

# CASE STUDY

## NTN-SNR

## LUBER READY HEAVY DUTY+



**ORBIC**  
ENGINEERING SOLUTIONS



OES201

# OVERVIEW

A major NHS hospital in the South East operates multiple theatre suites requiring strict environmental control. Each operating theatre relies on dedicated Air Handling Units (AHUs) to maintain sterile air pressure, temperature and filtration standards.

These AHUs run continuously, 24/7, with fan motors and bearing assemblies critical to maintaining uninterrupted airflow. Any unexpected failure risks theatre downtime, cancelled procedures, and patient care disruption.

The hospital's facilities maintenance team partnered with Orbic Engineering Solutions to improve the reliability and maintenance efficiency of these systems.



## THE CHALLENGE

Routine maintenance inspections identified recurring issues with fan shaft bearings within several AHU units:

- Bearings operating continuously under load
- Inconsistent manual lubrication intervals
- Limited access to lubrication points due to AHU enclosure design
- Risk of over or under-lubrication from manual greasing
- Increasing labour time required for routine preventative maintenance

Manual lubrication required isolating AHU units and opening access panels, which increased maintenance time and risk of contamination.

In critical healthcare environments, consistency and reliability are essential.

# OUR SOLUTION

Orbic supplied and implemented the NTN-SNR LUBER READY HEAVY DUTY+ automatic lubricator across multiple AHU bearing locations. This electrochemical single-point lubricator delivers precise, controlled grease discharge over a defined period, ensuring continuous lubrication without manual intervention.

Key features include:

- Adjustable lubrication periods from 1 to 12 months for predictable maintenance scheduling
- Continuous, controlled grease delivery to prevent lubrication-related bearing failures
- Compact design suitable for confined or difficult-to-access locations
- Heavy Duty+ grease providing excellent resistance to heavy loads, wear, and moisture
- IP-rated and reliable in humid or contaminated environments typical of HVAC systems

The units were fitted directly to bearing housings and configured for six-month discharge intervals aligned with planned maintenance schedules.

Orbic worked directly with the hospital's maintenance engineers to:

- Assess AHU lubrication points and operating conditions
- Specify correct lubricator type and discharge period
- Supply and install lubricators across multiple theatre AHUs
- Provide guidance on replacement intervals and ongoing management

Installation required no system modification and was completed during planned maintenance windows.

## OUTCOME

- ✔ Improved Equipment Reliability
- ✔ Reduced Maintenance Time
- ✔ Lower Risk of Theatre Downtime
- ✔ Improved Maintenance Efficiency
- ✔ Extended Bearing Service Life