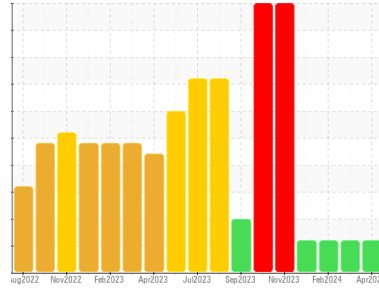




OIL ANALYSIS REPORT

Sample Rating Trend



ISO



Area

Shredder

Machine Id

ORU (Oil Recirculate Unit)-Shredder

Component

Hydraulic Power Pack

Fluid

SHELL HYDRAULIC S1 M 68 (--- GAL)

DIAGNOSIS

Recommendation

We recommend you service the filters on this component if applicable. Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

There is a high amount of silt (particulates < 14 microns in size) 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		PE0003612	PE0003615	PE0000747
Sample Date	Client Info		18 Apr 2024	21 Mar 2024	07 Feb 2024
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	ABNORMAL	ABNORMAL

CONTAMINATION

	method	limit/base	current	history1	history2
Water	WC Method	>0.05	NEG	NEG	NEG

WEAR METALS

	method	limit/base	current	history1	history2
PQ	ASTM D8184		24	33	21
Iron	ppm	ASTM D5185m >20	8	15	11
Chromium	ppm	ASTM D5185m >20	<1	0	<1
Nickel	ppm	ASTM D5185m >20	<1	0	<1
Titanium	ppm	ASTM D5185m	<1	0	<1
Silver	ppm	ASTM D5185m	<1	0	0
Aluminum	ppm	ASTM D5185m >20	3	0	2
Lead	ppm	ASTM D5185m >20	<1	0	<1
Copper	ppm	ASTM D5185m >20	3	2	3
Tin	ppm	ASTM D5185m >20	<1	0	<1
Vanadium	ppm	ASTM D5185m	<1	0	0
Cadmium	ppm	ASTM D5185m	<1	0	<1

ADDITIVES

	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m	0	0	0
Barium	ppm	ASTM D5185m	0	0	13
Molybdenum	ppm	ASTM D5185m	<1	0	<1
Manganese	ppm	ASTM D5185m	<1	0	<1
Magnesium	ppm	ASTM D5185m	4	3	6
Calcium	ppm	ASTM D5185m	39	51	47
Phosphorus	ppm	ASTM D5185m	318	301	335
Zinc	ppm	ASTM D5185m	377	342	359
Sulfur	ppm	ASTM D5185m	830	897	906

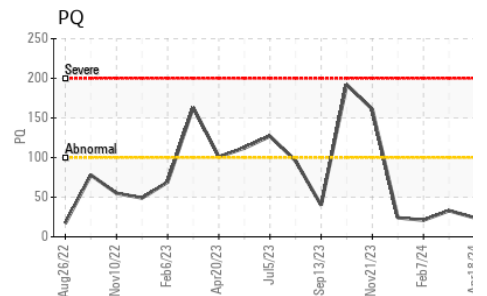
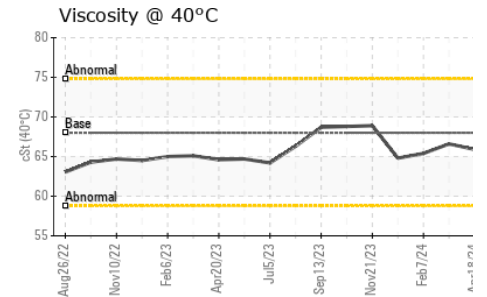
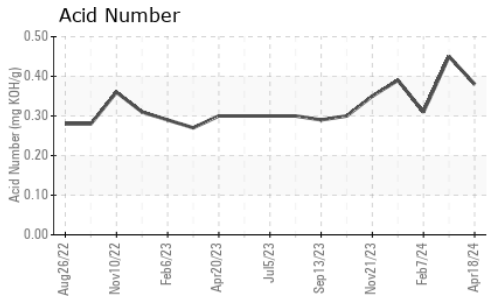
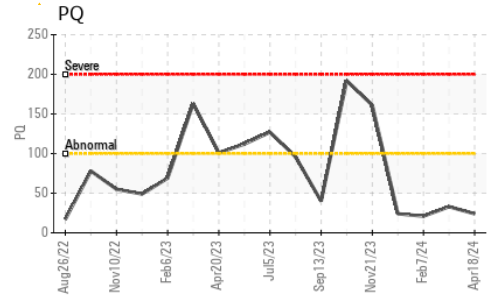
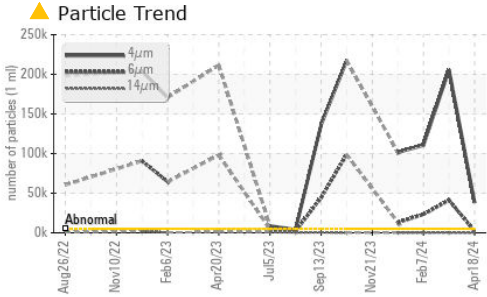
CONTAMINANTS

