

HP090 TURBINE STAGE UPGRADES

Benefits

- › Improved turbine efficiency, leading to increase in exhaust waste gate margin
- › Increased engine operating range
- › Can be done in conjunction with or separately of a compressor stage upgrade.
- › Improved turbine efficiency can be utilized to reduce engine emissions.

Upgrade summary

- › Optimized turbine matching to your application for maximum performance
- › New turbine broach angle design for increased efficiency and optimal flow angles

Interchangeability

- › Upon completing the turbine stage upgrade the turbocharger is completely interchangeable with the existing turbocharger's connection to the engine



HP090 THERMOCOUPLE EQUIPPED THRUST BEARING UPGRADE

Benefits

- › Monitoring of thrust bearing temperature may allow for the detection of lubrication issues prior to a bearing failure
- › The existing eutectic device only allows for the unit to be shut down after thrust bearing failure has already occurred
- › Can be done in conjunction with or separately of a compressor stage upgrade.

Upgrade summary

- › New thrust bearing equipped with a thermocouple is installed
- › Thermocouple lead exits the oil drain cavity and must be routed out of the lube oil drain line to the point of termination
- › The lube oil drain line must be modified to facilitate the installation of a seal where the thermocouple lead exits the drain line
- › Thrust bearing wear detection from eutectic device can be utilized in conjunction with the thermocouple as long as a compressor stage upgrade is not done at the same time

Interchangeability

- › Upon completing the thermocouple bearing upgrade, the turbocharger is completely interchangeable with the existing turbocharger other than the need to make the following changes:
 - Modifications required to facilitate the installation of the thermocouple which include modifying to oil drain line for a seal

LEGENDS DON'T STOP. WE MAKE SURE OF IT.™

CALL +1-844-RECIP-43 (INTERNATIONAL: +1-713-354-1299)
24/7 TECH SUPPORT: SUPPORT@COOPERSERVICES.COM
COOPERSERVICES.COM

