



OIL ANALYSIS REPORT

WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Area
SAP-337614 - SYMRISE
 Machine Id
R1601E VFF1027U1102 - SYMRISE
 Component
Compressor
 Fluid
INGERSOLL-RAND SSR ULTRA COOLANT (--- GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		APC0001309	APC0001319	APC0001301
Sample Date		Client Info		27 Jun 2024	29 Mar 2024	02 Jan 2024
Machine Age	hrs	Client Info		135325	103300	101141
Oil Age	hrs	Client Info		6000	4000	2100
Filter Age	hrs	Client Info		2000	3000	400
Oil Changed		Client Info		Not Changed	Not Changed	Not Changed
Filter Changed		Client Info		Changed	Changed	Changed
Sample Status				NORMAL	NORMAL	NORMAL

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>50	0	6	1
Chromium	ppm	ASTM D5185m	>10	0	<1	<1
Nickel	ppm	ASTM D5185m		0	0	<1
Titanium	ppm	ASTM D5185m		0	<1	0
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>25	<1	3	1
Lead	ppm	ASTM D5185m	>25	<1	0	<1
Copper	ppm	ASTM D5185m	>50	0	<1	<1
Tin	ppm	ASTM D5185m	>15	2	<1	<1
Vanadium	ppm	ASTM D5185m		0	<1	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

