


SAMPLE NAME: CBD-Isolate
Concentrate, Product Inhalable**CULTIVATOR / MANUFACTURER****Business Name:**
License Number:
Address:**DISTRIBUTOR / TESTED FOR****Business Name:** ECS Brands
License Number:
Address: -
--**SAMPLE DETAIL****Batch Number:** ECS-990-21055-D
Sample ID: 210213V002**Date Collected:** 02/13/2021
Date Received: 02/13/2021
Batch Size:
Sample Size:
Unit Mass:
Serving Size:**CANNABINOID ANALYSIS - SUMMARY****Total THC:** Not Detected**Total CBD:** 99.251%**Sum of Cannabinoids:** 99.402%**Total Cannabinoids:** 99.402%

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 = $\Delta 9\text{THC} + (\text{THCa} \cdot 0.877)$
Total CBD = $\text{CBD} + (\text{CBDa} \cdot 0.877)$
Sum of Cannabinoids = $\Delta 9\text{THC} + \text{THCa} + \text{CBD} + \text{CBDa} + \text{CBG} + \text{CBGa} + \text{THCV} + \text{THCVa} + \text{CBC} + \text{CBCa} + \text{CBDV} + \text{CBDVa} + \Delta 8\text{THC} + \text{CBL} + \text{CBN}$
Total Cannabinoids = $(\Delta 9\text{THC} + 0.877 \cdot \text{THCa}) + (\text{CBD} + 0.877 \cdot \text{CBDa}) + (\text{CBG} + 0.877 \cdot \text{CBGa}) + (\text{THCV} + 0.877 \cdot \text{THCVa}) + (\text{CBC} + 0.877 \cdot \text{CBCa}) + (\text{CBDV} + 0.877 \cdot \text{CBDVa}) + \Delta 8\text{THC} + \text{CBL} + \text{CBN}$

Moisture: NT**Density:** NT**Viscosity:** NT**SAFETY ANALYSIS - SUMMARY****Pesticides:**  **PASS****Mycotoxins:** NT**Residual Solvents:**  **PASS****Heavy Metals:** NT**Microbial Impurities (PCR):** NT**Microbial Impurities (Plating):** NT**Foreign Material:** NT**Water Activity:** NT**Vitamin E Acetate:** NT

For quality assurance purposes. Not a Pre-Harvest 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: California Code of Regulations Title 16 Effect Date January 16, 2019. Authority: Section 26013, Business and Professions Code. Reference: Sections 26100, 26104 and 26110, Business and Professions Code.

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)

 
LQC verified by: Alexandria Bradford
Date: 02/16/2021
Approved by: Josh Wurzer, President
Date: 02/16/2021



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: Not Detected

Total THC ($\Delta 9$ THC+0.877*THCa)

TOTAL CBD: 99.251%

Total CBD (CBD+0.877*CBDa)

TOTAL CANNABINOIDS: 99.402%

Total Cannabinoids (Total THC) + (Total CBD) + (Total CBG) + (Total THCV) + (Total CBC) + (Total CBDV) + $\Delta 8$ THC + CBL + CBN

TOTAL CBG: ND

Total CBG (CBG+0.877*CBGa)

TOTAL THCV: ND

Total THCV (THCV+0.877*THCVa)

TOTAL CBC: ND

Total CBC (CBC+0.877*CBCa)

TOTAL CBDV: 0.151%

Total CBDV (CBDV+0.877*CBDVa)

CANNABINOID TEST RESULTS - 02/15/2021

| COMPOUND | LOD/LOQ (mg/g) | MEASUREMENT UNCERTAINTY (mg/g) | RESULT (mg/g) | RESULT (%) |
|----------------------------|----------------|--------------------------------|--------------------|----------------|
| CBD | 0.07 / 0.29 | ±45.953 | 992.51 | 99.251 |
| CBDV | 0.04 / 0.15 | ±0.066 | 1.51 | 0.151 |
| $\Delta 9$ THC | 0.06 / 0.26 | N/A | ND | ND |
| $\Delta 8$ THC | 0.1 / 0.4 | N/A | ND | ND |
| THCa | 0.05 / 0.14 | N/A | ND | ND |
| THCV | 0.1 / 0.2 | N/A | ND | ND |
| THCVa | 0.07 / 0.20 | N/A | ND | ND |
| CBDa | 0.02 / 0.19 | N/A | ND | ND |
| CBDVa | 0.03 / 0.53 | N/A | ND | ND |
| CBG | 0.06 / 0.19 | N/A | ND | ND |
| CBGa | 0.1 / 0.2 | N/A | ND | ND |
| CBL | 0.06 / 0.24 | N/A | ND | ND |
| CBN | 0.1 / 0.3 | N/A | ND | ND |
| CBC | 0.2 / 0.5 | N/A | ND | ND |
| CBCa | 0.07 / 0.28 | N/A | ND | ND |
| SUM OF CANNABINOIDS | | | 994.02 mg/g | 99.402% |

