

SAMPLE NAME: A00000160

Infused, Hemp Infused

CULTIVATOR / MANUFACTURER
Business Name:
License Number:
Address:
DISTRIBUTOR / TESTED FOR
Business Name: New York Hemp Oil

License Number:
Address:

SAMPLE DETAIL
Batch Number:
Sample ID: 221005M003

Date Collected: 10/05/2022

Date Received: 10/05/2022

Batch Size:
Sample Size: 1.0 units

Unit Mass: 30 milliliters per Unit

Serving Size:


Scan QR code to verify authenticity of results.

CANNABINOID ANALYSIS - SUMMARY
Total THC: 9.540 mg/unit

Total CBD: 293.580 mg/unit

Sum of Cannabinoids: 608.190 mg/unit

Total Cannabinoids: 608.190 mg/unit


Total THC/CBD is calculated using the following formulas to take into account the loss of a carboxyl group during the decarboxylation step:


 $Total\ THC = \Delta^9\text{-THC} + (THCa\ (0.877))$
 $Total\ CBD = CBD + (CBDa\ (0.877))$
 $Sum\ of\ Cannabinoids = \Delta^9\text{-THC} + THCa + CBD + CBDa + CBG + CBGa +$
 $THCV + THCVa + CBC + CBCa + CBDV + CBDVa + \Delta^8\text{-THC} + CBL + CBN$
 $Total\ Cannabinoids = (\Delta^9\text{-THC} + 0.877*THCa) + (CBD + 0.877*CBDa) +$
 $(CBG + 0.877*CBGa) + (THCV + 0.877*THCVa) + (CBC + 0.877*CBCa) +$
 $(CBDV + 0.877*CBDVa) + \Delta^8\text{-THC} + CBL + CBN$
Density: 0.9475 g/mL

TERPENOID ANALYSIS - SUMMARY


39 TESTED, TOP 3 HIGHLIGHTED

Total Terpenoids: 0.0291%


 **β-Caryophyllene** 0.118 mg/g

 **α-Bisabolol** 0.080 mg/g

 **α-Humulene** 0.050 mg/g


SAFETY ANALYSIS - SUMMARY
Pesticides:  **PASS**
Residual Solvents:  **PASS**
Heavy Metals:  **PASS**
Microbiology (PCR):  **PASS**
Microbiology (Plating):  **PASS**


For quality assurance purposes. Not a Regulatory Hemp Lab Test Report. These results relate only to the sample included on this report. This report shall not be reproduced, except in full, without written approval of the laboratory.

Sample Certification: Action Limits used in this report are a compilation of guidance from state regulatory agencies in all states except Alaska. Action limits for required tests are the lower of any conflicting state regulations.

Decision Rule: Statements of conformity (e.g. Pass/Fail) to specifications are made in this report without taking measurement uncertainty into account. Where statements of conformity are made in this report, the following decision rules are applied: PASS - Results within limits/specifications, FAIL - Results exceed limits/specifications.

References: limit of detection (LOD), limit of quantification (LOQ), not detected (ND), not tested (NT), too numerous to count >250 cfu/plate (TNTC), colony-forming unit (cfu)


 LOQ verified by: Quinn Rizal
 Date: 10/10/2022


 Approved by: Josh Wurzer, President
 Date: 10/10/2022



Cannabinoid Analysis

Tested by high-performance liquid chromatography with diode-array detection (HPLC-DAD).

Method: QSP 1157 - Analysis of Cannabinoids by HPLC-DAD

TOTAL THC: 9.540 mg/unit

Total THC (Δ^9 -THC+0.877*THCa)

TOTAL CBD: 293.580 mg/unit

Total CBD (CBD+0.877*CBDa)

TOTAL CANNABINOIDS: 608.190 mg/unit

Total Cannabinoids (Total THC) + (Total CBD) + (Total CBG) + (Total THCV) + (Total CBC) + (Total CBDV) + Δ^8 -THC + CBL + CBN

TOTAL CBG: 5.250 mg/unit

Total CBG (CBG+0.877*CBGa)

TOTAL THCV: ND

Total THCV (THCV+0.877*THCVa)

TOTAL CBC: 7.320 mg/unit

Total CBC (CBC+0.877*CBCa)

