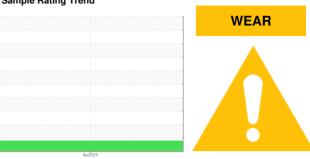


OIL ANALYSIS REPORT

Sample Rating Trend



Machine Id

AEROSTAR

Right Piston Aircraft Engine

PHILLIPS 66 AVIATION X/C OIL SAE20W50

DIAGNOSIS

Recommendation

We advise that you check the engine magneto timing. We advise that you perform a compression test, and a borescope exam. We recommend that you drain the oil from the component if this has not already been done. We recommend an early resample to monitor this condition. Provided compression test checks O.K., resample in 20 to 25 hours to monitor. Please specify the component make and model with your next sample.

Wear

Iron ppm levels are abnormal. Cylinder wear is indicated.

Contamination

There is no indication of any contamination in the oil.

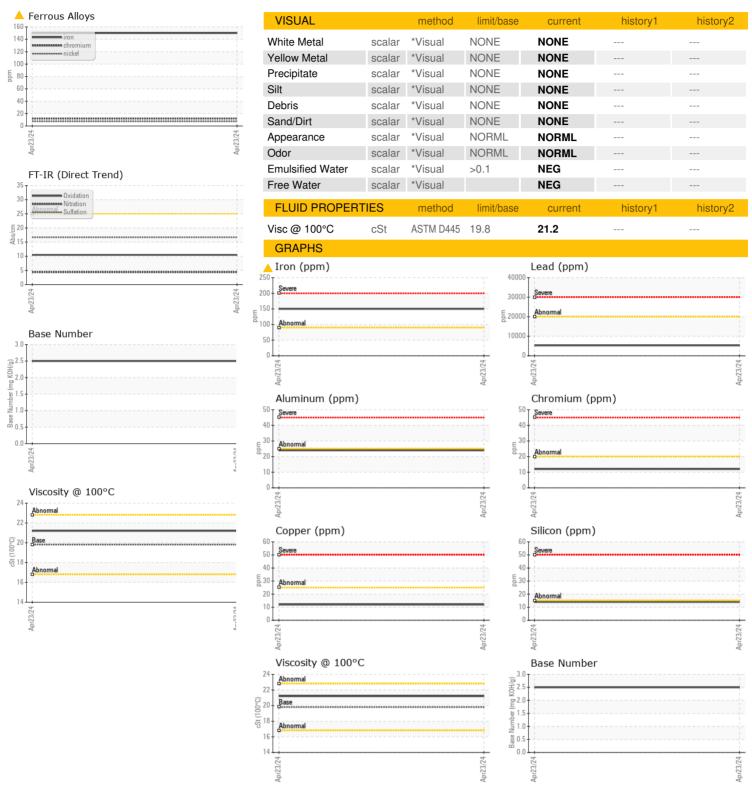
Fluid Condition

The BN result indicates that there is suitable alkalinity remaining in the oil. The oil is no longer serviceable as a result of the abnormal and/or severe wear.

(GAL)				Apr2024		
SAMPLE INFORM	MATION	method	limit/base	current	history1	history2
Sample Number		Client Info		WC0498794		
Sample Date		Client Info		23 Apr 2024		
Machine Age	hrs	Client Info		0		
Oil Age	hrs	Client Info		0		
Oil Changed		Client Info		N/A		
Sample Status				ABNORMAL		
CONTAMINATIO	N	method	limit/base	current	history1	history2
-uel		WC Method	>4.0	<1.0		
Nater		WC Method	>0.1	NEG		
Glycol		WC Method		NEG		
WEAR METALS		method	limit/base	current	history1	history2
ron	ppm	ASTM D5185m	>90	150		
Chromium	ppm	ASTM D5185m	>20	12		
Nickel	ppm	ASTM D5185m	>15	7		
Titanium	ppm	ASTM D5185m		0		
Silver	ppm	ASTM D5185m	>5	0		
Aluminum	ppm	ASTM D5185m	>25	24		
_ead	ppm	ASTM D5185m	>20000	5298		
Copper	ppm	ASTM D5185m	>25	12		
Γin	ppm	ASTM D5185m	>30	1		
/anadium	ppm	ASTM D5185m		0		
Cadmium	ppm	ASTM D5185m		<1		
ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		0		
Barium	ppm	ASTM D5185m		0		
Molybdenum	ppm	ASTM D5185m		0		
Manganese	ppm	ASTM D5185m		1		
Magnesium	ppm	ASTM D5185m		4		
Calcium	ppm	ASTM D5185m		0		
Phosphorus	ppm	ASTM D5185m		2		
Zinc	ppm	ASTM D5185m		0		
Sulfur	ppm	ASTM D5185m		1454		
CONTAMINANTS	8	method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m	>15	14		
Sodium	ppm	ASTM D5185m		0		
Potassium	ppm	ASTM D5185m	>20	2		
INFRA-RED		method	limit/base	current	history1	history2
Soot %	%	*ASTM D7844		0.4		
Vitration	Abs/cm	*ASTM D7624	>20	4.4		
Sulfation	Abs/.1mm	*ASTM D7415	>30	16.7		
FLUID DEGRADA	ATION	method	limit/base	current	history1	history2
Oxidation	Abs/.1mm	*ASTM D7414	>25	10.5		
Base Number (BN)	mg KOH/g	ASTM D2896		2.5		



OIL ANALYSIS REPORT





Certificate 12367

Laboratory Sample No.

: WC0498794 Lab Number : 06158767 Unique Number : 10994190 Test Package : MOB1+

: WearCheck USA - 501 Madison Ave., Cary, NC 27513

Received : 24 Apr 2024 **Tested** : 25 Apr 2024

Diagnosed : 26 Apr 2024 - Jonathan Hester

Contact: MARK WOOLNOUGH markw@anconacontrols.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)

WIXOM, MI

US 48393

T:

F:

ANCONA CONTROLS

28021 GRAND OAKS CT