Wärtsilä Propulsion condition monitoring service

To successfully manage a fleet, risks must be assessed – including the condition of propulsion equipment. As propulsion machinery is largely mounted underwater, it cannot be physically examined internally without going into dry dock. The Wärtsilä Propulsion condition monitoring service (PCMS) is class-approved and eliminates the need to enter a dry dock for visual inspections. The service provides you with up-to-date and in-depth information about the condition of your vessel’s propulsion equipment.

**SOLUTION DESCRIPTION**
The Wärtsilä Propulsion condition monitoring service provides you with real-time advice and regular reports about the condition of your machinery. With PCMS you can improve your vessel’s availability, reliability and profitability, while reducing risks and maintenance costs.

PCMS measures vibrations and oil condition in order to effectively monitor gears, bearings, the propeller and other propulsion equipment components. The service also gathers operational parameters from the propulsion control system.

**KEY BENEFITS**
- Base operational decisions on the actual condition of your equipment
- Maximise the availability of your vessel by performing overhauls only when needed
- Reduce the likelihood of breakdowns by being proactively informed of faults
- Reduce the total cost of ownership and maximise profitability
- Increase the lifetime of your equipment and preserve its condition by getting feedback on the factors generating excess wear
Delivery includes:

- Wärtsilä PCMS hardware to measure and monitor your equipment condition
- Interface to the propulsion control system for operational parameters
- A report including findings and recommendations is delivered on a monthly basis
- Execution of vibration and operational data analysis – every day when daily follow up is included in the scope, otherwise on a monthly basis during preparation of the report

WHY CHOOSE WÄRTSILÄ?

Wärtsilä is recognised as a condition monitoring service supplier by three of the major classification societies: the American Bureau of Shipping, Lloyd’s Register and DNV-GL. These classification societies have acknowledged that Wärtsilä PCMS can determine the condition of propulsion equipment without visual internal inspections and detect potential failures weeks, or even months, in advance.

SCOPE OF SUPPLY

PCMS can be installed on all kinds of vessels and is available for the following Wärtsilä and non-Wärtsilä propulsion or rotating equipment:

- Transverse thrusters
- Steerable thrusters
- Electric pods
- Controllable pitch propellers and gearboxes
- Water jets
- Rotating equipment (pumps etc.)