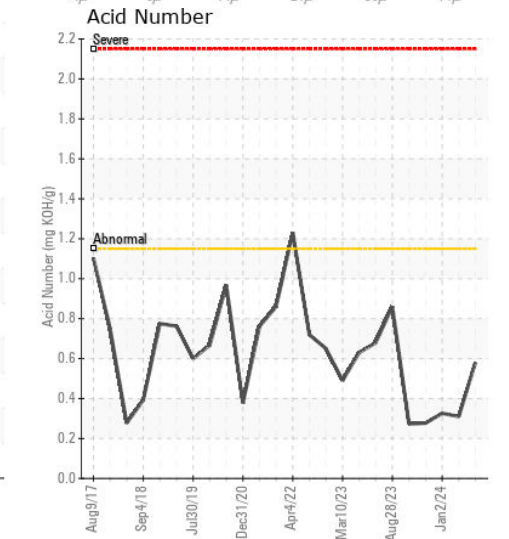
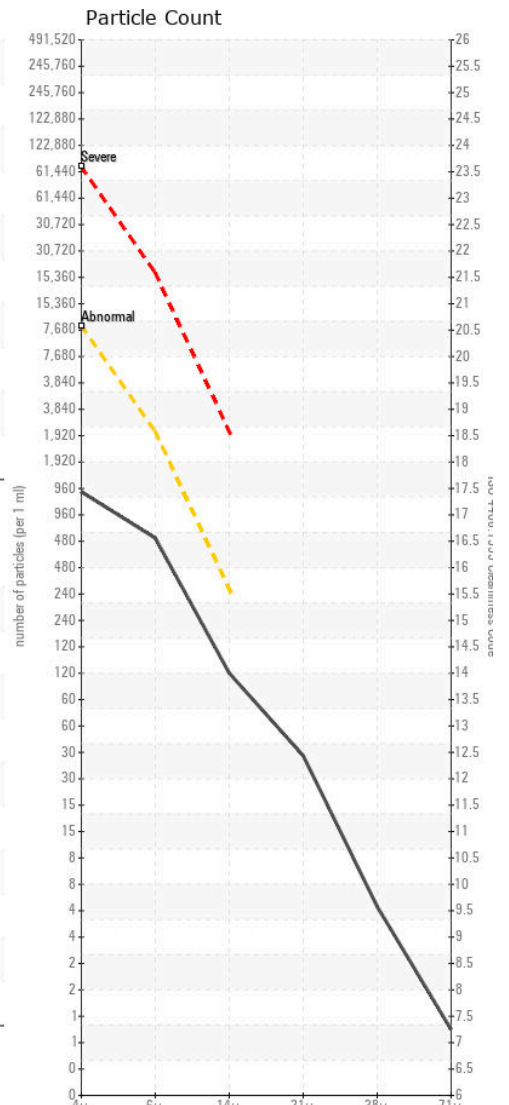
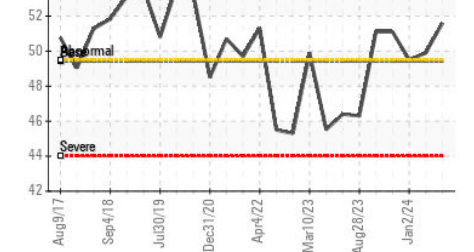
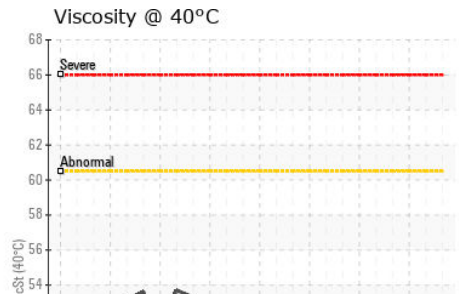
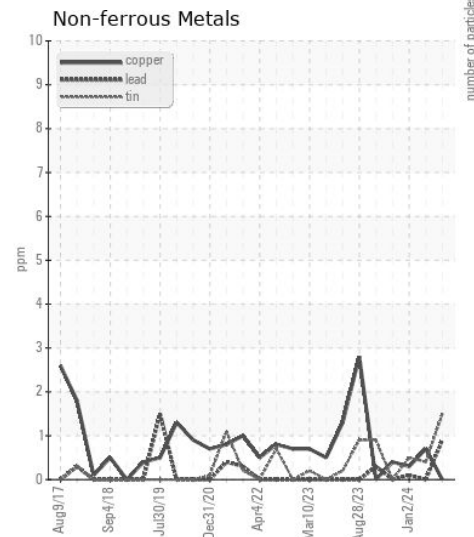
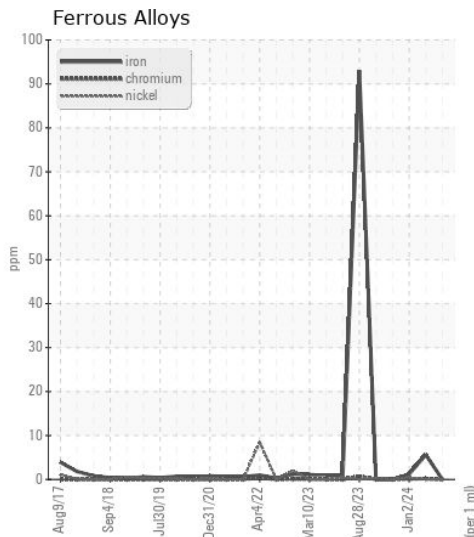
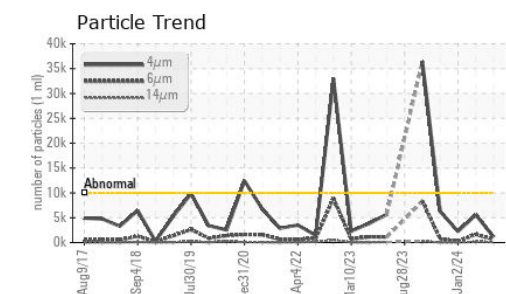
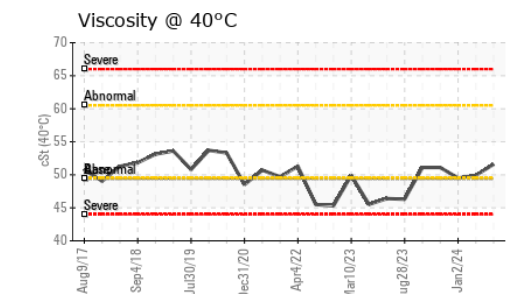
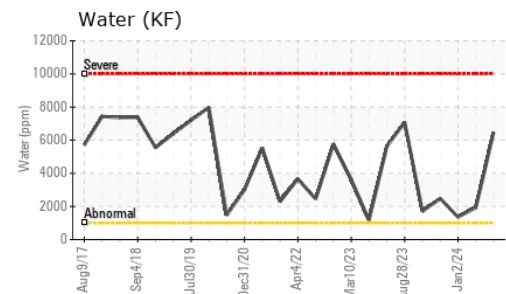
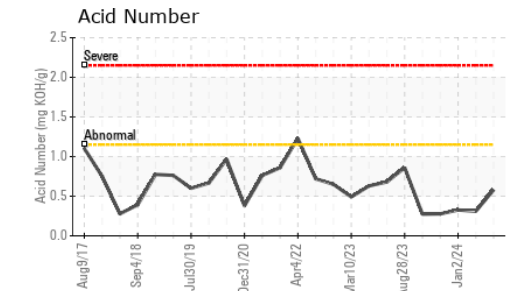
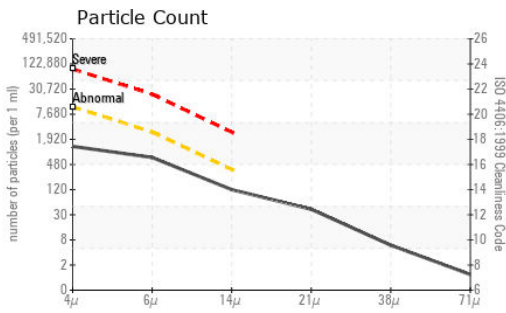
The amount and size of particulates present in the system are acceptable. There is no indication of any contamination in the oil.

