

OIL ANALYSIS REPORT



ISO

NO UNIT PC321170

Component Hydraulic System Fluid AW HYDRAULIC OIL ISO 32 (--- GAL)

DIAGNOSIS

Recommendation

Little or no information is provided as to the component and lubricant being tested. Recommendations are therefore generic in nature and may not apply to the current application. Please forward information as to equipment type, reservoir capacity, lubricant type and any pertinent information to allow for a more accurate assessment. We recommend you service the filters on this component. We recommend an early resample to monitor this condition. The fluid was not specified, however, a fluid match indicates that this fluid is (GENERIC) AW HYDRAULIC OIL ISO 32. Please confirm. NOTE: Please provide information regarding reservoir capacity, filter type and micron rating with next sample.

Wear

All component wear rates are normal.

Contamination

There is a moderate amount of silt (particulates < 14 microns in size) present in the oil.

Fluid Condition

The AN level is acceptable for this fluid. The oil is still serviceable provided that the contaminant(s) can be reduced to acceptable levels.

				Jan2024		
SAMPLE INFOR	MATION	method	limit/base	current	history1	history2
Sample Number		Client Info		PC321170		
Sample Date		Client Info		02 Jan 2024		
Machine Age	hrs	Client Info		0		
Oil Age	hrs	Client Info		0		
Oil Changed		Client Info		N/A		
Sample Status				ABNORMAL		
CONTAMINA	ΓΙΟΝ	method	limit/base	current	history1	history2
Water		WC Method	>0.05	NEG		
WEAR METAL	S	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185(m)	>20	10		
Chromium	ppm	ASTM D5185(m)	>20	0		
Nickel	ppm	ASTM D5185(m)	>20	0		
Titanium	ppm	ASTM D5185(m)		0		
Silver	ppm	ASTM D5185(m)		0		
Aluminum	ppm	ASTM D5185(m)	>20	<1		
Lead	ppm	ASTM D5185(m)	>20	1		
Copper	ppm	ASTM D5185(m)	>20	4		
Tin	ppm	ASTM D5185(m)	>20	0		
Antimony	ppm	ASTM D5185(m)		0		
Vanadium	ppm	ASTM D5185(m)		0		
Beryllium	ppm	ASTM D5185(m)		0		
Cadmium	ppm	ASTM D5185(m)		0		
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185(m)	5	0		
Barium	ppm	ASTM D5185(m)	5	0		
Molybdenum	ppm	ASTM D5185(m)	5	0		
Manganese	ppm	ASTM D5185(m)		0		
Magnesium	ppm	ASTM D5185(m)	25	1		
Calcium	ppm	ASTM D5185(m)	200	17		
Phosphorus	ppm	ASTM D5185(m)	300	309		
Zinc	ppm	ASTM D5185(m)	370	295		
Sulfur	ppm	ASTM D5185(m) ASTM D5185(m)	2500	918 -1		
Lithium	ppm			<1		
CONTAMINAN	NTS	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185(m)	>15	<1		
Sodium	ppm	ASTM D5185(m)	0.6	2		
Potassium	ppm	ASTM D5185(m)	>20	1		
FLUID CLEAN	LINESS		limit/base	current	history1	history2
Particles >4µm		ASTM D7647	>5000	<u> </u>		
Particles >6µm		ASTM D7647	>1300	<u> </u>		
Particles >14µm		ASTM D7647	>160	34		
Particles >21µm		ASTM D7647		11		
Particles >38µm		ASTM D7647	>10	0		
Particles >71µm		ASTM D7647	>3	0		

ISO 4406 (c) >19/17/14 A 22/19/12

Oil Cleanliness

Contact/Location: Detlef Janssen - ELEBAR



OIL ANALYSIS REPORT

A Particle Trend		FLUID DEGRAI		method	limit/base	current	history1	history2
25k - 4μm		Acid Number (AN)	mg KOH/g	ASTM D974*	0.57	0.34		
		VISUAL		method	limit/base	current	history1	history2
20k		White Metal	scalar	Visual*	NONE	NONE		
10k		Yellow Metal	scalar	Visual*	NONE	NONE		
5k - Abnormal		Precipitate	scalar	Visual*	NONE	NONE		
0k 47			scalar	Visual*	NONE	NONE		
Jan2/24		Silt Debris	scalar	Visual*	NONE	NONE		
		Sand/Dirt	scalar	Visual*	NONE	NONE		
Viscosity @ 100°C		Appearance	scalar	Visual*	NORML	NORML		
7-		Odor	scalar	Visual*	NORML	NORML		
6.5 Abnormal		Emulsified Water	scalar	Visual*	>0.05	NEG		
6 - Base 5.5 - Base 5		Free Water	scalar	Visual*		NEG		
5 Abnormal		FLUID PROPE	RTIES	method	limit/base	current	history1	history2
4		Visc @ 40°C	cSt	ASTM D7279(m)	32	34.2		
3.5			cSt	ASTM D7279(m)	5.4	5.8		
Jan 2/24		Visc @ 100°C Viscosity Index (VI)	Scale	ASTM D2270*	102	111		
		SAMPLE IMAC		method	limit/base	current	history1	history2
Acid Number				method	in the base	Current	Thistory	THStory Z
-								
80 - Base		Color					no image	no image
60 - Base								
40								
20 - Abnormal		Bottom					no image	no image
00								
Jan 2/24								
		GRAF HS				P-H-L C		
Viscosity @ 100°C		Ferrous Alloys			491,520	Particle Count		T ²⁶
7-		E _ iron			122,880	1		-24
Abnormal		E 5 - inches			30,720	Severe		-22
6 - 5.5 - Base		0			± € 7.680	Abnomia		-20
5- Abnormal		Jan 2/24			Jan 2/24 (per 1 ml) 1,920			-20
.5- 9		Non-ferrous Meta			30 10 10 10 10 10			-16
.5 L		¹⁰ T	15		ed jo 120			16
Jan 2/24		E c copper			uper 120	1		
ř		E 5-			2 30			-12
Viscosity @ 40°C					54	-		+10
Abnormal		Jan 2/2			Jan 2/24			
		Viscosity @ 40°C			(4μ 21μ	38µ 71µ
34 - Base 32 - Base		40 T			24 10.0 Mumber 10.0 Mumber 10.	Acid Number		
		S 35 - Abnormal			y Bm)	Base		
Abnormal		값 35 - <mark>Base</mark> 장 30 - Abnormal			a 0.50	Abnormal		
28 -		25			0.00			
Jan 2/24	·	Jan 2/24			Jan2/24 Ac	Jan 2/24		1000
Jan		-			-	,		_
	CALA Laboratory Sample No		75 Apple Recieved		lington, ON L Feb 2024	7L 5H9		TOR ONE INC
	Lab Numbe	er : 02613440	Diagnos	ed : 06 l	Feb 2024		_0	BARRIE, ON
ISC ISC	Accredited Unique Numl	ber : 5722535		i cian : Bill	Quesnel			CA L4N 3V
1906376	aboratory Onique Num							
	aboratory Test Packa	ge : IND 2 (Additional T			1			
Talina da Calendaria da Ca Calendaria da Calendaria da	aboratory Test Packa discuss this sample repo		ice at 1-8	00-268-213		nal lab.	djanssen@	Detlef Jansse elevatorone.c (800)465-706

Contact/Location: Detlef Janssen - ELEBAR