

CERTIFICATE OF ANALYSIS

GENERAL INFORMATION

Report Date	6/13/2024	Country of Origin	Vanuatu
Sample Number	S2131	Country of Processing	USA
Product Name	Taboo	Manufacture Date	Feb-24
Lot Number	VSSC2402-T6	Best By Date	Feb-27

ITEM	SPECIFICATION	TEST RESULTS	METHOD
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PHYSICAL & CHEMICAL

Identification	Piper methysticum	Complies	HPLC
Appearance	Beige to Yellow Powder	Complies	Organoleptic
Kavalactone Standard	2-17 % Kavalactones	8.50%	HPLC
Kavalactone Profile	Noble	Pass	HPLC
Chemotype	If # 5 is in 1st or 2nd in Abundance	243561	HPLC
K/DHM	> 1.2 for Noble	2.4	Calculation

HEAVY METALS

		Basal	Lateral		
Arsenic (As)	NMT 1,000 (ppb)*	< 10	5.5	ppb	FDA EAM 4.7
Cadmium (Cd)	NMT 1,000 (ppb)*	145	176	ppb	FDA EAM 4.7
Lead (Pb)	NMT 1,000 (ppb)*	14.9	108	ppb	FDA EAM 4.7
Mercury (Hg)	NMT 1,000 (ppb)*	< 10	< 10	ppb	FDA EAM 4.7

*Heavy Metals Action Limits Based on Maximum PDE at 5% Kavalactones. Results May Exceed 1,000 ppb action limit with higher kavalactone contents.

MICROBIOLOGICAL

		Basal	Lateral		
AEROBIC PLATE COUNT	NMT 10,000,000 cfu	240	17,000	cfu / 10 g	USP 61
E. COLI	ABSENT (cfu/10g)	Absent		cfu / 10 g	USP 62
PSEUDOMONAS AERUGINOSA	ABSENT (cfu/10g)	Absent		cfu / 10 g	USP 62
SALMONELLA	ABSENT (cfu/10g)	Absent		cfu / 10 g	USP 62
STAPHYLOCOCCUS AUREUS	ABSENT (cfu/10g)	Absent		cfu / 10 g	USP 62
YEAST	NMT 100,000 cfu (Combined)	80	800	cfu / 10 g	
MOLD	NMT 100,000 cfu (Combined)	80	1,000	cfu / 10 g	USP 2021
TOTAL YEAST & MOLD	NMT 100,000 cfu (Combined)	160	1,800	cfu / 10 g	

cfu/g = Colony Forming Units Per Gram NMT = No More Than PDE = Permitted Daily Exposure PPB = Parts Per Billion

Analysis Performed by a Third-Party Laboratory

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.

Authorized By (Name / Title):

Amy Sabeh *Manager*

Signature:

Amy Sabeh

Botany Evolution LLC

2510 Kirby Circle NE

Palm Bay, FL 32945

321-802-4583

Certificate Of Analysis**Sample Identification Information**Date of Analysis 6/13/2024Sample: S2131Product Name TABOOLot# VSSC2402-T6Country of Origin VANUATUCountry of Processing USAManufacture Date Feb-24Best By Date Feb-27**General Product Specifications**Product Species Piper MethysticumPart Used RootCommon Names Kava kava, Awa, YagonaAppearance Yellow, Brown, beige powder**Analyzed Characteristics****Specification****Result****Test Method**Standardization

2-17% Kavalactones

8.50%

HPLC

Identification

Complies by HPLC

Conform

HPLC

Kavalactone Profile

Noble

PASS

HPLC

Mesh Size

60-30

60

Sieve

Color

Beige to Yellow

Pass

Visual

Odor

Pass

Organoleptic

Taste

Pass

Organoleptic

Chemotype

243561

HPLC

K/DHM

2.4

Calculation

Kavalactones	Code	Peaks Ref. (elution order)	Correction Factor	Area *	Area %	Corrected Kavalactones	Chemotype Identifier
Standard Kavain	K			2369			
Methysticin	M	1	2.21	558.004	7.41%	0.72%	6
Dihydromethysticin	DHM	2	3.38	504.605	6.70%	1.00%	5
Kavain	K	3	1	4120.883	54.73%	2.41%	4
Dihydrokavain	DHK	4	3.48	1214.466	16.13%	2.47%	2
Desmethoxyyangonin	DMY	5	2.52	430.788	5.72%	0.63%	1
Yangonin	Y	6	3.12	700.895	9.31%	1.28%	3
Kavalactones			Total:	7529.641	100.00%	8.50%	243561

*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.

