

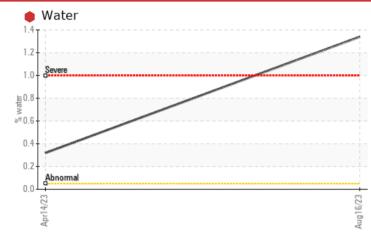
PROBLEM SUMMARY

Area OCEAN NAVIGATOR Machine Id [OCEAN NAVIGATOR] OCEAN NAVIGATOR DECK

Crane

FUCHS 68 (180 LTR)

COMPONENT CONDITION SUMMARY



RECOMMENDATION

We advise that you check for the source of water entry. We advise that you perform a filter service, and use off-line filtration to improve the cleanliness of the system fluid. We recommend an early resample to monitor this condition.

PROBLEMATIC 1	EST RE	SULTS				
Sample Status				SEVERE	ABNORMAL	
Water	%	ASTM D6304	>0.05	e 1.34	▲ 0.319	
ppm Water	ppm	ASTM D6304	>500	🛑 13400	A 3190	
Appearance	scalar	*Visual	NORML	🔺 MILKY	🔺 HAZY	
Emulsified Water	scalar	*Visual	>0.05	• 0.2%	▲ 0.2%	

Customer Id: VICNEWIN Sample No.: WC0824503 Lab Number: 05926806 Test Package: MAR 2



To manage this report scan the QR code

To discuss the diagnosis or test data: Don Baldridge +1 <u>don.b505@comcast.net</u>

To change component or sample information: Customer Service +1 1-800-237-1369 <u>customerservice@wearcheck.com</u>



RECOMMENDED ACTIONS							
Action	Status	Date	Done By	Description			
Change Filter			?	We advise that you perform a filter service, and use off-line filtration to improve the cleanliness of the system fluid.			
Resample			?	We recommend an early resample to monitor this condition.			
Check Water Access			?	We advise that you check for the source of water entry.			
Filter Fluid			?	We advise that you perform a filter service, and use off-line filtration to improve the cleanliness of the system fluid.			

HISTORICAL DIAGNOSIS



14 Apr 2023 Diag: Angela Borella

Check seals and/or filters for points of contaminant entry. We recommend you service the filters on this component. We recommend an early resample to monitor this condition.All component wear rates are normal. Appearance is hazy. There is a high concentration of water present in the oil. The AN level is acceptable for this fluid. The condition of the oil is acceptable for the time in service.





OIL ANALYSIS REPORT

Area OCEAN NAVIGATOR Machine Id [OCEAN NAVIGATOR] OCEAN NAVIGATOR DECK

Crane Fluid

FUCHS 68 (180 LTR)

DIAGNOSIS

Recommendation

We advise that you check for the source of water entry. We advise that you perform a filter service, and use off-line filtration to improve the cleanliness of the system fluid. We recommend an early resample to monitor this condition.

Wear

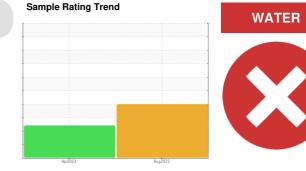
All component wear rates are normal.

Contamination

Appearance is milky. There is a high concentration of water present in the oil.

Fluid Condition

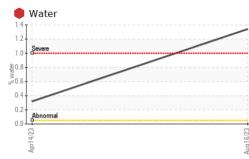
The AN level is acceptable for this fluid.

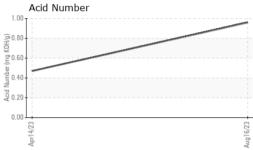


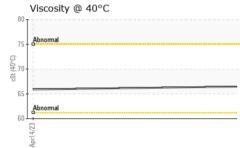
SAMPLE INFORM	IATION	method	limit/base	current	history1	history2
Sample Number		Client Info		WC0824503	WC0667219	
Sample Date		Client Info		16 Aug 2023	14 Apr 2023	
Machine Age	hrs	Client Info		0	0	
Oil Age	hrs	Client Info		0	0	
Oil Changed		Client Info		N/A	N/A	
Sample Status				SEVERE	ABNORMAL	
WEAR METALS		method	limit/base	current	history1	history2
Iron	ppm	ASTM D5185m	>20	5	1	
Chromium	ppm	ASTM D5185m	>10	<1	0	
Nickel	ppm	ASTM D5185m	>10	0	<1	
Titanium	ppm	ASTM D5185m		<1	0	
Silver	ppm	ASTM D5185m		<1	<1	
Aluminum	ppm	ASTM D5185m	>10	0	0	
Lead	ppm	ASTM D5185m	>20	<1	0	
Copper	ppm	ASTM D5185m	>20	2	<1	
Tin	ppm	ASTM D5185m	>10	<1	0	
Vanadium	ppm	ASTM D5185m		<1	0	
Cadmium	ppm	ASTM D5185m		3	0	
ADDITIVES		method	limit/base	current	history1	history2
ADDITIVES Boron	ppm	method ASTM D5185m	limit/base	current 0	history1 0	history2
	ppm ppm		limit/base			
Boron		ASTM D5185m	limit/base	0	0	
Boron Barium	ppm	ASTM D5185m ASTM D5185m	limit/base	0 0	0 0	
Boron Barium Molybdenum	ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 0	0 0 0	
Boron Barium Molybdenum Manganese	ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 0 <1	0 0 0 <1	
Boron Barium Molybdenum Manganese Magnesium	ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 0 <1 1	0 0 <1 3	
Boron Barium Molybdenum Manganese Magnesium Calcium	ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 <1 1 32	0 0 <1 3 47	
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus	ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 <1 1 32 333	0 0 <1 3 47 415	
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc	ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 <1 1 32 333 387	0 0 <1 3 47 415 521	
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur	ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m		0 0 <1 1 32 333 387 1263	0 0 <1 3 47 415 521 3415	
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS	ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m	limit/base	0 0 (- 1 32 333 387 1263 current	0 0 <1 3 47 415 521 3415 history1	 history2
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon	ppm ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m	limit/base	0 0 2 31 32 333 387 1263 <i>current</i> 2	0 0 0 <1 3 47 415 521 3415 history1 2	 history2
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium	ppm ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m ASTM D5185m method ASTM D5185m ASTM D5185m	limit/base	0 0 2 31 1 32 333 387 1263 <u>current</u> 2 2 <1	0 0 0 <1 3 47 415 521 3415 521 3415 history1 2 <1	 history2
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium Potassium	ppm ppm ppm ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m	limit/base >15 >20	0 0 2 31 1 32 333 387 1263 current 2 <1 2	0 0 2 3 47 415 521 3415 bistory1 2 <1 <1	 history2
Boron Barium Molybdenum Manganese Magnesium Calcium Phosphorus Zinc Sulfur CONTAMINANTS Silicon Sodium Potassium Water	ppm ppm ppm ppm ppm ppm ppm ppm ppm ppm	ASTM D5185m ASTM D5185m	limit/base >15 >20 >0.05	0 0 0 <1 1 32 333 387 1263 current 2 <1 2 <1 2 (1.34	0 0 0 <1 3 47 415 521 3415 history1 2 2 <1 <1 <1 ∧ 0.319	 history2



