

Compound ID	CAS Number	Outdoor wine		Indoor wine	
		Retention time (Minutes)	Peak area %	Retention time (Minutes)	Peak area (%)
Ethyl Acetate	141-78-6	5.899	2.20	5.905	2.09
Ethanol	64-17-5	7.18	9.56	7.181	9.06
n-Ethyl propanoate	105-37-3	8.165	0.04	8.166	0.04
Isobutyl acetate	110-19-0	-	-	10.119	0.13
1-propanol	71-23-8	10.131	0.15	-	-
Ethyl butyrate	105-54-4	10.976	0.77	10.975	0.61
Isobutanol	78-83-1	12.391	2.09	12.384	2.70
3-Methylbutan-1-ol	123-51-3	16.621	26.51	16.628	26.56
Ethyl caproate	123-66-0	18.584	6.77	18.601	6.56
2-Heptanol	543-49-7	20.768	0.22	20.767	0.19
Ethyl lactate	97-64-3	21.131	0.53	21.129	0.26
1-Hexanol	111-27-3	21.73	4.43	21.724	3.71
3-Octanol	589-98-0	23.491	0.03	-	-
2-Hexen-1-ol, (Z)-	928-94-9	23.673	0.02	-	-
Ethyl octanoate	106-32-1	25.98	5.97	25.985	6.52
Benzaldehyde	100-52-7	27.141	0.40	27.148	0.30
2,3-Butanediol	513-85-9	27.363	0.22	27.358	0.19
Isoamyl lactate	19329-89-6	28.957	0.32	28.954	0.18
3-Hydroxybutyrolactone	5469-16-9	30.079	0.17	30.08	0.21
4-Methylbenzaldehyde	104-87-0	31.137	0.09	-	-
3-Methylbutanoic acid	503-74-2	31.299	0.16	31.299	0.17
3-Tolualdehyde	620-23-5	-	-	31.138	0.10
ethyl 4-hydroxybutanoate	999-10-0	35.316	0.33	35.316	0.50
2-Phenylethyl acetate	103-45-7	36.131	0.04	36.145	0.02
Benzyl alcohol	100-51-6	37.142	0.84	37.142	0.96
Benzeneethanol	60-12-8	38.274	19.20	38.268	16.81
3-Phenylpropanol	122-97-4	41.674	0.10	-	-
Ethyl 3-hydroxytridecanoate	107141-15-1	-	-	43.815	0.01
4-Ethoxy-4-oxobutanoic acid	1070-34-4	48.96	0.02	48.962	0.38

**Supplementary Table 9: Volatile compounds with the largest peak areas found in the outdoor and indoor wine by HS-SPME and Shimadzu GC-MS.**

“-” denotes “not detected”.