

OIL ANALYSIS REPORT

Area CONSTRUCTORS, INC Machine Id 040688

Gasoline Engine Fluid MOBIL DELVAC 1300 SUPER 10W30 (--- G

DIAGNOSIS

A Recommendation

Oil and filter change at the time of sampling has been noted. 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.

Fluid Condition

The BN level is low. The condition of the oil is acceptable for the time in service.

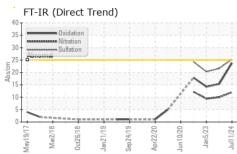
L)		lay2017 Ma	May2018 Jan2019 Nov2019 Jan2020 May2021 Jan2024				
SAMPLE INFORM	ATION	method	limit/base	current	history1	history2	
Sample Number		Client Info		SBP0007124	SBP0005718	SBP0002279	
ample Date		Client Info		11 Jul 2024	04 Jan 2024	05 Jan 2023	
Iachine Age	hrs	Client Info		8065	7674	7067	
)il Age	hrs	Client Info		391	309	351	
)il Changed		Client Info		Changed	Changed	Changed	
Sample Status				ABNORMAL	NORMAL	NORMAL	
CONTAMINATION	١	method	limit/base	current	history1	history2	
uel		WC Method	>4.0	<1.0	<1.0	<1.0	
Vater		WC Method	>0.2	NEG	NEG	NEG	
Glycol		WC Method		NEG	NEG	NEG	
WEAR METALS		method	limit/base	current	history1	history2	
ron	ppm	ASTM D5185m	>150	47	31	24	
Chromium	ppm	ASTM D5185m	>20	4	3	2	
lickel	ppm	ASTM D5185m	>5	<1	<1	<1	
Titanium	ppm	ASTM D5185m		0	<1	0	
Silver	ppm	ASTM D5185m	>2	0	0	0	
Aluminum	ppm	ASTM D5185m	>40	7	6	4	
ead	ppm	ASTM D5185m	>50	0	<1	1	
Copper	ppm	ASTM D5185m	>155	13	8	13	
īn	ppm	ASTM D5185m	>10	0	<1	<1	
/anadium	ppm	ASTM D5185m		0	0	0	
Cadmium	ppm	ASTM D5185m		0	0	0	
ADDITIVES		method	limit/base	current	history1	history2	
Boron	ppm	ASTM D5185m		28	44	48	
Barium	ppm	ASTM D5185m		0	0	0	
lolybdenum	ppm	ASTM D5185m		70	70	73	
langanese	ppm	ASTM D5185m		2	1	<1	
/lagnesium	ppm	ASTM D5185m		496	550	530	
Calcium	ppm	ASTM D5185m		1278	1219	1273	
Phosphorus	ppm	ASTM D5185m		674	726	676	
Zinc	ppm	ASTM D5185m		766	856	860	
Sulfur	ppm	ASTM D5185m		2999	2926	3364	
CONTAMINANTS		method	11 11 11				
		methou	limit/base	current	history1	history2	
		ASTM D5185m		current 20	history1	history2 8	
Silicon	ppm		>30				
Silicon Sodium		ASTM D5185m	>30 >400	20	17	8	
Silicon Sodium	ppm ppm	ASTM D5185m ASTM D5185m	>30 >400	20 5	17 3	8	
Silicon Sodium Potassium INFRA-RED	ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m	>30 >400 >20	20 5 4	17 3 2	8 3 2	
Silicon Sodium Potassium INFRA-RED Soot %	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method	>30 >400 >20 limit/base	20 5 4 current	17 3 2 history1	8 3 2 history2	
Silicon Sodium Potassium INFRA-RED Soot % Vitration	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method *ASTM D7844	>30 >400 >20 limit/base	20 5 4 current 0.1	17 3 2 <u>history1</u> 0	8 3 2 history2 0.1	
Silicon Sodium Potassium INFRA-RED Soot % Jitration	ppm ppm ppm % Abs/cm Abs/.1mm	ASTM D5185m ASTM D5185m ASTM D5185m method *ASTM D7844 *ASTM D7624	>30 >400 >20 limit/base >20	20 5 4 <u>current</u> 0.1 12.0	17 3 2 history1 0 10.0	8 3 2 history2 0.1 9.4	
Silicon Sodium Potassium INFRA-RED Soot % Nitration Sulfation	ppm ppm ppm % Abs/cm Abs/.1mm	ASTM D5185m ASTM D5185m ASTM D5185m method *ASTM D7844 *ASTM D7624 *ASTM D7415	>30 >400 >20 limit/base >20 >20 >30	20 5 4 <u>current</u> 0.1 12.0 25.3	17 3 2 history1 0 10.0 21.6	8 3 2 history2 0.1 9.4 20.3	

Sample Rating Trend

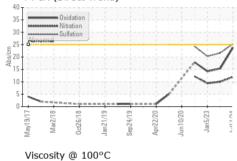
DEGRADATION

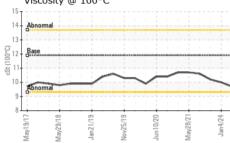


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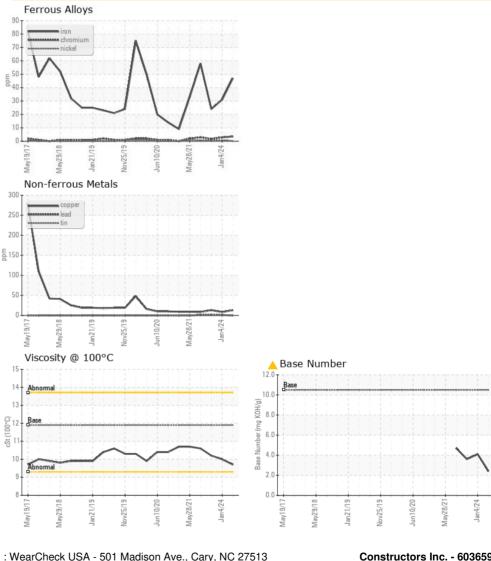


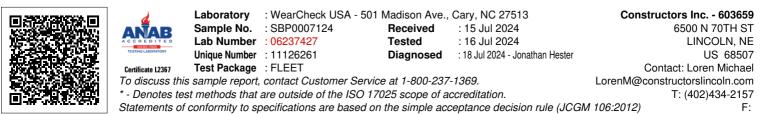






VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.2	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG
FLUID PROPERT	TIES	method	limit/base	current	history1	history2
Visc @ 100°C	cSt	ASTM D445	11.9	9.7	10.0	10.2
GRAPHS						





Submitted By: Loren Michael