

OIL ANALYSIS REPORT

Sample Rating Trend



Machine Id 227145

Component Transmission Fluid {not provided} (--- GAL)

DIAGNOSIS

Recommendation

No corrective action is recommended at this time. Resample at the next service interval to monitor. Please specify the brand, type, and viscosity of the oil on your next sample.

Wear

All component wear rates are normal.

Contamination

Moderate concentration of visible dirt/debris present in the fluid.

Fluid Condition

The condition of the fluid is acceptable for the time in service.

SAMPLE INFOR	MATION	method	limit/base	current	history1	history2
Sample Number		Client Info		GFL0077761		
Sample Date		Client Info		16 Feb 2024		
Machine Age	hrs	Client Info		0		
Oil Age	hrs	Client Info		0		
Oil Changed		Client Info		Not Changd		
Sample Status				ABNORMAL		
CONTAMINAT	ION	method	limit/base	current	history1	history2
Water		WC Method	>0.1	NEG		
WEAR METAL	S	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>200	62		
Chromium	ppm	ASTM D5185m	>10	0		
Nickel	ppm	ASTM D5185m		0		
Titanium	ppm	ASTM D5185m		0		
Silver	ppm	ASTM D5185m		0		
Aluminum	ppm	ASTM D5185m	>50	13		
Lead	ppm	ASTM D5185m	>50	3		
Copper	ppm	ASTM D5185m	>200	15		
Tin	ppm	ASTM D5185m	>10	<1		
Vanadium	ppm	ASTM D5185m	>10	0		
Cadmium	ppm	ASTM D5185m		0		
ADDITIVES	le le	method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		100		
Barium	ppm	ASTM D5185m		0		
Molybdenum		ASTM D5185m		۰ <1		
•	ppm	ASTM D5185m		1		
Manganese	ppm			-		
Magnesium	ppm	ASTM D5185m		<1		
Calcium						
.	ppm	ASTM D5185m		59		
	ppm	ASTM D5185m		201		
Phosphorus Zinc		ASTM D5185m ASTM D5185m		201 21		
	ppm	ASTM D5185m		201		
Zinc	ppm ppm ppm	ASTM D5185m ASTM D5185m	limit/base	201 21		
Zinc Sulfur	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	201 21 668		
Zinc Sulfur CONTAMINAN Silicon	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m method		201 21 668 current	 history1	 history2
Zinc Sulfur CONTAMINAN Silicon Sodium	ppm ppm ppm JTS	ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m	>50	201 21 668 current 7	 history1	 history2
Zinc Sulfur CONTAMINAN Silicon Sodium	ppm ppm ppm ITS ppm	ASTM D5185m ASTM D5185m ASTM D5185m Method ASTM D5185m ASTM D5185m	>50	201 21 668 current 7 11	 history1 	 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium	ppm ppm ppm ITS ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m *Visual	>50 >20 limit/base NONE	201 21 668 current 7 11 61 current NONE	 history1 	 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL White Metal	ppm ppm ppm JTS ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m Method	>50 >20 limit/base	201 21 668 current 7 11 61 current	 history1 history1	 history2 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL	ppm ppm ppm JTS ppm ppm ppm scalar	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m *Visual	>50 >20 limit/base NONE	201 21 668 current 7 11 61 current NONE	 history1 history1 	 history2 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL White Metal Yellow Metal Precipitate	ppm ppm ppm JTS ppm ppm ppm ppm scalar scalar	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m method *Visual	>50 >20 limit/base NONE NONE	201 21 668 current 7 11 61 current NONE NONE	 history1 history1 history1	 history2 history2 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL White Metal Yellow Metal Precipitate Silt	ppm ppm ppm ITS ppm ppm ppm ppm scalar scalar scalar	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m *Visual *Visual	>50 >20 limit/base NONE NONE NONE	201 21 668 current 7 11 61 current NONE NONE NONE NONE	 history1 history1 	 history2 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL White Metal Yellow Metal	ppm ppm ppm ITS ppm ppm ppm ppm scalar scalar scalar scalar	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m *Visual *Visual *Visual *Visual	>50 >20 limit/base NONE NONE NONE NONE	201 21 668 current 7 11 61 current NONE NONE NONE NONE NONE	 history1 history1 	 history2 history2 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL White Metal Yellow Metal Precipitate Silt Debris	ppm ppm ppm iTS ppm ppm ppm ppm scalar scalar scalar scalar scalar scalar	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m *Visual *Visual *Visual *Visual *Visual	>50 >20 limit/base NONE NONE NONE NONE NONE	201 21 668 current 7 11 61 current NONE NONE NONE NONE NONE NONE NONE	 history1 history1 	 history2 history2 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL White Metal Yellow Metal Precipitate Silt Debris Sand/Dirt Appearance	ppm ppm ppm JTS ppm ppm ppm scalar scalar scalar scalar scalar scalar	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m *Visual *Visual *Visual *Visual *Visual *Visual *Visual	>50 >20 limit/base NONE NONE NONE NONE NONE NONE	201 21 668 current 7 11 61 current NONE NONE NONE NONE NONE NONE NONE NON	 history1 history1 	 history2 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL White Metal Yellow Metal Precipitate Silt Debris Sand/Dirt	ppm ppm ppm JTS ppm ppm ppm ppm scalar scalar scalar scalar scalar scalar scalar	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m *Visual *Visual *Visual *Visual *Visual *Visual *Visual *Visual	>50 >20 limit/base NONE NONE NONE NONE NONE NONE NONE	201 21 668 current 7 11 61 current NONE NONE NONE NONE NONE NONE NONE NON	 history1 history1 	 history2 history2
Zinc Sulfur CONTAMINAN Silicon Sodium Potassium VISUAL White Metal Yellow Metal Precipitate Silt Debris Sand/Dirt Appearance Odor	ppm ppm ppm ppm ppm ppm ppm ppm scalar scalar scalar scalar scalar scalar scalar scalar	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m *Visual *Visual *Visual *Visual *Visual *Visual *Visual *Visual *Visual	>50 imit/base NONE NONE NONE NONE NONE NONE NORML NORML	201 21 668 current 7 11 61 current NONE NONE NONE NONE NONE NONE NONE NON	 history1 history1 	 history2 history2 -



OIL ANALYSIS REPORT

60

50

40 30 20

10

ppm

C

100 90 80 cSt (40°C)

60 50

Laboratory Sample No.

Lab Number : 06098038





Glycol Contamination).25 70 6 0.20 50 0.15 ۲,40 d 0.10 30 0.05 20 0.00 10 Feb16/24 Feb16/24

FLUID PROPERTIES method limit/base history1 history2 current Visc @ 40°C 30.0 cSt ASTM D445 SAMPLE IMAGES limit/base method current history1 history2 Color no image no image no image Bottom no image no image no image **GRAPHS** Ferrous Alloys 70 nickel 10 Feb16/24 Feb 16/24 Non-ferrous Metals lead 12 10 Feb16/24 4 Viscosity @ 40°C 110 70 40 30 20 Feb16/24 Feb16/24 : WearCheck USA - 501 Madison Ave., Cary, NC 27513 GFL Environmental - 650 - West Point Hauling : GFL0077761 Received : 22 Feb 2024 7825 Parham Landing Road



Unique Number : 10896268 Diagnosed : 26 Feb 2024 - Jonathan Hester Test Package : FLEET (Additional Tests: Glycol) Contact: Jason Smith Certificate L2367 To discuss this sample report, contact Customer Service at 1-800-237-1369. jasonsmith@gflenv.com * - 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)

Tested

: 26 Feb 2024

West Point, VA

US 23181

Т:

F: