

PhazeComp-Generated L^AT_EX Report Template

Aaron A. Zick
Zick Technologies, Inc.

January 3, 2026

Contents

List of Tables	ii
List of Figures	iii
1. Executive Summary	1
2. Introduction	2
2.1. A New Section	2
3. A New Chapter	3
3.1. A New Section	3
3.1.1. A new sub-section	3
4. Conclusions	5
Acknowledgements	6
Nomenclature	7
References	8
Tables	9
Figures	13

List of Tables

1.	Essential Properties for Characterization “SCN to C36+ with Asphaltenes” .	10
2.	Binary Interaction Parameters for Characterization “SCN to C36+ with Asphaltenes”	11
3.	Separation of the Fluid from 1800 m	12
4.	Separation of the Fluid from 2000 m	12
5.	Separation of the Fluid from 2200 m	12

List of Figures

1.	Depth vs. Pressure for Gravitational Segregation of an Asphaltenic Oil.	13
2.	Depth vs. Saturation Pressure for Gravitational Segregation of an Asphaltenic Oil.	14
3.	Depth vs. Overall Molecular Weight for Gravitational Segregation of an Asphaltenic Oil.	14
4.	Depth vs. Overall Density for Gravitational Segregation of an Asphaltenic Oil.	15
5.	Depth vs. Viscosity for Gravitational Segregation of an Asphaltenic Oil.	15
6.	Depth vs. Overall C1 Mole Fraction for Gravitational Segregation of an Asphaltenic Oil.	16
7.	Depth vs. Overall C1 Mass Fraction for Gravitational Segregation of an Asphaltenic Oil.	16
8.	Depth vs. Overall Asphalt Mole Fraction for Gravitational Segregation of an Asphaltenic Oil.	17
9.	Depth vs. Overall Asphalt Mass Fraction for Gravitational Segregation of an Asphaltenic Oil.	17
10.	Depth vs. Saturation Pressure for Saturated Properties of a Segregated Asphaltenic Oil.	18
11.	Depth vs. Pressure for Saturated Properties of a Segregated Asphaltenic Oil.	18
12.	Depth vs. Liquid Saturation for Saturated Properties of a Segregated Asphaltenic Oil.	19
13.	Depth vs. Liquid Phase Molecular Weight for Saturated Properties of a Segregated Asphaltenic Oil.	19
14.	Depth vs. Gas Phase Molecular Weight for Saturated Properties of a Segregated Asphaltenic Oil.	20
15.	Depth vs. Overall Molecular Weight for Saturated Properties of a Segregated Asphaltenic Oil.	20
16.	Depth vs. Liquid Phase Density for Saturated Properties of a Segregated Asphaltenic Oil.	21
17.	Depth vs. Gas Phase Density for Saturated Properties of a Segregated Asphaltenic Oil.	21
18.	Depth vs. Overall Density for Saturated Properties of a Segregated Asphaltenic Oil.	22
19.	Depth vs. Liquid Phase Viscosity for Saturated Properties of a Segregated Asphaltenic Oil.	22
20.	Depth vs. Gas Phase Viscosity for Saturated Properties of a Segregated Asphaltenic Oil.	23
21.	Depth vs. Viscosity for Saturated Properties of a Segregated Asphaltenic Oil.	23
22.	Depth vs. Liquid C1 Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	24
23.	Depth vs. Gas C1 Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	24
24.	Depth vs. Overall C1 Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	25

25.	Depth vs. Liquid C1 Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	25
26.	Depth vs. Gas C1 Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	26
27.	Depth vs. Overall C1 Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	26
28.	Depth vs. Liquid Asphalt Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	27
29.	Depth vs. Gas Asphalt Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	27
30.	Depth vs. Overall Asphalt Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	28
31.	Depth vs. Liquid Asphalt Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	28
32.	Depth vs. Gas Asphalt Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	29
33.	Depth vs. Overall Asphalt Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.	29

1. Executive Summary

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

2. Introduction

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

2.1. A New Section

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

3. A New Chapter

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

3.1. A New Section

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

3.1.1. A new sub-section

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

A new sub-sub-section

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam,

luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

A new paragraph. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

A new sub-paragraph. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

4. Conclusions

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

Acknowledgements

Lorem ipsum dolor sit amet, consectetur adipiscing elit. Etiam lobortis facilisis sem. Nullam nec mi et neque pharetra sollicitudin. Praesent imperdiet mi nec ante. Donec ullamcorper, felis non sodales commodo, lectus velit ultrices augue, a dignissim nibh lectus placerat pede. Vivamus nunc nunc, molestie ut, ultricies vel, semper in, velit. Ut porttitor. Praesent in sapien. Lorem ipsum dolor sit amet, consectetur adipiscing elit. Duis fringilla tristique neque. Sed interdum libero ut metus. Pellentesque placerat. Nam rutrum augue a leo. Morbi sed elit sit amet ante lobortis sollicitudin. Praesent blandit blandit mauris. Praesent lectus tellus, aliquet aliquam, luctus a, egestas a, turpis. Mauris lacinia lorem sit amet ipsum. Nunc quis urna dictum turpis accumsan semper.

Nomenclature

References

Tables

Table 1: Essential Properties for Characterization “SCN to C36+ with Asphaltenes”

Component	MW	Tc (K)	Pc (bar)	AF	VTran	ZcVis
N2	28.014	126.20	33.9800	0.03700	−0.00090	0.28804
CO2	44.010	304.12	73.7400	0.22500	0.21749	0.27300
C1	16.043	190.56	45.9900	0.01100	−0.00247	0.29012
C2	30.070	305.32	48.7200	0.09900	0.05894	0.28308
C3	44.097	369.83	42.4800	0.15200	0.09075	0.27884
I-C4	58.123	407.85	36.4000	0.18600	0.10952	0.27612
N-C4	58.123	425.12	37.9600	0.20000	0.11028	0.27500
I-C5	72.150	460.39	33.8100	0.22900	0.09773	0.27268
N-C5	72.150	469.70	33.7000	0.25200	0.11947	0.27084
C6	82.804	512.97	33.4395	0.24209	0.13431	0.27163
C7	95.984	548.39	31.0337	0.27689	0.14401	0.26885
C8	109.498	579.08	28.6493	0.31550	0.15428	0.26576
C9	122.741	606.71	26.3999	0.35663	0.17179	0.26132
C10	135.778	631.25	24.4605	0.39707	0.18842	0.25627
C11	148.737	653.49	22.7687	0.43703	0.20422	0.25198
C12	161.610	673.79	21.2873	0.47642	0.21913	0.24823
C13	174.389	692.43	19.9841	0.51518	0.23309	0.24490
C14	187.070	709.63	18.8323	0.55327	0.24610	0.24190
C15	199.649	725.57	17.8097	0.59070	0.25818	0.23921
C16	212.122	740.41	16.8978	0.62743	0.26936	0.23677
C17	224.488	754.27	16.0813	0.66349	0.27967	0.23457
C18	236.746	767.25	15.3476	0.69886	0.28917	0.23258
C19	248.894	779.46	14.6857	0.73355	0.29789	0.23079
C20	260.931	790.97	14.0866	0.76756	0.30590	0.22919
C21	272.859	801.84	13.5425	0.80092	0.31323	0.22775
C22	284.677	812.14	13.0468	0.83362	0.31995	0.22646
C23	296.388	821.91	12.5938	0.86569	0.32609	0.22532
C24	307.991	831.21	12.1787	0.89712	0.33171	0.22431
C25	319.490	840.08	11.7972	0.92793	0.33683	0.22343
C26	330.885	848.54	11.4456	0.95814	0.34151	0.22265
C27	342.179	856.64	11.1209	0.98776	0.34577	0.22198
C28	353.374	864.39	10.8202	1.01680	0.34965	0.22140
C29	364.471	871.83	10.5411	1.04527	0.35318	0.22091
C30	375.474	878.97	10.2815	1.07319	0.35638	0.22050
C31	386.384	885.85	10.0394	1.10056	0.35929	0.22017
C32	397.204	892.47	9.8133	1.12741	0.36193	0.21990
C33	407.937	898.85	9.6016	1.15373	0.36432	0.21970
C34	418.583	905.01	9.4031	1.17956	0.36647	0.21956
C35	429.146	910.97	9.2166	1.20489	0.36841	0.21947
C36+	575.186	980.64	7.3840	1.52557	0.38081	0.22218
Asphalt	1000.000	1249.30	8.5790	1.88293	0.17660	0.30617

Table 2: Binary Interaction Parameters for Characterization “SCN to C36+ with Asphaltenes”

	N2	CO2	C1
CO2	0.00000		
C1	0.02000	0.12000	
C2	0.06000	0.15000	0.00000
C3	0.08000	0.15000	0.00000
I-C4	0.08000	0.15000	0.00000
N-C4	0.08000	0.15000	0.00000
I-C5	0.08000	0.15000	0.00000
N-C5	0.08000	0.15000	0.00000
C6	0.08000	0.15000	0.00000
C7	0.08000	0.15000	0.01881
C8	0.08000	0.15000	0.02208
C9	0.08000	0.15000	0.02542
C10	0.08000	0.15000	0.02862
C11	0.08000	0.15000	0.03169
C12	0.08000	0.15000	0.03462
C13	0.08000	0.15000	0.03741
C14	0.08000	0.15000	0.04006
C15	0.08000	0.15000	0.04257
C16	0.08000	0.15000	0.04495
C17	0.08000	0.15000	0.04719
C18	0.08000	0.15000	0.04931
C19	0.08000	0.15000	0.05131
C20	0.08000	0.15000	0.05320
C21	0.08000	0.15000	0.05498
C22	0.08000	0.15000	0.05667
C23	0.08000	0.15000	0.05826
C24	0.08000	0.15000	0.05976
C25	0.08000	0.15000	0.06118
C26	0.08000	0.15000	0.06253
C27	0.08000	0.15000	0.06380
C28	0.08000	0.15000	0.06501
C29	0.08000	0.15000	0.06615
C30	0.08000	0.15000	0.06724
C31	0.08000	0.15000	0.06827
C32	0.08000	0.15000	0.06925
C33	0.08000	0.15000	0.07019
C34	0.08000	0.15000	0.07108
C35	0.08000	0.15000	0.07193
C36+	0.08000	0.15000	0.08093
Asphalt	0.08000	0.15000	0.11275

Table 3: Separation of the Fluid from 1800 m

Temp (C)	Pres (bar)	Cum GOR (sm ³ /m ³)		Rel Vol 2		Liq Den (g/cm ³)	
		Expt	Calc	Expt	Calc	Expt	Calc
35.000	10.000		3525.1		0.066739		0.74781
15.000	1.000		3697.7		0.063787		0.77094

Table 4: Separation of the Fluid from 2000 m

Temp (C)	Pres (bar)	Cum GOR (sm ³ /m ³)		Rel Vol 2		Liq Den (g/cm ³)	
		Expt	Calc	Expt	Calc	Expt	Calc
35.000	10.000		175.65		0.65674		0.83370
15.000	1.000		187.57		0.63727		0.85100

Table 5: Separation of the Fluid from 2200 m

Temp (C)	Pres (bar)	Cum GOR (sm ³ /m ³)		Rel Vol 2		Liq Den (g/cm ³)	
		Expt	Calc	Expt	Calc	Expt	Calc
35.000	10.000		29.074		0.92713		1.0665
15.000	1.000		31.342		0.91899		1.0735

Figures

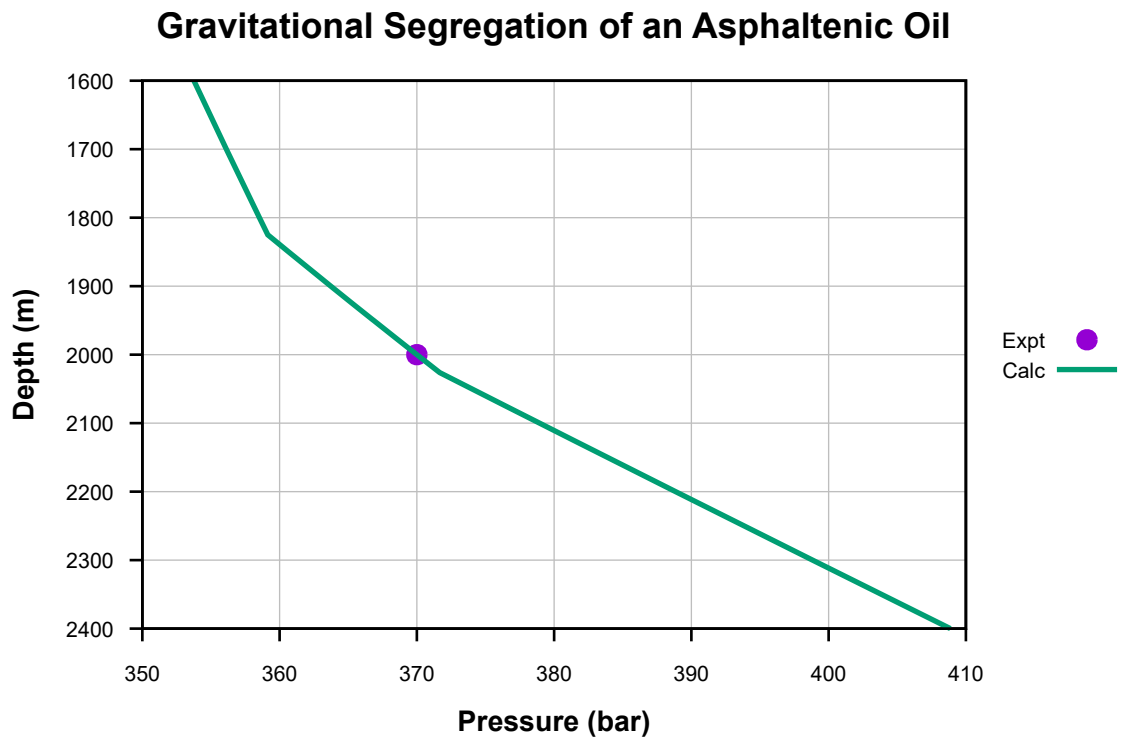


Figure 1: Depth vs. Pressure for Gravitational Segregation of an Asphaltenic Oil.

