Preparing students for the world of work and the jobs of tomorrow





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Welcome

Welcome to the Life Sciences UTC.

We're dedicated to creating

opportunities for students across the fields of science, engineering and healthcare. To giving you experiences you wouldn't find elsewhere, and making you stand out as students, in whatever path you decide to pursue.

We promise all of our students a job, apprenticeship or degree course when you leave.

We're now five years old. So this is the first year we've been able to talk about our students graduating from university, or see how they're getting on in the jobs they left us for...

Back in 2013, we were the first school in the country to deliver a specialised education in healthcare and science – and we've since added engineering to that list. Our students have the best of all worlds. You can study a broad range of GCSE, BTEC and A level subjects; and you can choose pathways that lead you directly into careers in science, medicine, nursing, engineering and veterinary science. All of that takes place in an energetic school environment, with cutting-edge facilities.

We also work closely with

leading businesses, hospitals and organisations in the health and science sectors, who provide our students with unforgettable real-world experience.

They're the things that universities and employers tell us really make our students stand out. They help equip you for the future world of work, and build your confidence, knowledge and thirst for learning. We hope you'll join us.

Come on in, take a look around, and find out a bit more about us, and how we can help you.



LIVERPOOL LIFE SCIENCES UTC

Latest Ofsted report, January 2016 Personal development, behaviour and welfare is:

OUTSTANDING

"The motto 'every day is an interview' is the backbone of UTC life. **Consequently pupils** are highly motivated and well supported with real world **experience through** well planned work placements. All pupils follow personalised pathways through the Build my Future programme which ensures future destinations are highly successful."

CAN I REALLY CHANGE SCHOOLS?



What? Can I change schools?

Yes! You can now change schools at either 14, or 16. The government changed things back in 2010, allowing you to choose whether or not to stay at your school from the age of 14. You can also join us at 16, after you've finished your GCSEs.



If you're in Year 9 now, instead of staying at your school for years 10 and 11, you can enrol at Liverpool Life Sciences UTC. Or you can join us for years 12 and 13.

We believe in real world life experience and top-class facilities, alongside a core curriculum that includes GCSEs in English, maths, science and computing.

We're partners of the University of Liverpool, alongside a range of employers and businesses across health and life sciences in the Liverpool City Region. That means we have access to the cutting-edge facilities, and the most up-to-date job skills and requirements. Which means that you can leave school at 14 or 16, become a full time student at the UTC, and start working towards the career or direction you're really passionate about.

But don't worry... you'll still study the core subjects you would in any other school. You just have access to opportunities here that you might not otherwise. And our unbiased advice means we can help you choose a career or training opportunity that you'll find fulfilling and relevant. So you'll have a full range of options open to you at 16.



When can I join?

If you're in Year 9 now, you can finish school at the end of the summer term and enrol at the UTC. You'll be a Year 10 entrant, starting in September. If you're currently in Year 11 now, you can enrol now to be a Year 12 entrant.



WHAT WE DO



We're the first school in the UK to specialise in science and health care for students aged 14 – 19. Liverpool Life Sciences University Technical College (UTC) combines outstanding academic education with specialist vocational qualifications, preparing our students for the world of work.

Modern, professional and progressive, UTCs offer a unique educational experience. We partner with local businesses and universities to create specialised training, alongside teaching the traditional curriculum. Established in 2010, UTCs have revolutionised education in the UK, allowing students to combine traditional GCSEs and A-Levels with specialist vocational qualifications like BTECs.

At Liverpool Life Sciences UTC we're educating and nurturing the next generation of scientists, healthcare practitioners, engineers and entrepreneurs.

Nestled in the heart of Liverpool's creative and digital hub, the Baltic Triangle, Liverpool Life Sciences UTC has a strong focus on project-based learning – which taps into the flourishing businesses on our doorstep, giving our students an invaluable insight into the modern-day world of work. Our placements put our students to work in some of the north west's award-winning science and healthcare facilities. And our masterclasses expose students to industry partners, consultants and practitioners.

Our ethos is simple: we're committed to providing the highest standards of teaching and learning, combined with real industry experience which opens doors for our students. Our offer is unique, and we're proud to work with some of the world-leaders in science and healthcare, giving our students the ability to build a strong and enviable portfolio of experience, so they can hit the ground running once they graduate from our UTC.

WHAT IS A UTC?

Our unique curriculum brings together the very best of education, academia and business to provide students with unrivalled routes into future careers.