TOTAL CBDV: 1.620 mg/unit

Total CBDV (CBDV+0.877*CBDVa)

CANNABINOID TEST RESULTS - 10/07/2022

COMPOUND	LOD/LOQ (mg/mL)	MEASUREMENT UNCERTAINTY (mg/mL)	RESULT (mg/mL)	RESULT (%)
CBD	0.004 / 0.011	±0.3650	9.786	1.0328
CBN	0.001 / 0.007	±0.2783	9.696	1.0233
Δ^9 -THC	0.002 / 0.014	±0.0175	0.318	0.0336
CBC	0.003 / 0.010	±0.0079	0.244	0.0258
CBG	0.002 / 0.006	±0.0085	0.175	0.0185
CBDV	0.002 / 0.012	±0.0022	0.054	0.0057
Δ^8 -THC	0.01 / 0.02	N/A	ND	ND
THCa	0.001 / 0.005	N/A	ND	ND
THCV	0.002 / 0.012	N/A	ND	ND
THCVa	0.002 / 0.019	N/A	ND	ND
CBDa	0.001 / 0.026	N/A	ND	ND
CBDVa	0.001 / 0.018	N/A	ND	ND
CBGa	0.002 / 0.007	N/A	ND	ND
CBL	0.003 / 0.010	N/A	ND	ND
CBCa	0.001 / 0.015	N/A	ND	ND
SUM OF CANNABINOIDS			20.273 mg/mL	2.1396%

Unit Mass: 30 milliliters per Unit

Δ^9 -THC per Unit	9.540 mg/unit
Total THC per Unit	9.540 mg/unit
CBD per Unit	293.580 mg/unit
Total CBD per Unit	293.580 mg/unit
Sum of Cannabinoids per Unit	608.190 mg/unit
Total Cannabinoids per Unit	608.190 mg/unit

DENSITY TEST RESULT

0.9475 g/mL

Tested 10/07/2022

Method: QSP 7870 - Sample Preparation



Terpenoid Analysis

Terpene analysis utilizing gas chromatography-flame ionization detection (GC-FID).

Method: QSP 1192 - Analysis of Terpenoids by GC-FID

1 β -Caryophyllene

A sesquiterpene with a fragrance that can be described as spicy, woody, dry, dusty and mildly sweet. It was one of the first organic compounds to fully synthesized in a laboratory and plays a role in the endocannabinoid system as it is a functional CB₂ receptor agonist. Found in black pepper, clove, hops, rosemary, black-jack, perilla, spicebush, Indian pennywort, celery, frankincense, vitex, parsley, marigold, tamarind...etc.

2 α -Bisabolol

A sesquiterpene alcohol with a fragrance that can be described as floral, peppery, sweet and clean. Found in chamomile, figwort, yarrow, skullcaps, lavender, ironwort, germander...etc.

3 α -Humulene

Also known as α -caryophyllene, it is an isomer of the sesquiterpene β -Caryophyllene which frequently occurs in nature with many aromatic plants across the globe. It has a fragrance that can be described as earthy or musky with spicy undertones. Found in hops, forskohlii, skullcaps, basil, nutmeg, cloves, sage, cotton, tamarind, black pepper, guava, Scotch pine...etc.