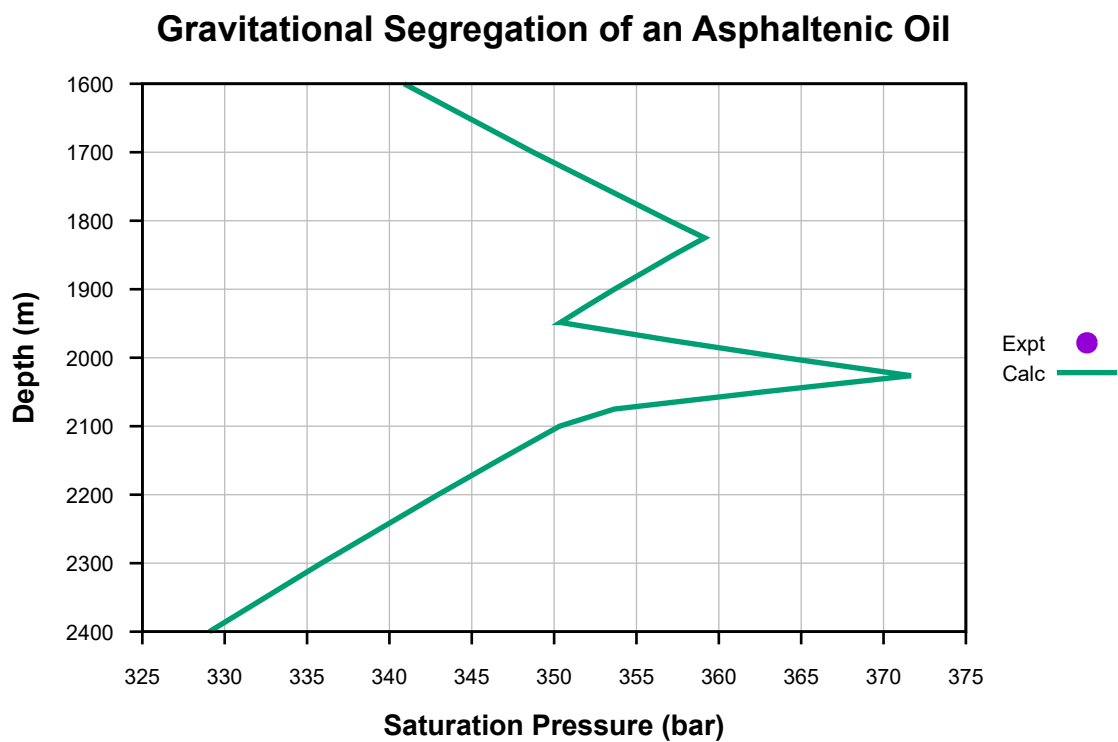


Figure 2: Depth vs. Saturation Pressure for Gravitational Segregation of an Asphaltenic Oil.

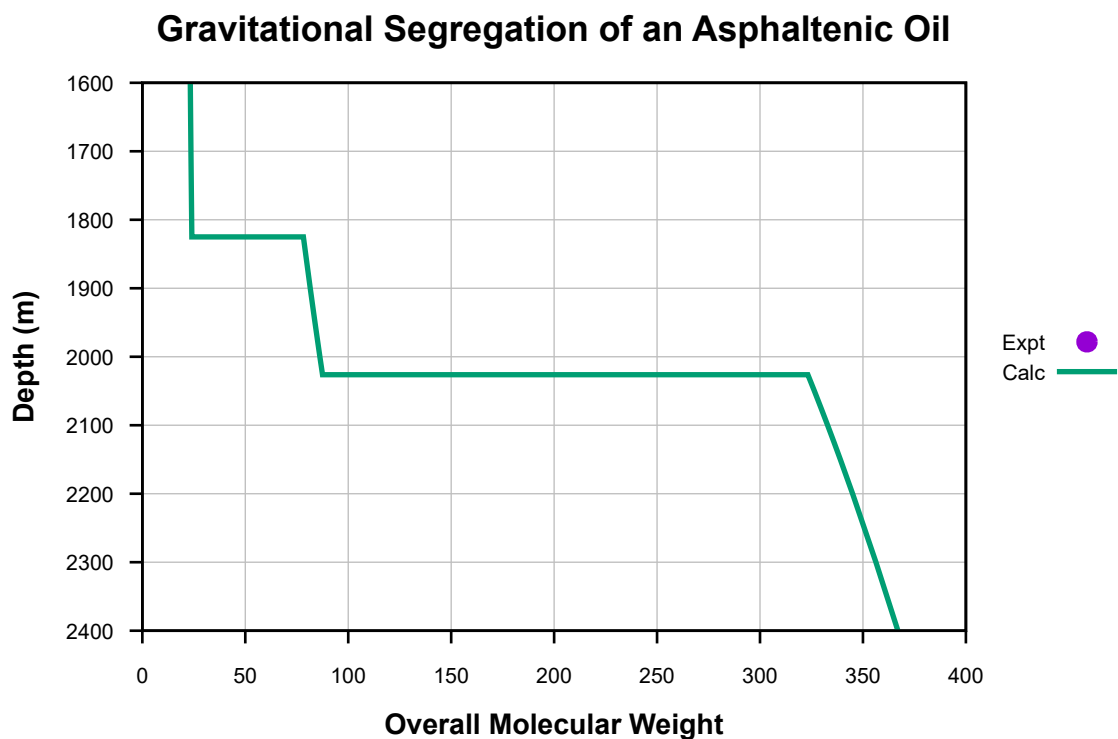


Figure 3: Depth vs. Overall Molecular Weight for Gravitational Segregation of an Asphaltenic Oil.

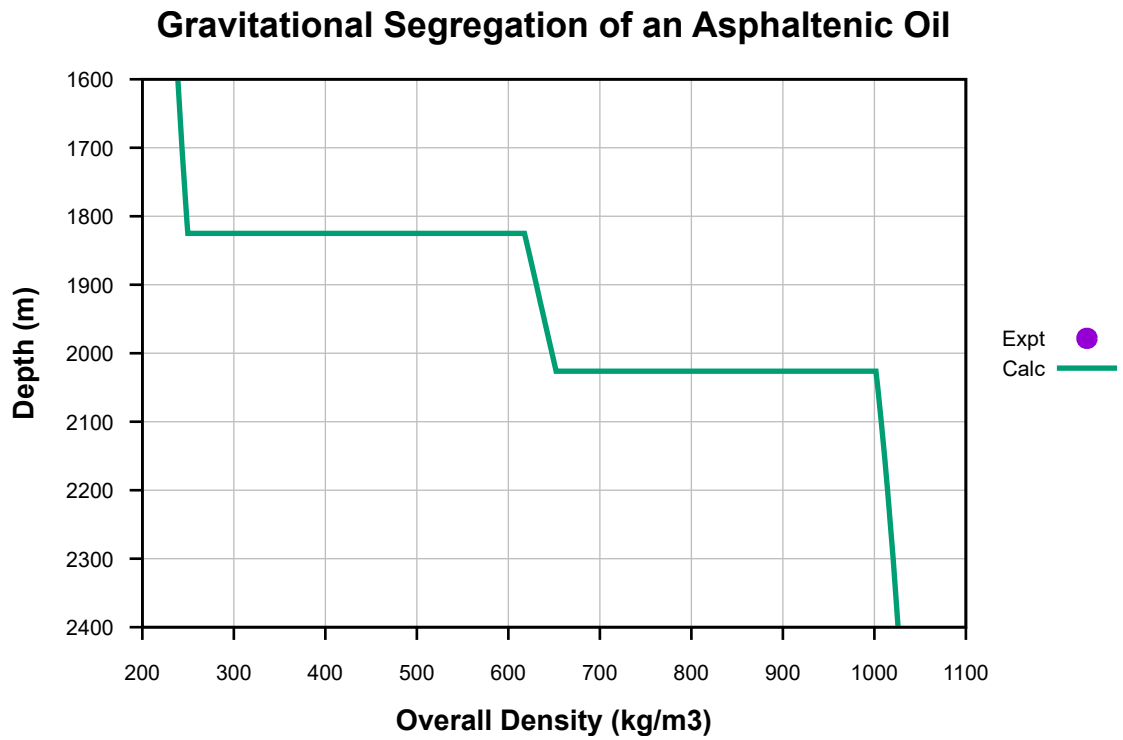


Figure 4: Depth vs. Overall Density for Gravitational Segregation of an Asphaltenic Oil.

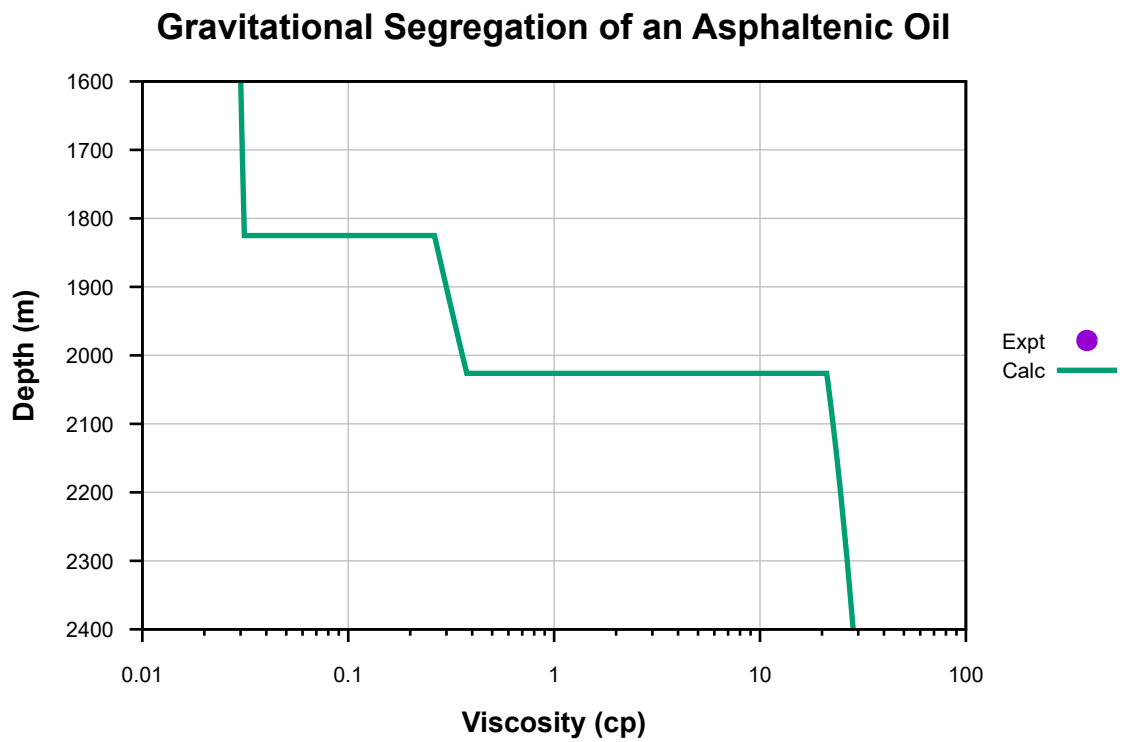


Figure 5: Depth vs. Viscosity for Gravitational Segregation of an Asphaltenic Oil.

