

OIL ANALYSIS REPORT

KEMP QUARRIES / MUSKOGEE SAND [67434] Machine Id WL056

Component Hydraulic System Fluid

PETRO CANADA HYDREX AW 68 (--- GAL)

DIAGNOSIS

Recommendation

Resample at the next service interval to monitor. (Customer Sample Comment: $\mathsf{PM-4}$ changed fluid and filters)

Wear

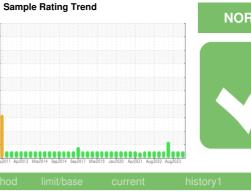
All component wear rates are normal.

Contamination

There is no indication of any contamination in the oil.

Fluid Condition

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

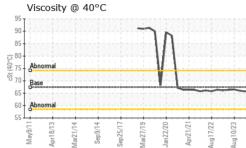


SAMPLE INFOR	MATION	method	limit/base	current	history1	history2
Sample Number		Client Info		PCA0086551	PCA0084739	PCA0070434
Sample Date		Client Info		18 Dec 2023	03 Oct 2023	10 Aug 2023
Machine Age	hrs	Client Info		34606	34177	33775
Oil Age	hrs	Client Info		34606	34177	1190
Oil Changed		Client Info		Changed	Not Changd	Not Changd
Sample Status				NORMAL	NORMAL	NORMAL
CONTAMINAT	ION	method	limit/base	current	history1	history2
Water		WC Method	>0.1	NEG	NEG	NEG
WEAR METAL	.S	method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>20	<1	3	3
Chromium	ppm	ASTM D5185m	>10	3	3	2
Nickel	ppm	ASTM D5185m	>10	<1	0	0
Titanium	ppm	ASTM D5185m		0	0	0
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>10	<1	<1	0
Lead	ppm	ASTM D5185m	>10	0	0	0
Copper	ppm	ASTM D5185m	>75	7	12	15
Tin	ppm	ASTM D5185m	>10	<1	0	0
Vanadium	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	0	0	0
Barium	ppm	ASTM D5185m	0	0	0	0
Molybdenum	ppm	ASTM D5185m	0	0	<1	0
Manganese	ppm	ASTM D5185m	0	0	0	0
Magnesium	ppm	ASTM D5185m	0	4	2	3
Calcium	ppm	ASTM D5185m	50	47	58	47
Phosphorus	ppm	ASTM D5185m	330	354	287	358
Zinc	ppm	ASTM D5185m	430	455	457	436
Sulfur	ppm	ASTM D5185m	760	886	846	854
CONTAMINAN	ITS	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>20	2	3	4
Sodium	ppm	ASTM D5185m		1	0	0
Potassium	ppm	ASTM D5185m	>20	0	1	0
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	>0.1	NEG	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG	NEG
0.00.16) Boy: 1						Submitted By:

NORMAL



OIL ANALYSIS REPORT



	FLUID PROPERTIES	method limit/base	current	history1	history2
70	Visc @ 40°C cSt	ASTM D445 67.4	65.7	66.0	66.5
	SAMPLE IMAGES	method limit/base	current	history1	history2
/11	Color		no image	no image	no image
Sep.25/1/19 Mar27/19 Apr21/21 Aug10/23 Aug10/23	Bottom		no image	no image	no image
	GRAPHS				
E	Iron (ppm)	30 25 20 <u>20</u>	- Severe		
	Mar21/11 Apr18/13 Sep9/14 Mar22/19 Sep9/14 Mar22/19 Mar22/19	$\mathcal{A}_{\mathcal{A}}$	Abnormal	Sep25/17	Apr21/21 Aug17/22 Aug10/23
High State	Aluminum (ppm) ³⁰ ²⁵ ³⁶ ³⁰ ³	30 25 20 <u><u></u> </u>	Chromium (pp)		
	5 0 1/1/6/ew Copper (ppm) 250 200 Severe	Aug 10/23 Aug 17/22 Aug 10/23	Silicon (ppm)	Sep.25/17 - Sep.25/17 - Sep.25/17 - Sep.25/17 - Sep.25/27 - Sep.27/20 - Sep.27	Apr21/21 + Aug17/22 + Aug10/23 +
Шd		April 21/21 Aug 17/22 Aug 10/23 Aug	- Abnormal	Sep25/17 - (Ma27/19 - Jan22/20 -	Apr21/21 { Aug17/22 Aug10/23 - }
(3-0-C) cSt (40-C)	Viscosity @ 40°C	3000 2500 2000 長 1500 1000 500	calcium phosphorus zinc	L	
	May9/11	· · · · · · · · · · · · · · · · · · ·		Sep25/17 Mar27/19 Jan22/20	Apr21/21 - Aug17/22 - Aug17/22 - Aug10/23
ntificate 12367 Test Package discuss this sample report, co Denotes test methods that ar	: WearCheck USA - 501 Madis : PCA0086551 Recieved : 06049694 Diagnose : 10810302 Diagnost : MOB 1 ontact Customer Service at 1-80 e outside of the ISO 17025 scop fications are based on the simple	: 02 Jan 2024 ed : 04 Jan 2024 ician : Sean Felton 00-237-1369. pe of accreditation.	Contact: mu:	Quarries - M 339 MUSCOGEE N skogee@musk	95 W 50th St I Porter, Ol US 7445 OTIFICATION

