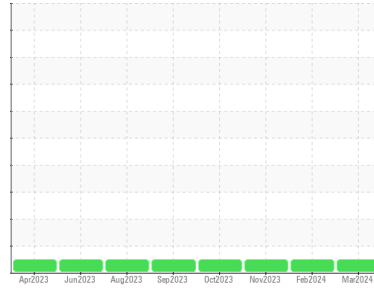




# OIL ANALYSIS REPORT

Sample Rating Trend



**NORMAL**



Area  
**WOOD PROCESSING EQUIPMENT**  
 Machine Id  
**PLANER STACKER**

Component  
**Hydraulic System**  
 Fluid  
**SHELL AW HYDRAULIC S2 46 (--- GAL)**

## DIAGNOSIS

### Recommendation

Resample at the next service interval to monitor.

### Wear

All component wear rates are normal.

### Contamination

There is no indication of any contamination in the oil. The amount and size of particulates present in the system are acceptable.

### Fluid Condition

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

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number	Client Info			<b>PE0000700</b>	PE06098278	PE0000732
Sample Date	Client Info			<b>15 Mar 2024</b>	22 Feb 2024	30 Nov 2023
Machine Age	hrs	Client Info		<b>0</b>	0	0
Oil Age	hrs	Client Info		<b>0</b>	0	0
Oil Changed	Client Info			<b>N/A</b>	N/A	N/A
Sample Status				<b>NORMAL</b>	NORMAL	NORMAL

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

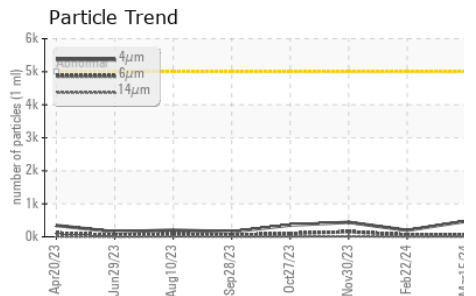
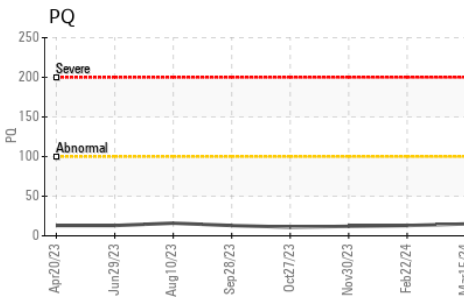
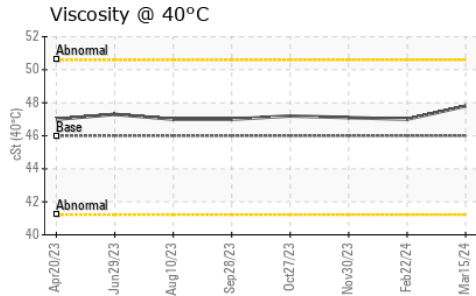
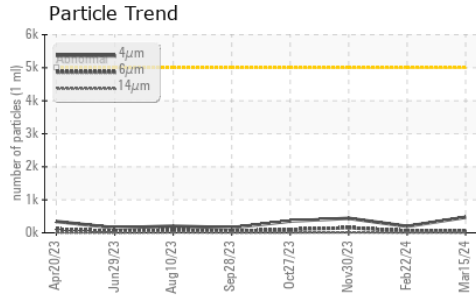
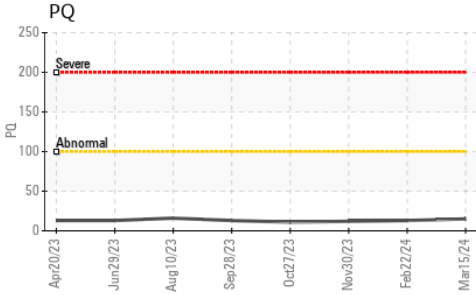
WEAR METALS		method	limit/base	current	history1	history2
PQ		ASTM D8184		<b>15</b>	13	12
Iron	ppm	ASTM D5185m	>20	<b>0</b>	2	0
Chromium	ppm	ASTM D5185m	>20	<b>&lt;1</b>	<1	0
Nickel	ppm	ASTM D5185m	>20	<b>0</b>	<1	0
Titanium	ppm	ASTM D5185m		<b>&lt;1</b>	<1	<1
Silver	ppm	ASTM D5185m		<b>0</b>	<1	0
Aluminum	ppm	ASTM D5185m	>20	<b>3</b>	<1	0
Lead	ppm	ASTM D5185m	>20	<b>&lt;1</b>	<1	0
Copper	ppm	ASTM D5185m	>20	<b>4</b>	2	1
Tin	ppm	ASTM D5185m	>20	<b>&lt;1</b>	<1	0
Vanadium	ppm	ASTM D5185m		<b>&lt;1</b>	0	0
Cadmium	ppm	ASTM D5185m		<b>&lt;1</b>	<1	0

