OIL ANALYSIS REPORT

Sample Rating Trend

ISO

Area
LOISELLE [02622901]
Machine Id
HITACHI ZX75US-7 24HI275506 (S/N HCMDW60J00020042)
Component
Hydraulic System
Fluid
PANOLIN HLP SYNTH 46 (103 LTR)

DIAGNOSIS

Recommendation

Nous vous recommandons de remplacer le filtre et d`utiliser un système de filtrage hors-ligne afin d`améliorer la propreté du fluide. Nous vous recommandons d`échantillonner de nouveau dès que possible afin de contrôler la situation.

Wear

Les taux d`usure de tous les composants sont normaux.

Contamination

Il y a une quantité modérée de matières particulaires (2 à 100 µm de taille) présente dans l`huile. Il y a une faible concentration (<5.0%) d'huile minérale présente dans le fluide. La teneur en eau est négligeable. La propreté du système est supérieure à la limite acceptable pour votre objectif de propreté ISO 4406.

Fluid Condition

Le AN est acceptable pour ce fluide. l`huile peut encore servir si la contamination peut être réduite à un niveau acceptable.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number		Client Info		**WC**	---	---
Sample Date		Client Info		**15 Mar 2024**	---	---
Machine Age	hrs	Client Info		**5**	---	---
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)	>10	**0**	---	---
Nickel	ppm	ASTM D5185(m)	>10	**<1**	---	---
Titanium	ppm	ASTM D5185(m)		**0**	---	---
Silver	ppm	ASTM D5185(m)		**0**	---	---
Aluminum	ppm	ASTM D5185(m)	>10	**<1**	---	---
Lead	ppm	ASTM D5185(m)	>10	**0**	---	---
Copper	ppm	ASTM D5185(m)	>75	**<1**	---	---
Tin	ppm	ASTM D5185(m)	>10	**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**	---	---

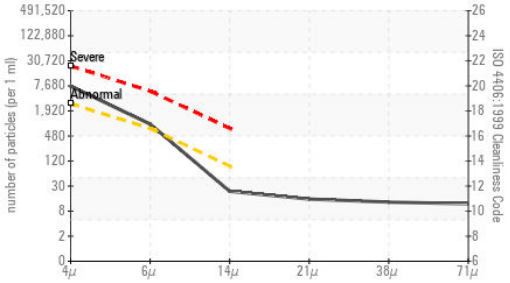
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185(m)	0	**<1**	---	---
Barium	ppm	ASTM D5185(m)	0	**0**	---	---
Molybdenum	ppm	ASTM D5185(m)	0	**0**	---	---
Manganese	ppm	ASTM D5185(m)	0	**0**	---	---
Magnesium	ppm	ASTM D5185(m)	0	**1**	---	---
Calcium	ppm	ASTM D5185(m)	0	**4**	---	---
Phosphorus	ppm	ASTM D5185(m)	1700	**1529**	---	---
Zinc	ppm	ASTM D5185(m)	0	**3**	---	---
Sulfur	ppm	ASTM D5185(m)	1350	**1522**	---	---
Lithium	ppm	ASTM D5185(m)		**<1**	---	---

CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185(m)	>20	**<1**	---	---
Sodium	ppm	ASTM D5185(m)		**0**	---	---
Potassium	ppm	ASTM D5185(m)	>20	**<1**	---	---
Water	%	ASTM D6304*	>0.05	**0.031**	---	---
ppm Water	ppm	ASTM D6304*	>500	**317**	---	---

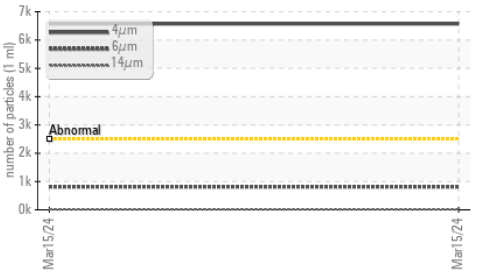
INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	ASTM D7844*		**0**	---	---
Nitration	Abs/cm	ASTM D7624*		**4.0**	---	---
Sulfation	Abs/.1mm	ASTM D7415*		**150.3**	---	---
Mineral Oil Content	%	ASTM D7418*	<5.0%	**<5.0**	---	---