University Technical Colleges – or UTCs – are schools/ colleges for 14 - 19 year olds UTCs teach specialist vocational qualifications, alongside traditional curriculum subjects We prepare students for the world of work and the jobs of tomorrow, by partnering with businesses, universities and industry bodies to offer a unique educational experience

UTCs provide the opportunity to specialise in certain subject areas – in our case, engineering, science and healthcare

Equipped to high standards with the latest technology and cuttingedge facilities. UTCs inform and inspire students through a hands-on approach to a subject you love

Students graduate from UTCs with a wealth of industry knowledge, thanks to quaranteed involvement with local enterprise and universities – giving you a competitive edge for entering the world of work or applying to university

WHY WE DO IT

We don't believe that education exists in isolation. At its best, it should inspire and guid you, and provide you with the practical tools you'll need for the rest of your life.

We work in a different way to most schools and colleges, working closely with partners across the fields of life sciences, health and engineering, so that you get a better insight into these sectors, a more realistic view of working in the field and can see the steps you need to take to get there. That experience not only helps you make better choices, but to stand out from the crowd when it comes to applying to university, finding a job, or an apprenticeship.

Our hours at the UTC more closely relate to the working environment. It helps make your transition to work or university easier, supporting you to become independent, confident learners.

We expect maturity and commitment from our students, and the enrichment activities, work experience and masterclasses we host are designed to help you develop this...

But ultimately, the way we work is about you, not us. We do things differently to help you find a career or path you'll love, and make sure you have all the information, support and experience you need to get there.

OUR PROMISE

We promise to secure the future for all of our students at the UTC. Whether you want to go to university, find a job, or take up an apprenticeship – we can guarantee your next steps.

Our pupils are highly motivated to achieve the best results through our personalised pathways and real-world teaching approach, and on successful completion of their courses, all of our students have secured one of the following:

job

At the UTC, we work closely with local employers and a range of partners in the science and wellbeing sector. There's plenty of opportunity for our students to take up an entry-level job, once graduating from the UTC. We work directly with HR departments to ensure that you have a smooth pathway into the workforce, in roles including laboratory technicians, manufacturing and process technicians, health care assistants and administrators.

A university place

When applying to a university of your choice, our students have a competitive edge. We work closely with the university admissions teams to give our students the best possible advice about course choices and requirements. Our specialist training prepares you for university courses in a range of science and healthcare subjects including: life sciences, chemistry, physics, engineering, pharmacology, medicine, nursing, physiotherapy, veterinary science, and more.

An apprenticeship We work closely with the National Apprenticeship Services to promote a range of higher level apprenticeships in NHS roles, QC analytical lab technicians, formulations chemists and production technologists.

ETHOS AND CARE



At the UTC, our ethos is simple: we're committed to providing the highest levels of teaching, whilst making our education inclusive and accessible to all. We help our students to become confident, independent, successful learners, by teaching you the skills that you'll need once you leave the UTC to pursue further education, employment or apprenticeships.

'Every day is an interview' is our motto, and this is reflected in our creative approach to learning.

Our school day runs from 9am to 4pm Monday to Friday, to align the school's hours with those of a working business day. Much like a working environment, our sixth formers wear business dress, while those in Years 10 and 11 wear a smart uniform with a black blazer. We encourage our staff and students to socialise, this is why we have a shared canteen for both staff and students.

Bold, exciting and creative

education sits at the heart of our ethos, a type of teaching which gets the best out of each individual pupil, and our specialist team of staff supports our students every step of the way. We understand that each learner is unique, and our inclusive educational approach ensures that every one of our students can access the curriculum and enjoy their time here.

We provide a safe space for students to learn, explore and push boundaries.

CUTTING-EDGE FACILITIES

In the heart of Liverpool's bustling creative and digital district, we're housed in a Grade II listed former warehouse.

The lofty spaces of the warehouse give us unparalleled flexibility and scale. We're fully wheelchair accessible throughout the building, with disabled toilets on every floor and home to:

- state-of-the-art innovation and science labs
- a 120-seat lecture theatre and cinema
- a dedicated health suite, with real hospital beds and a 'Sim Man' – a fully functioning dummy patient
- a fitness suite and gym, equipped with the latest sports kit
- flexible teaching areas alongside our core science facilities
- a fully-functioning aquaponics environment in our basement
- an animal management centre, home to rabbits, lizards, geckos, hamsters, toads – and more...
- a canteen and ground-floor café area for students to socialise with both students and staff















We educate the healthcare professionals, scientists, engineers and technicians of tomorrow.

Our teaching team are experts in their fields, with years of experience working in education, business and industry to provide a rounded realworld education to our students. And, we are the only state school in the country to employ university professors and PhD students as part of our teaching facility.

We're part of the Northern Schools Trust, the umbrella organisation which consists of the Liverpool Life Sciences UTC; our neighbours -The Studio; the North Liverpool Academy, and Wigan UTC.

Managing the governance, finance and administrative aspects of our UTC, the Northern Schools Trust's support allows us to focus our concentration on what's important - getting the best results for our students through innovative and inspiring education.

Each year we accept up to 800 students aged between 14-19 from all corners of Merseyside, which means that our class sizes are often smaller than in traditional secondary schools, allowing for a more focused approach to teaching. All our students have made the decision to study with us and they hail from 96 high schools across Merseyside.

At the UTC, we integrate technical, practical and academic learning, which provides the skills and experience for students to thrive and develop the skills that industry needs.

Our dedicated team of teaching staff has a wealth of industry experience between them, as well as links to local arts and science organisations. With years of experience under their belts, our teaching team are experts in their respective fields, and are part of a wider network of science and healthcare professionals.

We teach across the spectrum, from science, maths and English, to business, health and social sciences, PE, humanities and modern foreign languages. Our students benefit from a high standard of teaching, encompassing all of the traditional curriculum subjects as well as a range of focused science and healthcare subjects from our team of specialist staff.

The safety of our students is imperative. We provide a safe space for students to learn, explore and push boundaries, and our dedicated Director of Inclusion ensures our students receive all the support they need whilst removing any barriers to learning. Our pastoral and academic mentors play a central role in students' personal and academic development.

We understand that joining a new school is a big decision, and we're here to help you transition into your new environment as smoothly and confidently as possible. That's why we have a particular focus on helping new students settle into school life and make new friends as quickly as possible.





LIVERPOOL LIFE SCIENCES UTC

LIFE SCIENCES IN LIVERPOOL

Liverpool City Region houses one of the largest concentrations of science and healthcare professionals in the country. Between the collected resources of the University of Liverpool, Royal Liverpool University and Broadgreen Hospital Trust, the School of Tropical Medicine, blue chip giant Unilever and Sci-Tech Daresbury – recognised globally for world-class science, innovation and enterprise – we host an embarrassment of riches. If you're interested in a career in health and life sciences, you're in the right place.

We've benefitted from £1bn of recent investment in our infrastructure, across the NHS, universities and industry, and the north west has become one of three main concentrations of life science clusters in the country.

There are more than 8,000 life sciences students and 10,000 people working in the sector in the region. Liverpool is home to more specialist hospitals and health centres than any UK city outside London; nationally, 17% of people work in healthcare.

As a country, we excel in health and life sciences. Since the introduction of the Life Sciences Strategy in 2011, the country has secured over £7.5bn of investment in the sector. That has led directly to the creation of 18,000 new jobs. Today, the UK has one of the strongest and most productive health and life sciences industries in the world. Could you be part of it?





PARTNER ORGANISATIONS

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Working with employers, universities and the public sector is important to us for many reasons. The real-world experience that it affords our students is second to none. And by working with a carefully-curated collection of award-winning partners, our students graduate from us with an unrivalled bank of knowledge and experience, to help them on their way...

- Make a real difference get involved in ground-breaking research projects
- Join regular visits to external organisations and take part in work placements with our partners
- Listen to and learn from world-class speakers in our series of masterclasses and seminars
- Stay ahead of the curve and develop the niche skills our local awardwinning science companies need, gaining the relevant skills that employers seek out
- Get a £2,000 bursary from the University of Liverpool, which supports UTC students to make the transition from UTC to UoL

Europe's

STUDENT STORY

Medical student Beth was one of the UTC's first students, joining the sixth form as part of its first intake, in 2013.

'Straight away it felt different,' she says. 'While my mum, who's a teacher, was a bit apprehensive because it was a new school and she didn't know the teachers, it had a great atmosphere. It wasn't about "what grades have you got?", it was more about "what can we do for you? What do you want to do?" The teaching staff were so enthusiastic. The UTC's approach was different. I liked doing 9-5, in a more adult environment, and being treated more like an adult.'

Beth was her previous school's top performing student, and – although she wasn't yet interested in a career in medicine – knew she was interested in science. 'It was one of the teachers, as part of the career guidance, who persuaded me to take a look at medicine. I was applying for chemistry at the time, but he set me up with a placement. I'd had healthcare experience, but it was more on the science side. He said he thought I'd be really good at it, and persuaded me to give it another chance.

'In my next placement I shadowed a junior doctor at Fazakerley Hospital – as opposed to senior staff – and it completely changed my perspective. I was working with someone who wasn't that much older than me, and suddenly I could see how I could become a doctor. I saw what her job entailed, in the first stages of being out of uni. I could see the stages she'd been through, and thought "I can do this. It's achievable." Seeing her pocket book, to check she'd asked all the right questions, and the collaborative environment she worked in with nursing staff helped it all click into place.

