

CERTIFICATE OF ANALYSIS



JuniperAnalytics
INTEGRITY AND ACCURACY IN EVERY STEP

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ORELAP: 4101 / OLCC: 010-10035537931

| | |
|---------------------|---------------------------|
| Client Name: | Specialty Cannabinoids |
| Contact Info: | Brandon |
| Sample Type: | Extract |
| External Batch ID: | 2810 |
| Harvest/Prod. Date: | 2020-01-06 |
| Sample ID: | BSD |
| METRC ID: | Industrial Hemp |
| Juniper Batch #: | 20JA0057.01_A-B Composite |
| Intake Date: | 2020-01-07 |

Batch sampled per
OAR 333-064-0100



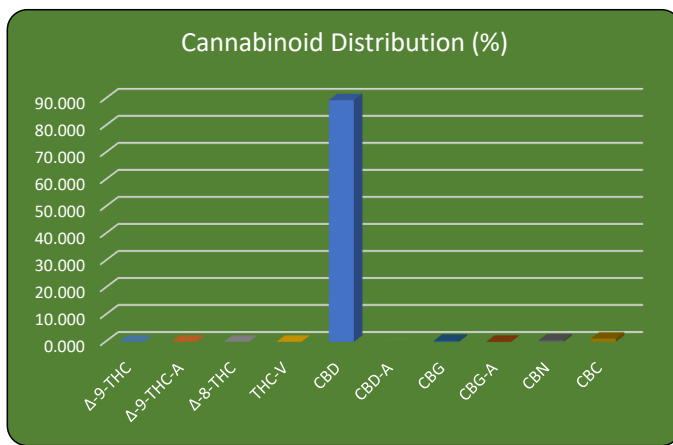
Potency Analysis (Oregon Compliance Standard OAR 333-007-0430)

ANALYSIS DATE: 2020-01-07

Instrument: HPLC/DAD

Method: JA-Potency-Proprietary

| Compound | Weight (%) | Concentration (mg/g) | LOQ (mg/g) |
|-----------|------------|----------------------|------------|
| Δ-9-THC | <LOQ | <LOQ | 1.00 |
| Δ-9-THC-A | <LOQ | <LOQ | 1.00 |
| Δ-8-THC | <LOQ | <LOQ | 1.00 |
| THC-V | <LOQ | <LOQ | 1.00 |
| CBD | 89.458 | 894.58 | 1.00 |
| CBD-A | <LOQ | <LOQ | 1.00 |
| CBG | 0.376 | 3.76 | 1.00 |
| CBG-A | <LOQ | <LOQ | 1.00 |
| CBN | 0.543 | 5.43 | 1.00 |
| CBC | 1.199 | 11.99 | 1.00 |



| TOTAL THC/CBD | Weight (%) | Conc (mg/g) | RPD |
|---|------------|-------------|-----|
| % THC Total = | <LOQ | <LOQ | N/A |
| %THC _{Total} = (THC-A * 0.877) + Δ9THC | | | |
| % CBD Total = | 89.458 | 894.58 | |
| %CBD _{Total} = (CBD-A * 0.877) + CBD | | | |

Residual Solvent Analysis (Oregon Compliance Standard OAR 333-007-0410)

ANALYSIS DATE: 2020-01-08

Instrument: GC/MS

Method: USP 467 - Modified

| Solvent | Result (ppm) | Action Level / LOQ (ppm) |
|-------------------|--------------|--------------------------|
| 1,4-Dioxane | <LOQ | 380 / 100 |
| 2-Butanol | <LOQ | 5000 / 500 |
| 2-Ethoxyethanol | <LOQ | 160 / 100 |
| 2-Propanol (IPA) | <LOQ | 5000 / 500 |
| Acetone | <LOQ | 5000 / 500 |
| Acetonitrile | <LOQ | 410 / 100 |
| Benzene | <LOQ | 2 / 1 |
| Cumene | <LOQ | 70 / 50 |
| Cyclohexane | <LOQ | 3880 / 500 |
| Dichloromethane | <LOQ | 600 / 100 |
| Ethyl acetate | <LOQ | 5000 / 500 |
| Ethyl ether | <LOQ | 5000 / 500 |
| Ethylene glycol | <LOQ | 620 / 300 |
| Ethylene oxide | <LOQ | 50 / 10 |
| Heptane | <LOQ | 5000 / 500 |
| Isopropyl acetate | <LOQ | 5000 / 500 |
| Methanol | <LOQ | 3000 / 500 |
| Propane | <LOQ | 5000 / 500 |
| Tetrahydrofuran | <LOQ | 720 / 100 |
| Toluene | <LOQ | 890 / 100 |

