OF GRADES AWARDED  
FOR ENGINEERING AND ICT  
WERE DISTINCTION\* OR  
DISTINCTION.

71%

OF YEAR 11 STUDENTS ACHIEVED A GRADE C OR ABOVE IN COMPUTING. 64% ACHIEVED A LEVEL 4 OR ABOVE IN MATHEMATICS AND 68% ACHIEVED A GRADE C OR ABOVE IN SCIENCE.

# UTC SWINDON: LEARN FOR THE REAL WORLD

Our aim is to become a world-class centre of excellence in engineering and digital technologies education for 14 to 18 year old girls and boys, who are committed to succeed in these areas.

Our students will be well-known for having the skills, attitude, behaviours, knowledge and experience that the world's leading employers are looking for. You will be well connected with our industry partners including Patheon, HOCHTIEF, Torin-Sifan, BMW, Honda, Army REME, Network Rail and more, which will give you access to great opportunities to learn from the best in the business.

within the working day. Personal and Professional Development (PPD) takes place once a week and will give you a refreshing break from your studies as you take on creative, sporting and social challenges of your choice. As well as being part of our broad curriculum, it will help you to enjoy life and to build up strong practical and social skills.

## THE LEARNING EXPERIENCE

Your learning experience at UTC Swindon will be practical and engaging; you will work on exciting and relevant projects that are similar to what goes on in the work place. During these projects you will learn and work in a team in our purpose-built laboratories and project spaces.

You'll also have plenty of time and quiet desk space to complete your independent study tasks. There will always be someone on hand to help if you get stuck and at the end of the day you can go home without homework looming over you. Of course, like anyone with a rewarding job, you'll take your interests home with you, and we can't promise that you won't sometimes want to do a bit of extra reading or programming!

Because our day is longer, you will need to manage your time effectively. It also means that you have the opportunity to take part in clubs and activities

THE NUMBER OF ANNUAL  
OPENINGS FOR DIGITAL  
TECHNOLOGY SPECIALIST JOBS  
IN ENGLAND IS PROJECTED TO  
BE OVER 12,100 BETWEEN 2017  
AND 2024.

**£25,880**

IS THE AVERAGE GRADUATE  
SALARY FOR ENGINEERING  
AND TECHNOLOGY,  
COMPARED TO £22,000 FOR  
ALL GRADUATES

# STUDENT DESTINATIONS

Known destinations in 2016:

## 32%

OF STUDENTS PROGRESSED TO UNIVERSITY

## 52%

OF STUDENTS PROGRESSED ONTO AN APPRENTICESHIP

## 16%

OF STUDENTS PROGRESSED INTO FULL TIME EMPLOYMENT

Here are some of the exciting destinations our students progressed to in 2017:

### CAREERS

- BMW
- Royal Electrical and Mechanical Engineers
- Royal Navy
- Bosch
- Network Rail
- Centerprise International
- Honda
- Patheon
- Rolls-Royce
- Mercedes Benz

### UNIVERSITIES

- University of the West of England
- Cardiff University



# PROJECT BASED LEARNING

At UTC Swindon, we focus on delivering a rich learning experience for our students. Your technical qualifications will be supported by our industry partners who set real world projects for contextual learning.

## Partners delivering projects to students this year



CASE STUDY

### HOCHTIEF bridge-building challenge

In May 2017, students at UTC Swindon put their civil engineering skills to the test with a bridge-building project set by a national construction firm.

The Year 10 students worked in teams, supported by staff from HOCHTIEF (UK) Construction, to build a bridge which could support as much weight as possible.

The aim of the project was to introduce students to careers in civil engineering and develop skills of teamwork and innovation.

Keith Broughton, Director of HOCHTIEF (UK) Construction Ltd, said: "It is our hope that UTC Swindon students gained a little knowledge and a lot of enjoyment from the bridge building day, and that in turn this will inspire some of the students to consider civil engineering in the future. HOCHTIEF are committed to supporting the local education community, and look forward to developing further ways of fostering the delivery of STEM subjects."

