



Sample & Analysis Information

Sample Information

Sample Name: Sweet Orange 10X Essential Oil**Botanical Name:** Citrus sinensis**Lot Number:** 13301**Production Method:** Cold Press**Sample Type:** EO - Single**Country of Origin:** USA**Analysis Date:** 6/27/2025**Manufacture Date:** June 2025

GC/MS

Inst. ID: Shimadzu GCMS-QP2010Ultra**Injection Type:** Split**Split Ratio:** 24.4**Column Type:** ZB-5**Injection Volume:** 0.1 µL**Temperature Program:** 2C/min

Physical Data

ANALYSIS

Optical Rotation @20°C

Refractive Index @20°C

Specific Gravity @20°C

METHOD

USP[781]

USP[831]

USP[841]

RESULTS

+83.52

1.46887

0.84505

Ret. Time	Component	Ret. Idx.	Conc. %	
4.474	Heptane	697	0%	
10.292	Nonane	898	0.02%	
11.604	alpha-Thujene	923	0.07%	
12.003	alpha-Pinene	930	0.72%	
14.134	Sabinene	969	0.73%	
14.429	beta-Pinene	975	0.17%	
15.057	Myrcene	986	1.86%	
15.900	Octanal	1002	1.21%	
16.099	alpha-Phellandrene	1005	0.04%	
16.242	delta-3-Carene	1007	0.04%	
16.757	alpha-Terpinene	1015	0.03%	
17.247	para-Cymene	1022	0.27%	
17.635	Limonene	1028	82.01%	IFRA
17.690	beta-Phellandrene	1029	0.2%	
18.606	trans-beta-Ocimene	1043	0.05%	
19.375	gamma-Terpinene	1055	0.94%	
20.167	1-Octanol	1067	0.2%	
21.157	Terpinolene	1083	0.02%	
21.227	trans-Linalool oxide	1084	0.02%	
22.116	Linalool	1097	2.77%	IFRA
22.468	Nonanal	1103	0.33%	
23.412	endo-Fenchol	1116	0.01%	
24.355	cis-Limonene oxide	1130	0.01%	
25.425	Isopulegol	1146	0.04%	
25.686	Citronellal	1150	0.48%	IFRA
26.115	Neoisopulegol	1156	0.02%	
27.026	Unidentified	1169	0.01%	
28.638	alpha-Terpineol	1193	0.92%	
29.433	Decanal	1204	4.76%	
29.709	Octyl acetate	1208	0.13%	
30.622	Nerol	1222	0.02%	
30.782	Citronellol	1224	0.08%	IFRA
31.560	Neral	1235	0.35%	IFRA
32.392	Geraniol	1248	0.02%	IFRA
33.574	Geranial	1265	0.56%	IFRA
33.920	Unidentified	1270	0.01%	
39.596	Neryl acetate	1356	0.06%	
40.696	alpha-Copaene	1372	0.03%	
42.929	Dodecanal	1407	0.53%	
43.482	beta-Caryophyllene	1416	0.18%	



Ret. Time	Component	Ret. Idx.	Conc. %	
44.345	trans-alpha-Bergamotene	1430	0.02%	
45.722	alpha-Humulene	1452	0.02%	
47.331	Germacrene D	1477	0.01%	
49.600	delta-Cadinene	1515	0.01%	

Total Identified Compounds **99.96 %**