OIL ANALYSIS REPORT

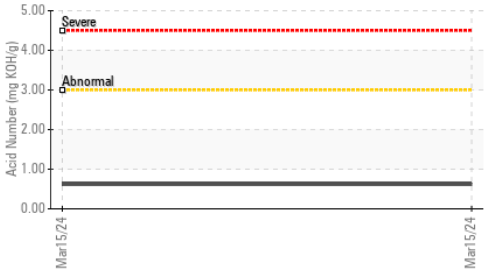
Particle Count



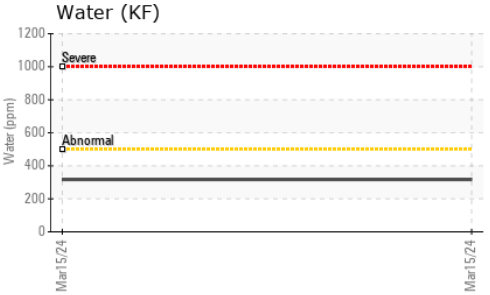
Particle Trend



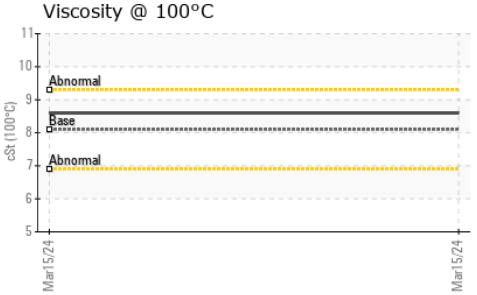
Acid Number



Water (KF)



Viscosity @ 100°C

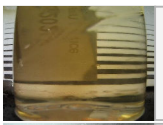


FLUID CLEANLINESS	method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>2500	▲ **6571**	---	---
Particles >6µm	ASTM D7647	>640	● **813**	---	---
Particles >14µm	ASTM D7647	>80	**20**	---	---
Particles >21µm	ASTM D7647	>20	**13**	---	---
Particles >38µm	ASTM D7647	>4	▲ **11**	---	---
Particles >71µm	ASTM D7647	>3	▲ **10**	---	---
Oil Cleanliness	ISO 4406 (c)	>18/16/13	▲ **20/17/11**	---	---

FLUID DEGRADATION		method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	ASTM D7414*		**153.6**	---	---
Acid Number (AN)	mg KOH/g	ASTM D974*		**0.62**	---	---

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 PROPERTIES		method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D7279(m)	47.0	**46.1**	---	---
Visc @ 100°C	cSt	ASTM D7279(m)	8.1	**8.6**	---	---
Viscosity Index (VI)	Scale	ASTM D2270*	146	**167**	---	---

SAMPLE IMAGES	method	limit/base	current	history1	history2
Color				*no image*	*no image*
Bottom				*no image*	*no image*

ISO 17025:2017 Accredited Laboratory

Laboratory : WearCheck - C8-1175 Appleby Line, Burlington, ON L7L 5H9
Sample No. : WC
Lab Number : 02622900
Unique Number : 5748019
Test Package : MOB 2 (Additional Tests: TAN Man)
Received : 18 Mar 2024
Tested : 20 Mar 2024
Diagnosed : 20 Mar 2024 - Kevin Marson

To discuss this sample report, contact Customer Service at 1-800-268-2131.
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.