Students first had to draw their truss designs accurately and plan their construction using materials provided, before working together to build their bridges. They were then tested three days later to see which bridge supported the heaviest weight.

Joanne Harper, UTC Swindon Executive Principal, commented: "We are grateful to HOCHTIEF for coming to run this fantastic activity with our Year 10 students. Experiences like this are highly valuable for them as they are exposed to the wide range of opportunities available to them in the future if they consider a career in engineering."



# THE KEY STAGE 4 CURRICULUM

<b>Core GCSEs</b>	GCSE English Language GCSE English Literature GCSE Mathematics GCSE Biology GCSE Chemistry GCSE Physics
<b>Specialist qualifications</b>	NCFE Certificate in Engineering Studies Certificate in Engineering Manufacture Digital Technology qualifications
<b>GCSE options</b>	GCSE Computer Science GCSE Business GCSE Smart Product Design and Manufacture GCSE Geography
<b>Extra-curricular activities</b>	Personal and Professional Development Sport and Recreation

Life as a student at UTC Swindon will be unlike any school experience you've ever had before.

Using the latest technology and equipment, you will learn through projects and practical activities. Teaching staff run lessons and seminars to introduce new topics and are always on hand to offer support in our independent learning spaces. You'll also work closely with our industry partners on projects and challenges they set.

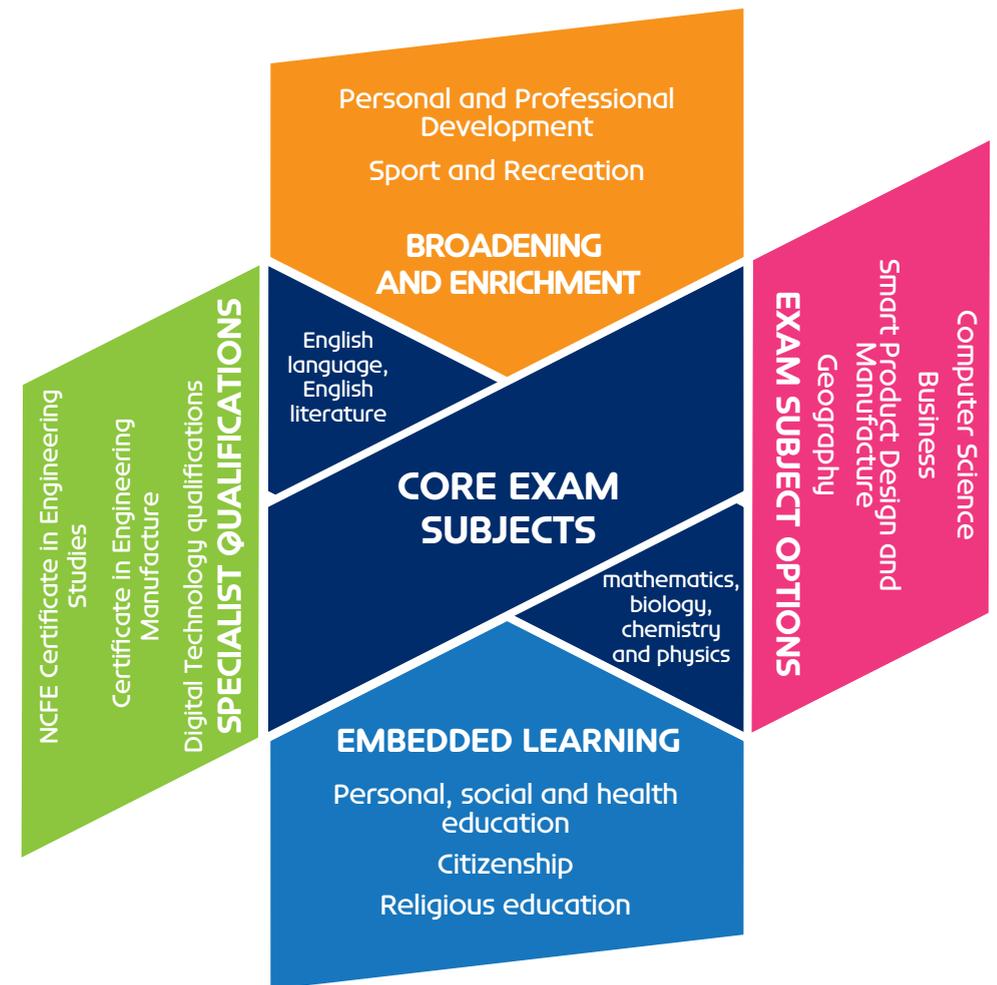
Alongside specialist qualifications, all students will study the core curriculum subjects of mathematics, English and sciences. You will also take part in weekly Personal and Professional Development, Sport and Recreation.

