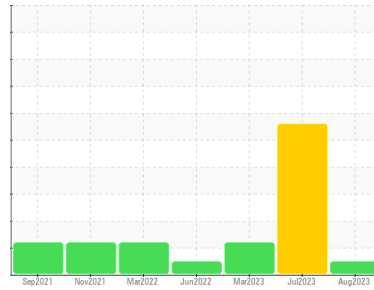




OIL ANALYSIS REPORT

Sample Rating Trend



NORMAL



Machine Id
MHTF_A5B MHTF_A5B_MOTOR

Component
Upper Bearing

Fluid
ROYAL PURPLE SYNFILM GT 32 (--- GAL)

DIAGNOSIS

Recommendation

Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

The water content is negligible. There is no indication of any contamination in the oil.

Fluid Condition

The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

SAMPLE INFORMATION

| method | limit/base | current | history1 | history2 |
|---------------|-------------|--------------------|-------------|-------------|
| Sample Number | Client Info | RP0027175 | RP0027457 | RP0012674 |
| Sample Date | Client Info | 11 Aug 2023 | 07 Jul 2023 | 12 Mar 2023 |
| Machine Age | hrs | Client Info | 0 | 0 |
| Oil Age | hrs | Client Info | 0 | 0 |
| Oil Changed | Client Info | N/A | N/A | N/A |
| Sample Status | | NORMAL | SEVERE | ABNORMAL |

WEAR METALS

| method | limit/base | current | history1 | history2 | |
|----------|------------|-----------------|--------------|----------|----|
| Iron | ppm | ASTM D5185m >20 | 3 | 5 | 4 |
| Chromium | ppm | ASTM D5185m >20 | 0 | 0 | 0 |
| Nickel | ppm | ASTM D5185m >20 | 0 | <1 | 0 |
| Titanium | ppm | ASTM D5185m | 0 | 0 | 0 |
| Silver | ppm | ASTM D5185m | 0 | 0 | 0 |
| Aluminum | ppm | ASTM D5185m >20 | <1 | <1 | <1 |
| Lead | ppm | ASTM D5185m >20 | 4 | 7 | 2 |
| Copper | ppm | ASTM D5185m >20 | 10 | ▲ 20 | 7 |
| Tin | ppm | ASTM D5185m >20 | 0 | 0 | 0 |
| Vanadium | ppm | ASTM D5185m | 0 | 0 | 0 |
| Cadmium | ppm | ASTM D5185m | 0 | 0 | 0 |

ADDITIVES

| method | limit/base | current | history1 | history2 | |
|------------|------------|-------------|--------------|----------|----|
| Boron | ppm | ASTM D5185m | 0 | 0 | 0 |
| Barium | ppm | ASTM D5185m | 0 | 2 | 2 |
| Molybdenum | ppm | ASTM D5185m | 0 | 0 | 0 |
| Manganese | ppm | ASTM D5185m | <1 | 0 | 0 |
| Magnesium | ppm | ASTM D5185m | 8 | 2 | 1 |
| Calcium | ppm | ASTM D5185m | 0 | 0 | 0 |
| Phosphorus | ppm | ASTM D5185m | 4 | 5 | 6 |
| Zinc | ppm | ASTM D5185m | 8 | 21 | 16 |

CONTAMINANTS

| method | limit/base | current | history1 | history2 | |
|-----------|------------|-----------------|--------------|----------|-------|
| Silicon | ppm | ASTM D5185m >15 | 6 | ◆ 74 | 10 |
| Sodium | ppm | ASTM D5185m | <1 | 0 | 0 |
| Potassium | ppm | ASTM D5185m >20 | 1 | <1 | <1 |
| Water | % | ASTM D6304 >2 | 0.003 | 0.005 | 0.007 |
| ppm Water | ppm | ASTM D6304 | 27.3 | 52.7 | 79.5 |

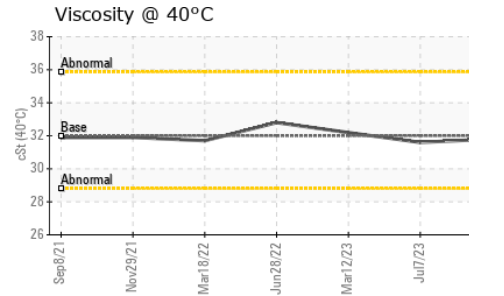
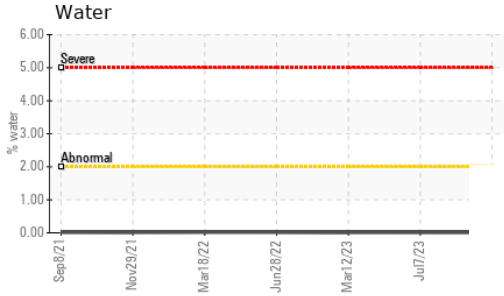
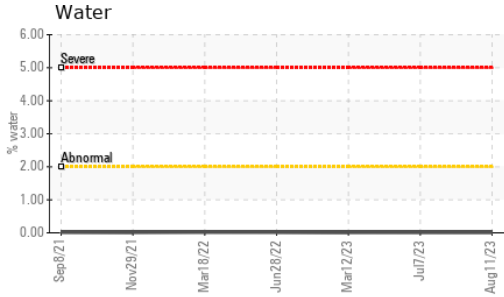
FLUID DEGRADATION

| method | limit/base | current | history1 | history2 | |
|------------------|------------|------------|-------------|----------|-------|
| Acid Number (AN) | mg KOH/g | ASTM D8045 | 0.48 | 0.535 | 0.458 |

