

CASE STUDY: MEDICAL GAS VACUUM PLANT REPLACEMENT

Norfolk and Norwich University Hospitals

This 1,200 bed teaching hospital with state-of-the-art facilities provides care to a population of around one million people from Norfolk, neighbouring counties and further afield.

During 2022, three medical gas vacuum plants had reached the end of their working life and needed replacing.

The challenge was the medical gas vacuum plants were situated in three separate locations on site, and disruption to service and down-time needed to be avoided. SHJ won the tender due to two key factors:

- SHJ offers a 'lifting and shifting' solution which eliminates the need for cranes - significantly reducing operational costs and disruption to the site.
- SHJ utilizes own-manufactured temporary vacuum pump units which supply the hospital with medical gases whilst the new vacuum plants are being installed, eliminating any shut down time for the hospital.

All three installations were performed over a period of 3 months, at an agreed schedule of 1 vacuum plant per month. Weekend installations were preferred which mitigates clinical risk to the hospital, and is SHJ's priority for this type of large vacuum plant installation.

SHJ liaised with site managers, Serco Health, to carefully plan each installation with day 1 for location of plant, day 2 for installation and running of temporary plant, and day 3 for rip-out and installation of new plant.

The job was successfully completed utilizing 5 SHJ staff and approximately 45 man days of work.



SHJ temporary plant, which keeps hospitals fully supplied with medical gases during installations.

“ SHJ tendered for the lifecycle replacement of 3 Large Vacuum plants here at the NNUH. The design, planning and installation were all very professional, the best of all, they gave me the option of backing up the Vacuum supply to the hospital during each install with temporary Vacuum systems. Patients didn't even know we were undertaking a major plant replacement – exceptional.”

Alan Parkins, Senior Authorised Person,
MGPS, Serco Health