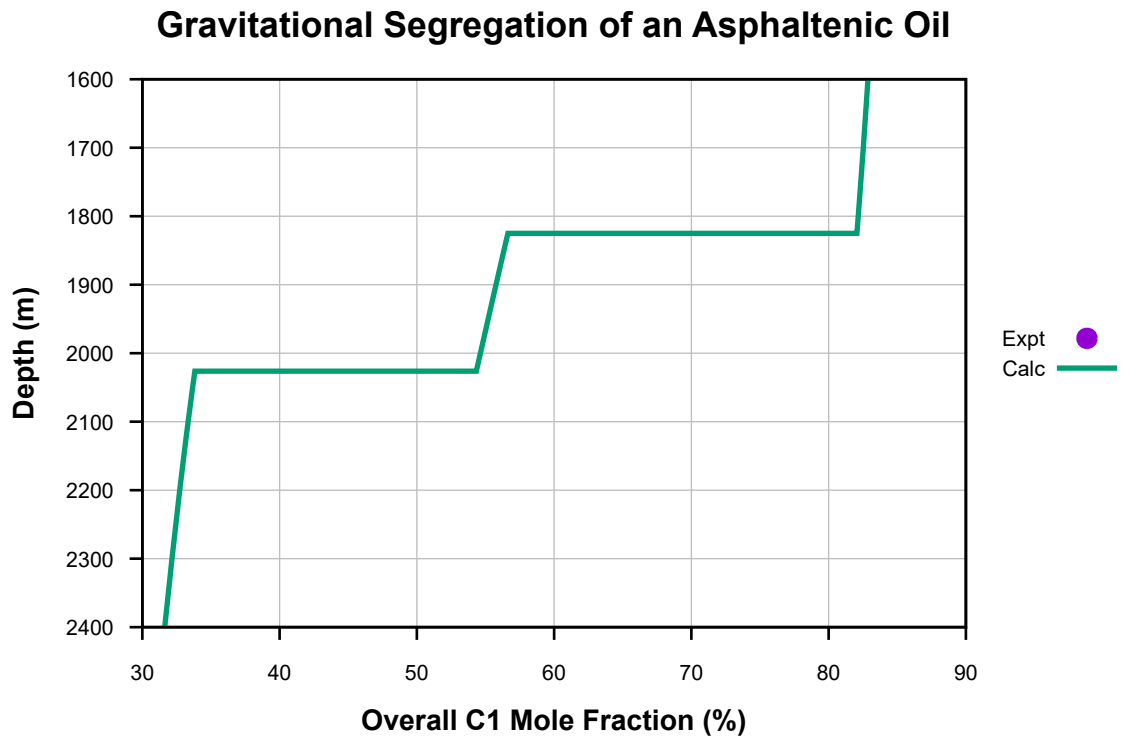


Figure 6: Depth vs. Overall C1 Mole Fraction for Gravitational Segregation of an Asphaltenic Oil.

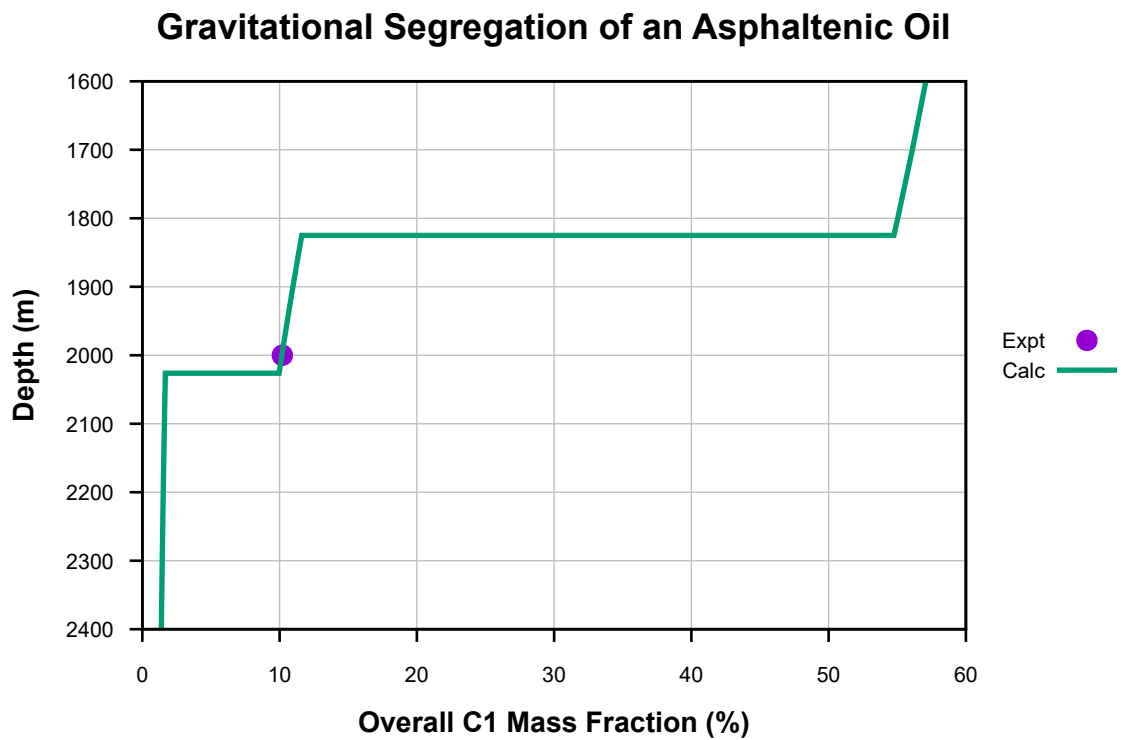


Figure 7: Depth vs. Overall C1 Mass Fraction for Gravitational Segregation of an Asphaltenic Oil.

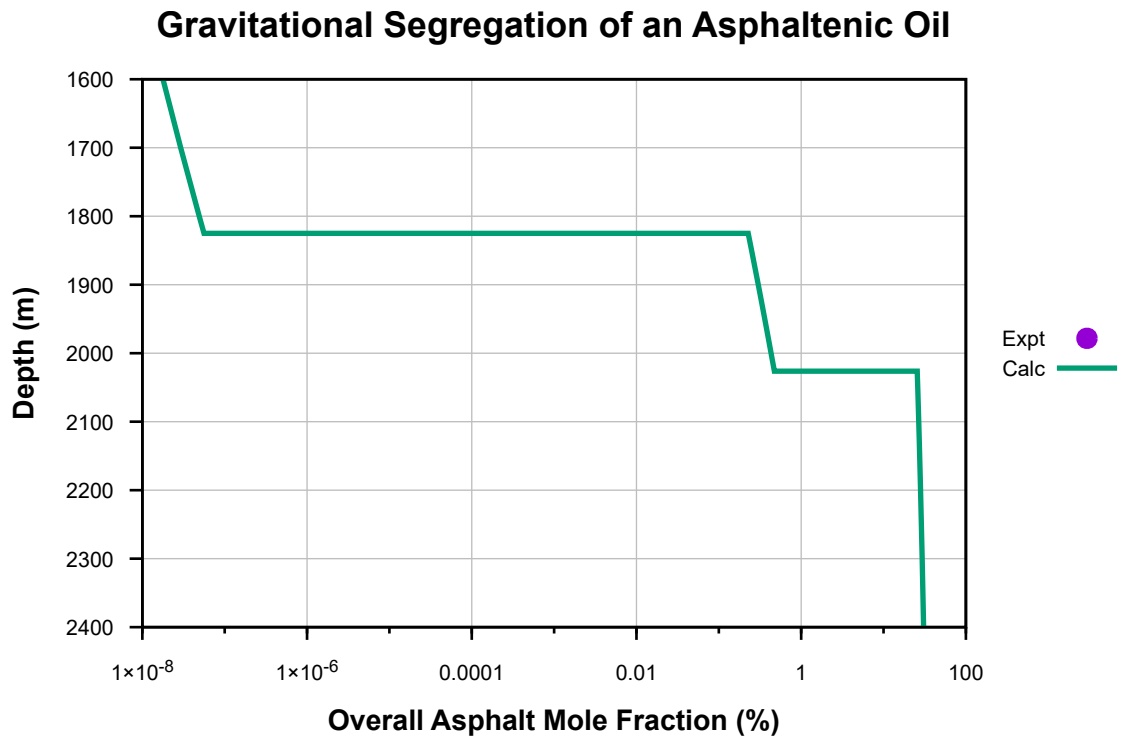


Figure 8: Depth vs. Overall Asphalt Mole Fraction for Gravitational Segregation of an Asphaltenic Oil.

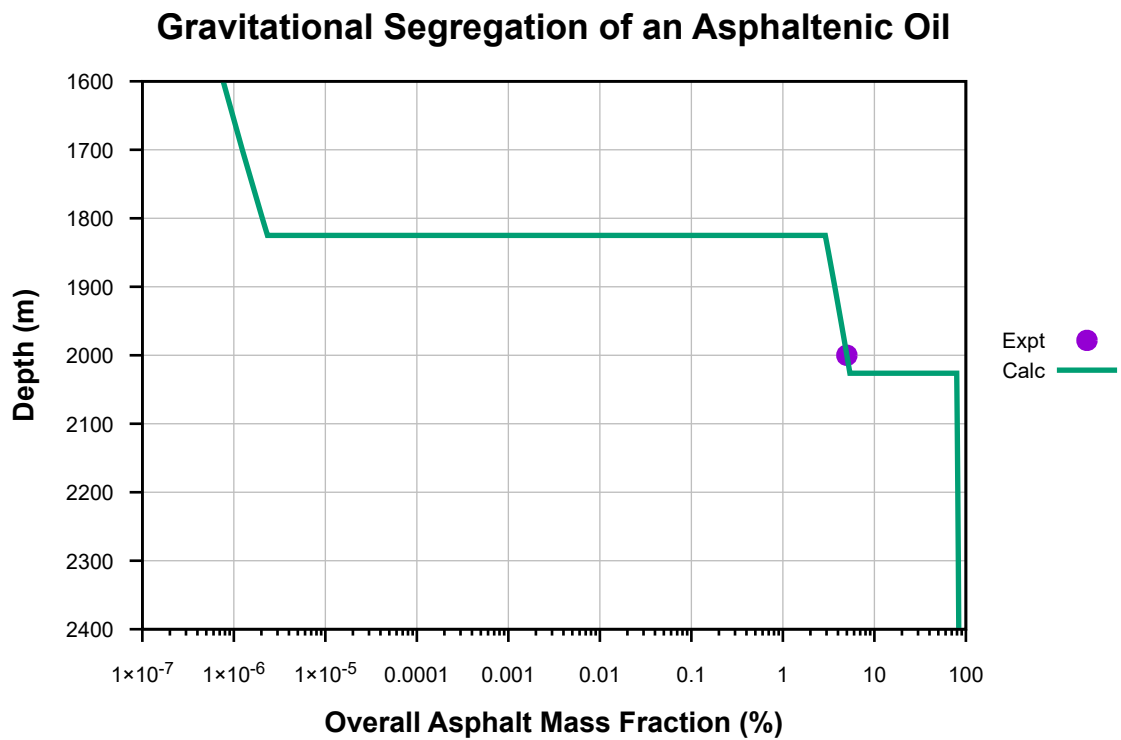


Figure 9: Depth vs. Overall Asphalt Mass Fraction for Gravitational Segregation of an Asphaltenic Oil.

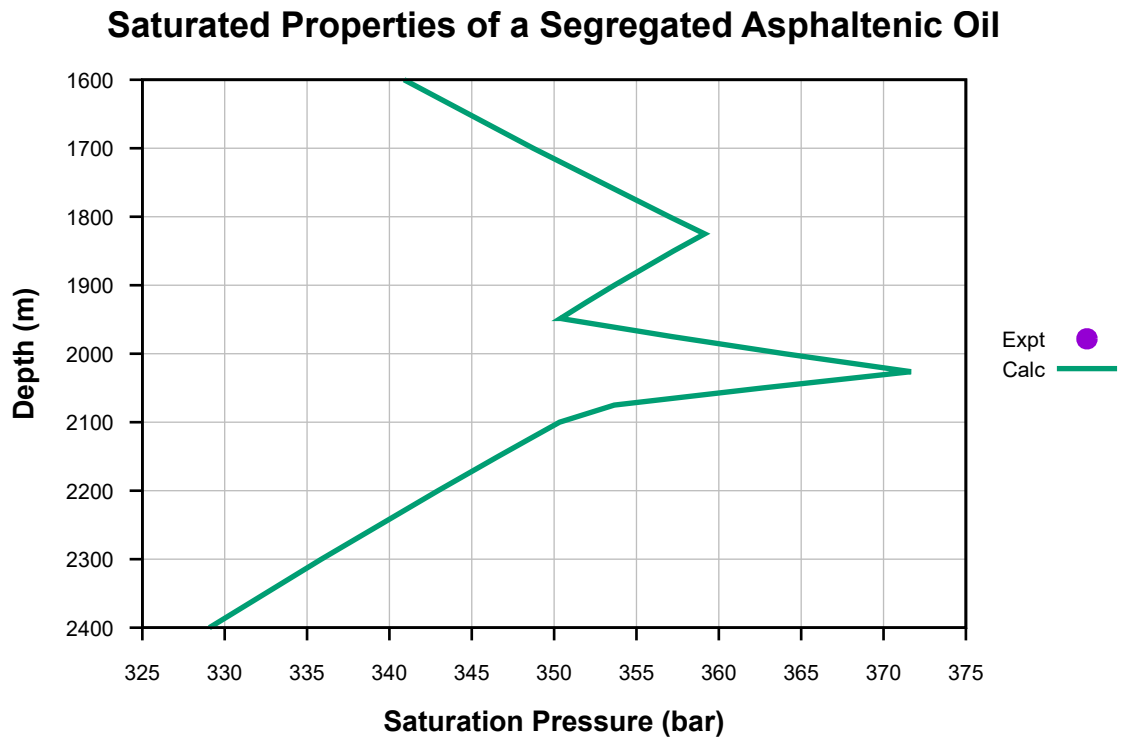


Figure 10: Depth vs. Saturation Pressure for Saturated Properties of a Segregated Asphaltenic Oil.