TERPENOID TEST RESULTS - 10/07/2022

COMPOUND	LOD/LOQ (mg/g)	MEASUREMENT UNCERTAINTY (mg/g)	RESULT (mg/g)	RESULT (%)
β -Caryophyllene	0.004 / 0.012	± 0.0033	0.118	0.0118
α -Bisabolol	0.008 / 0.026	± 0.0033	0.080	0.0080
α -Humulene	0.009 / 0.029	± 0.0012	0.050	0.0050
Guaiol	0.009 / 0.030	± 0.0016	0.043	0.0043
Linalool	0.009 / 0.032	N/A	<LOQ	<LOQ
trans- β -Farnesene	0.008 / 0.025	N/A	<LOQ	<LOQ
Caryophyllene Oxide	0.010 / 0.033	N/A	<LOQ	<LOQ
α -Pinene	0.005 / 0.017	N/A	ND	ND
Camphene	0.005 / 0.015	N/A	ND	ND
Sabinene	0.004 / 0.014	N/A	ND	ND
β -Pinene	0.004 / 0.014	N/A	ND	ND
Myrcene	0.008 / 0.025	N/A	ND	ND
α -Phellandrene	0.006 / 0.020	N/A	ND	ND
Δ^3 -Carene	0.005 / 0.018	N/A	ND	ND
α -Terpinene	0.005 / 0.017	N/A	ND	ND
p-Cymene	0.005 / 0.016	N/A	ND	ND
Limonene	0.005 / 0.016	N/A	ND	ND
Eucalyptol	0.006 / 0.018	N/A	ND	ND
β -Ocimene	0.006 / 0.020	N/A	ND	ND
γ -Terpinene	0.006 / 0.018	N/A	ND	ND
Sabinene Hydrate	0.006 / 0.022	N/A	ND	ND
Fenchone	0.009 / 0.028	N/A	ND	ND
Terpinolene	0.008 / 0.026	N/A	ND	ND
Fenchol	0.010 / 0.034	N/A	ND	ND
Isopulegol	0.005 / 0.016	N/A	ND	ND
Camphor	0.006 / 0.019	N/A	ND	ND
Isoborneol	0.004 / 0.012	N/A	ND	ND
Borneol	0.005 / 0.016	N/A	ND	ND
Menthol	0.008 / 0.025	N/A	ND	ND
Terpineol	0.009 / 0.031	N/A	ND	ND
Nerol	0.003 / 0.011	N/A	ND	ND
Citronellol	0.003 / 0.010	N/A	ND	ND
Pulegone	0.003 / 0.011	N/A	ND	ND
Geraniol	0.002 / 0.007	N/A	ND	ND
Geranyl Acetate	0.004 / 0.014	N/A	ND	ND
α -Cedrene	0.005 / 0.016	N/A	ND	ND
Valencene	0.009 / 0.030	N/A	ND	ND
Nerolidol	0.006 / 0.019	N/A	ND	ND
Cedrol	0.008 / 0.027	N/A	ND	ND
TOTAL TERPENOIDS			0.291 mg/g	0.0291%



Pesticide Analysis

Pesticide and plant growth regulator analysis utilizing high-performance liquid chromatography-mass spectrometry (HPLC-MS) or gas chromatography-mass spectrometry (GC-MS).

*GC-MS utilized where indicated.

Method: QSP 1212 - Analysis of Pesticides and Mycotoxins by LC-MS or QSP 1213 - Analysis of Pesticides by GC-MS

Exclusions¹ see last page

PESTICIDE TEST RESULTS - 10/07/2022 ✔ PASS

COMPOUND	LOD/LOQ (µg/g)	ACTION LIMIT (µg/g)	MEASUREMENT UNCERTAINTY (µg/g)	RESULT (µg/g)	RESULT
Abamectin	0.03 / 0.10	0.3	N/A	ND	PASS
Azoxystrobin	0.02 / 0.07	40	N/A	ND	PASS
Bifenazate	0.01 / 0.04	5	N/A	ND	PASS
Bifenthrin	0.02 / 0.05	0.5	N/A	ND	PASS
Boscalid	0.03 / 0.09	10	N/A	ND	PASS
Chlorpyrifos	0.02 / 0.06	≥ LOD	N/A	ND	PASS
Cypermethrin	0.11 / 0.32	1	N/A	ND	PASS
Etoxazole	0.02 / 0.06	1.5	N/A	ND	PASS
Hexythiazox	0.02 / 0.07	2	N/A	ND	PASS
Imidacloprid	0.04 / 0.11	3	N/A	ND	PASS
Malathion	0.03 / 0.09	5	N/A	ND	PASS
Myclobutanil	0.03 / 0.09	9	N/A	ND	PASS
Permethrin	0.04 / 0.12	20	N/A	ND	PASS
Piperonyl Butoxide	0.02 / 0.07	8	N/A	ND	PASS
Propiconazole	0.02 / 0.07	20	N/A	ND	PASS
Spiromesifen	0.02 / 0.05	12	N/A	ND	PASS
Tebuconazole	0.02 / 0.07	2	N/A	ND	PASS
Trifloxystrobin	0.03 / 0.08	30	N/A	ND	PASS



Residual Solvents Analysis

Residual Solvent analysis utilizing gas chromatography-mass spectrometry (GC-MS).

