







# **APPRENTICESHIPS**





## **EDUCATION TO CAREER**

Discover remarkable chances to enhance your skills, gain practical experience, expand your knowledge, and explore youth-friendly employment opportunities within STEM such as apprenticeships, entry-level positions, and graduate roles. Connect with these opportunities to pave your way towards a successful career by visiting their websites.

# So, what's an apprenticeship...?

APPRENTICESHIP

#### **Practical Work Experience:**

Apprenticeships provide hands-on experience in a specific trade or profession, allowing individuals to develop practical skills directly relevant to their chosen career path. This experience is highly valued by employers and can enhance employability.

#### **Earn While You Learn:**

Apprenticeships are paid positions, meaning individuals can earn a wage while gaining valuable work experience and training. This can help alleviate financial burdens and provide a source of income during the learning process.

#### **Recognised Qualifications:**

Apprenticeships lead to nationally recognized qualifications, ranging from intermediate to advanced levels, depending on the apprenticeship program. These qualifications validate the skills and knowledge gained during the apprenticeship and enhance one's CV.

#### **Industry-Relevant Training:**

Apprenticeships focus on providing training that aligns with the needs of specific industries. This ensures that individuals acquire skills and knowledge that are directly applicable to their chosen profession, making them highly sought after by employers. This is especially true for STEM in the East of England, where there is a shortage of skilled people.

#### **Career Progression Opportunities:**

Completing an apprenticeship can open doors to further career opportunities. Apprentices are often offered full-time positions within the company they trained with, or they may have improved prospects for securing employment elsewhere due to their practical experience and qualifications.

#### **Personal Development:**

Apprenticeships offer a supportive learning environment that promotes personal development. Apprentices gain confidence, independence, and essential transferable skills such as communication, teamwork, problem-solving, and time management. Many apprentices become STEM Ambassadors to inspire other people to take up a STEM role, too.

#### **Networking and Professional Connections:**

Apprenticeships provide opportunities to build professional networks and connections within the industry. These connections can be valuable for future employment prospects, mentorship, and accessing a broader range of opportunities.

#### **Debt-Free Alternative:**

Unlike traditional higher education routes, apprenticeships offer a debt-free alternative to gaining qualifications and practical experience. Apprentices do not accumulate student loans and can start their careers without the burden of significant financial obligations.

Overall, apprenticeships in the UK offer a combination of practical experience, recognised qualifications, and the opportunity to earn while learning. This makes them an attractive option for individuals seeking a direct pathway to a rewarding career.



Amazing Apprenticeships is a leading organisation in the education sector.

We are experts on apprenticeships and vocational education, driving forward innovative and creative work in England and internationally to change the way technical education is perceived.

www.amazingapprenticeships.com





#### https://airleague.co.uk/our-programmes/scholarships-and-bursaries

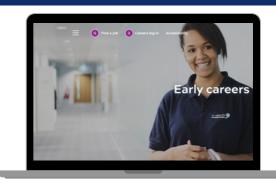
Over the past decade scholarships and bursaries worth over £2 million have been allocated to young people across the UK. We look for individuals that have a passion for aviation and aerospace and the determination to succeed. 2023 will see again changes to our scholarships and bursaries for which we will endeavor to deliver the maximum impact to our beneficiaries. New opportunities are already being introduced that will enhance the career pathways of future pilots, aspiring engineers and many other professional aviation disciplines.

The Air League offers the broadest range of scholarships and bursaries in the UK, with over 120 opportunities being awarded annually.

If you are considering a career in aviation and aerospace, the Air League can offer you unrivalled support and help.