MOISTURE TEST RESULT

Not Tested

DENSITY TEST RESULT

Not Tested

VISCOSITY TEST RESULT

Not Tested

 **Pesticide Analysis**


CATEGORY 1 PESTICIDE TEST RESULTS - 02/16/2021  **PASS**

CATEGORY 1 AND 2 PESTICIDES

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


| COMPOUND | LOD/LOQ (µg/g) | ACTION LIMIT (µg/g) | MEASUREMENT UNCERTAINTY (µg/g) | RESULT (µg/g) | RESULT |
|-------------------|----------------|---------------------|--------------------------------|---------------|--------|
| Aldicarb | 0.03 / 0.08 | ≥ LOD | N/A | ND | PASS |
| Carbofuran | 0.02 / 0.05 | ≥ LOD | N/A | ND | PASS |
| Chlordane* | 0.03 / 0.08 | ≥ LOD | N/A | ND | PASS |
| Chlorfenapyr* | 0.03 / 0.10 | ≥ LOD | N/A | ND | PASS |
| Chlorpyrifos | 0.02 / 0.06 | ≥ LOD | N/A | ND | PASS |
| Coumaphos | 0.02 / 0.07 | ≥ LOD | N/A | ND | PASS |
| Daminozide | 0.02 / 0.07 | ≥ LOD | N/A | ND | PASS |
| DDVP (Dichlorvos) | 0.03 / 0.09 | ≥ LOD | N/A | ND | PASS |
| Dimethoate | 0.03 / 0.08 | ≥ LOD | N/A | ND | PASS |
| Ethoprop(hos) | 0.03 / 0.10 | ≥ LOD | N/A | ND | PASS |
| Etofenprox | 0.02 / 0.06 | ≥ LOD | N/A | ND | PASS |
| Fenoxycarb | 0.03 / 0.08 | ≥ LOD | N/A | ND | PASS |
| Fipronil | 0.03 / 0.08 | ≥ LOD | N/A | ND | PASS |
| Imazalil | 0.02 / 0.06 | ≥ LOD | N/A | ND | PASS |
| Methiocarb | 0.02 / 0.07 | ≥ LOD | N/A | ND | PASS |
| Methyl parathion | 0.03 / 0.10 | ≥ LOD | N/A | ND | PASS |
| Mevinphos | 0.03 / 0.09 | ≥ LOD | N/A | ND | PASS |
| Paclobutrazol | 0.02 / 0.05 | ≥ LOD | N/A | ND | PASS |
| Propoxur | 0.03 / 0.09 | ≥ LOD | N/A | ND | PASS |
| Spiroxamine | 0.03 / 0.08 | ≥ LOD | N/A | ND | PASS |
| Thiacloprid | 0.03 / 0.10 | ≥ LOD | N/A | ND | PASS |

CATEGORY 2 PESTICIDE TEST RESULTS - 02/16/2021  **PASS**

| | | | | | |
|---------------------|-------------|-----|-----|----|------|
| Abamectin | 0.03 / 0.10 | 0.1 | N/A | ND | PASS |
| Acephate | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Acequinocyl | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Acetamiprid | 0.02 / 0.05 | 0.1 | N/A | ND | PASS |
| Azoxystrobin | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Bifenazate | 0.01 / 0.04 | 0.1 | N/A | ND | PASS |
| Bifenthrin | 0.02 / 0.05 | 3 | N/A | ND | PASS |
| Boscalid | 0.03 / 0.09 | 0.1 | N/A | ND | PASS |
| Captan | 0.19 / 0.57 | 0.7 | N/A | ND | PASS |
| Carbaryl | 0.02 / 0.06 | 0.5 | N/A | ND | PASS |
| Chlorantraniliprole | 0.04 / 0.12 | 10 | N/A | ND | PASS |

