

OIL ANALYSIS REPORT

Sample Rating Trend



Area SCHTRUCK 6280 [SCHTRUCK]

Front Diesel Engine

PETRO CANADA DURON SHP 15W40 (--- GAL)

Recommendation

Resample at the next service interval to monitor.

All component wear rates are normal.

Contamination

There is no indication of any contamination in the

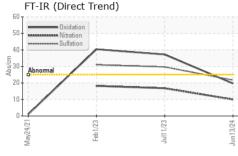
Fluid Condition

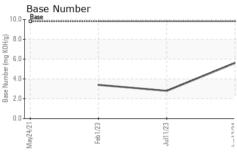
The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

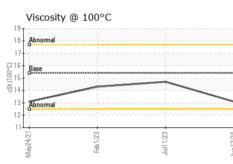
	iAL)		May202	Peb 2023	Jul2023 Ji	un2024	
Client Info	SAMPLE INFORM	MOITAN	method	limit/base	current	history1	history2
Machine Age mls Client Info 459095 389129 347381	Sample Number		Client Info		SBP0007711	SBP0004731	SBP0002524
Oil Age mls Client Info 36436 41748 38576 Oil Changed Sample Status Client Info Changed Chan	Sample Date		Client Info		13 Jun 2024	11 Jul 2023	01 Feb 2023
Client Info Changed Changed Changed Changed NORMAL ABNORMAL NORMAL ABNORMAL NORMAL	Machine Age	mls	Client Info		459095	389129	347381
NORMAL ABNORMAL NORMAL	Oil Age	mls	Client Info		36436	41748	38576
Fuel	Oil Changed		Client Info		Changed	Changed	Changed
Fuel	Sample Status				NORMAL	ABNORMAL	NORMAL
Water Glycol WC Method WC Method >0.2 NEG NEG NEG NEG NEG NEG NEG WEAR METALS method limit/base current history1 history2 Iron ppm ASTM D5185m >100 42 55 48 Chromium ppm ASTM D5185m >20 -1 2 2 Nickel ppm ASTM D5185m >2 -1 -1 -1 Titanium ppm ASTM D5185m >2 -1 -1 0 Siliver ppm ASTM D5185m >2 -1 -1 0 Aluminum ppm ASTM D5185m >2 -1 -1 0 Lead ppm ASTM D5185m >40 -1 3 4 Copper ppm ASTM D5185m >30 8 3 3 Tin ppm ASTM D5185m 0 0 0 0 Cadadium ppm ASTM D5185m 0 0 <	CONTAMINATION	J	method	limit/base	current	history1	history2
WEAR METALS	Fuel		WC Method	>6.0	<1.0	<1.0	<1.0
WEAR METALS	Water		WC Method	>0.2	NEG	NEG	NEG
Chromium	Glycol		WC Method		NEG	NEG	NEG
Chromium	WEAR METALS		method	limit/base	current	history1	history2
Nicke ppm	ron	ppm	ASTM D5185m	>100	42	55	48
Description	Chromium	ppm	ASTM D5185m	>20	<1	2	2
Silver	Nickel	ppm	ASTM D5185m	>2	<1	<1	<1
Aluminum	Titanium	ppm	ASTM D5185m		0	0	0
Lead	Silver	ppm	ASTM D5185m	>2	<1	<1	0
Copper	Aluminum	ppm	ASTM D5185m	>25	10	9	10
Tin	_ead	ppm	ASTM D5185m	>40	<1	3	4
Azanadium ppm ASTM D5185m 0 0 0 Cadmium ppm ASTM D5185m 0 0 0 ADDITIVES method limit/base current history1 history2 Boron ppm ASTM D5185m 0 3 2 30 Barium ppm ASTM D5185m 0 0 0 0 Molybdenum ppm ASTM D5185m 0 1 1 <1 Manganese ppm ASTM D5185m 0 1 1 <1 Magnesium ppm ASTM D5185m 1010 965 1080 512 Calcium ppm ASTM D5185m 1070 1189 1336 1591 Phosphorus ppm ASTM D5185m 1270 1329 1480 947 Sulfur ppm ASTM D5185m 1270 1329 1480 947 Sulfur ppm ASTM D5185m 225 7 8 <t< td=""><td>Copper</td><td>ppm</td><td>ASTM D5185m</td><td>>330</td><td>8</td><td>3</td><td>3</td></t<>	Copper	ppm	ASTM D5185m	>330	8	3	3
Cadmium ppm ASTM D5185m 0 0 0 ADDITIVES method limit/base current history1 history2 Boron ppm ASTM D5185m 0 3 2 30 Barium ppm ASTM D5185m 0 0 0 0 Molybdenum ppm ASTM D5185m 60 59 69 49 Magnesium ppm ASTM D5185m 0 1 1 <1	Γin	ppm	ASTM D5185m	>15	<1	1	<1
ADDITIVES	/anadium	ppm	ASTM D5185m		0	0	0
Soron ppm ASTM D5185m 0 0 0 0 0 0 0 0 0	Cadmium	ppm	ASTM D5185m		0	0	0
Barium	ADDITIVES		method	limit/base	current	history1	history2
Molybdenum ppm ASTM D5185m 60 59 69 49 Manganese ppm ASTM D5185m 0 1 1 <1	Boron	ppm	ASTM D5185m	0	3	2	30
Manganese ppm ASTM D5185m 0 1 1 <1 Magnesium ppm ASTM D5185m 1010 965 1080 512 Calcium ppm ASTM D5185m 1070 1189 1336 1591 Phosphorus ppm ASTM D5185m 1150 1075 1190 739 Zinc ppm ASTM D5185m 1270 1329 1480 947 Sulfur ppm ASTM D5185m 2060 3012 3268 2434 CONTAMINANTS method limit/base current history1 history2 Silicon ppm ASTM D5185m >25 7 8 10 Sodium ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D7844 >3 0.4 0.5 0.7 Nitration Abs/.1mm *ASTM D7415	Barium	ppm	ASTM D5185m	0	0	0	0
Magnesium ppm ASTM D5185m 1010 965 1080 512 Calcium ppm ASTM D5185m 1070 1189 1336 1591 Phosphorus ppm ASTM D5185m 1150 1075 1190 739 Zinc ppm ASTM D5185m 1270 1329 1480 947 Sulfur ppm ASTM D5185m 2060 3012 3268 2434 CONTAMINANTS method limit/base current history1 history2 Silicon ppm ASTM D5185m >25 7 8 10 Sodium ppm ASTM D5185m 7 13 12 Potassium ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D5185m >20 0.4 0.5 0.7 INFRA-RED method limit/base	Molybdenum	ppm	ASTM D5185m	60	59	69	49
