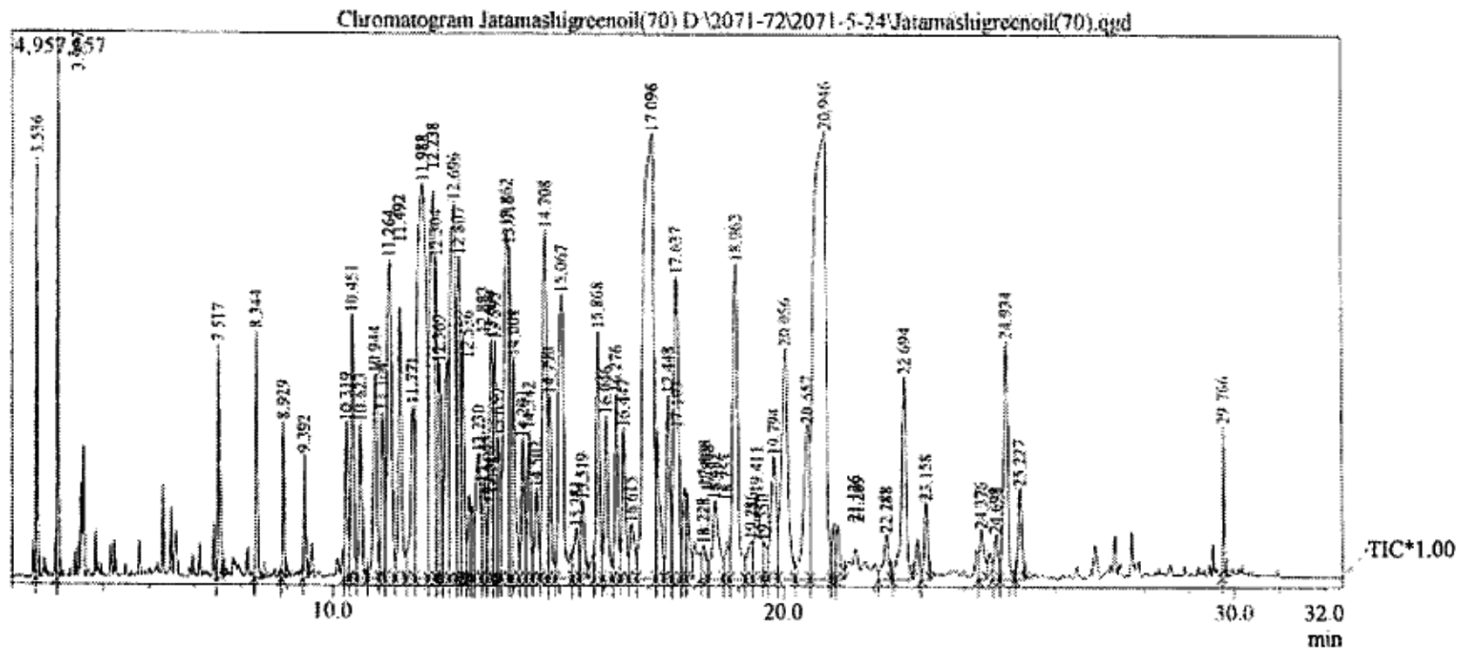




GCMS ANALYSIS

PRODUCT NAME: SPIKENARD ESSENTIAL OIL - 11134

DATE: August 4, 2015



Due to volume turnover, this report is not lot specific. It is representative of the quality of this oil produced by the manufacturer of this product. Specific lots may vary slightly as is the case in natural products.





GCMS ANALYSIS

Peak#	R.Time	Area	Area%	Peak Report TIC Name
1	3.536	6932451	0.86	Pinene <alpha->
2	3.997	9731920	1.21	Pinene <beta->
3	7.517	6144688	0.76	Isovalerate <isobutyl->
4	8.344	5949907	0.74	Myrtenate <methyl->
5	8.929	3815082	0.47	Myrtenyl acetate
6	9.392	3180824	0.39	1,3-Cyclopentanedimethanol
7	10.319	5784414	0.72	Naphthalene, 1,2,3,4,4a,5,6,8a-octahydro-7-methyl-4-methylene-1-(1-methyl-)
8	10.451	10027571	1.24	4,7-Methanoazulene, 1,2,3,4,5,6,7,8-octahydro-1,4,9,9-tetramethyl-, [1S-(
9	10.623	6165550	0.76	Cyclohexane, 1-ethenyl-1-methyl-2,4-bis(1-methylethenyl)-, [1S-(1.alpha.,
10	10.944	10377152	1.29	Sesquithujene <7-epi->
11	11.104	6777820	0.84	1,5,9,13-Tetradecatetraene
12	11.264	19877126	2.46	
13	11.492	12854471	1.59	Aristolene
14	11.771	10993134	1.36	Aristolene-1(10),8-diene
15	11.988	48221673	5.98	1H-Cyclopropa[a]naphthalene, 1a,2,3,5,6,7,7a,7b-octahydro-1,1,7,7a-tetra
16	12.238	28983895	3.59	(-)-Aristolene
17	12.304	8504192	1.05	Seychellene
18	12.369	7492766	0.93	Isolongifolene, 4,5-dehydro-
19	12.536	12751991	1.58	Linalyl formate
20	12.696	27146660	3.37	Valerena-4,7(11)-diene
21	12.807	14245794	1.77	1H-Cycloprop[e]azulene, decahydro-1,1,7-trimethyl-4-methylene-, [1aR-(
22	12.883	8123869	1.01	5-Hydroxymethyl-1,3,3-trimethyl-2-(3-methyl-but-1,3-dienyl)-cyclopenta
23	13.016	3183705	0.39	Calamenene <trans->
24	13.078	2668683	0.33	Cedrene <beta->
25	13.230	8521867	1.06	Curcumene <gamma->
26	13.344	4697953	0.58	Curcumene <alpha->
27	13.509	12446403	1.54	Muurola-4(14),5-diene <cis->
28	13.595	9335305	1.16	Eudesma-4(14),11-diene



