

OIL ANALYSIS REPORT

Sample Rating Trend



ISO



Machine Id
002 - MOBIL DELVAC 1300 10W30

Component
New (Unused) Oil
Fluid
{not provided} (--- GAL)

DIAGNOSIS

▲ Recommendation

This is a baseline read-out on the submitted sample.

▲ Contamination

There is a moderate amount of silt (particulates < 6 microns in size) present in the oil.

SAMPLE INFORMATION		method	limit/base	current	history1	history2
Sample Number	Client Info			PCA0099988	---	---
Sample Date	Client Info			14 Sep 2023	---	---
Machine Age	hrs	Client Info		0	---	---
Oil Age	hrs	Client Info		0	---	---
Oil Changed	Client Info			N/A	---	---
Sample Status				ATTENTION	---	---

WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m		1	---	---
Chromium	ppm	ASTM D5185m		0	---	---
Nickel	ppm	ASTM D5185m		0	---	---
Titanium	ppm	ASTM D5185m		<1	---	---
Silver	ppm	ASTM D5185m		0	---	---
Aluminum	ppm	ASTM D5185m		2	---	---
Lead	ppm	ASTM D5185m		0	---	---
Copper	ppm	ASTM D5185m		<1	---	---
Tin	ppm	ASTM D5185m		<1	---	---
Vanadium	ppm	ASTM D5185m		0	---	---
Cadmium	ppm	ASTM D5185m		0	---	---

ADDITIVES		method	limit/base	current	history1	history2
Boron	ppm	ASTM D5185m		84	---	---
Barium	ppm	ASTM D5185m		0	---	---
Molybdenum	ppm	ASTM D5185m		39	---	---
Manganese	ppm	ASTM D5185m		<1	---	---
Magnesium	ppm	ASTM D5185m		506	---	---
Calcium	ppm	ASTM D5185m		1724	---	---
Phosphorus	ppm	ASTM D5185m		749	---	---
Zinc	ppm	ASTM D5185m		880	---	---
Sulfur	ppm	ASTM D5185m		2854	---	---

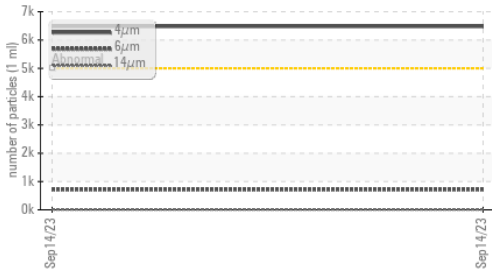
CONTAMINANTS		method	limit/base	current	history1	history2
Silicon	ppm	ASTM D5185m		9	---	---
Sodium	ppm	ASTM D5185m		3	---	---
Potassium	ppm	ASTM D5185m	>20	<1	---	---

FLUID CLEANLINESS		method	limit/base	current	history1	history2
Particles >4µm		ASTM D7647	>5000	▲ 6481	---	---
Particles >6µm		ASTM D7647	>1300	717	---	---
Particles >14µm		ASTM D7647	>160	12	---	---
Particles >21µm		ASTM D7647	>40	2	---	---
Particles >38µm		ASTM D7647	>10	0	---	---
Particles >71µm		ASTM D7647	>3	0	---	---
Oil Cleanliness		ISO 4406 (c)	>19/17/14	▲ 20/17/11	---	---

FLUID DEGRADATION		method	limit/base	current	history1	history2
Acid Number (AN)	mg KOH/g	ASTM D8045		1.06	---	---
Base Number (BN)	mg KOH/g	ASTM D2896		9.95	---	---

OIL ANALYSIS REPORT

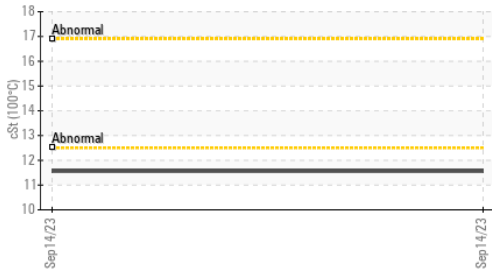
▲ Particle Trend



Base Number



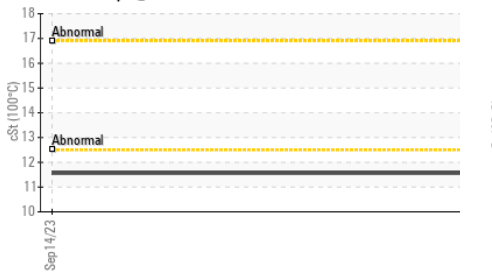
Viscosity @ 100°C



Acid Number



Viscosity @ 100°C



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	NEG	---	---
Free Water	scalar	*Visual	NEG	---	---

FLUID PROPERTIES	method	limit/base	current	history1	history2
Visc @ 40°C	cSt	ASTM D445	76.2	---	---
Visc @ 100°C	cSt	ASTM D445	11.56	---	---
Viscosity Index (VI)	Scale	ASTM D2270	144	---	---

SAMPLE IMAGES

method	limit/base	current	history1	history2
Color			no image	no image
Bottom			no image	no image

GRAPHS

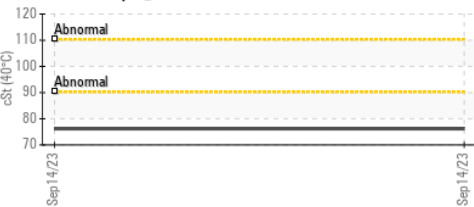
Ferrous Alloys



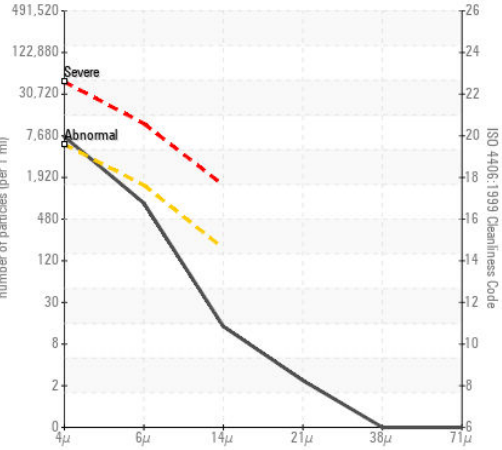
Non-ferrous Metals



Viscosity @ 40°C



▲ Particle Count



Acid Number



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : PCA0099988 **Received** : 14 Sep 2023
Lab Number : 05952374 **Diagnosed** : 21 Sep 2023
Unique Number : 10648333 **Diagnostician** : Jonathan Hester

MVP INC - MISSOURI VALLEY PETROLEUM
 1722 MANDAN AVE
 MANDAN, ND
 US 58554

Test Package : MOB 2 (Additional Tests: FT-IR, ICP-NewOil, KV100, PrtCount, TBN, VI)

Contact: RIC ABERLE
 RICHARD.ABERLE@PARKLANDUSA.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.

T: (701)663-5091

Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)

F: (701)663-9445