Calcium ppm ASTM D5185m 1070 1189 1336 1591 Phosphorus ppm ASTM D5185m 1150 1075 1190 739 Zinc ppm ASTM D5185m 1270 1329 1480 947 Sulfur ppm ASTM D5185m 2060 3012 3268 2434 CONTAMINANTS method limit/base current history1 history2 Soliticon ppm ASTM D5185m >25 7 8 10 Soliticon ppm ASTM D5185m 7 13 12 Potassium ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D5185m INFRA-RED method limit/base current history1 history2 Soot % % *ASTM D7844 >3 0.4 0.5 0.7 Nitration Abs/.1mm *ASTM D741	Manganese	ppm	ASTM D5185m	0	1	1	<1
Phosphorus ppm ASTM D5185m 1150 1075 1190 739 Zinc ppm ASTM D5185m 1270 1329 1480 947 Sulfur ppm ASTM D5185m 2060 3012 3268 2434 CONTAMINANTS method limit/base current history1 history2 Silicon ppm ASTM D5185m >25 7 8 10 Sodium ppm ASTM D5185m 7 13 12 Potassium ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D5185m INFRA-RED method limit/base current history1 history2 Soot % % *ASTM D7844 >3 0.4 0.5 0.7 Nitration Abs/cm *ASTM D7415 >30 21.7 29.7 31.0 FLUID DEGRADATION method limit/base	Magnesium	ppm	ASTM D5185m	1010	965	1080	512
Phosphorus ppm ASTM D5185m 1150 1075 1190 739 Zinc ppm ASTM D5185m 1270 1329 1480 947 Bulfur ppm ASTM D5185m 2060 3012 3268 2434 CONTAMINANTS method limit/base current history1 history2 Solium ppm ASTM D5185m >25 7 8 10 Sodium ppm ASTM D5185m 7 13 12 Potassium ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D5185m INFRA-RED method limit/base current history1 history2 Soot % % *ASTM D7844 >3 0.4 0.5 0.7 Nitration Abs/cm *ASTM D7415 >30 21.7 29.7 31.0 FLUID DEGRADATION *ASTM D7414 >25 19.7	Calcium	ppm	ASTM D5185m	1070	1189	1336	1591
20	Phosphorus		ASTM D5185m	1150	1075	1190	739
Sulfur ppm ASTM D5185m 2060 3012 3268 2434 CONTAMINANTS method limit/base current history1 history2 Silicon ppm ASTM D5185m >25 7 8 10 Sodium ppm ASTM D5185m 7 13 12 Potassium ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D5185m INFRA-RED method limit/base current history1 history2 Soot % % *ASTM D7844 >3 0.4 0.5 0.7 Nitration Abs/.mm *ASTM D7624 >20 10.0 16.8 18.2 Sulfation Abs/.1mm *ASTM D7415 >30 21.7 29.7 31.0 FLUID DEGRADATION method limit/base current history1 history2 Oxidation Abs/.1mm *ASTM D7414 </td <td></td> <td></td> <td>ASTM D5185m</td> <td>1270</td> <td>1329</td> <td>1480</td> <td>947</td>			ASTM D5185m	1270	1329	1480	947
Silicon ppm ASTM D5185m >25 7 8 10	Sulfur	ppm	ASTM D5185m	2060	3012	3268	2434
Sodium	CONTAMINANTS		method	limit/base	current	history1	history2
Potassium ppm ASTM D5185m >20 6 12 4 Chlorine ppm ASTM D5185m INFRA-RED method limit/base current history1 history2 Soot % % *ASTM D7844 >3 0.4 0.5 0.7 Nitration Abs/cm *ASTM D7624 >20 10.0 16.8 18.2 Sulfation Abs/.1mm *ASTM D7415 >30 21.7 29.7 31.0 FLUID DEGRADATION method limit/base current history1 history2 Oxidation Abs/.1mm *ASTM D7414 >25 19.7 37.2 40.4	Silicon	ppm	ASTM D5185m	>25	7	8	10
Chlorine ppm ASTM D5185m 0.5 0.7	Sodium	ppm	ASTM D5185m		7	13	12
INFRA-RED	Potassium	ppm	ASTM D5185m	>20	6	12	4
Soot % % *ASTM D7844 >3 0.4 0.5 0.7 Nitration Abs/cm *ASTM D7624 >20 10.0 16.8 18.2 Sulfation Abs/.1mm *ASTM D7415 >30 21.7 29.7 31.0 FLUID DEGRADATION method limit/base current history1 history2 Oxidation Abs/.1mm *ASTM D7414 >25 19.7 37.2 40.4	Chlorine	ppm	ASTM D5185m				
Nitration Abs/cm *ASTM D7624 >20 10.0 16.8 18.2 Sulfation Abs/.1mm *ASTM D7415 >30 21.7 29.7 31.0 FLUID DEGRADATION method limit/base current history1 history2 Oxidation Abs/.1mm *ASTM D7414 >25 19.7 37.2 40.4	INFRA-RED		method	limit/base	current	history1	history2
Sulfation Abs/.1mm *ASTM D7415 >30 21.7 29.7 31.0 FLUID DEGRADATION method limit/base current history1 history2 Oxidation Abs/.1mm *ASTM D7414 >25 19.7 37.2 40.4	Soot %	%	*ASTM D7844	>3	0.4	0.5	0.7
FLUID DEGRADATION method limit/base current history1 history2 Oxidation Abs/.1mm *ASTM D7414 >25 19.7 37.2 40.4	Vitration	Abs/cm	*ASTM D7624	>20	10.0	16.8	18.2
Oxidation	Sulfation	Abs/.1mm	*ASTM D7415	>30	21.7		31.0
	FLUID DEGRADA	TION	method	limit/base	current	history1	history2
Base Number (BN) mg KOH/g ASTM D2896 9.8 5.6 ▲ 2.8 3.4	Oxidation	Abs/.1mm	*ASTM D7414	>25	19.7	37.2	40.4
	Base Number (BN)	mg KOH/g	ASTM D2896	9.8	5.6	△ 2.8	3.4