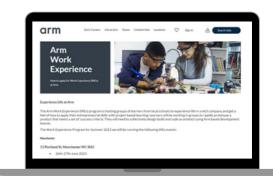
https://anglianwatercareers.co.uk/strategic-alliance-partnership/anglian-water-one-alliance/



"After my GCSEs, I went onto sixth form but left after my first year. I applied for a L3 Civil Engineering
Apprenticeship with Skanska working in the Anglian Water
@one Alliance. Six years later, and I have nearly finished my L6 Civil Engineering Degree Apprenticeship, all sponsored by my company. I have gained a wealth of skills, experience and knowledge in this time, and my current role is Section Engineer."

Rebecca Thompson, Civil engineering - Section Engineer





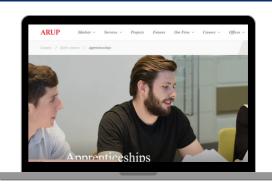
#### https://careers.arm.com/work-experience



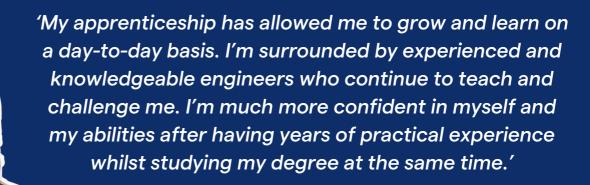
"At first, what attracted me to a degree apprenticeship in software engineering were the financial and professional benefits. I figured there is one thing that's better than zero debt at the end of a three-year degree, and that's also having three years' experience on the job."

Brandon, a Software Engineer Degree Apprentice.

# **ARUP**



#### https://www.arup.com/careers/early-careers/apprenticeships



Lizzie Wood
Level 6 structural engineering apprentice



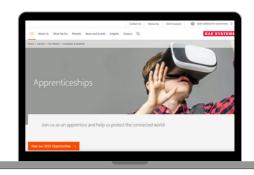


#### https://careers.astrazeneca.com/early-talent

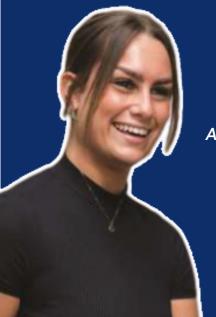
"The laboratory science apprenticeship programme at AstraZeneca has allowed me to work alongside and learn from industry professionals, as well as study towards a bachelor's degree in Applied Chemical Sciences with the University of Kent. I have gained invaluable experience and continue to develop both professionally and personally."

Rebecca Burford
Laboratory Science Apprentice

### **BAE SYSTEMS**



www.baesystems.com/en/cybersecurity/careers/our-people/graduates-and-students/apprenticeship

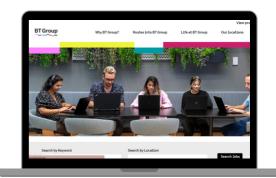


"After completing A Levels in Maths, Physics and Chemistry, I joined BAE SYSTEMS at the beginning of 2021 as part of their Advanced Apprenticeship programme. I've developed not only as an engineer, but personally. My hard and soft skills have gone through the roof. I'm so much more confident."

Amelia Gould

Advanced Engineering Technician Apprentice





#### https://jobs.bt.com/content/Students-and-Graduates/



"Graduating from BT's Degree Apprenticeship scheme has enabled me to develop critical industry knowledge and start building my professional network. It has and provided me with the academic credentials that I needed to kick start my career within the STEM Industry. Without the inspirational activities organised by BT's STEM Ambassadors, I would not have heard of the apprenticeship scheme or had the confidence to apply. I am extremely grateful to have had this opportunity and now after 5 years within the company, as I step into my new role, I and am excited to see what's next!"

Stephanie Bally Technical Delivery Manager





#### https://www.bamcareers.com/uk/en/campaigns-apprenticeship-programme



After speaking to BAM at my university careers fair, I applied for a summer placement. After the first summer internship I was offered sponsorship with BAM and returned the following summer. After graduating from Nottingham University with a 1st Class MEng in Civil Engineering I started work on the construction of the new Guildford Sewage Treatment Plant as a graduate engineer which Is where I am currently working today as a site engineer.