Beth completed work experience at the Royal, alongside her time at Fazakerley, and a month at RedX Pharma. 'Having spoken to people since, it's by far the thing that stood out most on my personal statement,' she says. 'An extended period of time in an adult environment gave me so much that I can apply to anything. I still don't know anyone else who had an opportunity like that. I did it over Easter, with some extra time away from school, and the UTC was so supportive in helping me fit it around studying.'





The UTC's partnership with the Royal Liverpool is a huge positive for students interested in medicine and healthcare. 'The Royal is so supportive of the UTC. I'm still in touch with one of the surgeons – it's surreal having a surgeon check in with me on Facebook to see how I'm getting on. But it's really encouraged me

to do the same. I'm part of the widening participation scheme in St Andrews, helping students with their personal statements, and talking to students who might not have that opportunity otherwise about the benefits of medicine.

'Being at the UTC surrounded me with people who've got similar interests. They had career ideas I'd never heard of. It wasn't just the staff, but all the students around you.'

Beth applied to four top universities, poring over their courses, facilities and wider appeal. 'We looked at league tables and courses, but were also encouraged to make decisions about what we wanted from university. We thought about where we'd like like to live, the cost of living, and how far we wanted to be from home.'

Beth graduated from St Andrews in summer 2018, having finished her BSc. Her medical degree will come from Queen Mary, where she's currently completing her final three years. She'll spend her first year working full time in hospitals Barts or the Royal London– the biggest hospital in western Europe. 'It's very exciting,' she says. 'They cover both some of the richest areas in London, and also the 1% most deprived area of the country. It's a chance to work with such a variety of people. 'Eventually, I'd like to either work in oncology or palliative care. I worked on a research project last year on oncology and palliative care, which was really eye-opening. And an academic lab research project this semester cemented that I enjoy both the clinical side and academic side.'

Beth is still very much part of the UTC community. 'One of the students in the year below came up to St Andrews for an interview, and came to see my accommodation. We've remained friends, I see him all the time here. A few more have applied for medicine to start this September,' she says.

'If I were talking to current students or prospective new students, I'd just tell them to put everything into it.' says Beth. 'If you're offered something, just do it. I was offered a month for work experience, but worried about how I'd catch up. But it really made the difference for me, and the UTC was really supportive of me. If you're interested in something, give it a go. You'll grow up a lot faster, and there are so many more opportunities. Whether you want to do a degree or an apprenticeship - or if you're not sure you won't be pushed in either direction. You'll be able to make a really balanced decision about what you want to do...'



KEY STAGE 4

As a specialist school, we don't limit the options that you can choose to study in Year 10 – in fact, we provide all the national curriculum subjects, plus a whole lot more. Our specialised option choices support routes into medicine, animal care, health and social care, engineering, sociology and much more. When you apply to the Life Sciences UTC, you'll get impartial advice on which options would benefit you the most, and the best route into your future career.

Alongside the core curriculum subjects, our students select a range of optional subjects, which give you a good foundation if you want to later specialise in a certain area in sixth form.



All our subjects have been designed in conjunction with our university and industry partners, to make sure that students get the best possible education options, for the roles of the future. We've worked closely with our partners to cover the key skills, experiences and attributes needed in the science, engineering and healthcare sectors. Our students have everything at their fingertips to make an informed decision about the best route through education for you, playing to your personal strengths and interests.

'Every day is an interview' is the UTC motto, and this applies to all aspects of our school life. Our students are treated as adults and are encouraged to demonstrate maturity, passion and commitment at every level in their journey.

We start each school day with inspiration from some of the world's industry leaders, and make sure that during form time (Pulse) we inspire our students to aim high, through a series of activities. These include watching TED talks before classes begin from some of the business world's big players, including Amazon founder Jeff Bezos, and international avalanche and mountain rescue expert, Dale Atkins.

GCSE OPTIONS

The core examination subjects are:

- English language
- English literature
- Mathematics
- Biology

The core curriculum also includes some non-examination subjects:

- Physical education
- Personal, social health, citizenship education
- Religious education
- Careers education, information, advice and guidance

The UTC's culture programme actively engages students both locally and nationally, through a series of sessions designed to build upon aspects of culture, faith, finance, Latin and the local community, and our students' role in it. Our wellbeing curriculum incorporates a varied programme of physical education classes for our students, including dance, gymnastics, field games and invasion games.

