



# MOBILE OIL ANALYSIS REPORT

CONTAMINATION  
OIL CONDITION  
WEAR

**NORMAL**  
**NORMAL**  
**NORMAL**

131 - Diesel Engine

Unit Make : CATERPILLAR  
 Unit Model : 385B Serial No : RED00208 Date Rec'd : Aug 22, 2006  
 Comp Make : BACKHOE EXCAVATOR Cust. Ref No. : {n/a} Sample Date : Aug 10, 2006  
 Comp Model : {n/a} Stub No. : KL-M090769 Diagnostician : Doug Bogart

## RECOMMENDATION

Resample at the next service interval to monitor.

Sample Date	12/15/05	02/11/06	07/19/06	Current	UOM
Time on Unit	3156	3267	4402	4572	hrs
Time on Oil	250	361	244	414	hrs
Time on Fltr	0	0	244	170	hrs
Oil Maint.	n/a	n/a	not chg	not chg	---
Filter Maint.	n/a	not chg	changed	changed	---

## CONTAMINATION

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

Sample Date	12/15/05	02/11/06	07/19/06	Current	Abn
Silicon	8.6	7.9	7.1	8.8	
Fuel (%)	<2.0	<2.0	<2.0	<2.0	
Glycol	---	---	---	---	
Water (%)	<0.1	<0.1	<0.1	<0.1	
Soot (%)	0.1	0.1	0.1	0.1	
>2µm	758	581	2782	556	
>5µm	280	215	1029	205	
>15µm	30	23	110	21	
>25µm	7	5	26	5	
>50µm	0	0	2	0	
>100µm	0	0	0	0	
ISO 4406	15/12	15/12	17/14	15/12	

## OIL CONDITION

Oil Type: SAE 15W40

The condition of oil is suitable for further service.

Sample Date	12/15/05	02/11/06	07/19/06	Current	Base
Potassium	0.0	0.7	0.0	0.0	
Boron	2.5	2.3	5.3	4.3	
Barium	0.0	0.0	0.0	0.0	
Calcium	3478	3702	3686	3482	
Magnesium	8.5	10	6.8	12	
Molybdenum	48	50	55	49	
Sodium	1.5	1.5	0.1	1.9	
Phosphorus	835	894	748	826	
Sulfur	4571	4922	4638	5195	
Zinc	965	1019	989	958	
Visc@100°C	11.5	11.3	11.4	11.3	14.5
TBN	8.82	8.99	8.96	6.05	

## WEAR

All component wear rates are normal.

Sample Date	12/15/05	02/11/06	07/19/06	Current	Abn
Iron	12	23	13	20	---
Nickel	0.8	0.3	0.0	0.7	---
Chromium	0.5	0.7	0.6	0.7	---
Titanium	0.2	0.0	0.2	0.2	---
Copper	1.4	15	1.7	2.9	---
Aluminum	2.3	2.1	3.1	3.4	---
Tin	0.0	0.8	0.0	0.0	---
Lead	0.5	0.7	1.9	1.0	---
Silver	0.0	0.0	0.0	0.0	---