Hamish Lonie Site Engineer





www.boschrexroth.com/en/pl/jobs-and-career/job-opportunities/work-apprenticeship-student-programs/



"I secured a modern apprenticeship when I was 18. By spending 1 day a week at college I was able to develop my academic skill set to complete a degree with honours, alongside building my working experience in Hydraulic engineering whist earning a wage. I would certainly recommend the apprenticeship route as a strong entry point into any industry."

Tom Fensome Bosch Rexroth



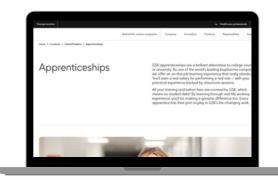


#### https://jobs.gecareers.com/healthcare/global/en

"My apprenticeship gave me the opportunity to work in different departments which allowed me to gain experience in a variety of mechanical and electrical roles. This set me up to work as a field engineer on MRI scanners. In 2022 I was promoted to Area Service Manager where I manage 30 engineers in London"

Craig Middlewood
Area Service Manager





#### https://www.gsk.com/en-gb/locations/united-kingdom/apprenticeships/



"Everything I have learned I have learned from others. Be it how to perform a task or how to have an open mind. Always be inquisitive, reflective, and prepared to ask why. The biggest influence on your career and those around you is you!"

Anthony Carr
Production Team Leader , Dispensary and Granulation

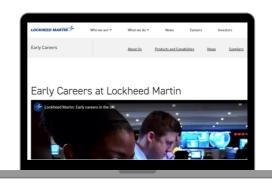




#### https://uk.leonardo.com/en/people-careers/apprenticeships





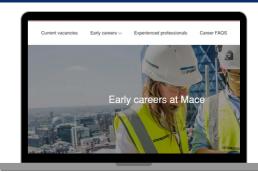


#### https://www.lockheedmartin.com/en-gb/careers/early-careers.html

"I never liked the idea of going to university as didn't believe that was the right learning path for me. Starting my apprenticeship meant I still went to college to gain both practical and theoretical knowledge, whilst then applying it at work. The Apprenticeship allowed me to work with many teams both internally and externally building my communication and organisational skills."

Becky Richards
Test Engineering Apprentice

# mace



#### https://careers.macegroup.com/gb/en/early-careers



After leaving College I knew I didn't want to spend another three years behind a desk. Being able to spend one day learning at University, then applying that immediately at work really was the perfect blend!

Joe Bowden

Mace Group Ltd





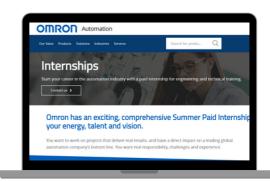
#### https://academy.healthierfuture.org.uk/jobs-and-apprenticeships



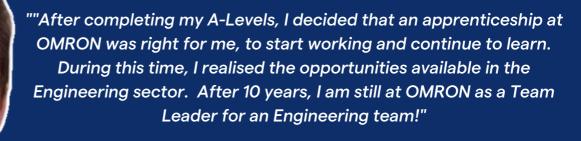
"I started working as a Health Care Assistant (HCA) at Warren Court's Forensic Unit and it was a role that I was really passionate about. During my time there I gained considerable experience and expertise and felt it was time to take the next step. When my supervisor, encouraged me to apply to join HPFT's new Nursing Associate Programme I jumped at the chance!"

Ian Costello, Fully Registered Nursing Associate in the Learning Disability and Forensic Service at HPFT

# OMRON



#### https://careers.omron.com/



George Brown





#### https://www.oxinst.com/apprenticeships



"My apprenticeship enabled me to gain valuable work experience alongside studying. I was able to work in a number of different departments gaining experience in how a business works and enabling me to identify what I enjoyed most, and where I wanted to develop my career. The real life experiences my apprenticeship gave me in manufacturing and systems integration were key to me being promoted to Senior Mechanical Design Engineer at the age of 26, much younger than many people who choose the University route into mechanical design."