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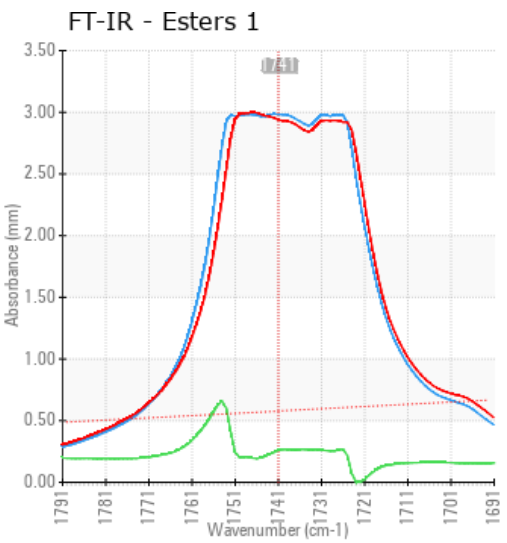
MINERAL OIL CONTENT REPORT

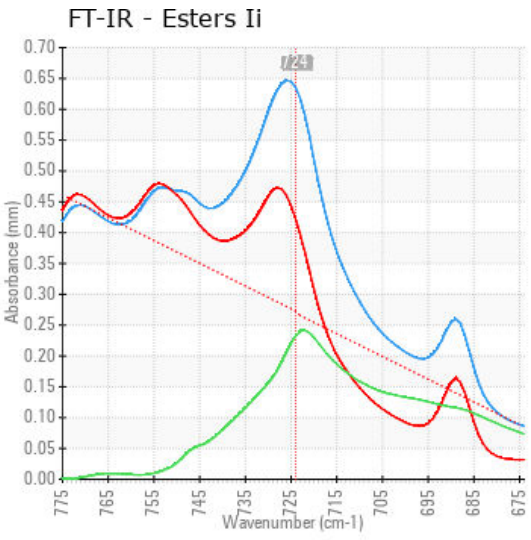
PASS

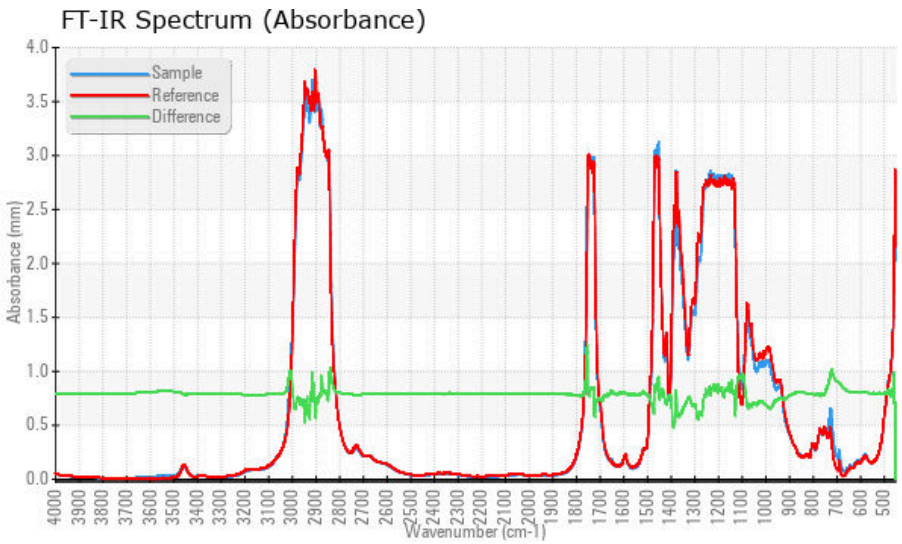
Area
LOISELLE [02622901]
Machine Id
HITACHI ZX75US-7 24HI275506 (S/N HCMDW60J00020042)
Component
Hydraulic System
Fluid
PANOLIN HLP SYNTH 46 (103 LTR)

SPECTRAL ANALYSIS

		method	limit/base	current	history1	history2
Zinc	ppm	ASTM D5185(m)	0	**3**	---	---
Mineral Oil Content	%	ASTM D7418*	<5.0%	**<5.0**	---	---







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