VISUAL

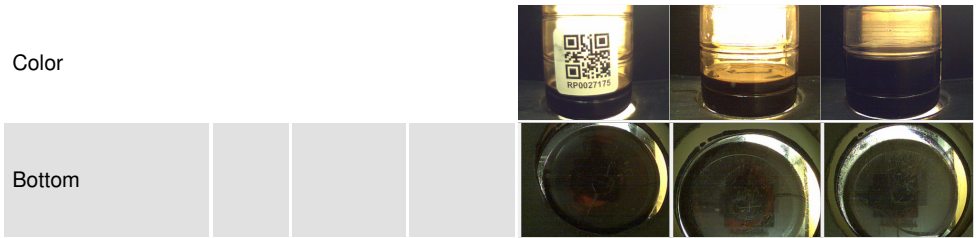
| method | limit/base | current | history1 | history2 | |
|------------------|------------|---------------|--------------|----------|-----------------|
| White Metal | scalar | *Visual NONE | NONE | NONE | ▲ MODER |
| Yellow Metal | scalar | *Visual NONE | NONE | NONE | NONE |
| Precipitate | scalar | *Visual NONE | NONE | NONE | NONE |
| Silt | scalar | *Visual NONE | NONE | NONE | NONE |
| Debris | scalar | *Visual NONE | NONE | NONE | NONE |
| Sand/Dirt | scalar | *Visual NONE | NONE | NONE | NONE |
| Appearance | scalar | *Visual NORML | NORML | NORML | NORML |
| Odor | scalar | *Visual NORML | NORML | NORML | NORML |
| Emulsified Water | scalar | *Visual >2 | NEG | NEG | NEG |
| Free Water | scalar | *Visual | NEG | mitt | ED: Christopher |

OIL ANALYSIS REPORT

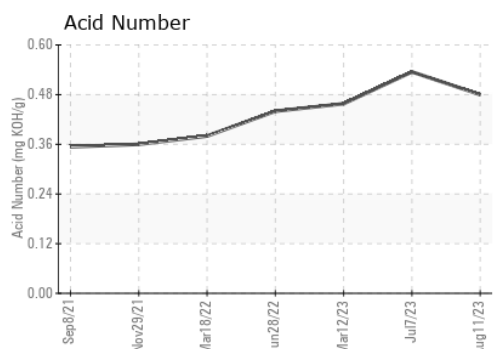
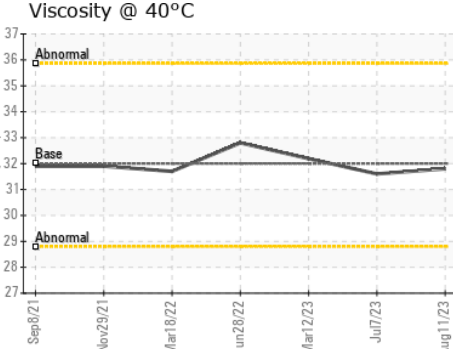
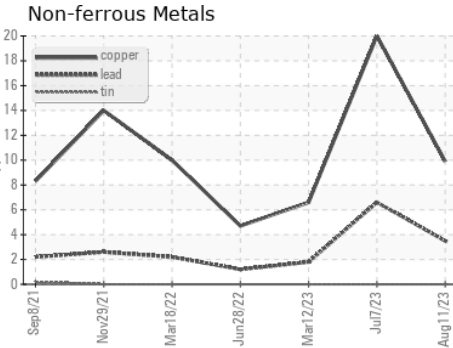
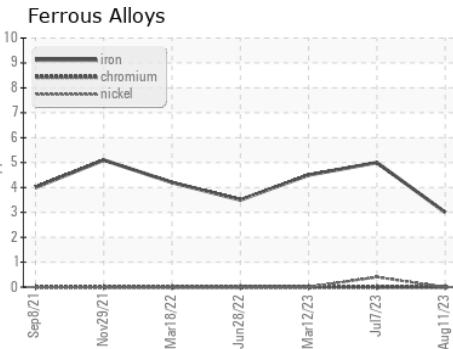


| FLUID PROPERTIES | | method | limit/base | current | history1 | history2 |
|------------------|-----|-----------|------------|-------------|----------|----------|
| Visc @ 40°C | cSt | ASTM D445 | 32 | 31.8 | 31.6 | 32.19 |

| SAMPLE IMAGES | | method | limit/base | current | history1 | history2 |
|---------------|--|--------|------------|---------|----------|----------|
|---------------|--|--------|------------|---------|----------|----------|



GRAPHS



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : RP0027175
Lab Number : 05924392
Unique Number : 10604339
Test Package : IND 2

ENERGY TRANSFER - MARCUS HOOK TF
 7 COMMERCE DRIVE
 ASTON, PA
 US 19014
 Contact: QUITA MORGAN

To discuss this sample report, contact Customer Service at 1-800-237-1369.

* - Denotes test methods that are outside of the ISO 17025 scope of accreditation.

Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)

T: (610)220-8386

F: