



THE CLIENT

University of Exeter School of Physics – their research encompasses a broad range of experimental, computational and theoretical physics, with research groups in acoustic and electromagnetic materials, quantum systems and nanomaterials, biomedical physics and astrophysics.

THE STORY

The University of Exeter School of Physics has set up a research centre for research into Graphene-based products and applications.

An existing laboratory space was converted into a suite of cleanrooms. Some existing walls were demolished, new doorways generated. The cleanrooms were then fitted out using a steel partition system, walk-on ceiling, vinyl flooring with a fully equipped changing room.

The facility was designed as



Research &
Development



Class 5 & 6



125m²

£500k

Project Value



Exeter

ISO class 5 and 6 with localised ISO class 5 laminar flow wet benches. Wet benches were custom designed to provide processing areas for acid and solvent-based processes. The benches were fitted out to the university's specific requirements and incorporated safety features such as eye washes and extract alarms.

A range of piped gas services were incorporated into the design mainly from bottle-stored gases. The compressed air was provided by a dedicated compressor and dryer. The compressor also fed a nitrogen generator to eliminate the need for bottled nitrogen. The rooms were fitted out with cleanroom benching, cupboard units, small power and 3-phase power in all work areas.

Continued on page two

“They designed and built a first class facility”

David Anderson, Cleanroom Manager at the centre, said: “Cleanroom Solutions understood our requirements; they designed and built a first class facility with which we are very pleased. They demonstrated high levels of flexibility and commitment throughout the project, overcoming any challenges put before them.”

David Anderson
Cleanroom Manager

UNIVERSITY OF
EXETER



GRAPHENE RESEARCH CENTRE



Cleanroom
solutions

CLIENT CASE STUDY

Contact Us

🏠 Unit C The Brocks,
Homefield Rd,
Haverhill, CB9 8QP

☎ 0330 113 0303

✉ sales@guardtech.com

🌐 www.cleanroom-solutions.co.uk



Continued from page one

A specially designed steel frame supported the air conditioning equipment with support stubs penetrating the roof to structural walls. Due to the close control ($\pm 0.2^\circ\text{C}$) a chiller was chosen to provide cooling. The control system was incorporated into the university BMS system.



THE RESULT

David Anderson, Cleanroom Manager at the centre, said: "Cleanroom Solutions understood our requirements; they designed and built a first class facility with which we are very pleased. They demonstrated high levels of flexibility and commitment throughout the project, overcoming any challenges put before them."

[For a 360° virtual tour click here](#)