Visit [www.utcswindon.co.uk](http://www.utcswindon.co.uk) for details on all courses studied at GCSE level.

## SPECIALIST OPTIONS

At Key Stage 4, you will study one or both of our specialist areas. During the course of Key Stage 4 you will complete the equivalent of two GCSEs in either Computer Science (IT) or Engineering or one in each specialist area.

Find out more about our specialisms on our website: [www.utcswindon.co.uk](http://www.utcswindon.co.uk)



I'VE BECOME SO MUCH MORE CONFIDENT SINCE I JOINED UTC SWINDON, WHICH IS PARTLY DOWN TO THE FACT THAT I DECIDED TO MOVE TO A NEW SCHOOL AND MEET NEW PEOPLE. THE TEACHERS ARE ALSO MORE PERSONAL AND TREAT US LIKE ADULTS, SO YOU FEEL THAT YOU CAN ASK THEM ABOUT ANYTHING AND THEY'LL HELP YOU.

James Goodchild



# POST-16 OPTIONS

In Year 12, you can tailor your engineering or digital technologies studies to fit your individual interests, abilities and ambitions. You can also work towards A-levels that complement your specialist studies.

## SPECIALIST OPTIONS

**BTEC Diploma in Engineering**

**BTEC Diploma in IT**

**Digital Technology qualifications**

Options include selecting a qualification worth:

- 180 credits (Three A-levels)
- 120 credits (Two A-levels)