Grace Munday
Senior Mechanical Design Engineer





### https://careers.premierfoods.co.uk/



"Being able to work and gain valuable experience, while studying is a fantastic way to build a career. Students can share hands on applied knowledge and develop together. I have been able to take this knowledge around the world, developing sustainable and ethical food supply chains. And we never stop learning "

Conan Fryer





### https://recruitment.raf.mod.uk/apprenticeships

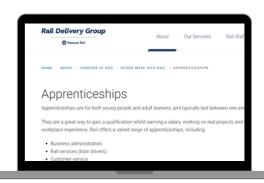


"In my 30's I was too old for a regular apprenticeship but then I realised I could do computing apprenticeship with the Royal Air Force! Five years on and I have completed my apprenticeship and I love being part of the military. I'm on my second posting, working at Air Command and looking after the RAF website."

Catherine Brady

Cyberspace Communications Specialist, Royal Air Force



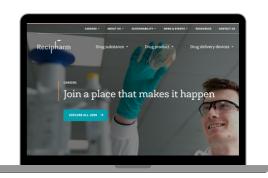


#### www.raildeliverygroup.com/about-us/careers/ways-into-rail/apprenticeships.html

"Completing an apprenticeship in rolling stock (train) maintenance put me in a position where I understood the different functions of not only the train but the entire railway system and this allowed me to apply the theory often discussed in STEM subjects (Maths and Physics in my case). I'm now a Principal Electrical Engineer for the Railway Safety and Standards Board and would not be in this position, or a Chartered Engineer, if it wasn't for my apprenticeship."

Darren Fitzgerald
Principal Electrical and Systems RST Engineer





### https://www.recipharm.com/careers



"Working within the lab at Bespak, age 22, I completed a Level 5 HND in Analytical Chemistry with CSR and became shortly promoted to Principal Analytical Technician. Apprenticeships can apply to you at any point in your professional career journey, you just have to seek the opportunity."

Lauren Williams

Quality Assurance Investigator





#### https://careers.roche.com/global/en/early-careers-uk-generationext-apprenticeships

"I am an Apprentice Data Scientist at Roche Products Ltd based in Welwyn. Throughout exam pressures I began to contemplate my future and whether I actually wanted to go to university. I kept an open mind and explored alternatives. So in the end, despite having offers from what I believed to be my dream degree I ended up turning it down for this opportunity. I have no regrets. Working for Roche has expanded my horizons and filled me with the confidence to achieve my full potential. I am beyond grateful for the privilege to learn the way that suits me. I am excited to build my own future."

Saad Ahammed Bin Huda Apprentice Data Scientist





https://www.sanger.ac.uk/about/careers/early-careers-apprenticeships/



"Unable to study science A Levels, I initially studied part-time for a CertHE in Natural Sciences with the Open University. This qualified me to join the Wellcome Sanger Institute as a bioscience degree apprentice, where I contribute to ground-breaking research using stem cells, neurons, and organoids to model diseases."

Lucy Holland Research Assistant





https://tarmaccareers.com/early-careers/apprentices-and-higher-apprentices/



"I started off as a Sixth form drop out without any career prospects and fortunatley was employed on an apprenticeship scheme with TARMAC at the age of 17. 7 years later I am a fully qualified site manager and am 1 month away from completing my civil engineering degree which I have been doing part time through TARMAC."

Matthew Simpson
Site Agent





#### https://www.thalesgroup.com/en/europe/united-kingdom/career/apprenticeships



"After a 42 year career it is interesting to reflect on how my choice to do an apprenticeship over university has shaped that pathway. At the time computers were new technology and an apprenticeship allowed for a more practical approach, much more suited to my way of learning The apprenticeship in Electronic Engineering has created wonderful opportunities during my career to work as both an engineer on some amazing projects and also in leadership roles working in a global technology company. An Apprenticeship is a rewarding entry point to enjoy a challenging and varied career!"

