

Botany Evolution LLC

2510 Kirby Circle NE
Palm Bay, FL 32945
321-802-4583

Certificate Of Analysis

Sample Identification Information

Date of Analysis 12/12/2018
Sample: S0583
Product Name KASTOM LATERAL ROOTS
Lot# SIV181113TLR

Country of Origin Solomon Islands
Country of Processing Solomon Islands
Manufacture Date 11/13/18
Expiration Date 11/13/21

General Product Specifications

Product Species Piper Methysticum
Part Used Root

Common Names Kava kava, Awa, Yagona
Appearance Beige powder

Analyzed Characteristics

Specification

Result

Test Method

<u>Standardization</u>	2-17% Kavalactones	16.12%	HPLC
<u>Identification</u>	Complies by HPLC	Conform	HPLC
<u>Kavalactone Profile</u>	Noble	PASS	HPLC
<u>Mesh Size</u>	60-30	60	Sieve
<u>Color</u>	Beige to Yellow	Pass	Visual
<u>Odor</u>		Pass	Organoleptic
<u>Taste</u>		Pass	Organoleptic
<u>Chemotype</u>		423165	HPLC
<u>K/DHM</u>		5.79	Calculation

Kavalactones	Code	Peaks Ref. (elution order)	Correction Factor	Area *	Area %	Corrected Kavalactones	Chemotype Identifier
Standard Kavain	K			2483.119			
Methysticin	M	1	2.21	853.843	5.39%	1.02%	6
Dihydromethysticin	DHM	2	3.38	533.561	3.37%	0.94%	5
Kavain	K	3	1	9975.976	63.03%	5.44%	4
Dihydrokavain	DHK	4	3.08	2216.247	14.00%	5.09%	2
Desmethoxyyangonin	DMY	5	2.52	1081.859	6.84%	1.62%	1
Yangonin	Y	6	3.12	1166.254	7.37%	2.01%	3
Kavalactones			Total:	15827.740	100.00%	16.12%	423165

*See data in attachment HPLC1100 Agilent Certificate with Chromatogram graph.

This result are in house tested and the best of our knowledge and experience. Using calibrated equipment.
We are dedicated to offer the best Quality of Botanical products on the market. We test and stand behind our products.
Disclaimer* the test results are accurate to the best of our knowledge and are based upon reputable laboratory and industry standard testing methods.
These results should not be used as a final determination for use in a finished product. It is recommended that you verify these test results with an in house quality control department or obtain an additional independent third party lab to verify that this material meets specifications
Botany Evolution, its board of directors, contract laboratories, employees, and affiliates are held harmless from any loss or damages resulting from the use or misuse of this document. The appropriate use of this product is the sole responsibility of the user of the purchasing party.

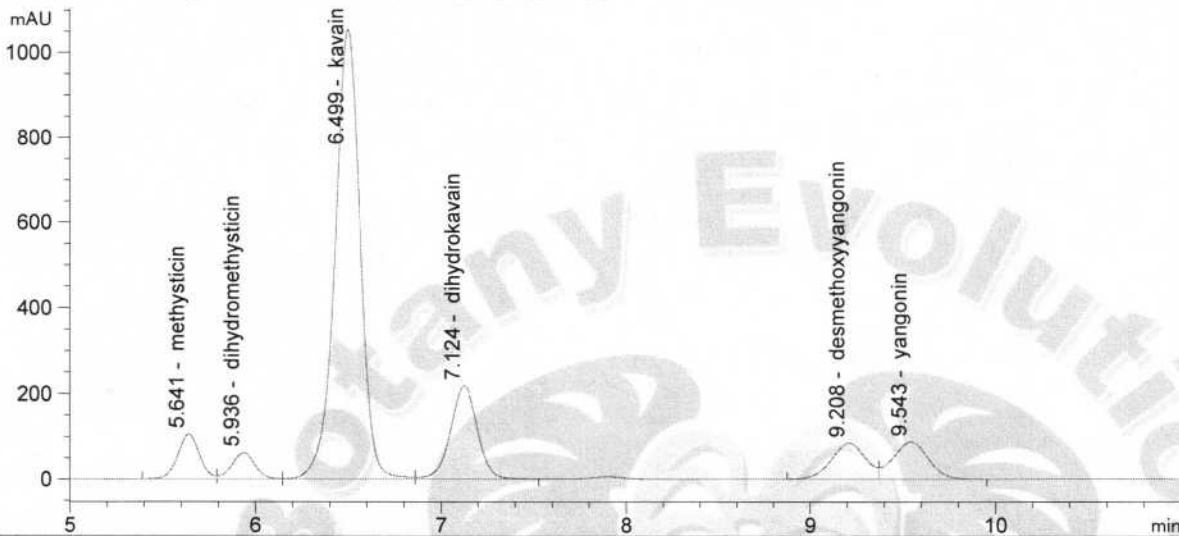
Mustel Youngs 12/13/18

SAMPLE S0583
 Vial 13

0.75167g/50ml

wavelength 246 nm
 C:\CHEM32\1\DATA\KAVA_12_12_2018_15MINSTDTESTMETHOD 2018-12-12 16-00-03\01->
 SEQUENCE C:\CHEM32\1\DATA\KAVA_12_12_2018_ ->
 Injection date 12/12/2018
 Injection time 8:35:45 PM
 Acq. operator KRISTL
 Method C:\CHEM32\1\DATA\KAVA_12_12_201->

DAD1 C, Sig=246,10 Ref=500,60 (KAVA_12_12_2018_15MINSTDTESTMETHOD 2018-12-12 16-00-03\013-1401.D)



#	COMPOUND	RET. TIME	AREA	AREA %	AMOUNT
1	methysticin	5.641	853.843	5.39	0.000
2	dihydromethysticin	5.936	533.561	3.37	0.000
3	kavain	6.499	9975.976	63.03	0.001
4	dihydrokavain	7.124	2216.247	14.00	0.001
5	desmethoxyyangonin	9.208	1081.859	6.84	0.000
6	yangonin	9.543	1166.254	7.37	0.000

12/13/18
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