Method: QSP 1204 - Analysis of Residual Solvents by GC-MS

Exclusions² see last page

RESIDUAL SOLVENTS TEST RESULTS - 10/07/2022 ✔ PASS

COMPOUND	LOD/LOQ (µg/g)	ACTION LIMIT (µg/g)	MEASUREMENT UNCERTAINTY (µg/g)	RESULT (µg/g)	RESULT
Propane	10 / 20	5000	N/A	ND	PASS
n-Butane	10 / 50	5000	N/A	ND	PASS
n-Pentane	20 / 50	5000	N/A	ND	PASS
n-Hexane	2 / 5	290	N/A	ND	PASS
n-Heptane	20 / 60	5000	N/A	ND	PASS
Benzene	0.03 / 0.09	1	N/A	ND	PASS
Toluene	7 / 21	890	N/A	ND	PASS
Total Xylenes	50 / 160	2170	N/A	ND	PASS
Methanol	50 / 200	3000	N/A	ND	PASS
Ethanol	20 / 50	5000	N/A	ND	PASS
2-Propanol (Isopropyl Alcohol)	10 / 40	5000	N/A	ND	PASS
Acetone	20 / 50	5000	N/A	ND	PASS
Ethyl Ether	20 / 50	5000	N/A	ND	PASS
Ethylene Oxide	0.3 / 0.8	1	N/A	ND	PASS
Ethyl Acetate	20 / 60	5000	N/A	ND	PASS
Chloroform	0.1 / 0.2	1	N/A	ND	PASS
Dichloromethane (Methylene Chloride)	0.3 / 0.9	1	N/A	ND	PASS

Continued on next page



Residual Solvents Analysis

Continued

RESIDUAL SOLVENTS TEST RESULTS - 10/07/2022 *continued* ✔ PASS

COMPOUND	LOD/LOQ (µg/g)	ACTION LIMIT (µg/g)	MEASUREMENT UNCERTAINTY (µg/g)	RESULT (µg/g)	RESULT
Trichloroethylene	0.1 / 0.3	1	N/A	ND	PASS
1,2-Dichloroethane	0.05 / 0.1	1	N/A	ND	PASS
Acetonitrile	2 / 7	410	N/A	ND	PASS

Heavy Metals Analysis

Heavy metal analysis utilizing inductively coupled plasma-mass spectrometry (ICP-MS).

Method: QSP 1160 - Analysis of Heavy Metals by ICP-MS

HEAVY METALS TEST RESULTS - 10/07/2022 ✔ PASS

COMPOUND	LOD/LOQ (µg/g)	ACTION LIMIT (µg/g)	MEASUREMENT UNCERTAINTY (µg/g)	RESULT (µg/g)	RESULT
Arsenic	0.02 / 0.1	0.42	N/A	ND	PASS
Cadmium	0.02 / 0.05	0.27	N/A	ND	PASS
Lead	0.04 / 0.1	0.5	N/A	ND	PASS
Mercury	0.002 / 0.01	0.4	N/A	ND	PASS

Microbiology Analysis

PCR AND PLATING

Analysis conducted by polymerase chain reaction (PCR) and fluorescence detection of microbiological contaminants.

Method: QSP 1221 - Analysis of Microbiological Contaminants

MICROBIOLOGY TEST RESULTS (PCR) - 10/10/2022 ✔ PASS

COMPOUND	ACTION LIMIT (cfu/g)	RESULT (cfu/g)	RESULT
Shiga toxin-producing <i>Escherichia coli</i>	Not Detected in 1g	ND	PASS
<i>Salmonella</i> spp.	Not Detected in 1g	ND	PASS
Bile-Tolerant Gram-Negative Bacteria	100	ND	PASS
<i>Staphylococcus aureus</i>	Not Detected in 1g	ND	PASS

Analysis conducted by 3M™ Petrifilm™ and plate counts of microbiological contaminants.

Method: QSP 6794 - Plating with 3M™ Petrifilm™

MICROBIOLOGY TEST RESULTS (PLATING) - 10/10/2022 ✔ PASS

COMPOUND	ACTION LIMIT (cfu/g)	RESULT (cfu/g)	RESULT
Total Aerobic Bacteria	100	ND	PASS
Total Yeast and Mold	10	ND	PASS

NOTES

- Exclusions: Sample Certification: California Code of Regulation Title 4 Division 19
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