Continued on next page

 **Pesticide Analysis** *Continued*

CATEGORY 2 PESTICIDE TEST RESULTS - 02/16/2021 *continued*  **PASS**

CATEGORY 1 AND 2 PESTICIDES

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

| COMPOUND | LOD/LOQ (µg/g) | ACTION LIMIT (µg/g) | MEASUREMENT UNCERTAINTY (µg/g) | RESULT (µg/g) | RESULT |
|--------------------------|----------------|---------------------|--------------------------------|---------------|--------|
| Clofentezine | 0.03 / 0.09 | 0.1 | N/A | ND | PASS |
| Cyfluthrin | 0.12 / 0.38 | 2 | N/A | ND | PASS |
| Cypermethrin | 0.11 / 0.32 | 1 | N/A | ND | PASS |
| Diazinon | 0.02 / 0.05 | 0.1 | N/A | ND | PASS |
| Dimethomorph | 0.03 / 0.09 | 2 | N/A | ND | PASS |
| Etoxazole | 0.02 / 0.06 | 0.1 | N/A | ND | PASS |
| Fenhexamid | 0.03 / 0.09 | 0.1 | N/A | ND | PASS |
| Fenpyroximate | 0.02 / 0.06 | 0.1 | N/A | ND | PASS |
| Flonicamid | 0.03 / 0.10 | 0.1 | N/A | ND | PASS |
| Fludioxonil | 0.03 / 0.10 | 0.1 | N/A | ND | PASS |
| Hexythiazox | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Imidacloprid | 0.04 / 0.11 | 5 | N/A | ND | PASS |
| Kresoxim-methyl | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Malathion | 0.03 / 0.09 | 0.5 | N/A | ND | PASS |
| Metalaxyl | 0.02 / 0.07 | 2 | N/A | ND | PASS |
| Methomyl | 0.03 / 0.10 | 1 | N/A | ND | PASS |
| Myclobutanil | 0.03 / 0.09 | 0.1 | N/A | ND | PASS |
| Naled | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Oxamyl | 0.04 / 0.11 | 0.5 | N/A | ND | PASS |
| Pentachloronitrobenzene* | 0.03 / 0.09 | 0.1 | N/A | ND | PASS |
| Permethrin | 0.04 / 0.12 | 0.5 | N/A | ND | PASS |
| Phosmet | 0.03 / 0.10 | 0.1 | N/A | ND | PASS |
| Piperonylbutoxide | 0.02 / 0.07 | 3 | N/A | ND | PASS |
| Prallethrin | 0.03 / 0.08 | 0.1 | N/A | ND | PASS |
| Propiconazole | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Pyrethrins | 0.04 / 0.12 | 0.5 | N/A | ND | PASS |
| Pyridaben | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Spinetoram | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Spinosad | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Spiromesifen | 0.02 / 0.05 | 0.1 | N/A | ND | PASS |
| Spirotetramat | 0.02 / 0.06 | 0.1 | N/A | ND | PASS |
| Tebuconazole | 0.02 / 0.07 | 0.1 | N/A | ND | PASS |
| Thiamethoxam | 0.03 / 0.10 | 5 | N/A | ND | PASS |
| Trifloxystrobin | 0.03 / 0.08 | 0.1 | N/A | ND | PASS |

 **Residual Solvents Analysis**


CATEGORY 1 RESIDUAL SOLVENTS TEST RESULTS - 02/15/2021  **PASS**

CATEGORY 1 AND 2 RESIDUAL SOLVENTS

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

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

| COMPOUND | LOD/LOQ (µg/g) | ACTION LIMIT (µg/g) | MEASUREMENT UNCERTAINTY (µg/g) | RESULT (µg/g) | RESULT |
|--------------------|----------------|---------------------|--------------------------------|---------------|--------|
| 1,2-Dichloroethane | 0.05 / 0.1 | 1 | N/A | ND | PASS |
| Benzene | 0.03 / 0.09 | 1 | N/A | ND | PASS |
| Chloroform | 0.1 / 0.2 | 1 | N/A | ND | PASS |
| Ethylene Oxide | 0.3 / 0.8 | 1 | N/A | ND | PASS |
| Methylene chloride | 0.3 / 0.9 | 1 | N/A | ND | PASS |
| Trichloroethylene | 0.1 / 0.3 | 1 | N/A | ND | PASS |

CATEGORY 2 RESIDUAL SOLVENTS TEST RESULTS - 02/15/2021  **PASS**

| | | | | | |
|-------------------|----------|------|------|-----|------|
| Acetone | 20 / 50 | 5000 | N/A | ND | PASS |
| Acetonitrile | 2 / 7 | 410 | N/A | ND | PASS |
| Butane | 10 / 50 | 5000 | N/A | ND | PASS |
| Ethanol | 20 / 50 | 5000 | N/A | ND | PASS |
| Ethyl acetate | 20 / 60 | 5000 | N/A | ND | PASS |
| Ethyl ether | 20 / 50 | 5000 | N/A | ND | PASS |
| Heptane | 20 / 60 | 5000 | N/A | ND | PASS |
| Hexane | 2 / 5 | 290 | N/A | ND | PASS |
| Isopropyl Alcohol | 10 / 40 | 5000 | N/A | ND | PASS |
| Methanol | 50 / 200 | 3000 | N/A | ND | PASS |
| Pentane | 20 / 50 | 5000 | ±7.7 | 154 | PASS |
| Propane | 10 / 20 | 5000 | N/A | ND | PASS |
| Toluene | 7 / 21 | 890 | N/A | ND | PASS |
| Total Xylenes | 50 / 160 | 2170 | N/A | ND | PASS |