

**Project 18.32:** PROSPECTing for lunar water: sample camera for a Moon lander

**Company:** The Open University

**Supervisor:** Simeon Barber

**Location:** Milton Keynes

**Company Description:** The Open University is an internationally recognised research leader in planetary and space sciences and the development of space instrumentation. Covering a wide range of disciplines from astrobiology to electrical engineering, geochemistry to quantum physics; and technologies from electronic imaging to remote sensing, mass spectroscopy to novel sensors; Open University researchers are often found in key roles in international space science missions such as Rosetta, ExoMars, Euclid, JUICE and Athena; with much of the activities performed in collaboration with Space Agencies, Universities and companies around the World. This research also informs our world-leading teaching in the Physical Sciences, Engineering and Earth and Environmental Sciences.

**Project Description:** PROSPECT is a sample drilling and analysis package being developed by the European Space Agency to search for water ice and other useful resources on the Moon. The student will join the Open University team developing this mini science laboratory as part of the ESA-Russia Luna-27 mission (due for launch in 2022). More mission info at: <http://exploration.esa.int/moon/59102-about-prospect/> and [www.spacelabslive.com](http://www.spacelabslive.com)

Intern responsibilities:

- testing our prototype microscope for imaging samples on the Moon
- preparing, processing and imaging a suite of lunar analogues and real lunar samples
- creating an archive of scientifically useful and visually attractive images and graphics
- scientific analysis and reporting of the data

The project offers the applicant:

- a role in the development of a world-leading analytical instrument for a new space mission
- experience in handling rare and valuable samples
- the chance to work both analytically and creatively with scientific data

**Applicant Specification:** This internship would suit a keen and enthusiastic individual with a background in Physics, Chemistry, Engineering or Earth/Planetary/Environmental Sciences, who is looking to gain experience in the field of space instrumentation.

**Preferred Additional Requirements:** Practical skills in working with scientific instruments and/or samples would be an asset as well as an interest and aptitude in imaging, photography or data visualisation.



**Further details:**

8 weeks minimum fixed term contract to be agreed with successful candidate but nominally with a start date of 18 June 2018. Salary is £1,500 per calendar month.

**Closing Date for Applications: 12 noon, Tuesday 5 June 2018**

Applications should be made through the online form attaching a CV, before the closing date. Please note that elements of the form left incomplete will be deemed to render the application ineligible. They will be checked for eligibility and forwarded to the employer.

**Apply here:** <https://sa.catapult.org.uk/people/space-placements-industry-spin/>