Trevor Rolfe
Deployment & Services Director

# Thermo Fisher S C I E N T I F I C



### https://jobs.thermofisher.com/global/en/students-new-grads



"University did not feel like the path for me so I searched for apprenticeships and was guided to the Government Apprenticeships website and I came across a company called PPD where they were looking for an Apprentice Finance Assistant to study and become a qualified accountant. Without any knowledge of the Clinical Research Organisations I decided to apply to this role as I truly believed in the companies missions statement. 24 months after completing the apprenticeship program I got promoted to an Associate Operations Finance Analyst and now I manage my own portfolio of complex Biotech studies."

Marcia Amaral Cardoso, Assoc. Operations Finance Analyst





#### https://careers.ukpowernetworks.co.uk/go/Apprentices/4279400/



"At 20 I realised I was on the wrong career path and electrical engineering was the way for me, so I undertook a level 3 craft apprenticeship as a cable jointer. After a few years' experience I decided I wanted to become an engineer and undertook a level 4 apprenticeship, which got me to where I am today. It's never too late!"

Rachael Dean
Connections Field Engineer





### https://careers.unilever.com/uk-apprenticeships



After finishing sixth form, my career with Unilever started in 2017, when I joined as a Foods Professional degree apprentice as part of the Research & Development team. This was a great start to my career and helped to accelerate my growth through exposure to different roles and functions during rotations as a Formulator, Product Developer and Process Engineer, all complimented by the completion of my degree studies in parallel (BSc in Foods Science & Technology). These rotations not only allowed me to grow but they allowed me to discover the area of work that interested me the most. This led to me securing a permanent role as a Process Engineer, prior to the completion of my apprenticeship and has supported my progression into my current role as a Senior Process Development Engineer for Ben & Jerry's. It is always great to see products I have worked on the in the supermarket freezers! I recommend the apprenticeship route to everyone hoping to further their education whilst setting up strong foundations for their future career!

Abigail Davidson
Senior Process Development Engineer





### www.apprenticeships.admin.cam.ac.uk



"I would advise anyone who is unsure about where to go next to seriously consider an apprenticeship. There are so many out there and it is a way to get qualifications whilst gaining invaluable experience. 5 years later, I still work for the University and have been able to progress through 2 roles."

> James Christley Network Specialist



If you are considering an Apprenticeship please visit the company websites listed to view the application dates and available positions.









### **Free Educator Resources**

# Most of the apprentices featured in this booklet are STEM Ambassadors.

Our STEM Ambassadors are exceptional individuals! They are a mix of professionals from across industry, who are willing to work with young people, to inspire them, which can serve as a stepping stone to their future careers.

Connecting young people with STEM industry experts; STEM Ambassadors help to bring STEM subjects alive and provide real-life examples of industry careers, creating an invaluable link between schools and industry. For the last 20 years, they have been an incredible resource to schools, colleges and communities across the UK and can be requested to support STEM skills across the curriculum and cross-curricular work

Teachers/ group leaders: find a STEM Ambassador for your activity

Sign in at www.stem.org.uk/ dashboard



Select 'Advertise an activity' in the menu on your online dashboard, fill in the details and publish your activity



STEM Ambassadors will express an interest in your activity and you can offer them a place



Once the STEM
Ambassador has
accepted, click confirm
and communicate
through the integrated
messaging tool to
arrange the details
for your activity









Give us feedback

**START** 

STEP 1

STEP 2

STEP 3

STEP 4

STEP 5

STEP 6

# www.stem.org.uk



### STEM Community

STEM Community is a friendly, supportive network of more than 19,000 teachers and technicians. Featuring exclusive events, subject-specific groups, lively debates and topical news, you can't afford to miss out. It's free to join. It uses the same login details as your STEM Learning website account if you already have one. If not, it's quick and easy to register.

Find out more