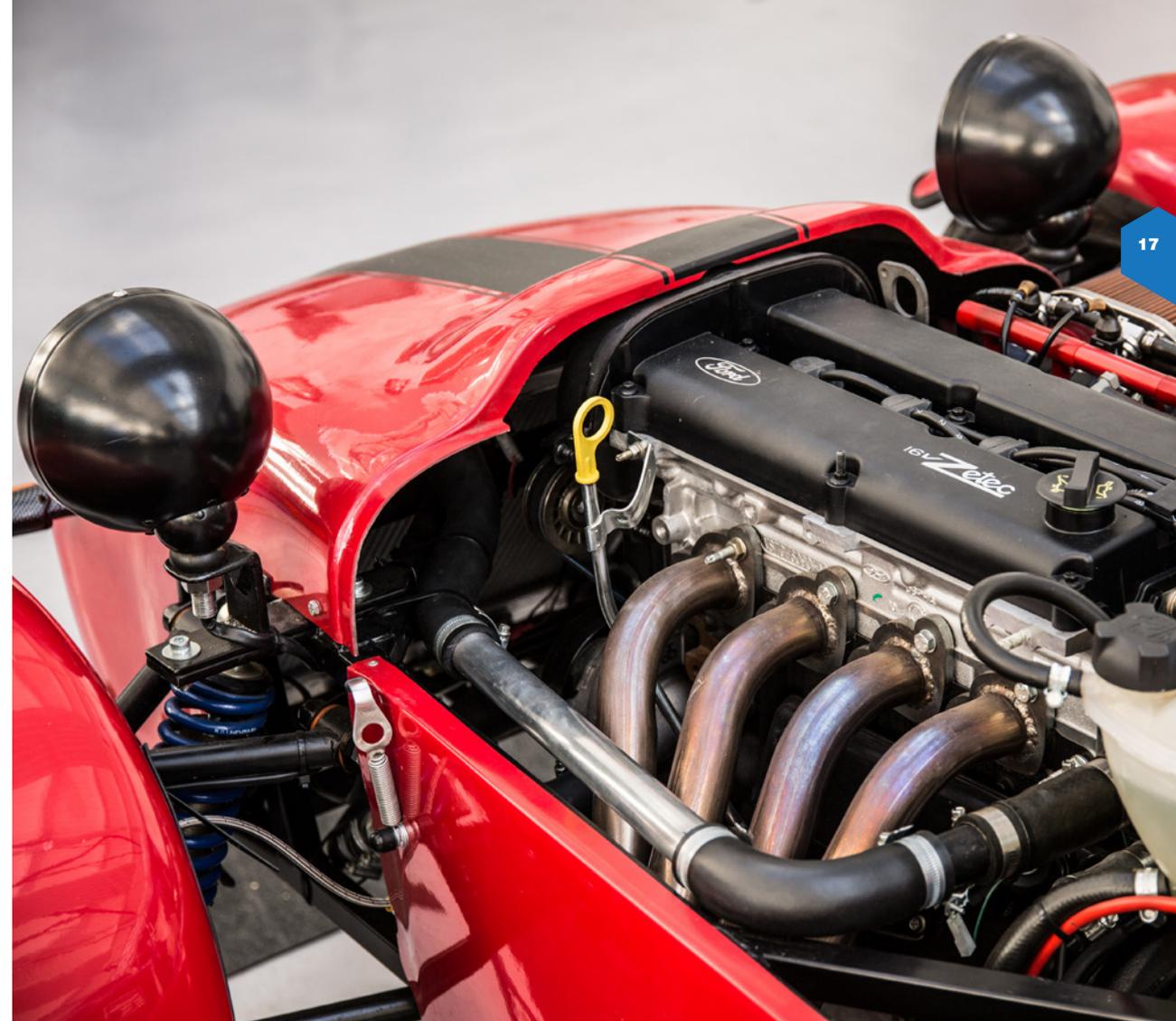
### A-levels

- Mathematics
- English
- Physics
- Chemistry
- Computer Science

### Personal and Professional Development

# 33,000

ENGINEERING COMPANIES NATIONALLY WILL HAVE NEARLY 33,000 ANNUAL OPENINGS FOR PEOPLE WITH SPECIALIST ENGINEERING SKILLS BETWEEN 2017 AND 2024 BUT THERE IS CURRENTLY A SHORTFALL OF 1.8 MILLION ENGINEERS ACROSS THE UK.



### Gareth Wilson, UTC Swindon alumnus and current apprentice at Patheon

Gareth Wilson was offered a place on Patheon's four-year apprenticeship programme in summer 2017.

"I was attracted to studying at UTC Swindon because of the engineering specialism. I attended an open day and was impressed by the professional atmosphere and the engineering facilities and equipment. These were much better than you would find at a typical school.

"I was thinking about moving onto university after completing my course, but discovered the apprenticeship programme at Patheon when they came to deliver a presentation. This offered the opportunity to continue studying, while working and developing skills in the workplace. It means I can achieve a further qualification while earning money and I will have much more practical experience than I would if I came out of university after three years."