Silicon	ppm	ASTM D5185m	>25	2	10	2
Potassium	ppm	ASTM D5185m	>20	10	5	2
Water	%	ASTM D6304	>0.1	0.645	0.192	0.136
ppm Water	ppm	ASTM D6304	>1000	6450	1924	1362
Particles >4µm		ASTM D7647	>10000	1140	5572	2250
Particles >6µm		ASTM D7647	>2500	621	1640	259
Particles >14µm		ASTM D7647	>320	106	133	12
Particles >21µm		ASTM D7647	>80	36	33	2
Particles >38µm		ASTM D7647	>20	5	0	0
Particles >71µm		ASTM D7647	>4	1	0	0
Oil Cleanliness		ISO 4406 (c)	>20/18/15	17/16/14	20/18/14	18/15/11
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	>0.1	0.2%	NEG	NEG

FLUID CONDITION

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

Sodium	ppm	ASTM D5185m		50	24	18
Boron	ppm	ASTM D5185m	0	0	5	0
Barium	ppm	ASTM D5185m	500	492	688	746
Molybdenum	ppm	ASTM D5185m	0	0	0	<1
Manganese	ppm	ASTM D5185m		<1	<1	<1
Magnesium	ppm	ASTM D5185m	0	0	1	<1
Calcium	ppm	ASTM D5185m	0	0	8	4
Phosphorus	ppm	ASTM D5185m	20	0	28	18
Zinc	ppm	ASTM D5185m	0	16	12	0
Sulfur	ppm	ASTM D5185m	200	367	611	329
Acid Number (AN)	mg KOH/g	ASTM D8045		0.58	0.31	0.326
Visc @ 40°C	cSt	ASTM D445	49.4	51.6	49.9	49.5



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513

Sample No. : APC0001309

Lab Number : 06224517

Unique Number : 11102714

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

Received : 01 Jul 2024

Tested : 06 Jul 2024

Diagnosed : 06 Jul 2024 - Don Baldrige

AIR PRODUCTS AND CHEMICALS INC - ALLENTOWN

7201 HAMILTON BLVD

ALLENTOWN, PA

US 18195

Contact: MICHAEL PROTZEK

protzema@airproducts.com

T:

F:

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)