



# OIL ANALYSIS REPORT

WEAR	<b>NORMAL</b>
CONTAMINATION	<b>SEVERE</b>
FLUID CONDITION	<b>NORMAL</b>

Machine Id  
**HPU-4**  
 Component  
**Hydraulic System**  
 Fluid  
**DURALENE ZD AW 100 (--- LTR)**

## RECOMMENDATION

Check seals and/or filters for points of contaminant entry. The air breather requires service. If unrated, we recommend that you replace with a suitable micron rated and/or desiccant air breather. If rated, we recommend that you service/replace the breather. We recommend you service the filters on this component. Resample in 30-45 days to monitor this situation. Please specify the component make and model with your next sample.

## WEAR

All component wear rates are normal.

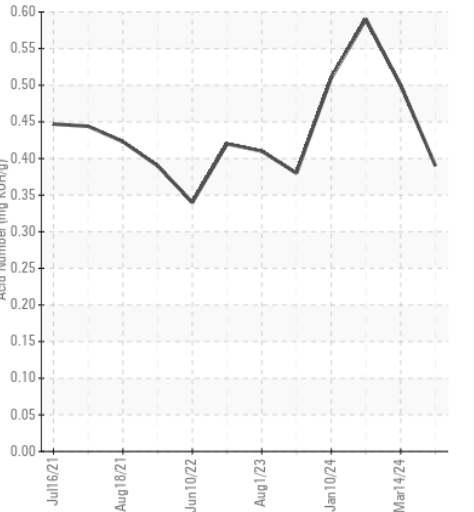
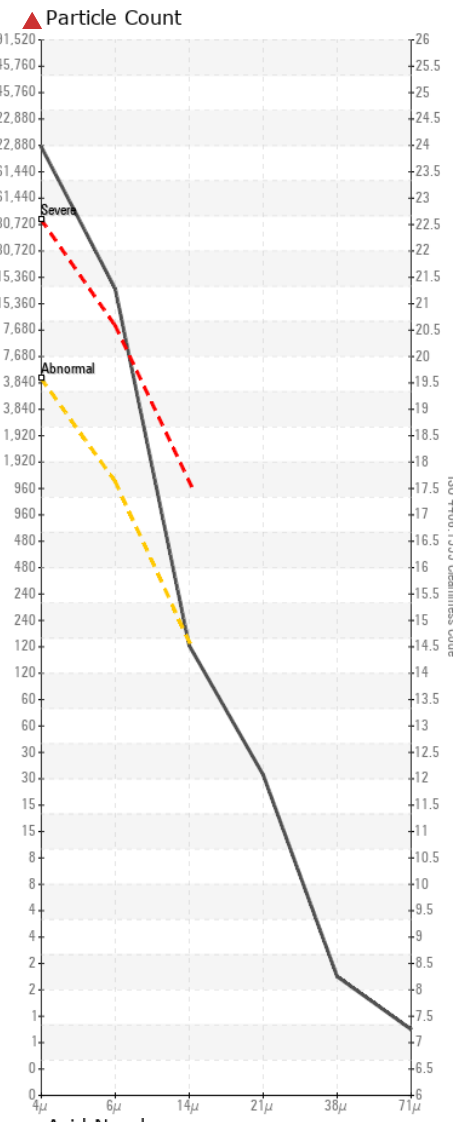
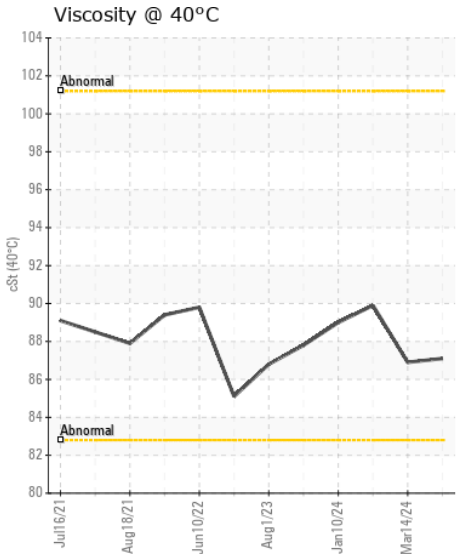
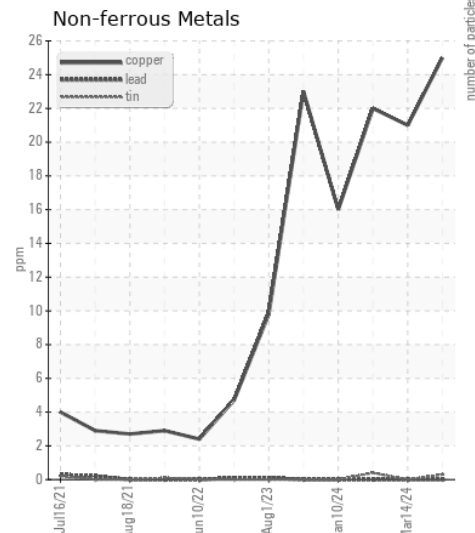
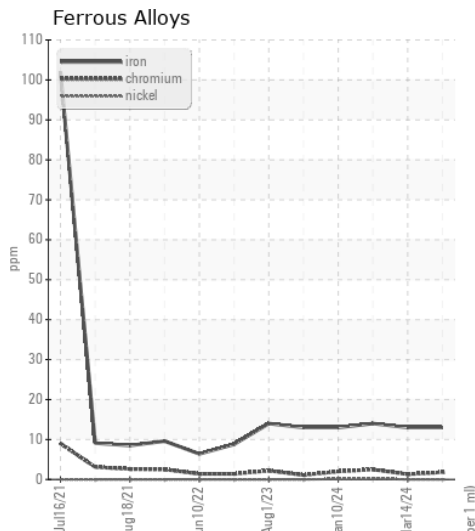
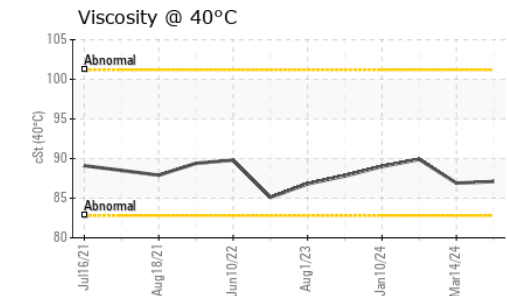
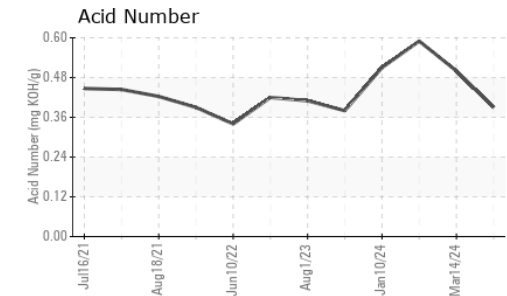
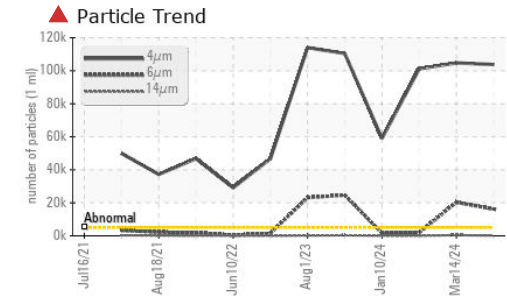
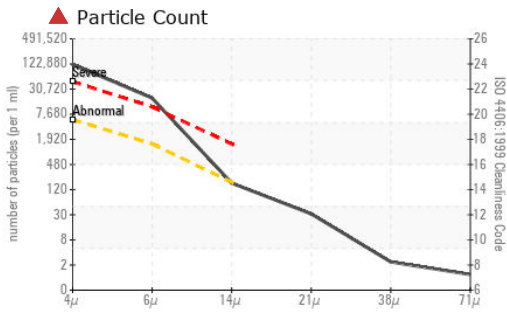
## CONTAMINATION

There is a high amount of silt (particulates < 14 microns in size) present in the oil.