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Chemist

Rustie Youngs

Date

6/14/24

SAMPLE S2131
Vial 12

0.75736g/50mL

wavelength 246 nm

C:\CHEM32\1\DATA\KAVA_06_13_2024_15MINSTDTESTMETHOD 2024-06-13 16-35-38\01->
SEQUENCE C:\CHEM32\1\DATA\KAVA_06_13_2024_ ->

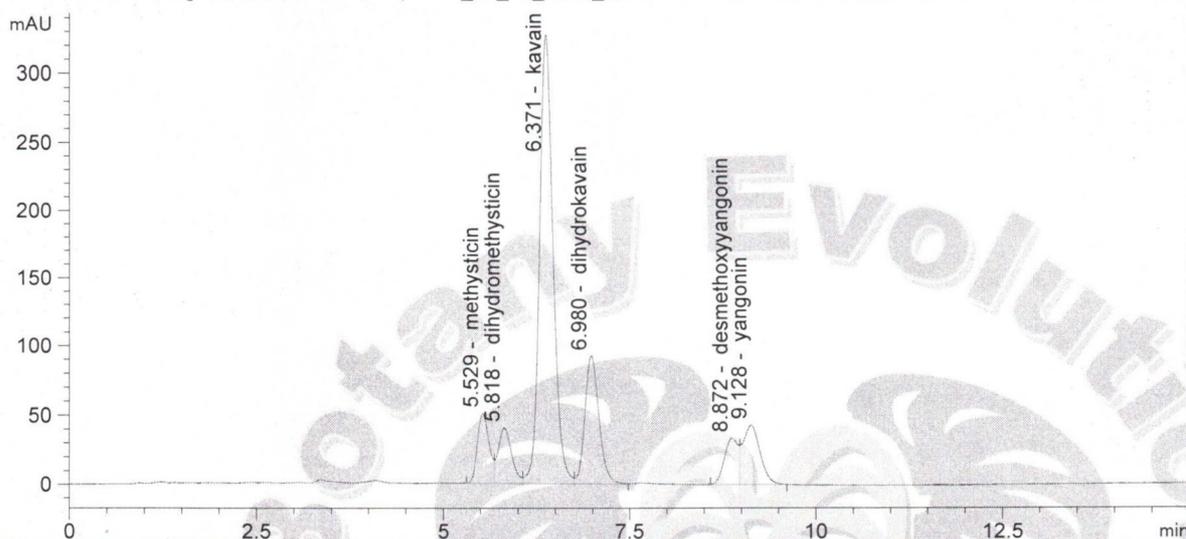
Injection date 6/13/2024

Injection time 8:38:23 PM

Acq. operator KRISTL

Method C:\CHEM32\1\DATA\KAVA_06_13_202->

DAD1 C, Sig=246,10 Ref=500,60 (KAVA_06_13_2024_15MINSTDTESTMETHOD 2024-06-13 16-35-38\012-1201.D)



#	COMPOUND	RET. TIME	AREA	AREA %	AMOUNT
1	methysticin	5.529	558.004	7.41	0.000
2	dihydromethysticin	5.818	504.605	6.70	0.000
3	kavain	6.371	4120.883	54.73	0.000
4	dihydrokavain	6.980	1214.466	16.13	0.000
5	desmethoxyyangonin	8.872	430.788	5.72	0.000
6	yangonin	9.128	700.895	9.31	0.000

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