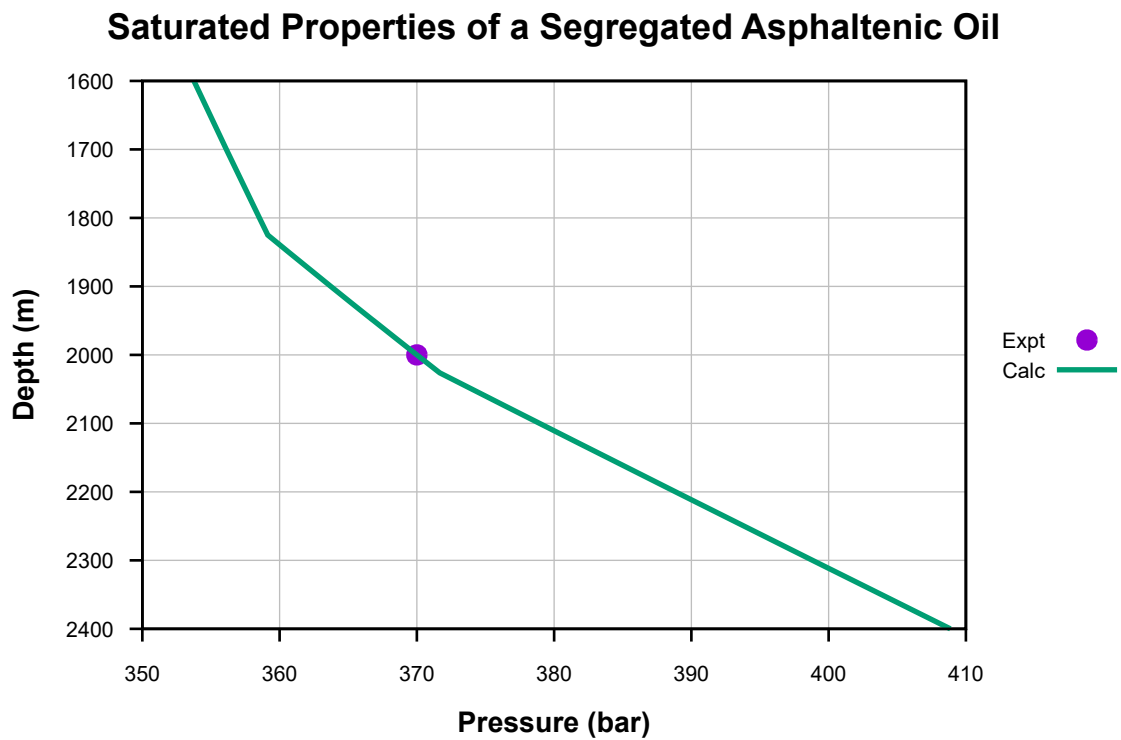


Figure 11: Depth vs. Pressure for Saturated Properties of a Segregated Asphaltenic Oil.

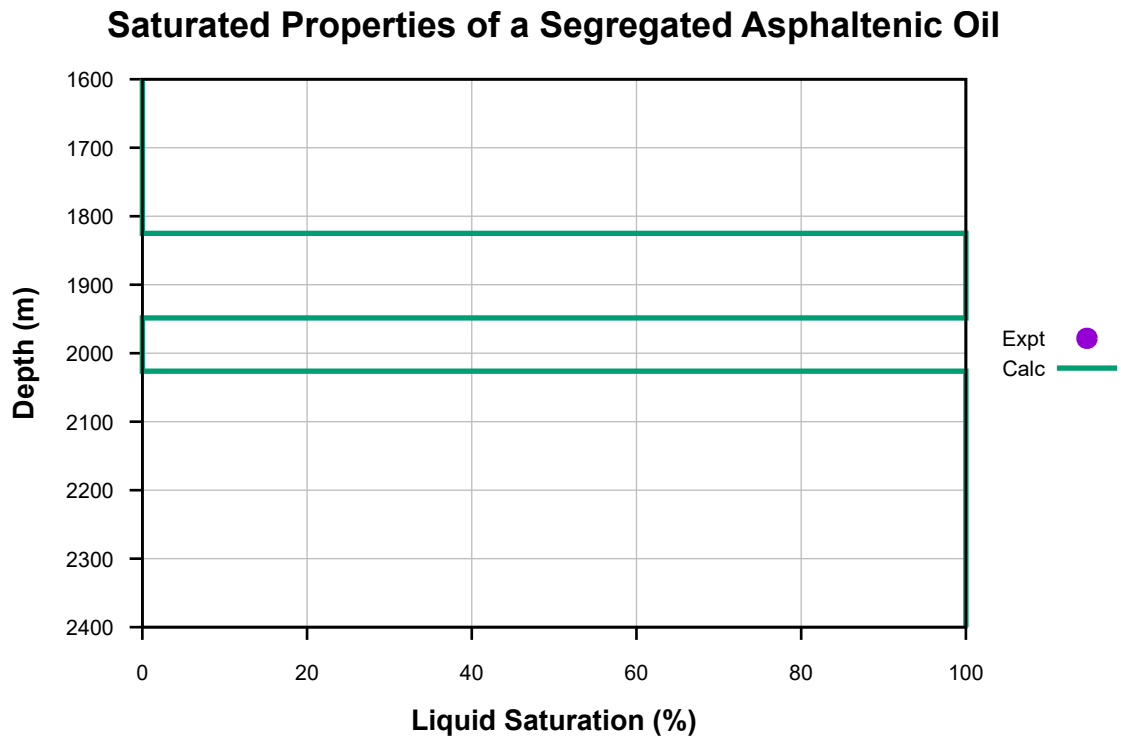


Figure 12: Depth vs. Liquid Saturation for Saturated Properties of a Segregated Asphaltenic Oil.

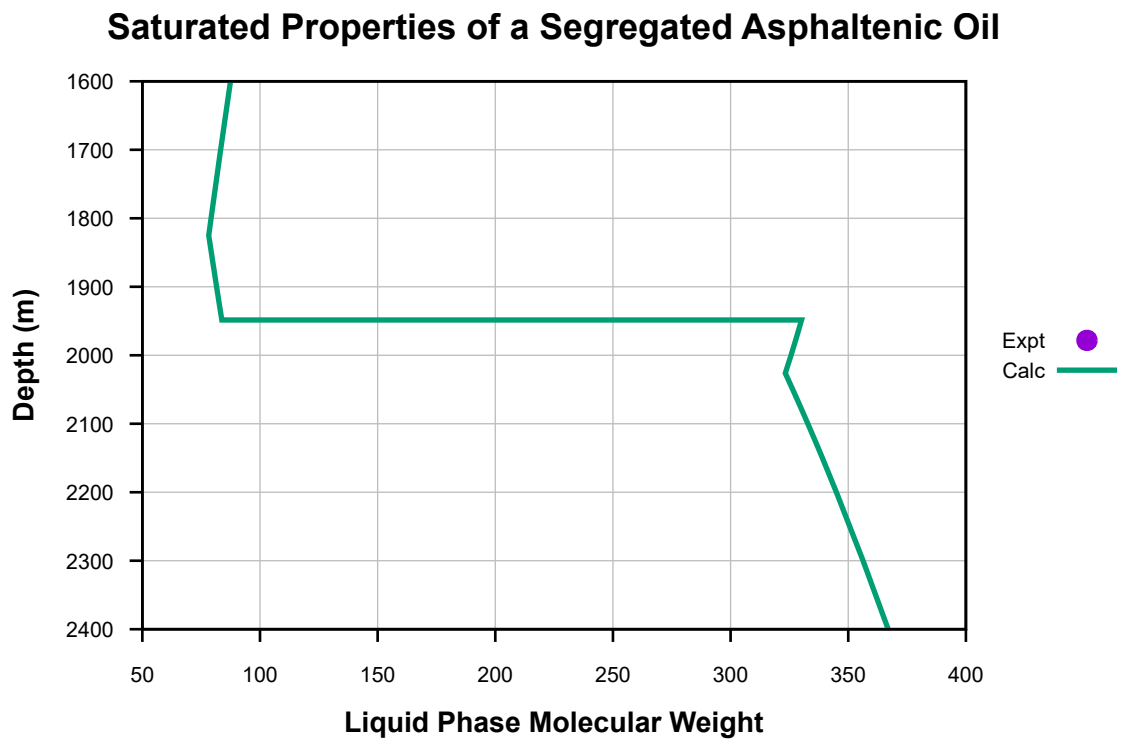


Figure 13: Depth vs. Liquid Phase Molecular Weight for Saturated Properties of a Segregated Asphaltenic Oil.

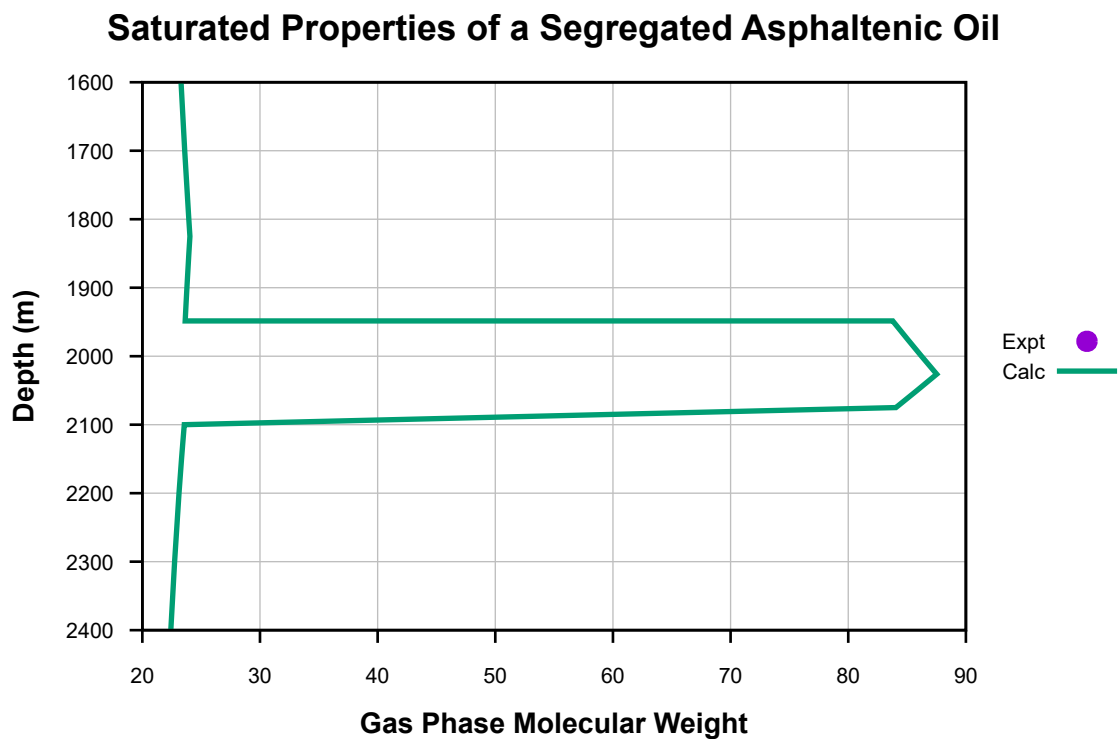


Figure 14: Depth vs. Gas Phase Molecular Weight for Saturated Properties of a Segregated Asphaltenic Oil.

