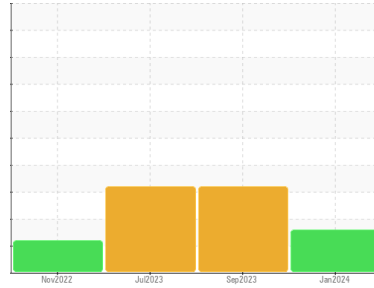




# OIL ANALYSIS REPORT

## Sample Rating Trend



## VISCOSITY



## Machine Id BIG BLUE HYDRAULIC UNIT

Component  
Hydraulic System

Fluid  
BENZ OIL ULTRA GUARD 552 (350 GAL)

### DIAGNOSIS

#### ● Recommendation

No corrective action is recommended at this time. Resample at the next service interval to monitor.

#### 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 oil viscosity is higher than normal. The AN level is acceptable for this fluid.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number	Client Info			<b>PH0000236</b>	PH0000294	PH0000212
Sample Date	Client Info			<b>26 Jan 2024</b>	21 Sep 2023	12 Jul 2023
Machine Age	hrs	Client Info		<b>14164</b>	0	0
Oil Age	hrs	Client Info		<b>14164</b>	12124	11092
Oil Changed	Client Info			<b>Not Chngd</b>	Filtered	Filtered
Sample Status				<b>ATTENTION</b>	SEVERE	SEVERE

CONTAMINATION		method	limit/base	current	history1	history2
Water	WC Method		>0.05	<b>NEG</b>	NEG	NEG

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>20	<b>10</b>	8	8
Chromium	ppm	ASTM D5185m	>20	<b>3</b>	2	2
Nickel	ppm	ASTM D5185m	>20	<b>0</b>	0	<1
Titanium	ppm	ASTM D5185m		<b>0</b>	0	0
Silver	ppm	ASTM D5185m		<b>0</b>	0	1
Aluminum	ppm	ASTM D5185m	>20	<b>0</b>	<1	0
Lead	ppm	ASTM D5185m	>20	<b>0</b>	0	<1
Copper	ppm	ASTM D5185m	>20	<b>11</b>	6	7
Tin	ppm	ASTM D5185m	>20	<b>1</b>	<1	<1
Vanadium	ppm	ASTM D5185m		<b>0</b>	0	<1
Cadmium	ppm	ASTM D5185m		<b>0</b>	0	0

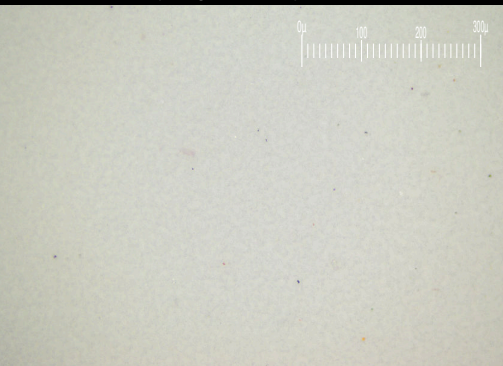
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		<b>0</b>	0	0
Barium	ppm	ASTM D5185m		<b>0</b>	0	0
Molybdenum	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
Manganese	ppm	ASTM D5185m		<b>&lt;1</b>	<1	<1
Magnesium	ppm	ASTM D5185m		<b>0</b>	<1	1
Calcium	ppm	ASTM D5185m		<b>&lt;1</b>	6	2
Phosphorus	ppm	ASTM D5185m		<b>323</b>	270	289
Zinc	ppm	ASTM D5185m		<b>4</b>	7	11
Sulfur	ppm	ASTM D5185m		<b>1433</b>	1213	969

CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>15	<b>2</b>	3	3
Sodium	ppm	ASTM D5185m		<b>3</b>	4	3
Potassium	ppm	ASTM D5185m	>20	<b>0</b>	<1	2

FLUID CLEANLINESS		method	limit/base	current	history1	history2
Particles >4µm	ASTM D7647	>1300	● <b>1613</b>	913	495	
Particles >6µm	ASTM D7647	>320	● <b>463</b>	248	154	
Particles >14µm	ASTM D7647	>80	<b>54</b>	20	23	
Particles >21µm	ASTM D7647	>20	<b>13</b>	6	7	
Particles >38µm	ASTM D7647	>4	<b>0</b>	1	0	
Particles >71µm	ASTM D7647	>3	<b>0</b>	0	0	
Oil Cleanliness	ISO 4406 (c)	>17/15/13	● <b>18/16/13</b>	17/15/11	16/14/12	