Enrichment activities are key to building our students' experience of the world outside the classroom. Designed to enhance applications for future study, apprenticeship and job applications, our enrichment

Students can select from the range of optional subjects below:

Chemistry

Business

studies

Computer

science

- Child care
- Geography
 - History

Physics

- Sociology
- Health and
 Arabic
- social care Sport
- Psychology
- Spanish
- Engineering

activities are fun, compelling and diverse, allowing students to build their knowledge whilst building their confidence.

Project-based learning is also a core element of our innovative educational approach at the UTC. Each week, all students attend two periods dedicated to technical projects, where they work in teams on industry inspired projects. With access to industrylevel laboratories and environments, our students can excel in the science and healthcare sectors, through close mentoring and support from our award-winning industry partners and sponsors.

LIVERPOOL LIFE SCIENCES UTC

LIVERPOOL LIFE SCIENCES UTC

ENRICHMENT AND CAREER SUPPORT

Fancy learning street dance in between classes? Want to build a 1,000mph jet powered car from scratch, in your spare time? Maybe you'd like to practise your coding skills? Our enrichment activities have got you covered...

Enrichment activities run alongside our classes and lab work, offering students a wide range of exciting and interesting opportunities to build on their experience, or learn a new hobby or skill.

"Want to build a 1,000mph jet powered car from scratch, in your spare time?" We offer a range of enrichment opportunities, appealing to a broad range of students; there are fitness sessions; water sports; sign language classes; and opportunities to take part in junior doctor scenarios.

Our programme of enrichment activities goes hand in hand with a strong and enviable UCAS application. We encourage students to take part in our fun, educational sessions in order for their skills to stand out from the crowd in their university entrance applications.

As well as building up a unique and strong skills base, our students benefit from impartial careers advice and guidance through our Build my Future programme. Our close connection to local universities and colleges means our students have the best possible advice when it comes to university admissions.

Of course, we understand that not all of our students want to pursue a university education; our guidance team are on hand to talk our students through life after the UTC, whether that may be university, an apprenticeship, or a job upon graduating.

PROJECTS

UN Sustainable Development Goals

When starting Year 10, our students are invited to begin a year-long project which focuses on the 17 UN Sustainable Development Goals (SDGs). The SDGs are a series of goals, targets and indicators for governments around the world to implement, to encourage a sustainable way of life. For the goals – which focus on eradicating poverty, healthy oceans, gender equality and clean energy, to name a few – to be effective, they must be practiced at a local level. We've created a fun, competitive and interactive learning environment which encourages our students to learn about and implement the 17 SDGs, across one academic year.

Students will work in teams to create an electric portfolio of work – an Instagram account, where they can upload videos and photos on completion of each goal, tagging their media with their team name and the goal that's been achieved. Our students will work together on projects which include: wellbeing challenges, International Women's Day challenges, masterclasses on renewable energy, faith visits to temples, mosques and synagogues; and a toilet twinning challenge, which encourages our students to consider clean water by twinning as many toilet cubicles in the school with toilets in developing worlds.

We encourage our students to raise money for their own chosen charities throughout the year, which instils a culture of giving back to society. As well as building up a range of skills and knowledge to create a competitive UCAS personal statement, our students will also have completed all the requirements needed to complete a Bronze Duke of Edinburgh Award, should they choose to.

LIVERPOOL

STUDENT STORY

Daniel graduated from his undergraduate degree in summer 2018, and is about to embark on a PhD...

'I came across the UTC because my Mum is a primary school teacher,' says Daniel, who joined its first intake in 2013. 'The husband of one of her colleagues, a professor from the University of Liverpool, was on the board of governors there. He referred me on,' says Daniel. 'It was the first year it opened and I instantly latched on to the fact that it was science-orientated.

'I've always been science-orientated and really into biology and chemistry – less so physics. My dad is an engineer and my brothers are a physicist and an engineer – I suppose that makes me the black sheep of the family!'

My school sixth-form was OK, but the facilities at the UTC were much better than I had access to at college. I decided to go to the UTC with a friend, and my little brother's also decided to go, too.'

At the UTC, Daniel completed a month's work experience with one of the school's partners, Croda,

a world leader in natural based specialty chemicals. He also worked with school partner Farm Urban as part of the UTC's enrichment programme, where he helped design the alpha-helix sculpture which sits in the UTC lobby. Daniel has kept in touch with Farm Urban after leaving the UTC and comes back when he can to continue his work with them.

'I spent the month at Croda in Widnes, doing microbiology, which was useful as I learned that I didn't want to do that as a career!' he laughs.

Three years ago, Daniel left the UTC to study biochemistry at the University of York. He credits the support of the team at the UTC in supporting his university application process.

'They did an Oxford University tour whilst I was there, and were very helpful generally in helping with our university applications.





