

### **OIL ANALYSIS REPORT**

Sample Rating Trend

DIRT

# CREAM 9 WEST TANK FARM

Hydraulic System Fluid MOBIL SHC 630 (--- GAL)

#### DIAGNOSIS

#### A Recommendation

No corrective action is recommended at this time. 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. Elemental level of silicon (Si) above normal.

#### Fluid Condition

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

	May2021 May2022 May2024						
SAMPLE INFORI	MATION	method	limit/base	current	history1	history2	
Sample Number		Client Info		PCA0118383	PCA0065789	PCA0051133	
Sample Date		Client Info		22 May 2024	25 May 2022	27 May 2021	
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	
CONTAMINAT	ION	method	limit/base	current	history1	history2	
Water		WC Method	>0.05	NEG	NEG	NEG	
WEAR METAL	S	method	limit/base	current	history1	history2	
Iron	ppm	ASTM D5185m	>20	2	6	4	
Chromium	ppm	ASTM D5185m	>20	0	0	0	
Nickel	ppm	ASTM D5185m	>20	0	<1	0	
Titanium	ppm	ASTM D5185m		0	<1	1	
Silver	ppm	ASTM D5185m		0	<1	0	
Aluminum	ppm	ASTM D5185m	>20	<1	5	5	
Lead	ppm	ASTM D5185m	>20	0	0	0	
Copper	ppm	ASTM D5185m		0	0	0	
Tin	ppm		>20	0	<1	0	
Antimony	ppm	ASTM D5185m	200			0	
Vanadium	ppm	ASTM D5185m		0	0	0	
Cadmium	ppm	ASTM D5185m		0	0	0	
	ppin						
ADDITIVES		method	limit/base		history1	history2	
Boron	ppm	ASTM D5185m		0	<1	0	
Barium	ppm	ASTM D5185m		0	0	0	
Molybdenum	ppm	ASTM D5185m		0	0	0	
Manganese	ppm	ASTM D5185m		<1	0	<1	
Magnesium	ppm	ASTM D5185m		0	0	<1	
Calcium	ppm	ASTM D5185m		0	0	11	
Phosphorus	ppm	ASTM D5185m		463	315	332	
Zinc	ppm	ASTM D5185m		0	0	3	
Sulfur	ppm	ASTM D5185m		0	147	225	
CONTAMINAN	TS	method	limit/base	current	history1	history2	
Silicon	ppm	ASTM D5185m	>15	<mark>人</mark> 19	1	0	
Sodium	ppm	ASTM D5185m		0	2	1	
Potassium	ppm	ASTM D5185m	>20	<1	0	0	
FLUID CLEAN	<u>-INESS</u>	method	limit/base	current	history1	history2	
Particles >4µm		ASTM D7647	>10000	<b>A</b> 35899	68260	106944	
Particles >6µm		ASTM D7647	>2500	<u> </u>	<b>2847</b>	▲ 5350	
Particles >14µm		ASTM D7647	>640	423	87	66	
Particles >21µm		ASTM D7647	>160	85	18	7	
Particles >38µm		ASTM D7647	>40	4	0	0	
				-			

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ISO 4406 (c) >20/18/16 A 22/20/16

ASTM D7647 >10

Particles >71µm

**Oil Cleanliness** 

0

▲ 24/20/13

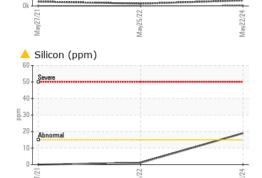
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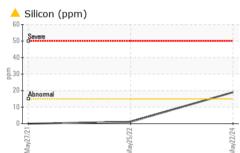
▲ 23/19/14

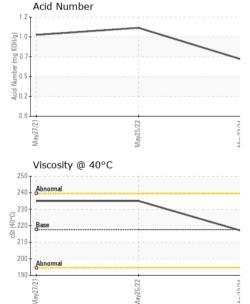


120 -100 Î particles (1 80 60 40 201





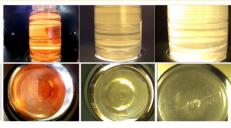




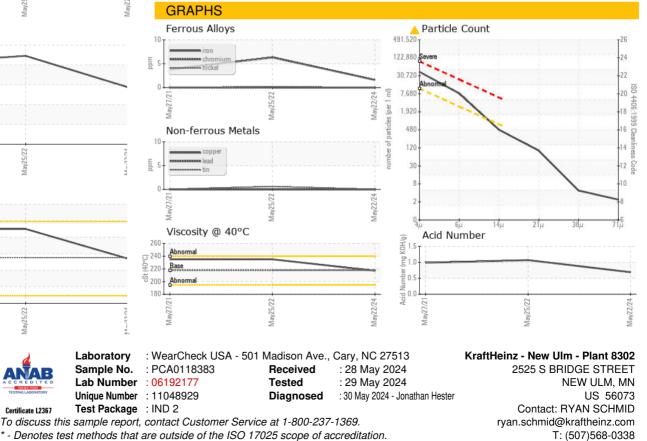
## **OIL ANALYSIS REPORT**

FLUID DEGRAD	ATION	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045		0.69	1.07	0.985
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	LIGHT	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 PROPE	RTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	217.7	217	235	235
SAMPLE IMAGES		method	limit/base	current	history1	history2

Color



Bottom



\* - 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)

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Certificate 12367

Submitted By: RYAN SCHMID

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F: (507)354-7927