CASE STUDY

# PROFESSIONAL QUALIFICATIONS

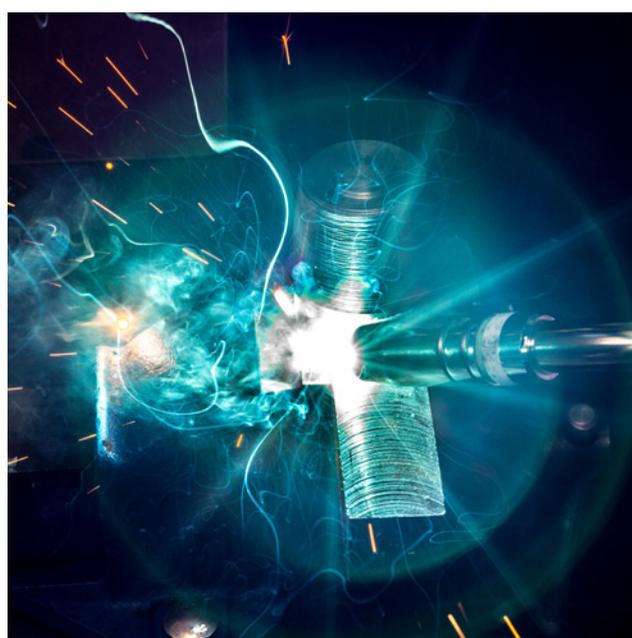
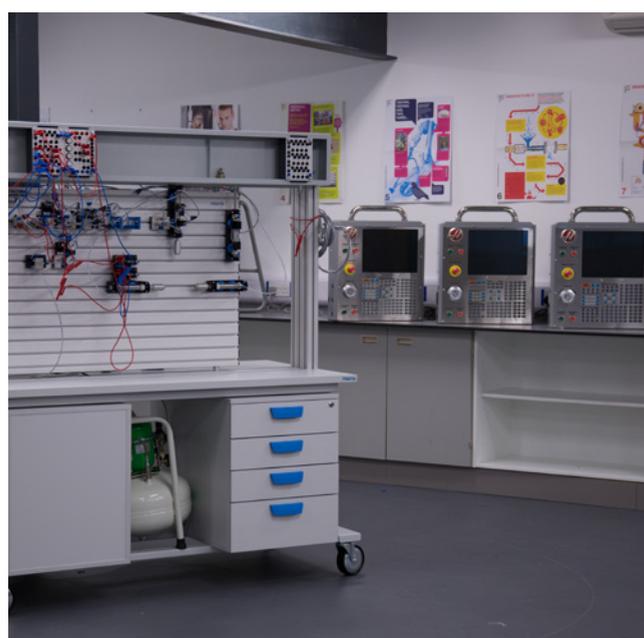
Alongside your GCSE and A-level studies, you will have the opportunity to work towards professional qualifications that will set you apart from the crowd.

The focus at UTC Swindon is on independent learning, and you will work towards these qualifications in your own time. You will have the opportunity to gain professional qualifications from:

- Microsoft IT Academy
- Cisco Academy
- Autodesk



# LEARN IN A STATE-OF-THE-ART ENVIRONMENT



# EMPLOYABILITY SKILLS

## Examples of how the Learning Philosophy (see page 6) is applied through activities in and out of the classroom

- Skills Training Week
- Work experience
- Project based learning
- Competitions
- Career talks
- Site visits
- Software Testing Week
- UTC Development Team

## Employability skills

- Presenting
- Teamwork
- Time management
- Interview techniques

## Character traits

- Grit
- Patience
- Determination
- Perseverance

# LEAD PARTNERS

UTC Swindon is very fortunate to be supported by sponsors and partners, who are working together to make sure we have everything in place for an exemplary engineering and digital technologies learning experience.

Our partners are involved in a number of ways, including:

- Consultancy and advice on curriculum content
- Coaching and mentoring for staff and students
- Product and services donations
- Providing work experience opportunities
- Employer accreditations
- Participation in the governance of the UTC
- Employer-led projects and challenges

Some of our partners include:

