

OIL ANALYSIS REPORT

Sample Rating Trend



QUANTUM M2 HPU2

Component Hydraulic System Fluid STELLA FOOD OIL 150 (--- GAL)

DIAGNOSIS

Recommendation

Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The system and fluid cleanliness is acceptable.

Fluid Condition

The AN level is acceptable for this fluid. The condition of the oil is suitable for further service.

SAMPLE INFORM	IATION	method	limit/base	current	history1	history2
Sample Number		Client Info		WC0885486	WC0743765	
Sample Date		Client Info		12 Feb 2024	10 May 2023	
Machine Age	hrs	Client Info		0	5890	
Oil Age	hrs	Client Info		1235	1140	
Oil Changed		Client Info		Not Changd	Not Changd	
Sample Status				NORMAL	NORMAL	
WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>20	0	2	
Chromium	ppm	ASTM D5185m	>20	<1	0	
Nickel	ppm	ASTM D5185m	>20	0	0	
Titanium	ppm	ASTM D5185m		0	0	
Silver	ppm	ASTM D5185m		0	0	
Aluminum	ppm	ASTM D5185m	>20	0	0	
Lead	ppm	ASTM D5185m	>20	0	0	
Copper	ppm	ASTM D5185m	>20	0	<1	
Tin	ppm	ASTM D5185m	>20	0	0	
Vanadium	ppm	ASTM D5185m		0	0	
Cadmium	ppm	ASTM D5185m		0	0	
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		0	0	
Barium	ppm	ASTM D5185m		0	0	
Molybdenum	ppm	ASTM D5185m		0	0	
Manganese	ppm	ASTM D5185m		0	0	
Magnesium	ppm	ASTM D5185m		<1	0	
Calcium	ppm	ASTM D5185m		2	<1	
Phosphorus	ppm	ASTM D5185m		111	147	
Zinc	ppm	ASTM D5185m		6	16	
Sulfur	ppm	ASTM D5185m		56	106	
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>15	2	2	
Sodium	ppm	ASTM D5185m		0	0	
Potassium	ppm	ASTM D5185m	>20	0	<1	
Water	%	ASTM D6304	>0.05	0.002		
ppm Water	ppm	ASTM D6304	>500	19		
FLUID CLEANLIN	ESS	method	limit/base	current	history1	history2
Particles >4µm		ASTM D7647	>5000	621	1348	
Particles >6µm		ASTM D7647	>1300	155	302	
Particles >14µm		ASTM D7647	>160	11	18	
Particles >21µm		ASTM D7647	>40	4	6	
Particles >38µm		ASTM D7647	>10	0	2	
Particles >71µm		ASTM D7647	>3	0	1	
Oil Cleanliness		ISO 4406 (c)	>19/17/14	16/14/11	18/15/11	
FLUID DEGRADA	TION	method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045		0.25	0.27	



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VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE	
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	
Precipitate	scalar	*Visual	NONE	NONE	NONE	
Silt	scalar	*Visual	NONE	NONE	NONE	
Debris	scalar	*Visual	NONE	NONE	NONE	
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	
Appearance	scalar	^Visual	NORML	NORML	NORML	
Udor	scalar	*Visual	NORML	NORML	NORML	
Free Water	scalar	*Visual	>0.05	NEG	NEG	
FLUID PROPERTI	ES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445		148	148	
SAMPLE IMAGES		method	limit/base	current	history1	history2
Color						no image
Bottom						no image
GRAPHS						
Ferrous Alloys			401 520	Particle Cour	it	20
8 iron			431,320	Ĩ		-20
6 - nickel			122,880	Courses .		-24
4			30,720			-22
2-			7.68			20
-10 			24 (Im 1,000	Aonormai		120
Aay 10			[per] 1201		· · · · · · · · · · · · · · · · · · ·	-18
Non-ferrous Metals			· 			-16
0 T			r of pe			
8 - copper			ag 120			-14 9
6 - tim			- 30	- \	$\mathbf{\mathbf{N}}$	-12
2				8-		-10
/10/23			12/24	2+		-8
May			。 出	0 4u 6u	144 214	384 714
Viscosity @ 40°C				Acid Number	- ibi c ibi	- spa i t t på
Abnormal			(B ^{0.30}] —————] (
50			Q 0.24			
50 -				2		
10-			N 0.06	6 -		
30 Abnormal			0.00			
ay 10/2:			eb 12/2 ⁴	ay10/23		eh 12/2
≥ NearCheck LISA - 501	Madisc	on Ave Carv	NC 27513	W	UNIV	
NC0885486	Rece	ived : 22	2 Feb 2024		1571	GRESSEL DR
0890500	Diag	u :23	7 FED 2024 Feb 2024 - Don	Baldridge	L	119 45833

* - 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)

Test Package : IND 2 (Additional Tests: KF)

To discuss this sample report, contact Customer Service at 1-800-237-1369.

Certificate L2367

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