	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m >15	1	<1	<1
Sodium	ppm	ASTM D5185m	0	<1	0
Potassium	ppm	ASTM D5185m >20	2	0	1

FLUID CLEANLINESS

	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>5000	▲ 38171	▲ 205675	▲ 110481
Particles >6µm	ASTM D7647	>1300	● 1930	▲ 41195	▲ 23306
Particles >14µm	ASTM D7647	>160	8	146	67
Particles >21µm	ASTM D7647	>40	2	6	3
Particles >38µm	ASTM D7647	>10	0	0	1
Particles >71µm	ASTM D7647	>3	0	0	0
Oil Cleanliness	ISO 4406 (c)	>19/17/14	▲ 22/18/10	▲ 25/23/14	▲ 24/22/13

OIL ANALYSIS REPORT

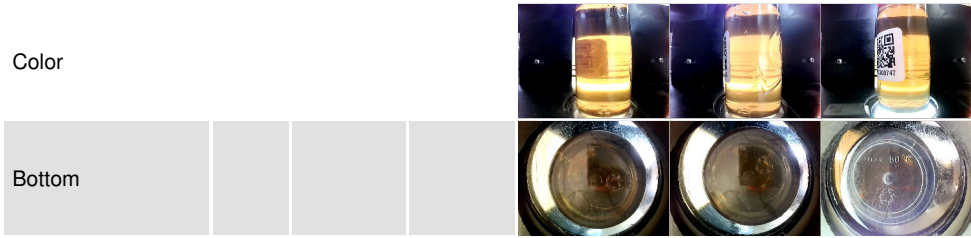


FLUID DEGRADATION		method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045		0.38	0.45	0.31

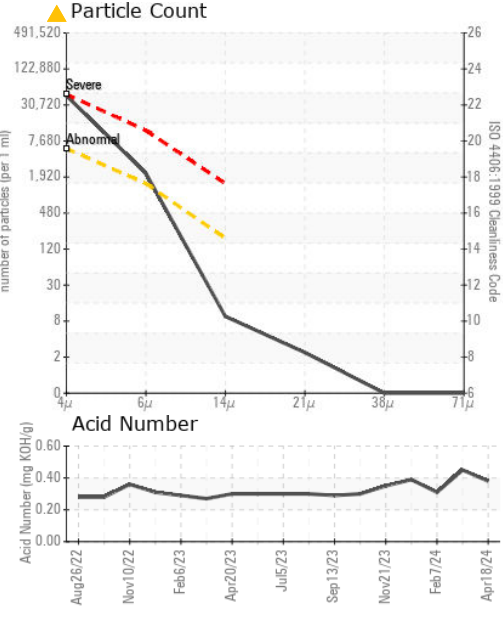
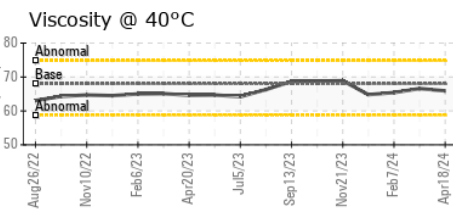
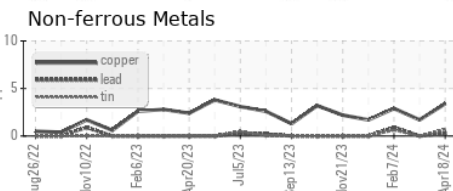
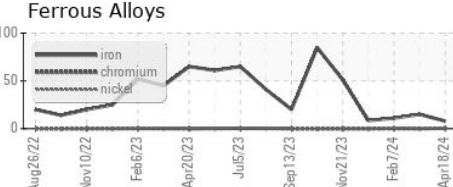
VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.05	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG

FLUID PROPERTIES		method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	68	65.9	66.6	65.4

SAMPLE IMAGES



GRAPHS



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : PE0003612
Lab Number : 06156853
Unique Number : 10992276
Test Package : PLANT (Additional Tests: ICP, KV40, PQ, PrtCount, SCREEN)

Seattle Iron and Metals
 601 S MYRTLE ST
 SEATTLE, WA
 US 98108
 Contact: ADAM THOMAS
 athomas@seairon.com
 T: (206)682-0040
 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)