## FLUID CONDITION

The AN level is acceptable for this fluid. The oil is still serviceable provided that the contaminant(s) can be reduced to acceptable levels.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		<b>DC0009083</b>	DC0027416	DC0027582
Sample Date		Client Info		<b>09 Jul 2024</b>	14 Mar 2024	09 Feb 2024
Machine Age	mths	Client Info		<b>0</b>	16	16
Oil Age	mths	Client Info		<b>0</b>	0	2
Filter Age	mths	Client Info		<b>3</b>	0	1
Oil Changed		Client Info		<b>Not Changd</b>	Not Changd	Not Changd
Filter Changed		Client Info		<b>Not Changd</b>	Not Changd	Not Changd
Sample Status				<b>SEVERE</b>	ABNORMAL	ABNORMAL
Iron	ppm	ASTM D5185m	>20	<b>13</b>	13	14
Chromium	ppm	ASTM D5185m	>10	<b>2</b>	1	2
Nickel	ppm	ASTM D5185m	>10	<b>0</b>	0	<1
Titanium	ppm	ASTM D5185m		<b>&lt;1</b>	0	<1
Silver	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
Aluminum	ppm	ASTM D5185m	>10	<b>4</b>	0	<1
Lead	ppm	ASTM D5185m	>10	<b>0</b>	0	0
Copper	ppm	ASTM D5185m	>75	<b>25</b>	21	22
Tin	ppm	ASTM D5185m	>10	<b>&lt;1</b>	0	<1
Vanadium	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Silicon	ppm	ASTM D5185m	>20	<b>4</b>	3	4
Potassium	ppm	ASTM D5185m	>20	<b>1</b>	0	<1
Water		WC Method	>0.1	<b>NEG</b>	NEG	NEG
Particles >4µm		ASTM D7647	>5000	<b>▲ 103764</b>	▲ 104742	▲ 101125
Particles >6µm		ASTM D7647	>1300	<b>▲ 16195</b>	▲ 20326	● 1933
Particles >14µm		ASTM D7647	>160	<b>152</b>	▲ 404	50
Particles >21µm		ASTM D7647	>40	<b>28</b>	▲ 69	15
Particles >38µm		ASTM D7647	>10	<b>2</b>	1	0
Particles >71µm		ASTM D7647	>3	<b>1</b>	0	0
Oil Cleanliness		ISO 4406 (c)	>19/17/14	<b>▲ 24/21/14</b>	▲ 24/22/16	▲ 24/18/13
Silt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Debris	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Appearance	scalar	*Visual	NORML	<b>NORML</b>	NORML	NORML
Odor	scalar	*Visual	NORML	<b>NORML</b>	NORML	NORML
Emulsified Water	scalar	*Visual	>0.1	<b>NEG</b>	NEG	NEG
Sodium	ppm	ASTM D5185m		<b>0</b>	1	<1
Boron	ppm	ASTM D5185m		<b>2</b>	1	4
Barium	ppm	ASTM D5185m		<b>20</b>	0	0
Molybdenum	ppm	ASTM D5185m		<b>&lt;1</b>	0	1
Manganese	ppm	ASTM D5185m		<b>0</b>	0	<1
Magnesium	ppm	ASTM D5185m		<b>79</b>	75	85
Calcium	ppm	ASTM D5185m		<b>190</b>	200	181
Phosphorus	ppm	ASTM D5185m		<b>311</b>	343	349
Zinc	ppm	ASTM D5185m		<b>426</b>	394	431
Sulfur	ppm	ASTM D5185m		<b>7670</b>	8711	8681
Acid Number (AN)	mg KOH/g	ASTM D8045		<b>0.39</b>	0.50	0.59
Visc @ 40°C	cSt	ASTM D445		<b>87.1</b>	86.9	89.9



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : DC0009083 **Received** : 18 Jul 2024  
**Lab Number** : 06240262 **Tested** : 19 Jul 2024  
**Unique Number** : 11129096 **Diagnosed** : 19 Jul 2024 - Wes Davis  
**Test Package** : MOB 2

**CONSERVIT INC.**  
 PO BOX 1517  
 HAGERSTOWN, MD  
 US 21740  
 Contact: DON LONG

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)

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