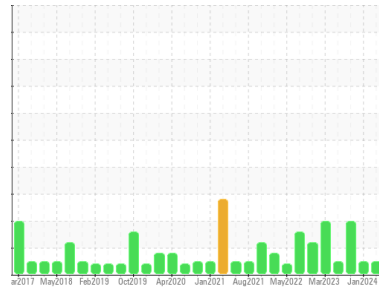




OIL ANALYSIS REPORT

Sample Rating Trend



NORMAL



Machine Id
HS5 12 (S/N S0075SFMCTHAA03)
 Component
Refrigeration Compressor
 Fluid
USPI ALT-68 SC (--- GAL)

DIAGNOSIS

Recommendation

Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

There is no indication of any contamination in the oil. The amount and size of particulates present in the system are acceptable.

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		USP0011432	USP0005475	USP0001114
Sample Date	Client Info		12 May 2024	31 Jan 2024	15 Oct 2023
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			NORMAL	NORMAL	ABNORMAL

WEAR METALS

	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m >8	0	0	0
Chromium	ppm	ASTM D5185m >2	<1	0	0
Nickel	ppm	ASTM D5185m	0	0	<1
Titanium	ppm	ASTM D5185m	<1	<1	0
Silver	ppm	ASTM D5185m >2	0	0	0
Aluminum	ppm	ASTM D5185m >3	0	0	0
Lead	ppm	ASTM D5185m >2	<1	<1	<1
Copper	ppm	ASTM D5185m >8	<1	0	0
Tin	ppm	ASTM D5185m >4	<1	<1	<1
Vanadium	ppm	ASTM D5185m	0	0	0
Cadmium	ppm	ASTM D5185m	<1	0	0

ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	0	0	0
Barium	ppm	ASTM D5185m	1	0	0
Molybdenum	ppm	ASTM D5185m	<1	0	0
Manganese	ppm	ASTM D5185m	0	0	0
Magnesium	ppm	ASTM D5185m	0	0	1
Calcium	ppm	ASTM D5185m	0	0	1
Phosphorus	ppm	ASTM D5185m	0	0	<1
Zinc	ppm	ASTM D5185m	2	0	<1
Sulfur	ppm	ASTM D5185m 50	0	0	8

CONTAMINANTS

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >15	<1	<1	<1
Sodium	ppm	ASTM D5185m	0	0	0
Potassium	ppm	ASTM D5185m >20	1	0	1
Water	%	ASTM D6304 >0.01	0.003	0.003	0.003
ppm Water	ppm	ASTM D6304 >100	32	37	39.3

FLUID CLEANLINESS

	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>10000	9794	5086	▲ 88757
Particles >6µm	ASTM D7647	>2500	2355	1255	▲ 18245
Particles >14µm	ASTM D7647	>320	58	42	▲ 556
Particles >21µm	ASTM D7647	>80	8	7	▲ 88
Particles >38µm	ASTM D7647	>20	0	1	1
Particles >71µm	ASTM D7647	>4	0	0	0
Oil Cleanliness	ISO 4406 (c)	>20/18/15	20/18/13	20/17/13	▲ 24/21/16

FLUID DEGRADATION

	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D974 0.005	0.014	0.014	0.015

