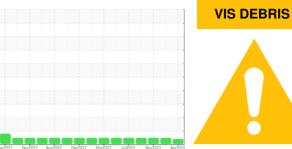


OIL ANALYSIS REPORT

Sample Rating Trend



Machine Id

GE SITE 2 HP PUMP B

Pump

ROYAL PURPLE SYNFILM GT 46 (--- QTS)

DIAGNOSIS

Recommendation

We recommend you service the filters on this component if applicable. Resample at the next service interval to monitor. We were unable to perform a particle count due to a high concentration of particles present in this sample.

All component wear rates are normal.

Contamination

Moderate concentration of visible dirt/debris present 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 WC0837914 WC0837919 WC0837818 Sample Date Client Info 25 Apr 2024 01 Jan 2024 17 Nov 20 Machine Age hrs Client Info 0 0 0 Oil Age hrs Client Info 0 0 0 Oil Changed Client Info N/A N/A N/A Sample Status ABNORMAL NORMAL NORMAL CONTAMINATION method limit/base current history1 history1 Water WC Method >.1 NEG NEG NEG WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5185m >5 0 0 0 Chromium ppm ASTM D5185m >5 0 0 <1 Nickel ppm ASTM D5185m >3 0 </th
Sample Date Client Info 25 Apr 2024 01 Jan 2024 17 Nov 20 Machine Age hrs Client Info 0 0 0 Oil Age hrs Client Info 0 0 0 Oil Changed Client Info N/A N/A N/A N/A Sample Status ABNORMAL NORMAL NORMAL NORMAL NORMAL CONTAMINATION method limit/base current history1 history1 Water WC Method >.1 NEG NEG NEG WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >3 0 <1 0 Silver ppm ASTM D5185m >7 0 0 <1
Machine Age hrs Client Info 0 0 0 Oil Age hrs Client Info 0 0 0 Oil Changed Client Info N/A N/A N/A N/A Sample Status ABNORMAL NORMAL NORMAL NORMAL NORMAL CONTAMINATION method limit/base current history1 history1 Water WC Method >.1 NEG NEG NEG WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >3 0 <1
Oil Age hrs Client Info 0 0 0 Oil Changed Client Info N/A N/A N/A Sample Status ABNORMAL NORMAL NORMAL CONTAMINATION method limit/base current history1 history1 Water WC Method >.1 NEG NEG NEG WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >3 0 <1
Oil Changed Client Info N/A N/A N/A N/A Sample Status ABNORMAL NORMAL NORMAL NORMAL CONTAMINATION method limit/base current history1 history1 Water WC Method >.1 NEG NEG NEG WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >3 0 <1 0 Silver ppm ASTM D5185m >3 0 0 <1 Aluminum ppm ASTM D5185m >7 0 0 <1
Sample Status ABNORMAL NORMAL NORMAL CONTAMINATION method limit/base current history1 history Water WC Method >.1 NEG NEG NEG WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >5 0 0 <1
CONTAMINATION method limit/base current history1 history1 Water WC Method >.1 NEG NEG NEG WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >5 0 0 <1
Water WC Method >.1 NEG NEG NEG WEAR METALS method limit/base current history1 history1 Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >5 0 0 <1 Titanium ppm ASTM D5185m >3 0 <1 0 Silver ppm ASTM D5185m >3 0 0 <1 Aluminum ppm ASTM D5185m >7 0 0 <1
WEAR METALS method limit/base current history1 history2 Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >5 0 0 <1 Titanium ppm ASTM D5185m >3 0 <1 0 Silver ppm ASTM D5185m >3 0 0 <1 Aluminum ppm ASTM D5185m >7 0 0 <1
Iron ppm ASTM D5185m >90 0 0 0 Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >5 0 0 <1
Chromium ppm ASTM D5185m >5 0 0 0 Nickel ppm ASTM D5185m >5 0 0 <1
Nickel ppm ASTM D5185m >5 0 0 <1 Titanium ppm ASTM D5185m >3 0 <1 0 Silver ppm ASTM D5185m >3 0 0 0 Aluminum ppm ASTM D5185m >7 0 0 <1
Titanium ppm ASTM D5185m >3 0 <1 0 Silver ppm ASTM D5185m >3 0 0 0 Aluminum ppm ASTM D5185m >7 0 0 <1
Silver ppm ASTM D5185m >3 0 0 0 Aluminum ppm ASTM D5185m >7 0 0 <1
Aluminum ppm ASTM D5185m >7 0 0 <1
Load North DE10Est 10 C
Lead ppm ASTM D5185m >12 0 0
Copper ppm ASTM D5185m >30 0 <1 0
Tin ppm ASTM D5185m >9 0 0 0
Vanadium ppm ASTM D5185m 0 0
Cadmium ppm ASTM D5185m 0 0 0
ADDITIVES method limit/base current history1 history
Boron ppm ASTM D5185m 0 0 0
Barium ppm ASTM D5185m 0 0 0 <1
Molybdenum ppm ASTM D5185m 0 0 0 0
Manganese ppm ASTM D5185m 0 0 <1
Magnesium ppm ASTM D5185m 95 87 84 93
Calcium ppm ASTM D5185m 0 0 0 4
Phosphorus ppm ASTM D5185m 0 0 5
Zinc ppm ASTM D5185m 0 0 0
Sulfur ppm ASTM D5185m 15000 20631 17764 17925
CONTAMINANTS method limit/base current history1 history
Silicon ppm ASTM D5185m >60 4 4 5
Sodium ppm ASTM D5185m 1 <1 <1
Potassium ppm ASTM D5185m >20 0 1
FLUID CLEANLINESS method limit/base current history1 history
Particles >4μm ASTM D7647 >5000 401 88
Particles >6μm ASTM D7647 >1300 100 30
Particles >14μm
·
Particles >21μm
·
Particles >21μm
Particles >21μm ASTM D7647 >40 2 1 Particles >38μm ASTM D7647 >10 0 0

Acid Number (AN)

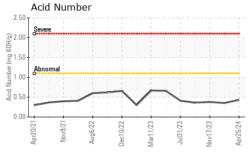
mg KOH/g ASTM D8045

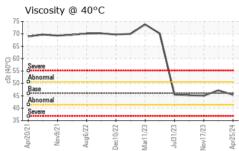
0.352

0.38



OIL ANALYSIS REPORT





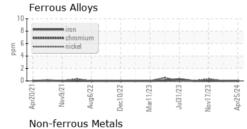
VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	▲ MODER	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>.1	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG
FLUID PROPERT	TIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	46.0	45.4	47.2	45.0
SAMPLE IMAGES		method	limit/base	current	history1	history2

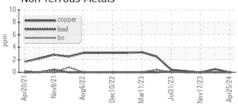
Bottom

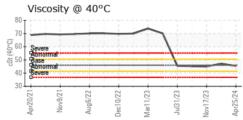
Color

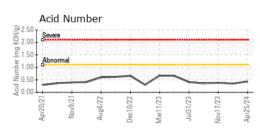


GRAPHS













Certificate 12367

Laboratory Sample No.

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 : WC0837914 Lab Number : 06161420 Unique Number : 10996843

Received **Tested** Diagnosed

: 26 Apr 2024 : 30 Apr 2024 : 30 Apr 2024 - Don Baldridge

1421 MOBIL OIL ROAD VANDERBILT, TX US 77991

HILCORP ENERGY - VANDERBILT

Contact: DEREK HARGRAVE dhargrave@hilcorp.com T: (361)284-7406

Test Package : IND 2 (Additional Tests: PrtCount) 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)