Customer Information

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Attention : JIM MORTIMER
Phone : [redacted]

Unit Information

Unit # : **2012 AMG C63**
Component : **ENGINE**
Location :
Manufacturer : MERCEDES-BENZ
Serial # :
Model : C63

Lubricant

Manufacturer : SHELL
Brand : ROTELLA T6
Grade : 5W40

Sample : 05/23-60

Lab Tracking # : 3 - 859239

FLUID LIFE
EQUIPMENT RELIABILITY SERVICES

Oil Analysis

95 Copernicus Boulevard, Brantford
Ontario, Canada N3P 1N4
Phone: 877 962 2400

Sample

Contaminants (ppm)

Wear Metals (ppm)

Additives (ppm)

Sample Number	Sample Date	Sodium	Potassium	Silicon	Aluminum	Iron	Copper	Lead	Tin	Chromium	Nickel	Titanium	Silver	Vanadium	Antimony	Beryllium	Calcium	Zinc	Phosphorus	Magnesium	Molybdenum	Boron	Barium	Lithium
Ref. Sample	2010/11/20	1	0	6	0	2	0	1	0	0	0	0	0	0	0	0	920	1259	1061	1144	75	73	0	1
05/23-060	2019/05/05	3	2	5	3	10	2	0	0	0	0	1	0	0	1	0	1700	1130	987	396	21	125	0	0
11/07-240	2017/10/29	3	0	4	2	12	2	3	1	0	0	0	0	0	0	0	973	1170	1056	1022	64	51	0	0
02/15-012	2017/01/31	4	2	6	4	19	4	0	0	1	0	0	0	0	0	0	1374	1114	1018	747	64	59	0	0
11/12-272	2015/11/01	1	4	5	8	22	6	1	2	1	0	0	0	0	0	0	2523	923	881	22	66	98	0	0
04/29-243	2015/04/26	3	11	7	16R	43	11	1	0	1	0	0	0	0	0	0	2390	978	890	37	88	165	0	0

Sample Information

Physical Tests

Sample Date	Oil Mfr.	Oil Brand	Oil Grade	Comp. Service	Oil Service	Units	Oil Chg	Visc 40°C cSt	Visc 100°C cSt	Visc Index	Water	Glycol %	Fuel %	NIT (A/cm)	OX (A/cm)	Sul (A/cm)
Ref. Sample	SHE	ROT T6	5W40					85.6	13.84	166	N			<0.10	<0.10	<0.10
2019/05/05	SHE	ROT T6	5W40	39645	4997	KM	Y	85.5	14.20	172	N	NT	NT	12.1	2.05	5.52
2017/10/29	SHE	ROT T6	5W40	34680	3111	KM	N	74.6	13.00	177	N	NT	NT	11.6	5.05	6.28
2017/01/31	SHE	ROT T6	5W40	31568	4578	KM	Y	72.1R	12.41R	172	PU	NT	1.04	15.3	6.40	6.93
2015/11/01	MB	MB 229-5	5W40	26990	3905	KM	N	77.1	12.65	164	N	NT	<0.60	-	-	-
2015/04/26	MOB	?	0W40	22999	2059	KM	N	68.2R	12.06R	175	PR	NT	2.06R	-	-	-

Results

2019/05/05 Tested wear and contamination levels are within acceptable limits.

2017/10/29 Tested wear and contamination levels are within acceptable limits.

2017/01/31 Note Water, Viscosity at 40°C and Viscosity at 100°C.

2015/11/01 Tested wear and contamination levels are within acceptable limits.

2015/04/26 Note Fuel, Water, Viscosity at 40°C and Viscosity at 100°C and flagged element Aluminum.
Unable to perform Infra-red analysis without a new oil reference. Please provide a new oil sample along with complete oil manufacturer, brand, and grade information.

Recommendations

2019/05/05 Resample next interval to monitor.

2017/10/29 Resample next interval to monitor.

2017/01/31 Water contamination can be detrimental to any component. Check or assess system for source of contamination.
Verify oil type. Make sure oil meets manufacturers specifications.
Resample mid - interval to monitor.

2015/11/01 Resample next interval to monitor.

2015/04/26 Assess all causes of viscosity dilution - fuel leak, excess idling, wrong lube used, sample contaminated, over heating.
Check or assess system for source of contamination.
We recommend changing the lubricant and any applicable filters, if not recently done. If necessary,

Key: Y - Yes N - Negative P - Positive R - Reportable U - Unacceptable S - Severe I - Insufficient Sample > - More Than < - Less Than NT - Not Triggered ◢ - Updated