GCMS ANALYSIS

Peak#	R Time	Area	Area%	Name
29	13.659	5399012	0.67	1,4-Methano-1H-cyclohepta[d]pyridazine, 4,4a,5,6,7,8,9,9a-octahydro-10
30	13.862	24393848	3.02	Naphthalene, 1,2,3,4,4a,5,6,8a-octahydro-7-methyl-4-methylene-1-(1-methyl-
31	13.916	9175779	1.14	Naphthalene, 1,2,3,4,4a,5,6,8a-octahydro-4a,8-dimethyl-2-(1-methylether)
32	14.008	8582869	1.06	Bicyclo[5.2.0]nonane, 4-methylene-2,8,8-trimethyl-2-vinyl-
33	14.203	6346621	0.79	Azulene, 1,2,3,5,6,7,8,8a-octahydro-1,4-dimethyl-7-(1-methylethenyl)-, [1
34	14.342	6420078	0.80	Curcumene <beta->
35	14.502	4959682	0.61	Naphthalene, 1,2,3,4,4a,5,6,8a-octahydro-7-methyl-4-methylene-1-(1-methyl-
36	14.708	20441684	2.53	(-)-alpha-Panasinsen
37	14.790	7510114	0.93	Cadinene <delta->
38	15.067	20739408	2.57	Neoisolongifolene, 8,9-dehydro-
39	15.381	3080738	0.38	2,11-Dioxatetracyclo[4.3.1.1(3,10).0(6,9)]undec-4-ene, 3,7,7,10-tetramethyl-
40	15.519	4161844	0.52	2,4,6-Tris(cyclohexyl)hept-1-ene
41	15.868	11906111	1.48	1-Ethyl-4,4-dimethyl-cyclohex-2-en-1-ol
42	16.046	8484132	1.05	Myrtenyl isobutyrate
43	16.276	8639716	1.07	Cyclohex-3-ene-1-carboxaldehyde <1-methyl-, 4-(4-methylpentyl)->
44	16.447	7639286	0.95	Viridiflorol
45	16.615	3758645	0.47	Isolongifolene, 4,5,9,10-dehydro-
46	17.096	63643812	7.89	Cadin-4-en-10-ol
47	17.193	7861962	0.97	Globulol
48	17.448	9098391	1.13	Epiglobulol
49	17.637	19760658	2.45	Carotol
50	17.808	4587171	0.57	2-Naphthalenemethanol, 2,3,4,4a,5,6,7,8-octahydro- alpha , alpha ,4a,8-tet
51	17.868	3694485	0.46	1H-Cycloprop[e]azulen-4-ol, decahydro-1,1,4,7-tetramethyl-, [1ar-(1a alpi
52	18.228	2056972	0.26	1-Naphthalenol, decahydro-1,4a-dimethyl-7-(1-methylethylidene)-, [1R-(1
53	18.482	7434612	0.92	
54	18.753	2106894	0.26	Globulol
55	18.963	23199178	2.88	Cadin-4-en-10-ol
56	19.286	2799233	0.35	
57	19.411	6516381	0.81	Bicyclo[3.3.1]nonan-9-one, 1,2,4-trimethyl-3-nitro-, (2-endo,3-exo,4-exo)
58	19.550	2081579	0.26	Bisabolol <alpha->
59	19.794	9794258	1.21	Cadin-4-en-10-ol
60	20.056	23057716	2.86	Patchouli alcohol
61	20.557	12994334	1.61	6-Isopropenyl-4,8a-dimethyl-1,2,3,5,6,7,8,8a-octahydro-naphthalen-2-ol
62	20.946	75740212	9.39	1(2H)-Naphthalenone, octahydro-4a,8a-dimethyl-7-(1-methylethyl)-, [4aR
63	21.126	2526364	0.31	Bisabolol <alpha->
64	21.209	2782171	0.34	2,10-Dodecadien-1-ol, 3,7,11-trimethyl-, (E)-(+/-)-
65	22.288	3278289	0.41	Alloaromadendrene oxide-(2)
66	22.694	13855852	1.72	Azulene, 1;2,3,3a,4,5,6,7-octahydro-1,4-dimethyl-7-(1-methylethenyl)-, [1
67	23.158	3797478	0.47	Naphthalene, 1,2,3,4-tetrahydro-2,5,8-trimethyl-
68	24.376	3155146	0.39	2(3H)-Naphthalenone, 4,4a,5,6,7,8-hexahydro-4,4a-dimethyl-6-(1-methylc
69	24.698	2481249	0.31	2,2,7,7-Tetramethyltricyclo[6.2.1.0(1,6)]undec-4-en-3-one
70	24.934	14512584	1.80	2s,6s-2,6,8,8-Tetramethyltricyclo[5.2.2.0(1,6)]undecan-2-ol
71	25.227	4637260	0.58	Formic acid, 8-formyloxymethyl-2-isopropyl-5-methyl-bicyclo[3.2.1]oct-6
72	29.766	2433032	0.30	Aristolol-1(10),8-diene
		806463706	100.00	

Disclaimer & Caution

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