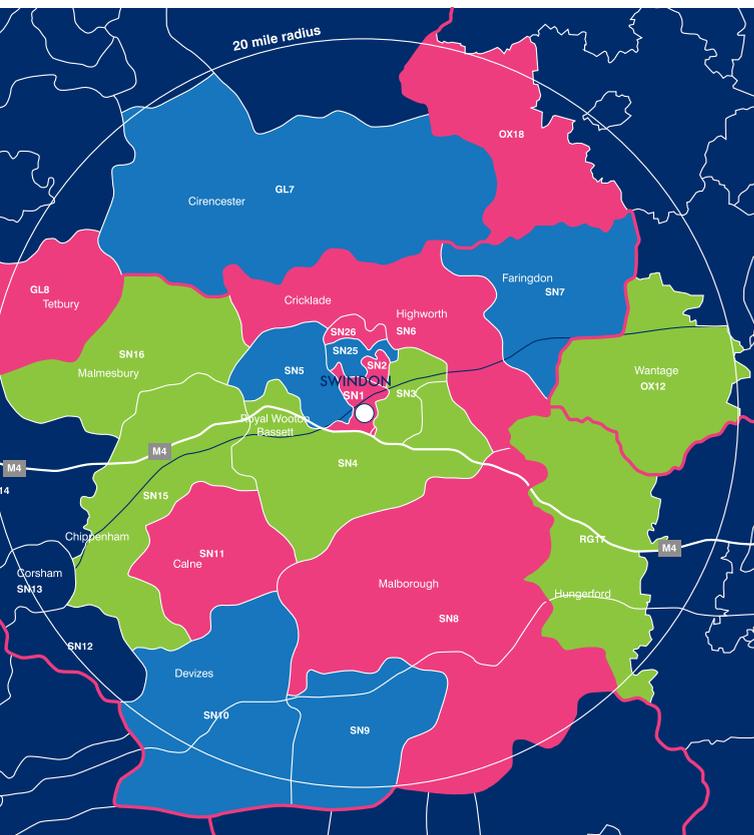
	<p>Oxford Brookes is one of the UK's leading modern universities and enjoys an international reputation for teaching excellence and innovation as well as strong links with business and industry.</p>
	<p>Patheon is a global pharma contract development and manufacturing organisation, providing an end-to-end supply chain solution for pharmaceutical and biopharmaceutical companies.</p>
	<p>HOCHTIEF is one of the largest international construction groups, delivering complex infrastructure projects across the globe.</p>
	<p>Torin-Sifan designs and manufactures highly efficient AC and EC motors, motorised impellers and fans for the residential and commercial HVAC manufacturing markets worldwide.</p>
	<p>Network Rail is the authority responsible for the UK's railway network.</p>
	<p>Thames Water is the UK's largest water and wastewater services company, responsible for the public water supply and waste water treatment in large parts of Greater London, the Thames Valley, Surrey, Gloucestershire, Wiltshire, Kent, and some other areas of the United Kingdom.</p>
	<p>Rota Val is a dedicated manufacturer of Rotary Valves and Diverter Valves for the Solids Handling Industry.</p>
	<p>MINI is the latest chapter in Plant Swindon's sixty year history. About 90 per cent of the pressings and almost 80 per cent of the sub-assemblies, such as doors, bonnets and tailgates for MINI, are produced in Swindon. From 2004 to 2006, around £60 million was invested in the preparation for MINI production. Another £25 million is being invested for further building and press line refurbishments.</p>

# JOIN UTC SWINDON

If you are currently in Year 9 or Year 11 you are able to apply for a place. There are no tests to join the UTC at 14. In order to gain entry to Year 12, you must have achieved a minimum of five GCSEs or equivalent at grades A\*-C/9-5 including English language and mathematics.

UTCs are designed to be sub-regional provisions so we welcome students from a wide catchment area that includes

Grouped postcode areas have been defined as the method to ensure geographical spread. This means that applicants living close to UTC Swindon do not have priority over other applicants within the other part of the catchment. A set percentage of places will be allocated for young people living in each of the grouped post code areas as shown on the map below.



## POSTCODE GROUP A:

SN5, SN7, SN9, SN10, SN25, GL7

## POSTCODE GROUP B:

SN1, SN2, SN6, SN8, SN11, SN26, OX18, GL8

## POSTCODE GROUP C:

SN3, SN4, SN15, SN16, RG17, OX12

## UTC SWINDON:



## HOW TO APPLY

You should apply via the application forms on the UTC Swindon website: [www.utcswindon.co.uk](http://www.utcswindon.co.uk)

## ARE YOU READY TO MOVE FROM SCHOOL TO UTC SWINDON?

We believe that there are many very good reasons to choose UTC Swindon. However, we also understand that the decision to change school is a big one.

As you lead up to your transition to UTC Swindon we will work with you, your family and your existing school to make sure that you are making the right decision. In making the move from school to UTC Swindon it is important that you:

- **are not deciding on your own, but that you have the support of your existing school and your parents or carers**
- **come to taster events that we put on to get a feel for the UTC and what it will be like**
- **studying here**
- **come and talk to us**
- **take advantage of the support, guidance and welfare on offer**

What matters to us is that you have made the right decision.

# FIND OUT MORE

## TASTER EVENTS

We run a number of taster events and information sessions throughout the year. Please come along to find out more and ask any questions you have:

- Tuesday 26 September
- Thursday 16 November
- Wednesday 31 January

Visit our website to find out further information about our events: [www.utcswindon.co.uk](http://www.utcswindon.co.uk)

## GET IN TOUCH

There are a number of ways to contact us:

Phone: 01793 207 920

Email: [info@utcswindon.co.uk](mailto:info@utcswindon.co.uk)

Visit: Book an appointment to speak with a member of the teaching team:

UTC Swindon, Bristol Street, Swindon, SN1 5ET

## KEEP UP TO DATE

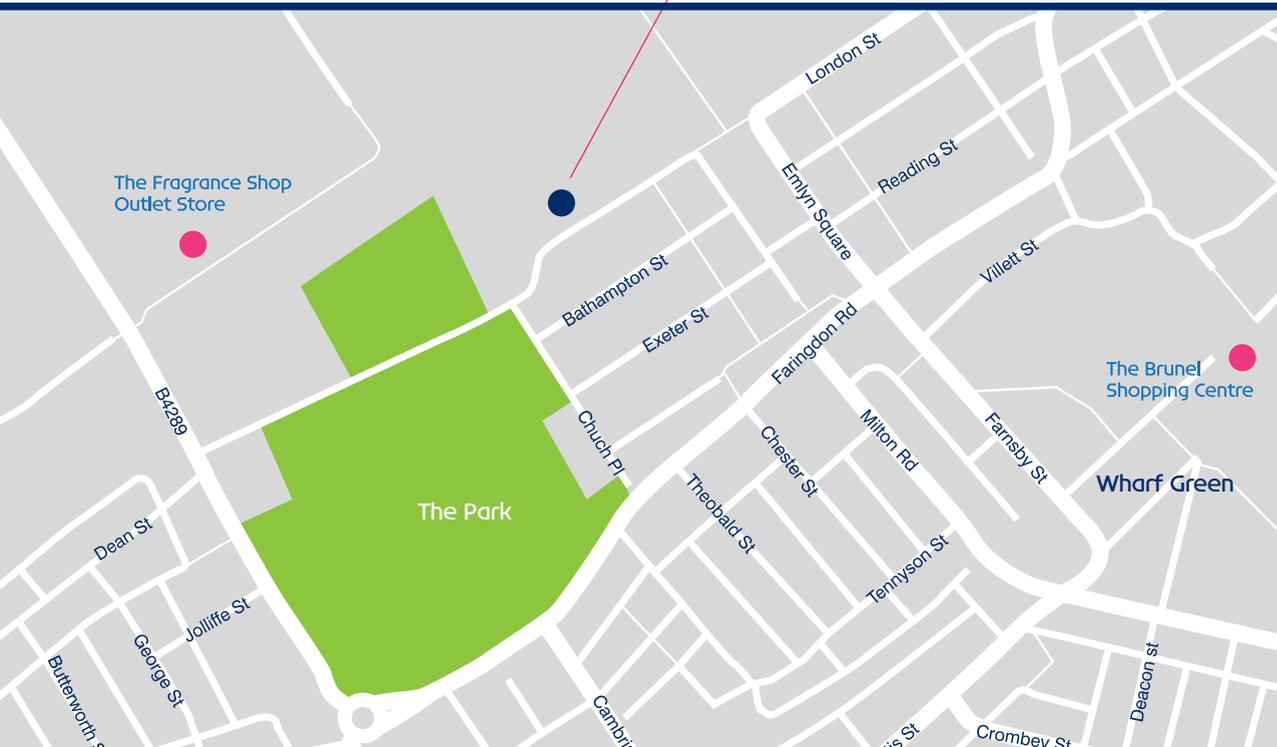
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