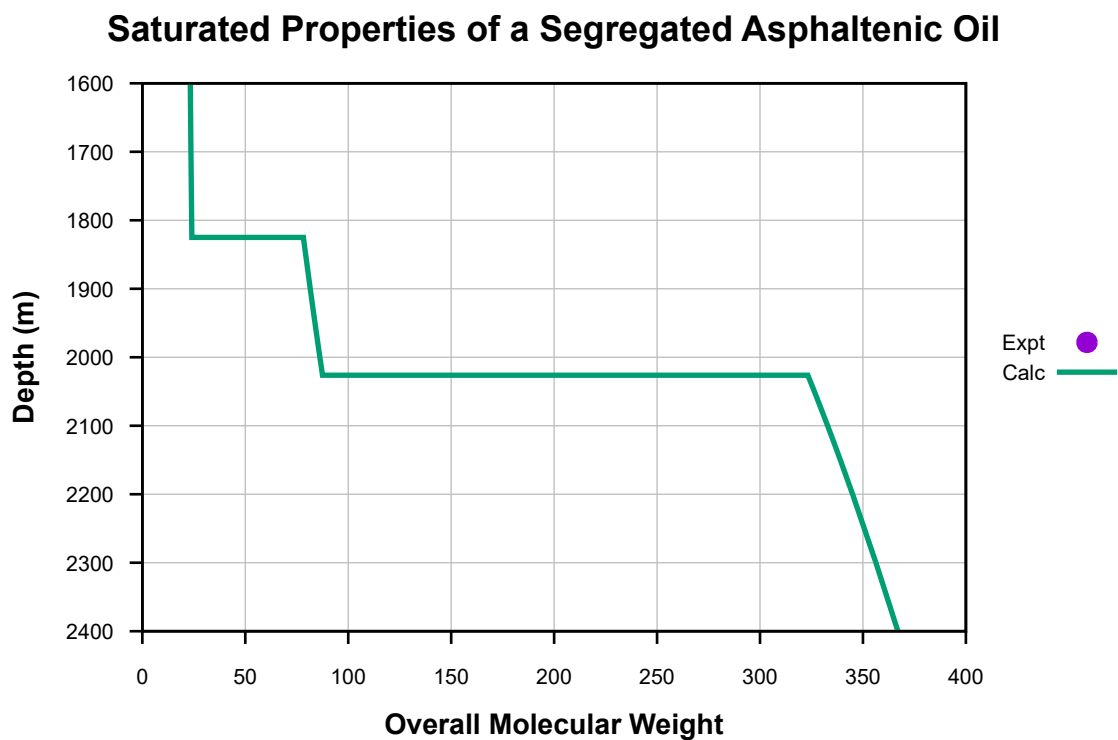


Figure 15: Depth vs. Overall Molecular Weight for Saturated Properties of a Segregated Asphaltenic Oil.

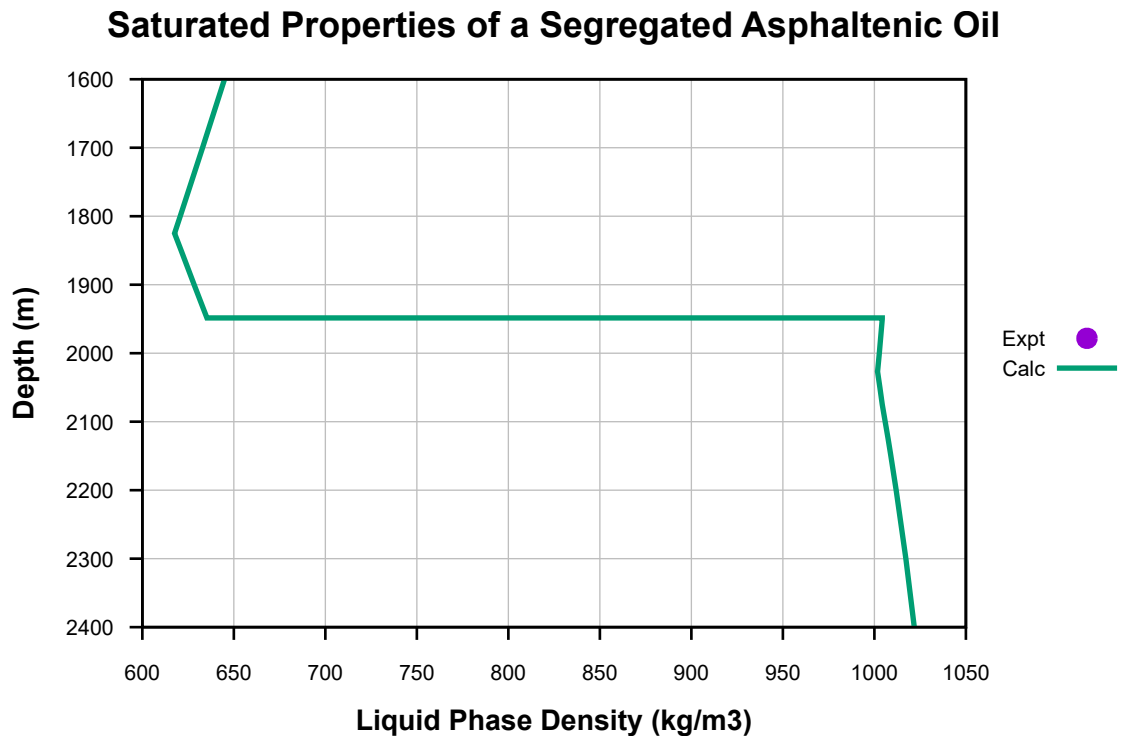


Figure 16: Depth vs. Liquid Phase Density for Saturated Properties of a Segregated Asphaltenic Oil.

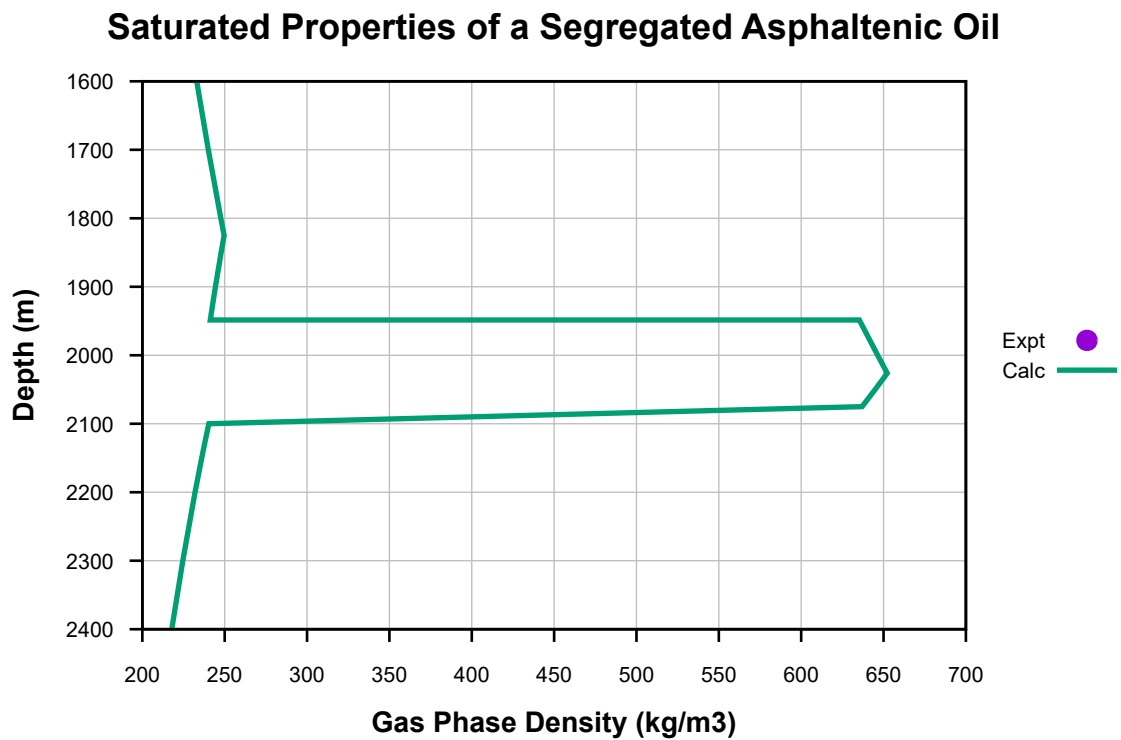


Figure 17: Depth vs. Gas Phase Density for Saturated Properties of a Segregated Asphaltenic Oil.

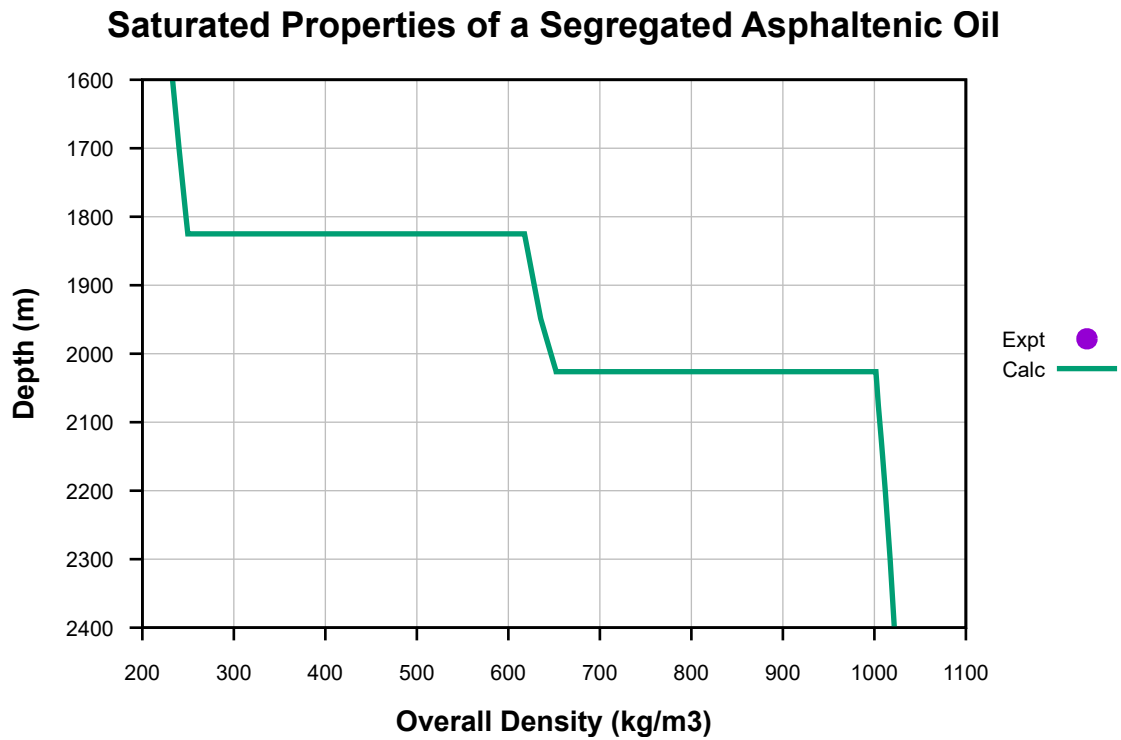


Figure 18: Depth vs. Overall Density for Saturated Properties of a Segregated Asphaltenic Oil.

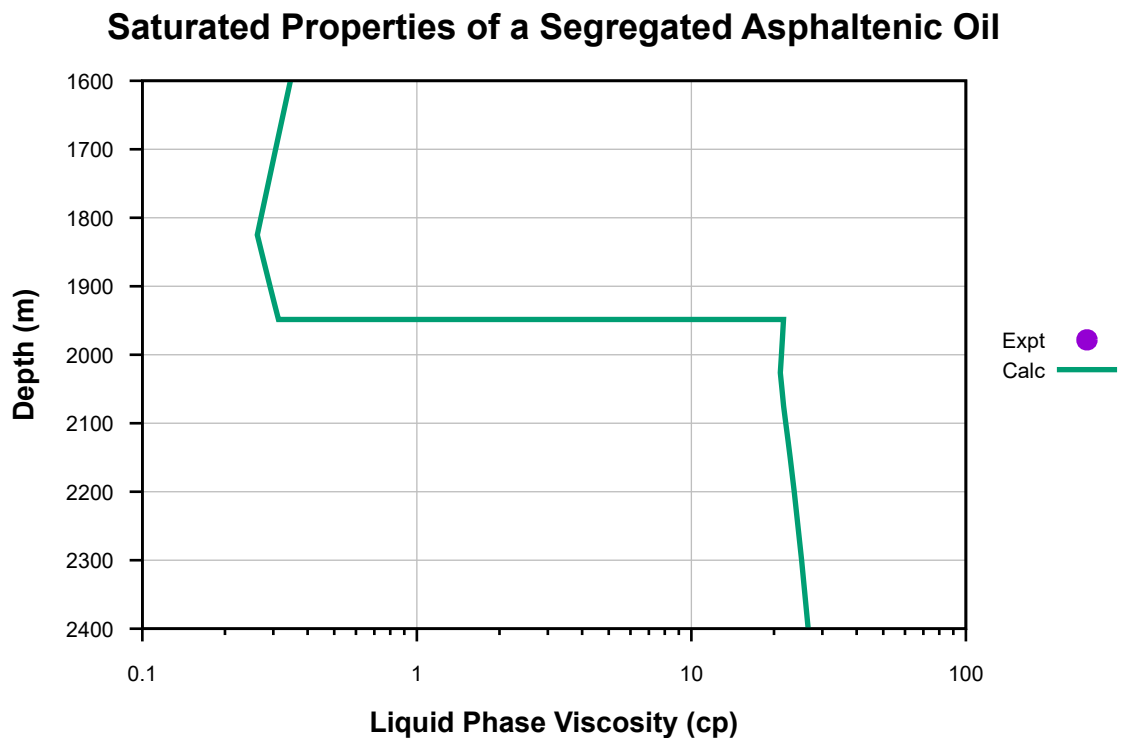


Figure 19: Depth vs. Liquid Phase Viscosity for Saturated Properties of a Segregated Asphaltenic Oil.

