

*Jake, Reuben Scholar and former Ark Putney Academy student, is studying Astrophysics at University College London. This summer, Jake moved to Pasadena, California to work at NASA's Jet Propulsion Laboratory. NASA JPL is the leading centre in America for the robotic exploration of the solar system. Here Jake talks about this incredible experience and looks back on how his school and scholarship helped make this possible.*



I chose to study Astrophysics at UCL because I'm fascinated by the universe and space. There are so many things we don't know yet, especially in exoplanetary science – which is the study of planets outside of our solar system. It's so exciting knowing that studying the atmosphere of these planets could lead to the detection of 'biosignatures' - or signs of life.

This summer, I realised a life-long ambition to work for NASA. I was fortunate to be accepted onto a summer placement as a research intern for Caltech - the California Institute of Technology. I was part of two teams throughout my placement, the Geological and Planetary Science division at Caltech and NASA's Jet Propulsion Laboratory.

This was one of the best experiences of my life – although it was a bit of a shock having to leave the campus at 7:30 am every day and starting work straight away. However, it was truly worth it because I worked with incredible people and gained knowledge in an area I wouldn't have learned at university.

I also developed skills in coding, public speaking and networking, and now know for sure that this is the industry that I want to work in. I have even made plans to collaborate again with some of the people I've met, which will hopefully open doors in the future.

I don't think I would have been able to take part in such an experience if it wasn't for the Reuben Scholarship. I was awarded the scholarship through my old school, Ark Putney Academy, to help cover my living costs at university. If I didn't have the scholarship I would have to take up a part-time job, which would mean I have less time to study, less time to apply for summer placements or take part in societies - I would miss out on most of the university experience.



*Jake, in front of the Mars Curiosity Test Rover*

I remember telling my school when I was 18 that I wanted to work for a space agency and I'm amazed that I've achieved that only a few years later. It really shows what is possible when you put your mind to it. That's something that was instilled in me when I was at school - the teachers at Ark Putney were so supportive and encouraged us all to aim high.

After graduation I plan on doing a PhD in Physics or Astronomy, focusing on exoplanets. I'm still unsure about the specific pathway but that's the fun with trying new things and seeing if it suits you. If I could give any advice to students, I would say do what makes you happy and what you enjoy. It doesn't matter if you aren't the best at it, the fact that you enjoy it means that you will try harder, work harder and spend more time trying to learn. I still struggle to with my subject all the time but because I enjoy it, I persevere. Keep trying and you too could be working at NASA!