

Case Study

Protecting *business critical* laboratory equipment

Insite Group - March 2025



Project Overview

Location | Pharmaceutical, UK.

Challenge | A leading pharmaceutical company required a complete power protection solution for critical laboratory equipment.

Critical Load | Laboratory equipment.

Solution | With extensive experience and unrivalled product knowledge, KUP provided an integrated UPS solutions including a generator to account for any power loss.

Background

KOHLER Uninterruptible Power (KUP) was selected to provide an uninterruptible power supply and generator for essential laboratory equipment for a leading pharmaceutical organisation.

KUP worked on the project alongside the main construction contractor Insite Group – established in 2004 they specialise in construction services to provide a complete, holistic contracting service. Insite Group ensure every aspect of the client's needs are met and exceeded.

Challenge

The pharmaceutical organisation needed to find a solution to protect valuable research and equipment in the event of a power outage. After all information was obtained from Insite Group and the end user, KUP was able to recommend a suitable solution for complete critical power protection.

Rob Taylor, KUP Director – Hardware Sales, comments: "After a rigorous selection process to meet the customer's requirements, we put forward a KOHLER PW 9250DPA 300 kW working in conjunction with a KOHLER SMD0 V500C2 500kVA generator.

He continues: "The safest, most reliable and ultimately most cost-effective way of specifying and achieving a well-matched generator and UPS power supply pair is to discuss your requirements with a UPS supplier that has the experience and the products to assemble the right package. We supply both uninterruptible power supplies and backup generators and through many years of experience, we are very well placed to bring them together into integrated UPS solutions with assured inter-operability."



Solution

The KOHLER PW 9250DPA is a true modular uninterruptible power supply, scalable from 50 kW up to 1.5MW, for power applications in critical, high density computing environments, such as pharmaceutical facilities.

This UPS works with a KOHLER SMDO V500C2 500kVA generator, a high performance three-phase standby diesel generator with an industry leading Volvo engine.

UPS ensure power quality while the mains supply is available and provide emergency power supply backup from their energy storage resource when it isn't. One inevitable problem with energy storage, typically provided by lead-acid VRLA batteries, is that its capacity is always finite.

While extra UPS battery banks can increase capacity, the risk of an extended blackout exceeding this cannot be eliminated. Accordingly, with business-critical applications such as pharmaceutical, where even a short shutdown is not an option, generators can complement its UPS.

Unlike UPS batteries, standby generators can support the critical load through any length of blackout, provided they are adequately fuelled and maintained. However, there is a range of electrical and mechanical factors to consider when pairing a backup generator system and UPS power supplies within a secure power protection system.



Result and Impact

Scott McMillan, Group Managing Director, comments:

“KUP was selected as our partner because of its excellent reputation, product performance and quality of customer service. A power outage would have had incredibly damaging implications as it will require items to be re-validated, taking several weeks and potentially costing thousands in lost revenue.”

PM: Rob Taylor, KUP Director – Hardware Sales

Client: Scott McMillan, Group Managing Director, Insite Group

If you are looking for a sales and service solution for your power protection equipment, please get in touch with our team at uksales.ups@kohler.com