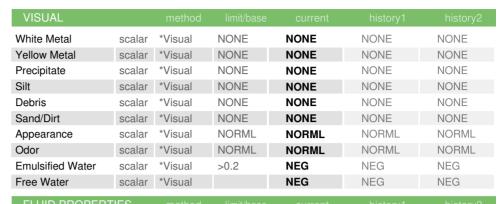


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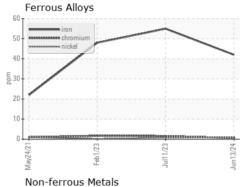


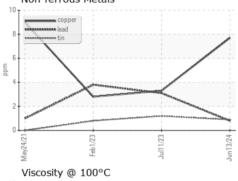


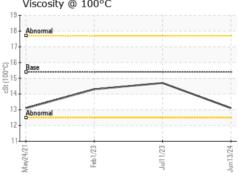


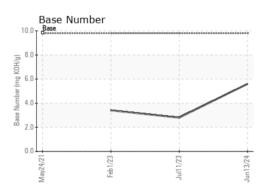
FLUID FROFER	TILO	memou			HISTOLAL	HISTOLYZ
Visc @ 100°C	cSt	ASTM D445	15.4	13.1	14.7	14.3

GRAPHS













Certificate 12367

Laboratory Sample No.

: WearCheck USA - 501 Madison Ave., Cary, NC 27513 : SBP0007711 Lab Number : 06217573 Unique Number : 11090437 Test Package : FLEET

Received **Tested** Diagnosed

: 21 Jun 2024 : 24 Jun 2024 : 24 Jun 2024 - Wes Davis

SCHMIDT TRANSPORTATION - 605449 108 E Bay Road Plattsmouth, NE US 68048 Contact: NICK DOTY

doty@liquidtrucking.com T: (402)949-9398

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)