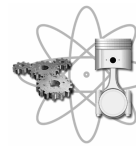


AMSOIL oil filter
 Fuel used a 50/50 run of regular
 and E85, Our trips to PA were all
 E85, so 2K was on that.
 Air filter has 10k on it



ANALYSIS REPORT

Machine Type: Gasoline Engine	Received: 07/23/2024	ATTN: Nick Mikitka
Fluid In Use: Signature 0w20 ASM	Report: 07/24/2024	
Lube Brand: AMSOIL	Model: 2016 Suburban 5.3	
Make: CHEVROLET		

Date		7/18/2024	10/15/2023	5/4/2023	9/18/2022	3/15/2022	7/23/2021	10/6/2020
Lab Number	NEW OIL	5063879	4673240	4438407	3684595	3495652	3271771	3004945
Lube Miles		6,000	5,629	3,244	5,300	6,000	8,430	14,236
Machine Miles		101,753	95,435	89,805	86,351	80,002	74,003	65,463

SPECTROSCOPIC ANALYSIS (ppm) ASTM D5185 Mod

Iron	0	35	10	12	16	26	32	57
Copper	0	25	27	28	28	40	37	63
Lead	1	0	0	0	0	1	0	0
Aluminum	0	1	0	0	0	3	2	4
Tin	0	0	0	0	0	0	0	0
Nickel	0	0	0	0	0	0	0	0
Chromium	0	1	0	0	0	1	1	2
Titanium	0	0	0	0	0	0	0	0
Vanadium	0	0	0	0	0	0	0	0
Silver	0	0	0	0	0	0	0	0
Silicon	2	9	9	8	8	11	13	19
Boron	357	154	114	209	121	114	86	40
Calcium	1307	1702	1432	1301	1213	1367	1923	1103
Magnesium	909	1480	1040	1013	955	854	553	863
Phosphorus	774	860	750	710	590	653	644	570
Zinc	773	1061	900	827	786	787	734	737
Barium	0	0	0	0	0	4	0	0
Molybdenum	228	302	237	219	215	205	170	195
Sodium	5	7	5	6	7	8	11	11
Potassium	3	2	2	1	0	0	0	0

PHYSICAL PROPERTIES

Viscosity @ 40C ASTM D 445 Mod		45.8	45.8	44.6	46.8	45.1	43.1	48.7
Viscosity @ 100C ASTM D 445 Mod	8.8	8.8	8.5	8.5	8.6	8.4	8.3	9
Viscosity Index ASTM D 2270 *		175	165	171	164	165	172	168
Base Number	9.29 †	3.89 †	4.81 †	5.61 †	4.05 †	3.68 †	2.76 †	2.3 †
Acid Number ASTM D 974		2.42	3.34	1.98	2.7	2.77	4.25	4.27

IR (Indexing Numbers) JOAP Method

Oxidation	49	63	61	60	66	64	67	66
Nitration	5	12	11	11	11	14	17	17
Antiwear	20	21	20	20	20	21	21	21
Sulfation	44	60	56	53	57	58	58	56
Glycol	0	0	0	0	0	0	0	0
Soot (%)	0	0	0	0	0	0	0	0

SINGLE COMPONENT TESTS

Water ppm	821	906 (a)	720 (a)	961 (a)	507 (a)	1110 (a)	1442 (a)	1339 (a)
Fuel Dilution % By GC *	0.4	0.8	0.8	1.3	0.5	1.7	3.6	3.7

This test is accredited under the laboratory's ISO/IEC 17025 accreditation issued by the ANSI-ASQ National Accreditation Board. Refer to certificate and scope of accreditation L2221. (e) -Estimated sample date. (*)-Not in scope of accreditation. TBN Methods: (†)-ASTM D4739, (‡)-IWI-390*. Water Methods:(a)-ASTM D6304C, (b)-IWI-134*, (c)-Crackle, (d)-IWI-135*, (e) - IWI-370*. DysonAnalysis

Samples tested as received.