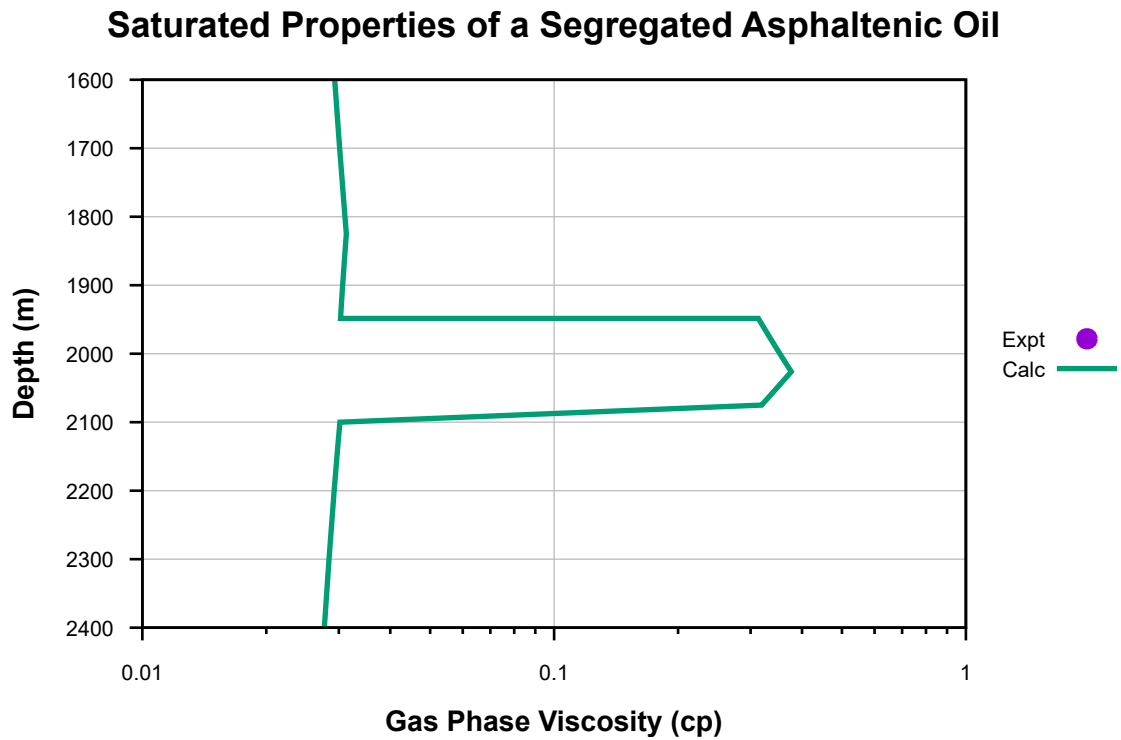


Figure 20: Depth vs. Gas Phase Viscosity for Saturated Properties of a Segregated Asphaltenic Oil.

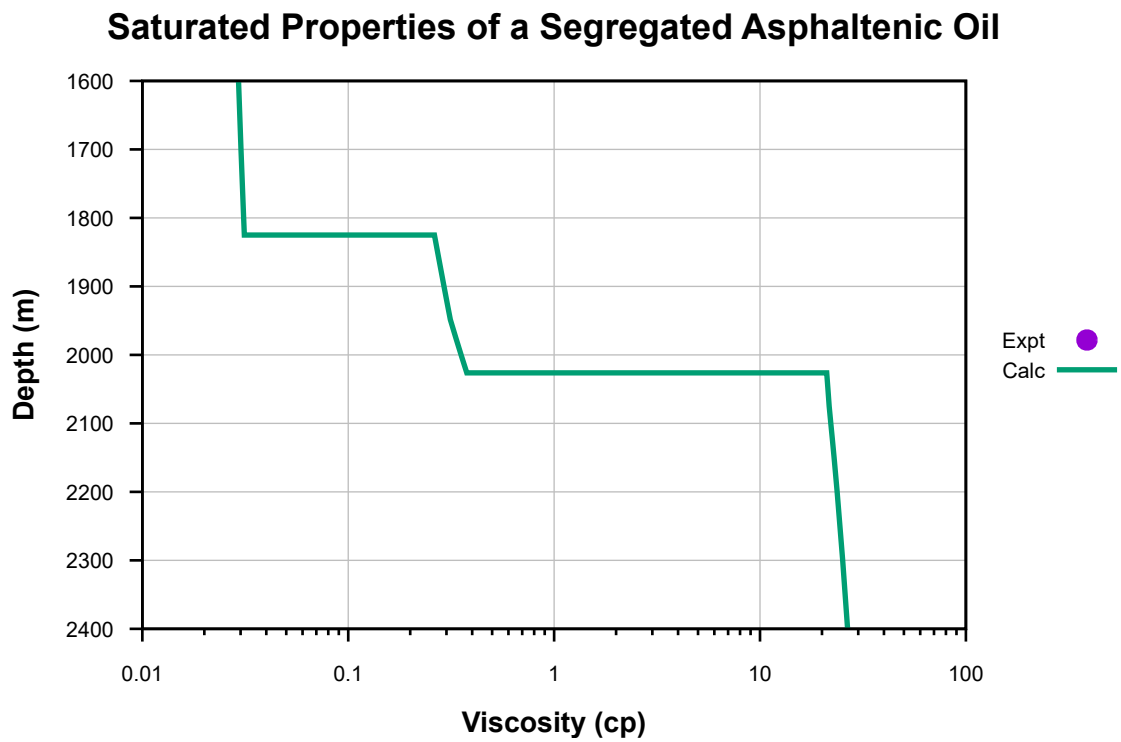


Figure 21: Depth vs. Viscosity for Saturated Properties of a Segregated Asphaltenic Oil.

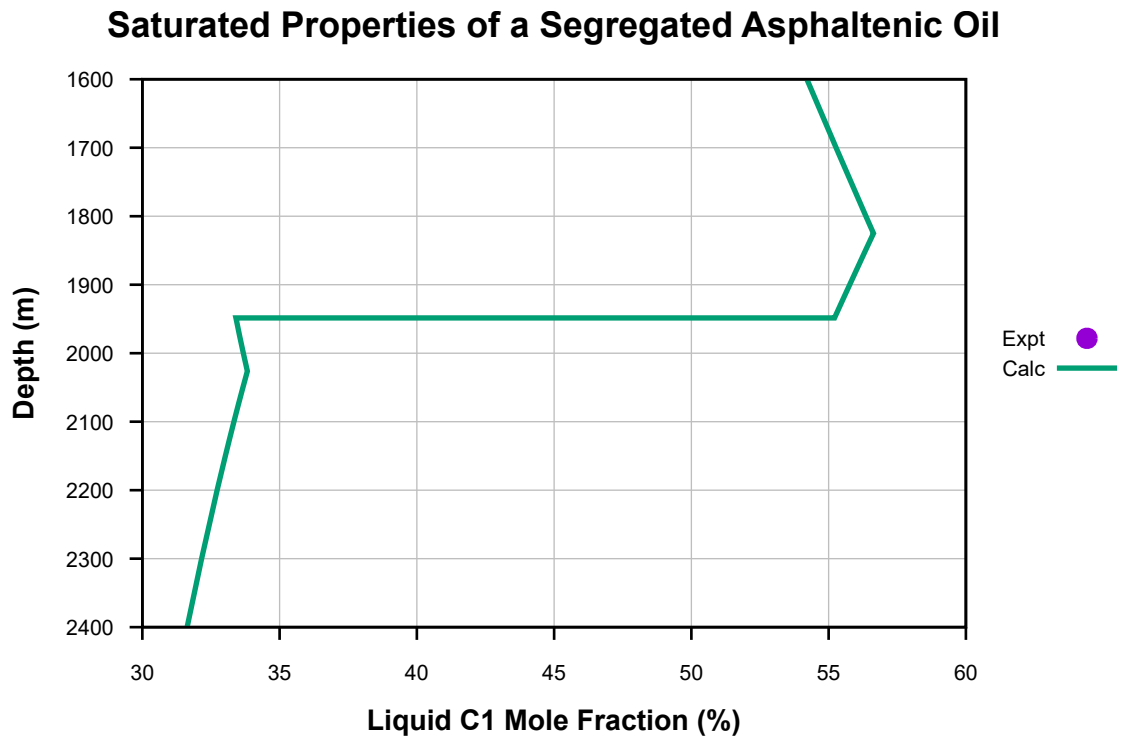


Figure 22: Depth vs. Liquid C1 Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

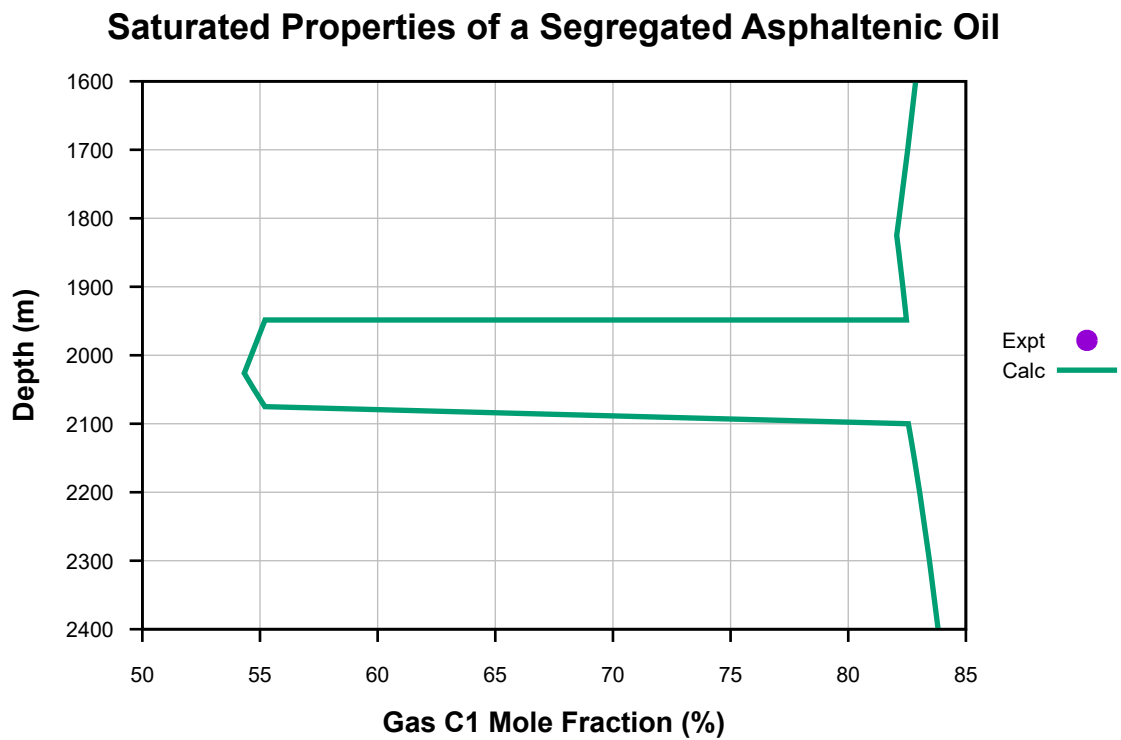


Figure 23: Depth vs. Gas C1 Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

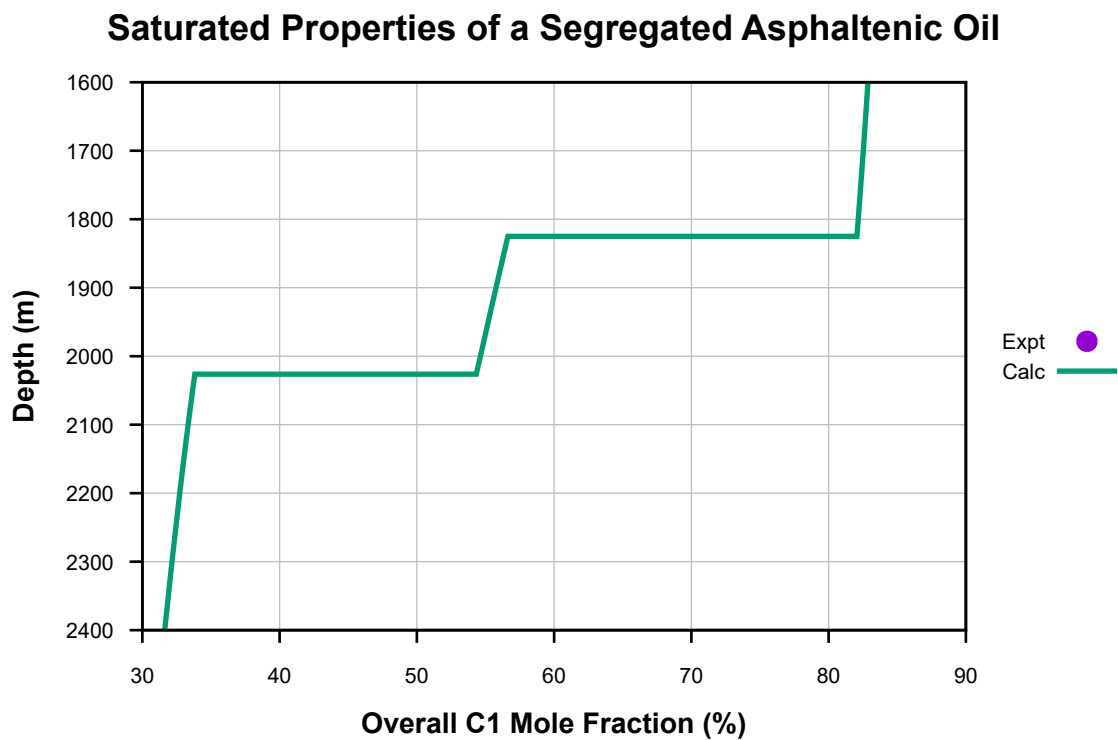


Figure 24: Depth vs. Overall C1 Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

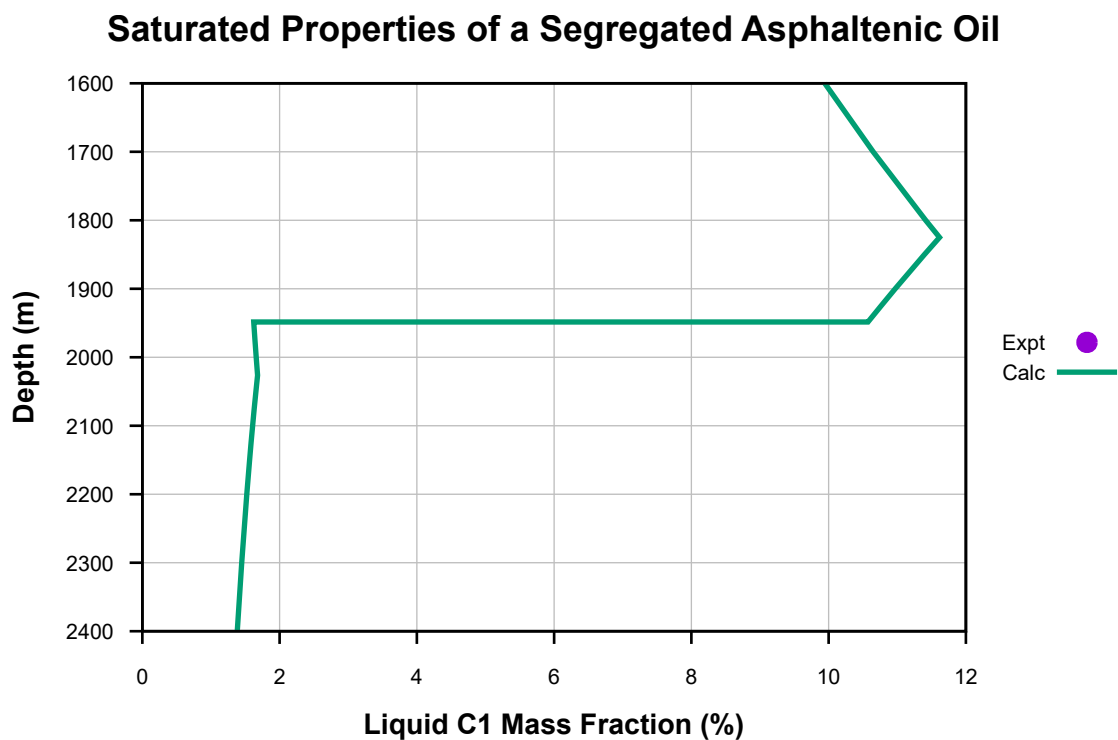


Figure 25: Depth vs. Liquid C1 Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

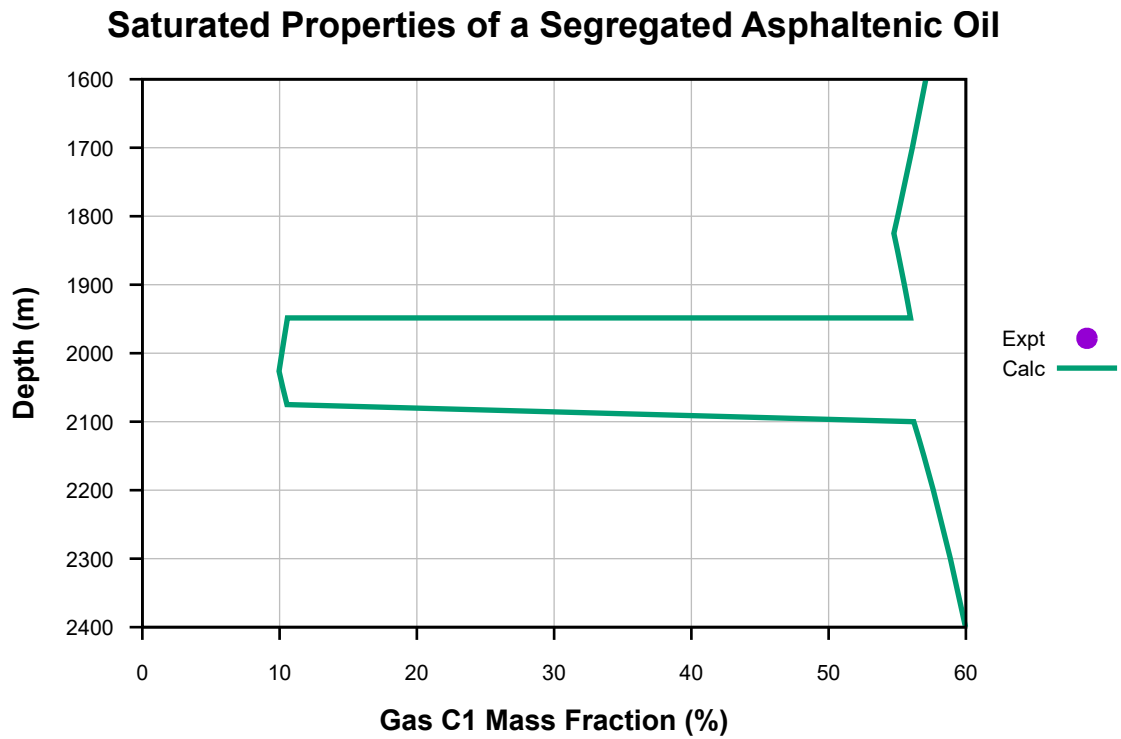


Figure 26: Depth vs. Gas C1 Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

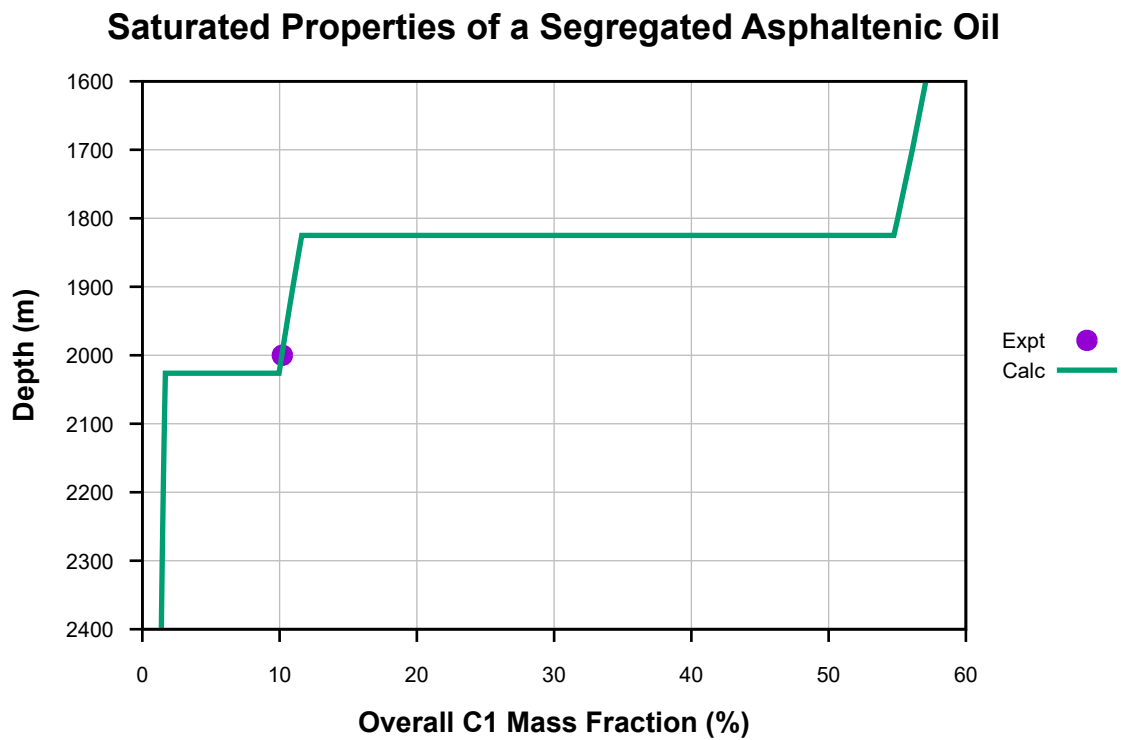


Figure 27: Depth vs. Overall C1 Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

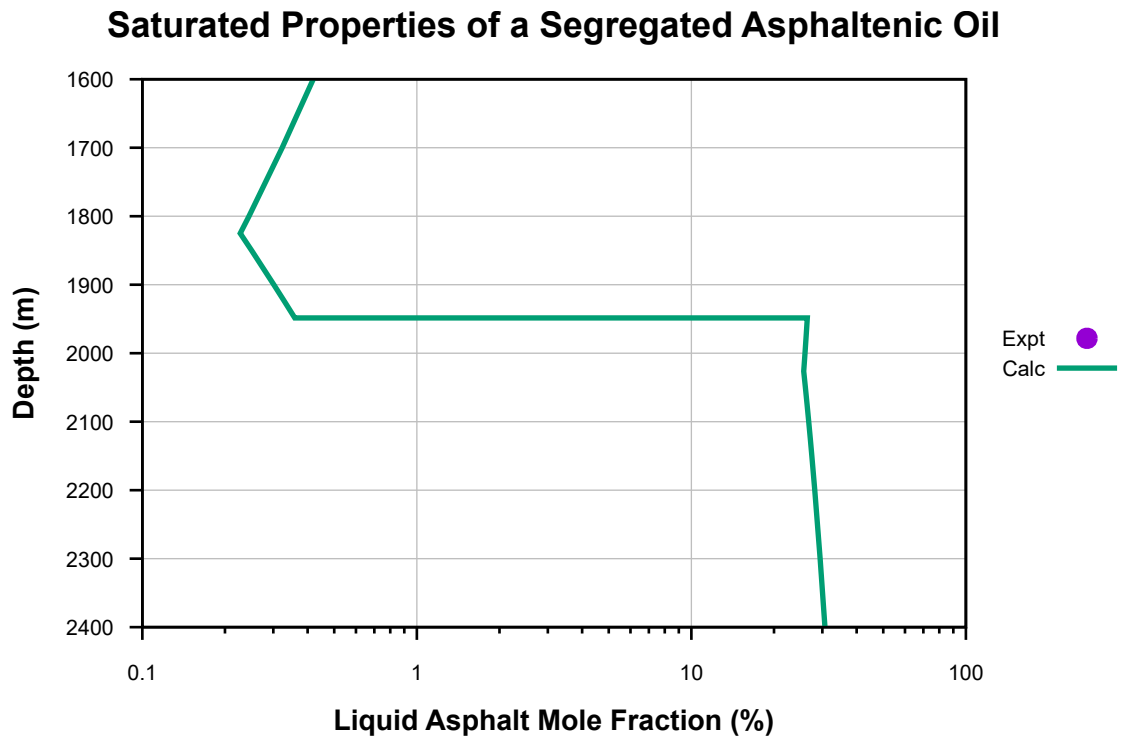


Figure 28: Depth vs. Liquid Asphalt Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

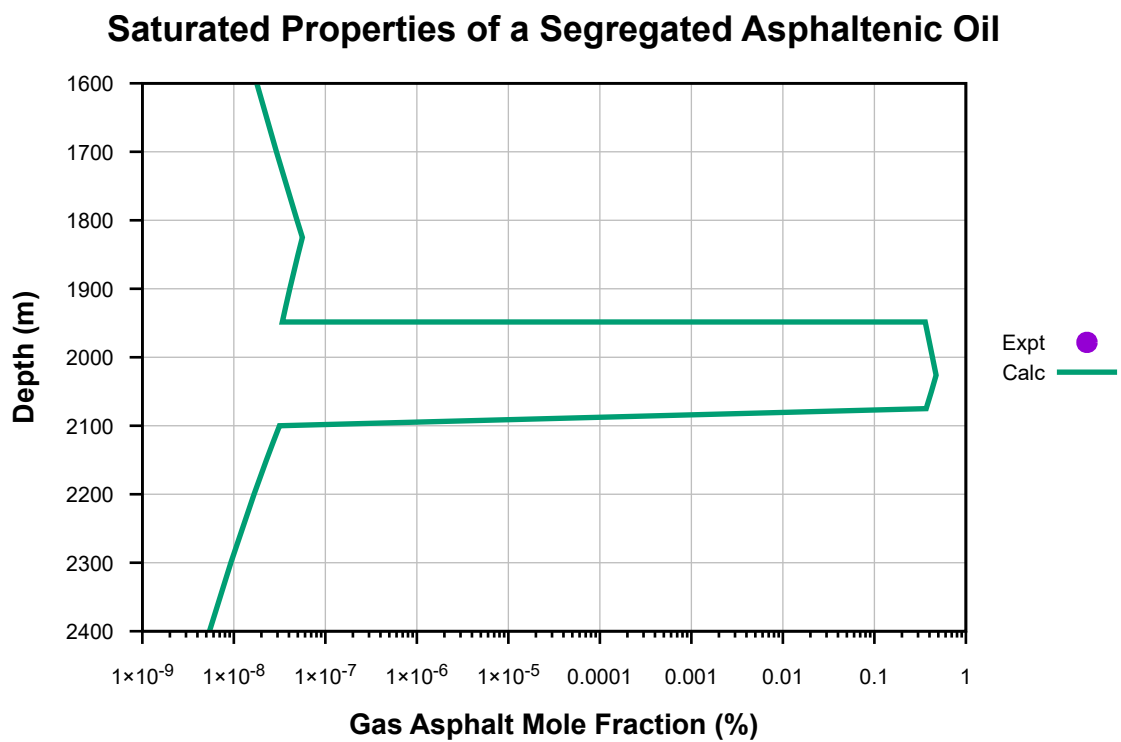


Figure 29: Depth vs. Gas Asphalt Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

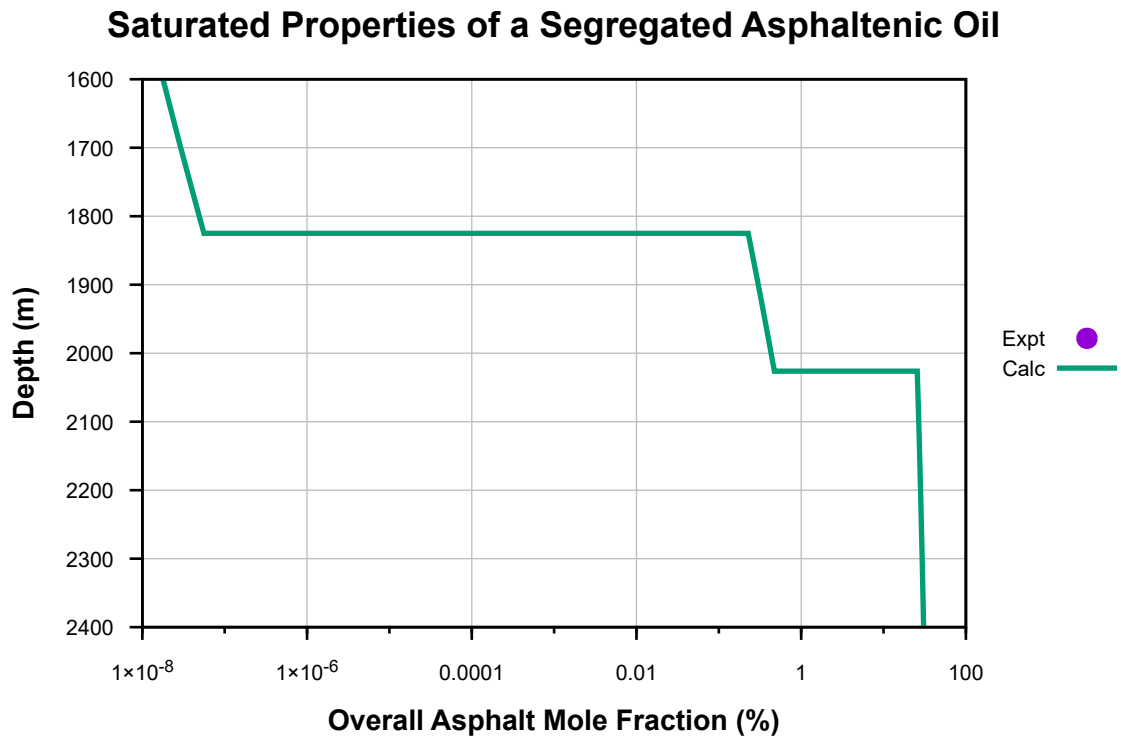


Figure 30: Depth vs. Overall Asphalt Mole Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

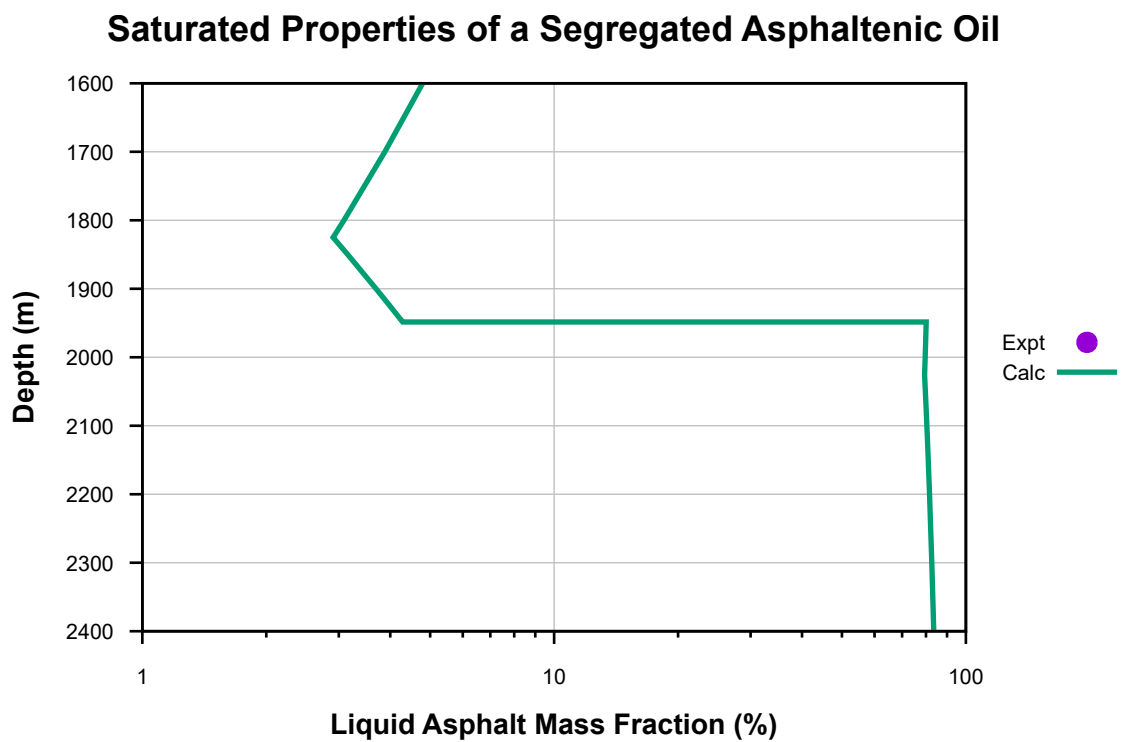


Figure 31: Depth vs. Liquid Asphalt Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

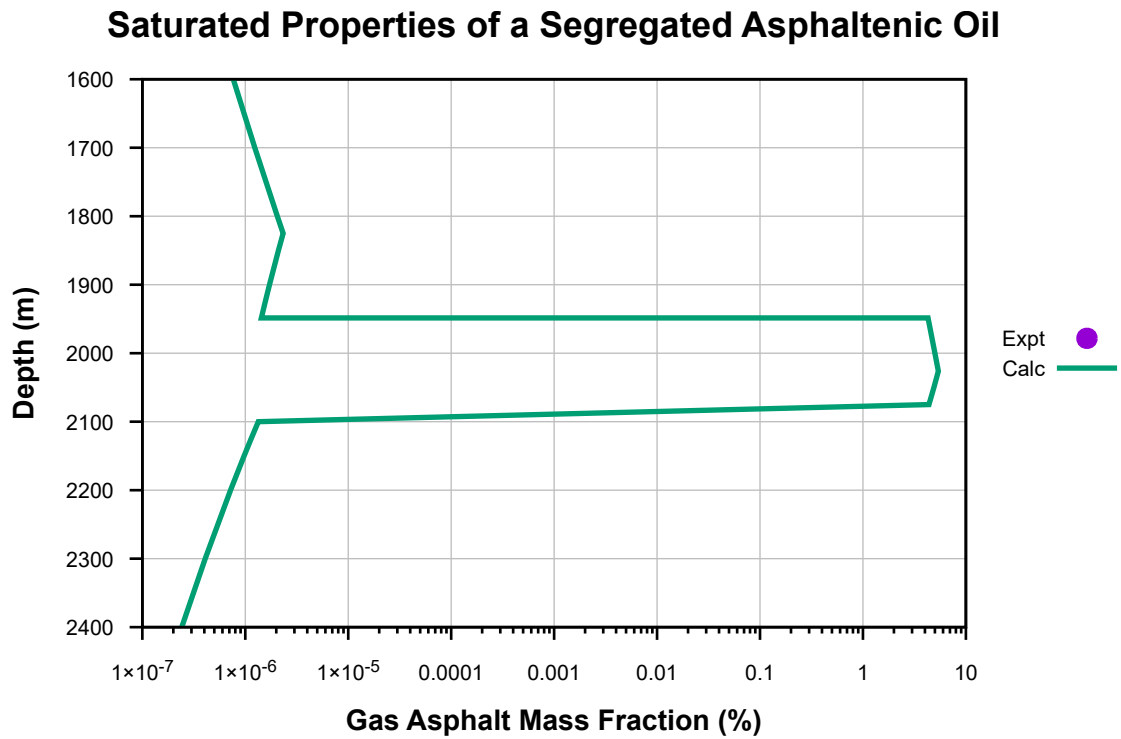


Figure 32: Depth vs. Gas Asphalt Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.

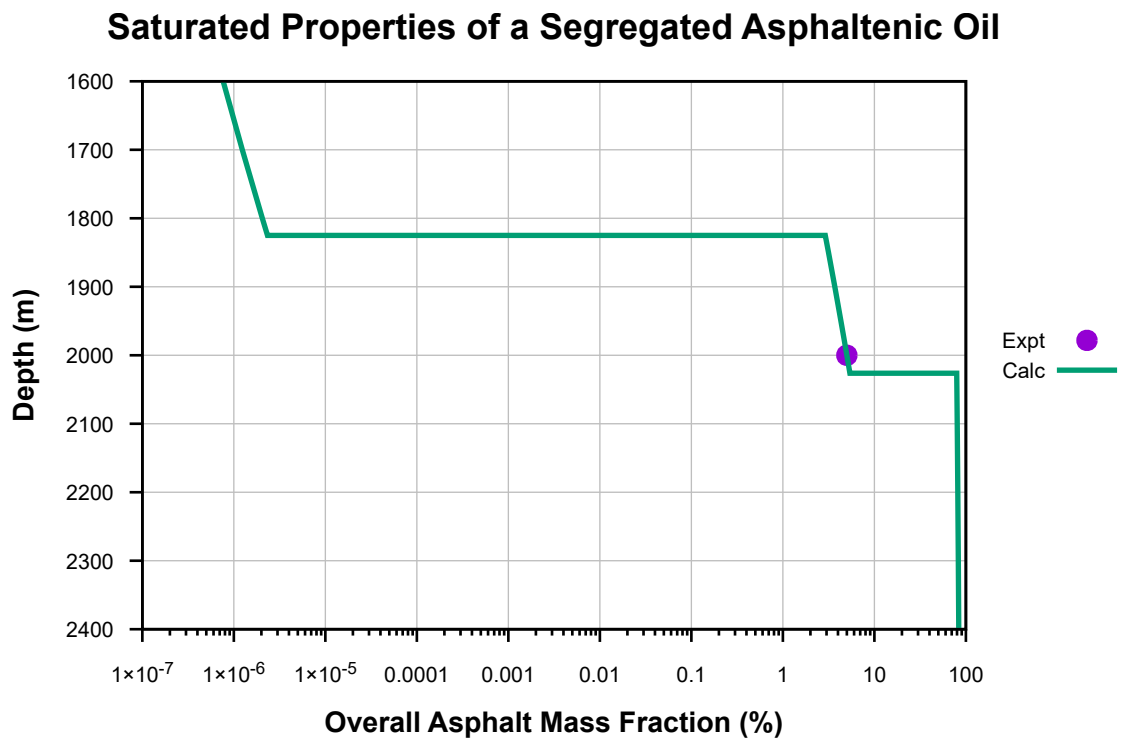


Figure 33: Depth vs. Overall Asphalt Mass Fraction for Saturated Properties of a Segregated Asphaltenic Oil.