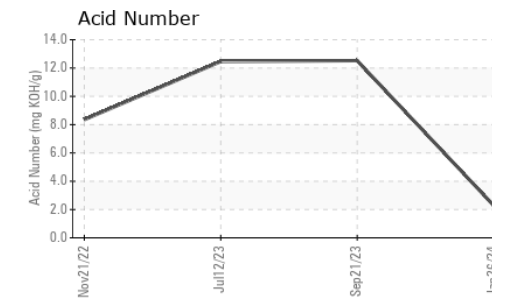
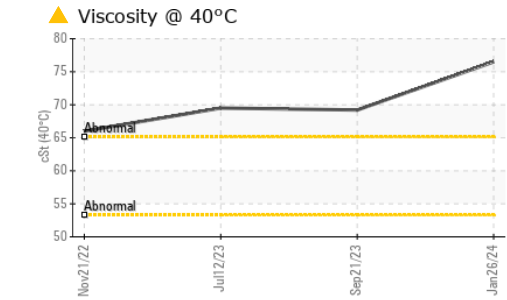
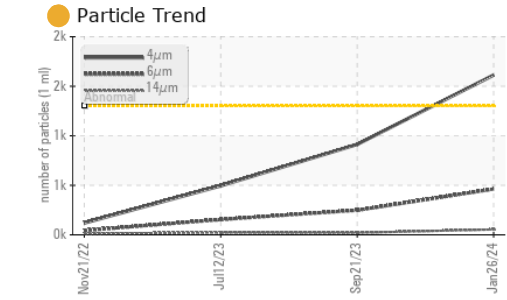
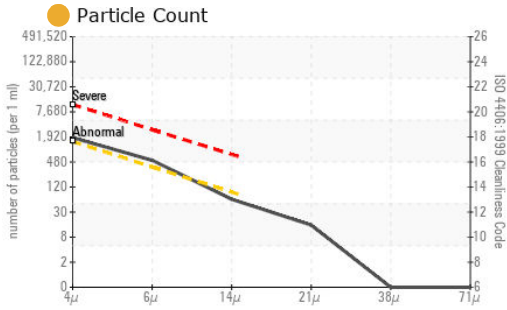
FLUID DEGRADATION		method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045		<b>2.29</b>	▲ 12.52	▲ 12.46

Particle Filter (Magn: 200 x)





# OIL ANALYSIS REPORT



Certificate L2367

**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : PH0000236  
**Lab Number** : 06124902  
**Unique Number** : 10939053  
**Test Package** : PLANT ( Additional Tests: PrtFilter )  
**Received** : 21 Mar 2024  
**Tested** : 27 Mar 2024  
**Diagnosed** : 27 Mar 2024 - Jonathan Hester

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

\* - 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)

**DEETER FOUNDRY**  
 5945 N 70TH ST  
 LINCOLN, NE  
 US 68507

Contact: BRANDON KUHNKE  
 brandon.kuhnke@groupnei.com

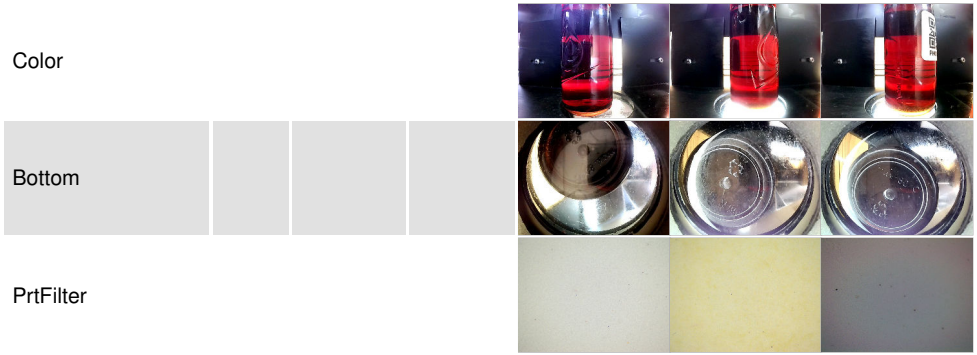
T: (402)464-7466

F:

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
Odor	scalar	*Visual	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.05	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	▲ 76.5	69.2	69.5

SAMPLE IMAGES	method	limit/base	current	history1	history2
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## GRAPHS