OIL ANALYSIS REPORT







	VISUAL		method	limit/base	current	history1	history2
	White Metal	scalar	*Visual	NONE	NONE	NONE	
	Yellow Metal	scalar	*Visual	NONE	NONE	NONE	
	Precipitate	scalar	*Visual	NONE	NONE	NONE	
	Silt	scalar	*Visual	NONE	NONE	NONE	
	Debris	scalar	*Visual	NONE	NONE	LIGHT	
	Sand/Dirt	scalar	*Visual	NONE	NONE	NONE	
Aug16/23	Appearance	scalar	*Visual	NORML		A HAZY	
Aı	Odor Emulsified Water	scalar	*Visual	NORML		NORML	
	Free Water	scalar scalar	*Visual *Visual	>0.05	0.2% NEG	▲ 0.2% NEG	
					NEG		
	FLUID PROPER	TIES	method	limit/base	current	history1	history2
	Visc @ 40°C	cSt	ASTM D445		66.5	65.9	
	SAMPLE IMAGE	S	method	limit/base	current	history1	history2
23	Color				no image		no image
Aug16/23	00101				no image		no image
A.							
	Bottom				no image		no image
	GRAPHS						
	Ferrous Alloys						
	10 ₁						
	8 - iron chromium						
	0 minimum ninkal						
				_			
	4 2						
	₽ 4 2 0 ###****						
	2			16/23			
	April 4/23			Aug16/23			
	Non-ferrous Meta	ls		Aug16/23			
	Non-ferrous Meta	ls		Aug16/23			
	Non-ferrous Meta	ls		Aug16/23			
	Non-ferrous Meta	ls		Aug 16/23			
	Non-ferrous Meta	ls		Aug 16/23			
	Non-ferrous Meta	ls					
	Non-ferrous Meta	ls					
	Non-ferrous Meta	ls		Aug16/23			
	Non-ferrous Meta	ls		Aug16/23	Acid Numbe	r	
	Non-ferrous Meta	ls		Aug16/23		r	
	Non-ferrous Meta	ls		Aug16/23	30 I	r	
	Non-ferrous Meta	15		Aug16/23	30 I	r	
	Non-ferrous Meta	ls		Aug16/23	30 I	r	
	Non-ferrous Meta	ls		Aug16/23 3		r	
	Non-ferrous Meta	ls		Aug16/23 3		r	
	Non-ferrous Meta	ls		Aug16/23	30 I	r	
	Non-ferrous Meta			Aug 16/23 Aug 16	200 30 40 20 30 40 40 40 40 40 40 40 40 40 40 40 40 40		
boratory	Non-ferrous Meta Non-ferrous Meta Non-ferrous Meta Viscosity @ 40°C			Aug 16/23 Aug 16	200 30 40 20 30 40 40 40 40 40 40 40 40 40 40 40 40 40	ican Queen Voya	ages - Ocear
boratory Imple No. Ib Number	Non-ferrous Meta Non-ferrous Meta	501 Madia	d :167	(0)H01 (0)H01	200 30 40 20 30 40 40 40 40 40 40 40 40 40 40 40 40 40	ican Queen Voya 1201 B	ages - Ocean rridgeport Driv effersonville, I
boratory mple No. b Number	Non-ferrous Meta Non-ferrous Meta	501 Madia	d : 167 ed : 187	(0)(10) (0)(10)(10) (0)(10)(10) (0)(10)(10)(10)(10)(10)(10)(10)(10)(10)(200 30 40 20 30 40 40 40 40 40 40 40 40 40 40 40 40 40	ican Queen Voya 1201 B	ages - Ocear ridgeport Driv
aboratory Sample No. ab Number Inique Number Test Package	Non-ferrous Meta Non-ferrous Meta Viscosity @ 40°C Viscosity @ 40°C Viscosity @ 40°C Viscosity @ 40°C Viscosity @ 40°C 100075 400 100 100 100 100 100 100 100	501 Madia Received Diagnos Diagnos	d : 167 ed : 187 tician : Dor =)	C2091 Day C2091 Day	3 Amer	ican Queen Voya 1201 B Je	ages - Ocear ridgeport Driv effersonville, I US 4713 t: Dietrich Gile

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

F: