



WEAR	NORMAL
CONTAMINATION	NORMAL
FLUID CONDITION	NORMAL

Area
VQU
Machine Id
Component
VQU
Hydraulic System
Fluid
CHEVRON RANDO HD 68 (300 GAL)

RECOMMENDATION

Resample at the next service interval to monitor.

Test	UOM	Method	Limit/Abn	Current	History1	History2
Sample Number		Client Info		MW0039996	MW0060709	MW0016760
Sample Date		Client Info		14 Apr 2024	13 Jan 2024	24 Aug 2023
Machine Age	hrs	Client Info		32055	0	26636
Oil Age	hrs	Client Info		32055	30102	26636
Filter Age	hrs	Client Info		32055	0	26636
Oil Changed		Client Info		Not Changd	Not Changd	Not Changd
Filter Changed		Client Info		Not Changd	N/A	Not Changd
Sample Status				NORMAL	NORMAL	NORMAL

WEAR

All component wear rates are normal.

Iron	ppm	ASTM D5185m	>20	0	1	1
Chromium	ppm	ASTM D5185m	>10	0	<1	0
Nickel	ppm	ASTM D5185m	>10	0	0	0
Titanium	ppm	ASTM D5185m		0	<1	0
Silver	ppm	ASTM D5185m		0	0	0
Aluminum	ppm	ASTM D5185m	>10	0	2	<1
Lead	ppm	ASTM D5185m	>20	0	1	0
Copper	ppm	ASTM D5185m	>20	2	5	3
Tin	ppm	ASTM D5185m	>10	0	<1	0
Vanadium	ppm	ASTM D5185m		0	0	0
White Metal	scalar	*Visual	NONE	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE	NONE

CONTAMINATION

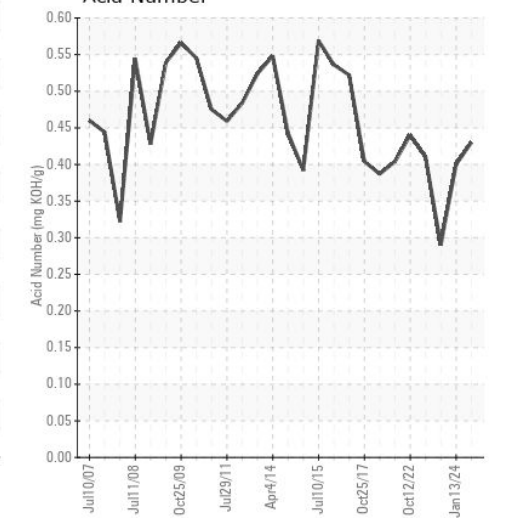
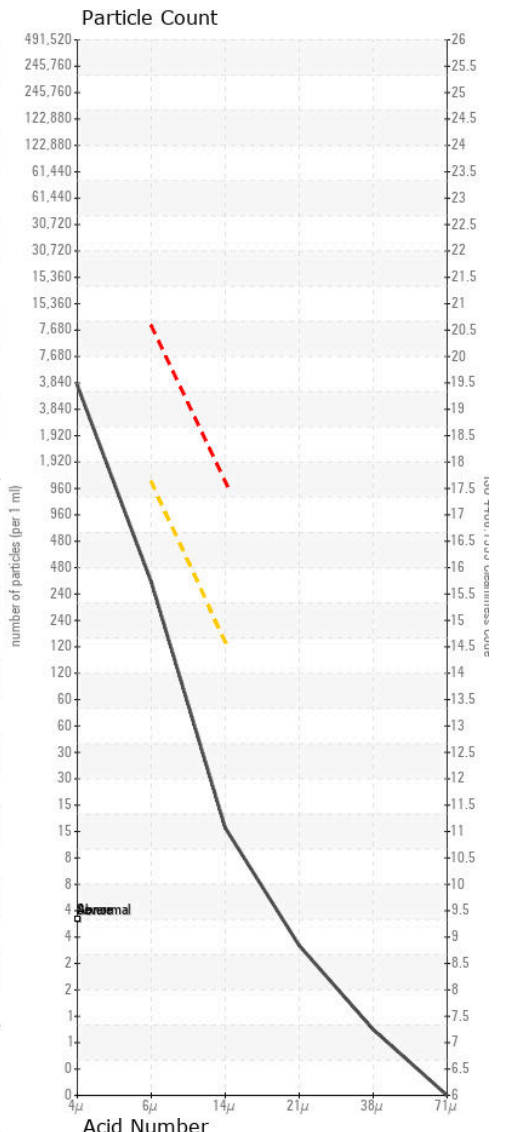
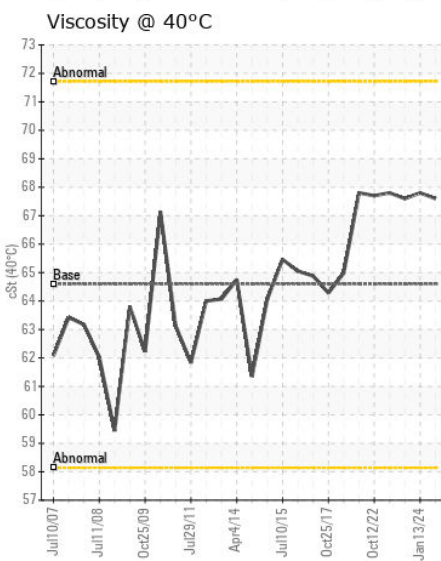
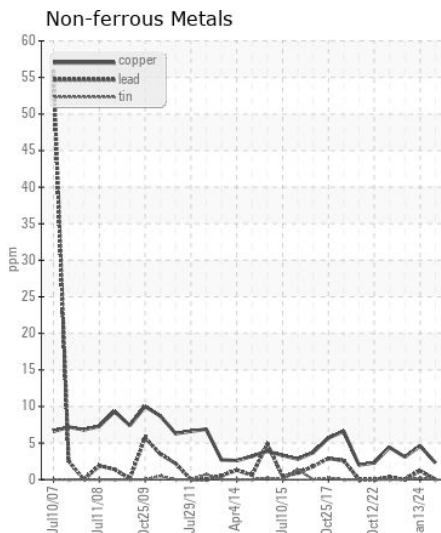
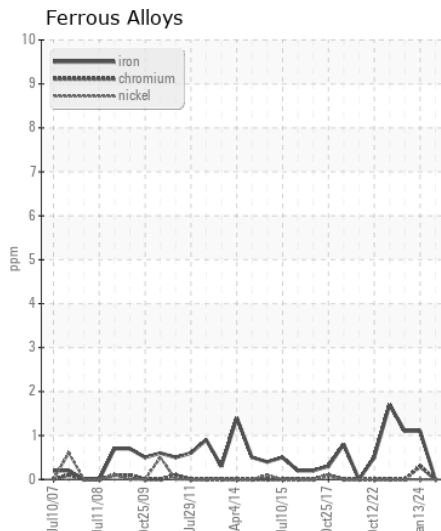
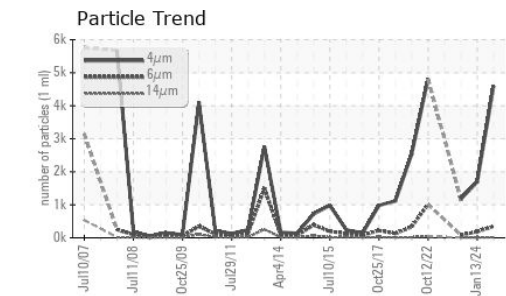
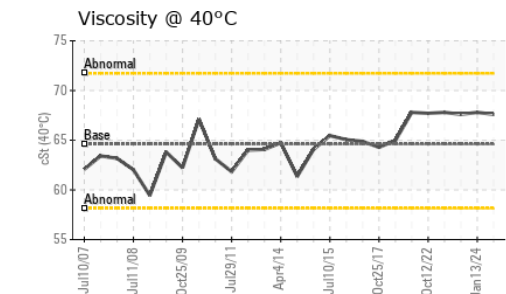
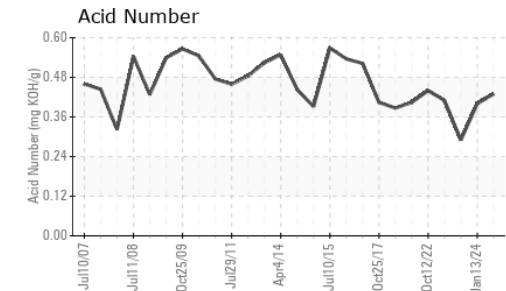
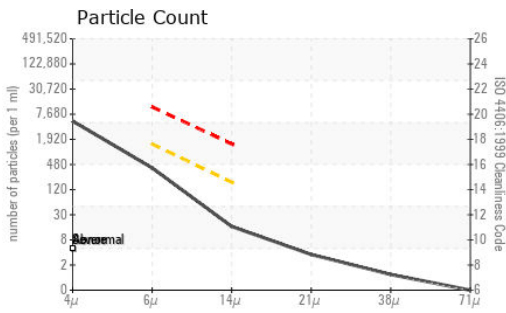
The system cleanliness is acceptable for your target ISO 4406 cleanliness code. The system and fluid cleanliness is acceptable.

Silicon	ppm	ASTM D5185m	>15	0	0	0
Potassium	ppm	ASTM D5185m	>20	0	2	<1
Water		WC Method	>0.05	NEG	NEG	NEG
Particles >4µm		ASTM D7647		4595	1691	1176
Particles >6µm		ASTM D7647	>1300	350	183	84
Particles >14µm		ASTM D7647	>160	14	9	8
Particles >21µm		ASTM D7647	>40	3	2	2
Particles >38µm		ASTM D7647	>10	1	0	1
Particles >71µm		ASTM D7647	>3	0	0	0
Oil Cleanliness		ISO 4406 (c)	>-/17/14	19/16/11	18/15/10	17/14/10
Silt	scalar	*Visual	NONE	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.05	NEG	NEG	NEG

FLUID CONDITION

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

Sodium	ppm	ASTM D5185m		<1	0	0
Boron	ppm	ASTM D5185m		0	0	0
Barium	ppm	ASTM D5185m		0	0	6
Molybdenum	ppm	ASTM D5185m		0	<1	0
Manganese	ppm	ASTM D5185m		0	0	0
Magnesium	ppm	ASTM D5185m		0	0	<1
Calcium	ppm	ASTM D5185m		22	32	32
Phosphorus	ppm	ASTM D5185m		308	284	313
Zinc	ppm	ASTM D5185m		405	418	383
Sulfur	ppm	ASTM D5185m		803	749	770
Acid Number (AN)	mg KOH/g	ASTM D8045		0.43	0.40	0.29
Visc @ 40°C	cSt	ASTM D445	64.6	67.6	67.8	67.6



Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : MW0039996
Lab Number : 06161393
Unique Number : 10996816
Test Package : MAR 2
Received : 26 Apr 2024
Tested : 29 Apr 2024
Diagnosed : 30 Apr 2024 - Don Baldrige

AMERICAN RIVER TRANSPORTATION CO.
 P.O. BOX 2889
 ST. LOUIS, MO
 US 63111
 Contact: BRIAN GRIEWING
 brian.griewing@adm.com
 T:
 F: (314)481-5278

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)