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		<b>0</b>	0	6
Barium	ppm	ASTM D5185m		<b>&lt;1</b>	5	0
Molybdenum	ppm	ASTM D5185m		<b>&lt;1</b>	1	0
Manganese	ppm	ASTM D5185m		<b>0</b>	<1	<1
Magnesium	ppm	ASTM D5185m		<b>9</b>	7	8
Calcium	ppm	ASTM D5185m		<b>59</b>	51	322
Phosphorus	ppm	ASTM D5185m		<b>302</b>	259	383
Zinc	ppm	ASTM D5185m		<b>375</b>	334	465
Sulfur	ppm	ASTM D5185m		<b>2013</b>	1811	2117

CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>15	<b>2</b>	2	1
Sodium	ppm	ASTM D5185m		<b>0</b>	0	11
Potassium	ppm	ASTM D5185m	>20	<b>&lt;1</b>	<1	0

FLUID CLEANLINESS		method	limit/base	current	history1	history2
Particles >4µm		ASTM D7647	>5000	<b>473</b>	196	440
Particles >6µm		ASTM D7647	>1300	<b>59</b>	62	152
Particles >14µm		ASTM D7647	>160	<b>5</b>	6	13
Particles >21µm		ASTM D7647	>40	<b>2</b>	1	3
Particles >38µm		ASTM D7647	>10	<b>0</b>	0	0
Particles >71µm		ASTM D7647	>3	<b>0</b>	0	0
Oil Cleanliness		ISO 4406 (c)	>19/17/14	<b>16/13/10</b>	15/13/10	16/14/11

# OIL ANALYSIS REPORT

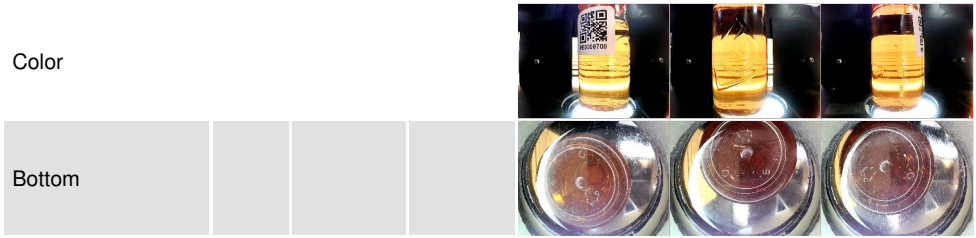


FLUID DEGRADATION		method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045		<b>0.28</b>	0.24	0.27

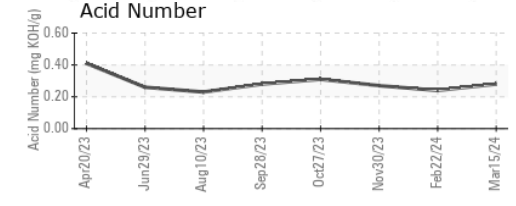
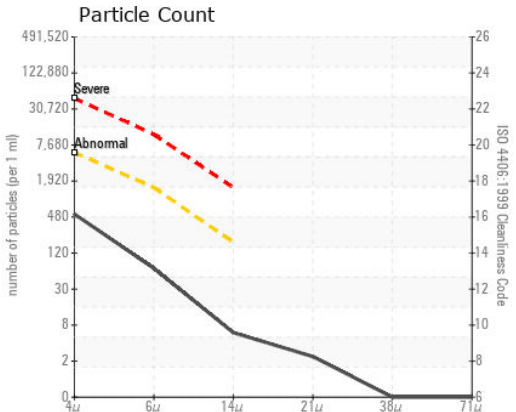
VISUAL		method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Precipitate	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Silt	scalar	*Visual	NONE	<b>NONE</b>	NONE	NONE
Debris	scalar	*Visual	NONE	<b>NONE</b>	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	>0.05	<b>NEG</b>	NEG	NEG
Free Water	scalar	*Visual		<b>NEG</b>	NEG	NEG

FLUID PROPERTIES		method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	46	<b>47.8</b>	47.0	47.1

### SAMPLE IMAGES



### GRAPHS



**Laboratory** : WearCheck USA - 501 Madison Ave., Cary, NC 27513  
**Sample No.** : PE0000700 **Received** : 29 Mar 2024  
**Lab Number** : **06133135** **Tested** : 01 Apr 2024  
**Unique Number** : 10952600 **Diagnosed** : 02 Apr 2024 - Don Baldrige  
**Test Package** : PLANT ( Additional Tests: ICP, KV40, PQ, PrtCount, SCREEN )

**WEYERHAEUSER - RAYMOND LUMBER**  
 1740 51 ELLIS ST  
 RAYMOND, WA  
 US 98577  
 Contact: JOHNNY DOMINGUEZ  
 johnny.dominguez@weyerhaeuser.com

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)