



JPS Reliability

A Reliable Plant is a Profitable Plant

PROfessional services for **PRO**active maintenance

INTRODUCTION



Do you have?

- Unpredicted faults
- Inadequate Reliability
- Repeat failures
- Unexplained Machine Issues

Leading to

- Emergency breakdown maintenance
- High maintenance cost
- Poor use of available labour
- Loss of production or increased cost per hour

JPS provide

- Improved functionality and efficiency
- Address repeat failures
- Improved maintenance practice
- Maintenance planning

WHAT IS CONDITION MONITORING



In general, Condition Monitoring is periodic or continuous measurements of conditional parameters (Predictor and/or Indicator), collected during normal operation that determines the physical state of an item or system without disturbance.

The objective of the Condition Monitoring technique(s) is to provide information with respect to the actual condition of the system and any change in that condition, based on known data. (This could be manufacturer's specification or recorded monitoring data).

This information is used to schedule Conditional Maintenance tasks on an as needed basis (instead of relying on predetermined intervals).

The selection of the Condition Monitoring technique(s) depends on the criticality, failure mechanisms, type of equipment used and, importantly on economic and safety consequences.



WHAT WE DO



Enhance system reliability through Condition Monitoring technique(s) by applying health-based maintenance



Improve machine and system functionability - keep production running for longer



Determine failure mechanisms of the system - then derive their associated Relevant Condition Predictor(s)



Apply Condition Monitoring strategies and technologies that will indicate the condition and performance of the system(s)



Drive the maintenance task and planned interval(s). Review performance.

HOW WE CAN HELP YOU



When a client requires support with or development of Health Based Maintenance we work in partnership.

Upskill your internal workforce in

- Ultrasound Airborne and Structural Borne
- Infrared Thermography-Low Voltage, Mechanical and Process
- Vibration Analysis
- General Maintenance Practices
- Practical Reliability Engineering

Contracted Reliability Services

- Contemporary Condition Monitoring consultancy to assist clients with the management of their Health Based Maintenance program

TECHNOLOGIES AND SERVICES

Vibration Analysis

- Unbalance
- Looseness
- Resonance
- Pump issues
- Gear faults/wear
- Inadequate lubrication
- Bearings
- Steam traps/valves

Lubrication

- Gear faults/wear
- Wrong oil/mixed
- Oil degradation
- Contamination
- Fuel dilution
- Leaking seals
- Bearings
- Overheating

Thermography

- Bearings
- Overheating
- Steam traps/valves
- Flammable gas leaks
- HV issues
- Electrical wiring faults
- Heat exchanger blockage
- Refractory applications

Ultrasound

- Inadequate lubrication
- Steam traps/valves
- Bearings
- Flammable gas / air leaks
- HV issues
- Corona discharge arcing
- Heat exchanger tubes/plate

ABOUT US



Over 40 years' combined experience in the fields of Condition Monitoring, Practical Reliability Engineering and Maintenance Practices.

Worked with many of the Blue-Chip companies in the UK and Australia.

Our experiences ranges from Lubrication, Thermal Imaging, Vibration Analysis, Ultrasound, NDT, Maintenance Planning, Maintenance Improvements, Project Management and Mechanical Maintenance including on-site Dynamic Balancing and Laser Alignment.

We are qualified to ISO 18436-2 VA Level 3, ISO 18436-4 LM Level 2, ASNT-SN-TC-IA IRT Level 2, ASNT-SN-TC-IA UT Airborne Level I & Asset Reliability Practitioner Category I (ARP).

Registered with Engineers Australia in the Mechanical College, Engineering Council UK as Engineering Technician and with the British Institute for Non-Destructive Testing as an Associate Member.

Author of “ [Enhanced System Reliability Through Vibration Technology](https://theseasonedanalyst.guru)” ISBN 978-1-5272-5386-5 (<https://theseasonedanalyst.guru>).

CONTACT US



info@jpsreliability.com



<https://jpsreliability.com>



07387 986 454