LIVERPOOL LIFE SCIENCES UTC

They took us to Oxford for a week, giving us the full tour, and we did mock-interviews which was really helpful.

'I ended up going to the University of York, which at the time of applying was in the top five in the country in my field of interest, biochemistry. I've just finished my three-year degree there. I just got my finalised results this morning a first!'

In addition to helping secure his place at university in the application process, Daniel felt the learning environment was key to preparing him for his time at York.

'My practical skills were better as a result of going to the UTC and that gave me a leg-up and improved my confidence when going to university, especially when doing physical lab work.

'A lot of the work we did in the labs went above and beyond the curriculum and allowed me to indulge my interest in learning outside of that.

'The UTC helped me scratch the itch of learning to work



independently, and you don't really get that in normal curriculum. You were taught about the end goal of the work, but could figure out how you get there on your own, to a degree."

Daniel is moving to London this September to begin a four-year PhD at the Francis Crick Institute.



WHY WE USE SIXTH FORM PATHWAYS

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We use pathways to help you visualise the best route into the career you're interested in, and support you in making the right study choices at Year 12.

We work closely with you and your parents to make sure you opt for the best combination of subjects to help you achieve your dreams. And, if you're unsure about your future goals, we can advise you on how best to keep your options open and find out what really inspires you.

We also offer our students a variety of project-based learning, placements and masterclasses, so you get a real taste for the jobs and environments that you're passionate about.

Project-based learning

Our project programme underpins the work-based ethos of the UTC. Students participate in practical workshops, experiment, research, seminars and enrichment opportunities connected to an area of study.

This significantly improves your confidence, motivation, self-respect, academic achievement and skills development. **Placements** All of our post-16 courses include work-related activities and opportunities for work placements.

Masterclasses

Our students regularly benefit from inspirational masterclasses delivered by our industry partners, hospital consultants and university academics.

We offer five different pathways, giving you a chance to explore wideranging subject areas, coupled with unforgettable, real-life experience:

- Exploring medicine/ dentistry/ veterinary
- Exploring life sciences
- Exploring engineering and physical sciences
- Exploring forensic and social sciences
- Exploring health and care

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PROJECTS

Aquaponics

With more people living in urban areas than ever before; a growing population, and an increasing concern over cultivatable land available to feed us all, we're having to rethink how we're growing and distributing our food.

We're proud to be the home of Farm Urban – our basement resident which grows plants and crops in an urban environment, using state of the art technology. Is this the farm of the future? Our students are invited to find out through a series of hands on laboratory skills, which give you a true insight into the world's food security issues, and the potential solutions. Linking leading scientific research with local food production, Farm Urban invites our students to test the most effective ways to grow food in urban environments.

This enrichment programme builds our students' teamwork, innovation and problem-solving skills, and is an exciting pathway to future study.

Macmillan Cancer Care Project and Dementia Friends Programme

Both our Macmillan Cancer Care Project and the Dementia Friends Programme are designed to address the challenges of living with cancer and dementia and encourage students to take their understanding of the illnesses and turn it into action.

Our Macmillan Cancer Care Project encourages students to raise awareness of cancer through a series of campaigns and fundraising initiatives, whilst building teamwork, communication and leadership skills.

The Dementia Friends Programme allows our students to explore the medical reasons behind dementia – meeting with dementia patients and attending masterclasses from industry experts. Exploring the advances in technology to treat Dementia, our students learn vital skills which will support them to achieve a career in health and medicine.

LIVERPOOL LIFE SCIENCES UTC

HOW THE SIXTH FORM **CURRICULUM WORKS**

Making your choices

When it comes to choosing your sixth form options, many people will tell you to choose the subjects you enjoy and that interest you – which is good advice. But, it's also important to think further ahead and to consider what you might like to do in the future.

It's scary to realise that the choices you make now will influence the choices you're Each of the next five pages covers one able to make at the end of your A Levels. And in turn, which degree courses, jobs and apprenticeships are open to you at the end of your time with us.

That's why having the right information now will give you more options when the time comes. For some degrees/ jobs, vou'll need to have studied a particular subject or range of subjects beforehand.

It's our job to help you make decisions that won't make things harder for you in the long term. We need to be sure that the subjects you take equip you for your chosen university course, apprenticeship or career path – or show off your skills in a particular subject area.

Most importantly, if you haven't yet decided what you'd like to do in the longer term, we can advise you on the subjects that help keep your options open until vou do.

When making your choices. think about: 1. Reflecting your strengths and interests 2. Entry requirements for your future careers/ courses 3. Ensuring balance in your combination

of our sixth form pathways. There are two ways to read each one – down from the top, or up from the bottom...

