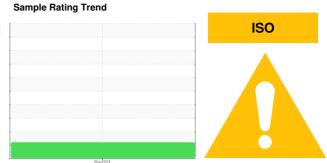


OIL ANALYSIS REPORT

Apel Extrusions - 888019 **PL003**

Hydraulic System

AW HYDRAULIC OIL ISO 46 (--- GAL)



DIAGNOSIS

Recommendation

The sample submitted is 2 times dirtier than the ISO dirt count recommendation of 19/16/14.

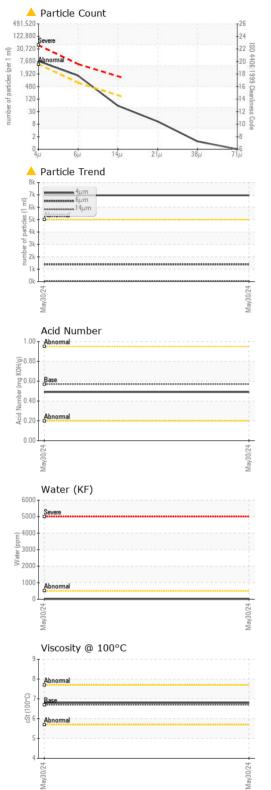
Contamination

Particles >6µm and oil cleanliness are abnormally high. Particles >4µm are notably high.

		<u>, </u>		May2024		
SAMPLE INFORM	MATION	method	limit/base	current	history1	history2
Machine ID		Client Info		Virgin Product		
Department		Client Info		Sales		
Production Stage		Client Info		Virgin		
Sent to WC		Client Info		06/25/2024		
Sample Number		Client Info		E30002476		
Sample Date		Client Info		30 May 2024		
Machine Age	hrs	Client Info		0		
Oil Age	hrs	Client Info		0		
Oil Changed		Client Info		N/A		
Sample Status				ABNORMAL		
WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185(m)	>20	0		
Chromium	ppm	ASTM D5185(m)	>20	0		
Nickel	ppm	ASTM D5185(m)	>20	<1		
Titanium	ppm	ASTM D5185(m)		0		
Silver	ppm	ASTM D5185(m)		0		
Aluminum	ppm	ASTM D5185(m)		0		
Lead	ppm	ASTM D5185(m)	>20	0		
Copper	ppm	ASTM D5185(m)		0		
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	14		
Phosphorus	ppm	ASTM D5185(m)	300	355		
Zinc	ppm	ASTM D5185(m)		445		
Sulfur	ppm	ASTM D5185(m)	2500	853		
Lithium	ppm	ASTM D5185(m)		<1		
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185(m)	>15	0		
Sodium	ppm	ASTM D5185(m)		1		
Potassium	ppm	ASTM D5185(m)	>20	0		
Water	%	ASTM D6304*	>0.05	0.001		
ppm Water	ppm	ASTM D6304*	>500	11		



OIL ANALYSIS REPORT



FLUID CLEANLIN	IESS	method	limit/base	current	history1	history2
	iLUU					
Particles >4µm		ASTM D7647		6960		
Particles >6µm		ASTM D7647		<u>1391</u>		
Particles >14µm		ASTM D7647	>160	51		
Particles >21µm		ASTM D7647	>40	9		
Particles >38µm		ASTM D7647	>10	1		
Particles >71µm			>3	0		
Oil Cleanliness		ISO 4406 (c)	>19/16/14	<u>^</u> 20/18/13		
FLUID DEGRADA	TION	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D974*	0.57	0.49		
VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	Visual*	NONE	NONE		
Yellow Metal	scalar	Visual*	NONE	NONE		
Precipitate	scalar	Visual*	NONE	NONE		
Silt	scalar	Visual*	NONE	NONE		
Debris	scalar	Visual*	NONE	NONE		
Sand/Dirt	scalar	Visual*	NONE	NONE		
Appearance	scalar	Visual*	NORML	NORML		
Odor	scalar	Visual*	NORML	NORML		
Emulsified Water	scalar	Visual*	>0.05	NEG		
Free Water	scalar	Visual*		NEG		
FLUID PROPERT	TES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D7279(m)	46	45.1		
Visc @ 100°C	cSt	ASTM D7279(m)	6.7	6.8		
Viscosity Index (VI)	Scale	ASTM D2270*	97	104		
SAMPLE IMAGES	3	method	limit/base	current	history1	history2
Color					no image	no image
Bottom					no image	no image



CALA ISO 17025:2017 Accredited Laboratory

Laboratory

Sample No. Lab Number : 02644342 Unique Number : 5801881

: E30002476

: WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9 Received

Tested Diagnosed

: 02 Jul 2024 - Aylwin Lee Test Package : IND 2 (Additional Tests: KF, KV100, TAN Man, VI) To discuss this sample report, contact Customer Service at 1-905-372-2251.

: 27 Jun 2024

: 28 Jun 2024

Test denoted (*) outside scope of accreditation, (m) method modified, (e) tested at external lab. Validity of results and interpretation are based on the sample and information as supplied.

Environmental 360 Solutions Ltd.

640 Victoria Street Cobourg, ON CA K9A 5H5

Contact: Tatiana Sorkina tsorkina@e360s.ca T: (800)263-3939

F: (905)373-4950

Report Id: CHECOB [WCAMIS] 02644342 (Generated: 07/02/2024 07:42:15) Rev: 1

Contact/Location: Tatiana Sorkina - CHECOB