1. If you know what direction you want to take when you're older, work from the bottom up to select the pathway and course options you need to take now...

2. If you know what subjects you want to study, work from top down to see the different apprenticeships. university and career options they open up for you...

But remember! We've suggested possible university courses, apprenticeships and careers. These lists aren't exhaustive, and we can help you look at the wider range of choices that you might wish to consider.

EXPLORING MEDICINE/ **DENTISTRY**/ VETERINARY

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To study medicine Entry at university you'll need 5 grade 8s at GCSE; to study veterinary/ dentistry at university, you'll need 8 GCSE grade 8s.

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Medicine, dentistry and veterinary science are some of the most academically challenging degree courses to gain a place on. Similarly, this pathway is a challenging, intensive preparation for applying for these courses.

Work on a range of projects that teach the basics of biomedical and life sciences, and participate in work placements, including the Royal Liverpool Hospital and Knowsley Safari Park, to support your UCAS application.

If a career in medicine, dentistry or as a vet is calling you, take the opportunity to experience a number of exciting work placements, masterclassses and projects designed to help you achieve your goals.

Medicine Dentistry **Biomedical sciences** Veterinary sciences Bio veterinarv sciences

SUBJECT

OPTIONS

Chemistry Bioloav

Psychology

rement

Physics Maths

History

Laboratory assistant **Operating health** professional Haematology technician **Dental nurse**





EXPLORING LIFE SCIENCES - DEGREE **COURSES**

SUBJECT **OPTIONS**

Biology Chemistry **Physics**

Maths

Psychology

BTEC Applied Science

For A Level routes, you'll need at least 5 6s/ Bs at GCSE, including science. BTEC routes need at least 3 GCSE 4s/ Cs, including science. If you don't already have English or maths at GCSE. you'll need to successfully repeat this in Year 12.

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The life science pathway gives you knowledge and expertise in technical laboratory work. and has evolved to support the need for more specialists in this area. You'll gain the numerical, analytical and communication skills that many key employers look out for, including the NHS, pharmaceutical, chemical and agrochemical industries, and government agencies like the Department of Health.

Work placements with our partner organisations are a key element of the learning experience, creating a highly practical pathway with lots of opportunities for projects and

Biochemistry, Biotechnology Microbiology **Biomedical sciences** Veterinary sciences Pharmacology Zoology, Marine biology

Laboratory technician Sterile service technician **NHS pharmacy Health informatics Animal Nursing**

> Geneticist Microbiologist Pharmacologist Marine biologist

YOUR **IDEAL** CAREER

LIVERPOOL LIFE SCIENCES UTC

EXPLORING ENGINEERING AND PHYSICAL SCIENCES

For A Level routes, you'll need at least 5 6s/ Bs at GCSE, including science. BTEC routes need at least 3 GCSE 4s/ Cs, including science. If you don't already have English or maths at GCSE you'll need to successfully repeat this in Year 12.



Chemistry, **Physics**

- **Biology, Maths**
- Further maths
- Computing
- **BTEC Applied Science** Geography



Chemistry, Physics Engineering Earth and marine sciences, Astronomy Maths, Metallurgy

Understanding the world around us guides exploration on the engineering and physical sciences pathway. It combines perspectives from physical, chemical, environmental, mathematical and

geological sciences and is ideal for students who enjoy lab work, research, complex equations and methodical analysis.

If you're looking at A Levels in chemistry, physics and maths - with a view to a career in engineering – this could be the option for you.

Chemistry technician Engineering **Process manufacturing**



Analytical chemist Formulations chemist Engineer

YOUR **IDEAL** CAREER

EXPLORING FORENSIC AND SOCIAL SCIENCES

SUBJECT OPTIONS

BTEC in Forensic

- Science Psychology
- Diploma in Criminology

✓ Sociology Biology

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For A Level routes, you'll need at least 5 6s/ Bs at GCSE, including science. BTEC routes need at least 3 GCSE 4s/ Cs, including science. If you don't already have English or maths at GCSE, you'll need to successfully repeat this in Year 12.

Forensic science is geared around using a range of scientific techniques and principles to resolve legal disputes. You'll have an analytical mind, pay attention to the details and be interested in biology, chemistry and, potentially, the study of the mind. You'll need to have the motivation to investigate your work fully, uncovering the evidence to support your studies. You will need to meet deadlines and work independently.

You can combine your study of science with learning more about the law in criminology or the mind in psychology or sociology. Or, specialize in the social sciences which will allow you to understand how and why people behave as they do, study society and understand unemployment, how people vote and what makes people happy.



Criminal investigation Forensic science Microbiology

> Psychologist Probation officer Social worker Forensic scientist

YOUR IDEAL CAREER

EXPLORING HEALTH AND CARE

SUBJECT OPTIONS

Biology, Physics Maths, Psychology Sociology BTEC Health & Social Care

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For A Level routes, you'll need at least 5 6s/ Bs at GCSE, including science. BTEC routes need at least 3 GCSE 4s/ Cs, including science. If you don't already have English or maths at GCSE, you'll need to successfully repeat this in Year 12.

By studying the heath and care pathway, you'll gain a broad understanding of the human mind and body, and the causes and symptoms of some diseases - ideal for anyone considering nursing or midwifery. You'll examine a range of health topics including anatomy, psychology, acute and chronic conditions, genetic and nutritional disorders. mental health and infectious diseases, backed up with a work placement at the Royal Liverpool Hospital.

Explore the principles of the care sector from a scientific, sociological and psychological perspective. The perfect springboard to enter a caring, social work or community work-based profession, it's a highly practical pathway. A range of work-related projects and placements ensures you're well prepared for a job when you leave us, or to access a higher education course such as nursing, care or social work.



Radiography, Midwifery Nursing, Occupational therapy, Ophthalmology Physiotherapy Health & social care Social work, Early years

Healthcare, early years radiotherapy dietetic, physiotherapy residential assistants Clinical support workers Dental nursing Play work coordinator Apprenticesne

Nurse, Midwife Physiotherapist Radiographer Emergency/ elderly/ disabled assistant

YOUR IDEAL CAREER

STUDENT STORY

David graduated from the UTC in summer 2017, and is now an undergraduate engineer at the prestigious Dyson Institute of Engineering and Technology. Opting for a degree apprenticeship, as opposed to a traditional degree, means he works three days a week alongside Dyson's global engineering team, while studying for an engineering degree from the University of Warwick.

'Going into electronics or engineering was set in stone for me before I joined, but going to the Dyson Institute isn't very conventional, and I know a lot of schools discouraged people from doing it,' he says. 'While some schools chase 100% of their students going to university, it's not always right for everyone, and the UTC was willing to look into different paths for me. They were willing to push for it and help me in any way possible. It really complemented what I was interested in and what I was good at...

'I knew a few older people from my school that had moved to the UTC,' says David. 'Talking to them, they were all enjoying themselves and having a good time. When I went to have a look around, I was struck by how friendly and encouraging it was. Feedback was taken differently and there was more involvement between staff and students. I think my ability to talk to people – especially people who're more senior, or older than me – has really been helped by that, which is good for interviews and my job.

'Although my commute was more than an hour, I was ready to break out of my comfort zone. It would have been easy to stay at my old school, and I kept in touch with my friends there, but it was good to meet new people and new staff. Being in a city centre had a different atmosphere – everything had a faster pace. Commuting gave me a different insight and perspective into normal working life – it was more reflective of that, than school. Sticking to a rigorous timetable was more like a job, which helped when I did my work experience, and I felt more independent.' Studying A Levels in physics, maths, further maths and an AS in chemistry, David had already begun university applications and received his offers before he opted for a degree apprenticeship. 'Talking to other people who'd gone to university changed my mind,' he says. 'There's the debt, and then the social life isn't that areat once the work kicks in. Having a massive summer is good, but most people seemed to spend it working. This ticked more boxes for me. And a friend's dad, who runs his own business, told me how many university students he found were unprepared for the world of work. Suddenly, it was a no brainer for me.

'Now I work within a team on Mondays, Tuesdays and Fridays,' he says. 'Then on Wednesdays and Thursdays have lectures and tuition. I spend working days delivering projects, and have rotated between the electronics, software and mechanics teams this year. While my degree will take four years instead of three, I don't pay tuition fees, and earn a salary for my work.'

The UTC gave David the time he needed to work on his application, alongside time for phone and physical interviews. 'Whenever there was anything that needed doing they helped me out,'



he says, 'and it is a lengthy process compared with other universities, including a hefty application form and online tests.

'And my work experience, with a company called BrainBoxes, really helped with my interviews. Not everything's about the academic results – more and more people are interested in what you've been doing outside work and school; what experiences you have alongside the education. The education is a given, so they're looking for what sets you aside – work experience and projects. They really make a difference.'

HOW TO APPLY... Year 10 and 12 info

It's easy to apply to join the Life Sciences UTC. You can apply online at lifesciencesutc.co.uk/apply or come to an open evening and apply in person. You'll find more details online at lifesciencesutc.co.uk

Contact us: ◎ ¶ ♥ @lifesciencesutc 0151 230 1320

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