| Solvent | Result (ppm) | Action Level / LOQ (ppm) |
|----------------------|--------------|--------------------------|
| Pentanes; | <LOQ | 5000 / 500 |
| -n-pentane | <LOQ | ** |
| -iso-pentane | <LOQ | ** |
| -neo-pentane | <LOQ | ** |
| Butanes; | <LOQ | 5000 / 500 |
| -n-butane | <LOQ | ** |
| -iso-butane | <LOQ | ** |
| Hexanes; | <LOQ | 290 / 50 |
| -n-hexane | <LOQ | ** |
| -2-methylpentane | <LOQ | ** |
| -3-methylpentane | <LOQ | ** |
| -2,2-dimethylbutane | <LOQ | ** |
| -2,3-dimethylbutane | <LOQ | ** |
| Xylenes; | <LOQ | 2170 / 300 |
| -1,2-dimethylbenzene | <LOQ | ** |
| -1,3-dimethylbenzene | <LOQ | ** |
| -1,4-dimethylbenzene | <LOQ | ** |
| -Ethyl benzene | <LOQ | ** |

**RPD calculated for combined results

Residual Solvents **PASS**

Tentatively Identified Compounds: Peak 1: Hits 1-2: Hexane, 2-methyl-

<LOQ - Less than the Limit of Quantification

***Largest hit reported to appropriate governing body; RPD only calculated on samples where the average result is above 50% of the action level.

Approval

Report Date: 2020-01-09

QA Review



Juniper Batch #: 20JA0057.01_A-B Composite
 Intake Date: 2020-01-07

Pesticide Analysis (Oregon Compliance Standard OAR 333-008-1190)

| ANALYSIS DATE: 2020-01-09 | | | Instrument: LC/MS/MS | | Method: AOAC 2007.1 ^{modified} | |
|---------------------------|--------------|--------------------------|----------------------|--------------|---|--|
| Pesticide | Result (ppm) | Action Level / LOQ (ppm) | Pesticide | Result (ppm) | Action Level / LOQ (ppm) | |
| Abamectin | <LOQ | 0.5 / 0.25 | Imazalil | <LOQ | 0.2 / 0.10 | |
| Acephate | <LOQ | 0.4 / 0.20 | Imidacloprid | <LOQ | 0.4 / 0.20 | |
| Acequinocyl | <LOQ | 2.0 / 1.00 | Kresoxim-methyl | <LOQ | 0.4 / 0.20 | |
| Acetamiprid | <LOQ | 0.2 / 0.10 | Malathion | <LOQ | 0.2 / 0.10 | |
| Aldicarb | <LOQ | 0.4 / 0.20 | Metalaxyl | <LOQ | 0.2 / 0.10 | |
| Azoxystrobin | <LOQ | 0.2 / 0.10 | Methiocarb | <LOQ | 0.2 / 0.10 | |
| Bifenazate | <LOQ | 0.2 / 0.10 | Methomyl | <LOQ | 0.4 / 0.20 | |
| Bifenthrin | <LOQ | 0.2 / 0.10 | Methyl Parathion | <LOQ | 0.2 / 0.10 | |
| Boscalid | <LOQ | 0.4 / 0.20 | MGK-264 | <LOQ | 0.2 / 0.10 | |
| Carbaryl | <LOQ | 0.2 / 0.10 | Myclobutanil | <LOQ | 0.2 / 0.10 | |
| Carbofuran | <LOQ | 0.2 / 0.10 | Naled | <LOQ | 0.5 / 0.25 | |
| Chlorantraniliprole | <LOQ | 0.2 / 0.10 | Oxamyl | <LOQ | 1.0 / 0.50 | |
| Chlorfenapyr | <LOQ | 1.0 / 0.50 | Paclotrazol | <LOQ | 0.4 / 0.20 | |
| Chlorpyrifos | <LOQ | 0.2 / 0.10 | Permethrins | <LOQ | 0.2 / 0.10 | |
| Clofentezine | <LOQ | 0.2 / 0.10 | Phosmet | <LOQ | 0.2 / 0.10 | |
| Cyfluthrin | <LOQ | 1.0 / 0.50 | Piperonyl butoxide | <LOQ | 2.0 / 1.00 | |
| Cypermethrin | <LOQ | 1.0 / 0.50 | Prallethrin | <LOQ | 0.2 / 0.10 | |
| Daminozide | <LOQ | 1.0 / 0.50 | Propiconazole | <LOQ | 0.4 / 0.20 | |
| DDVP (Dichlorvos) | <LOQ | 1.0 / 0.50 | Propoxur | <LOQ | 0.2 / 0.10 | |
| Diazinon | <LOQ | 0.2 / 0.10 | Pyrethrins | <LOQ | 1.0 / 0.50 | |
| Dimethoate | <LOQ | 0.2 / 0.10 | Pyridaben | <LOQ | 0.2 / 0.10 | |
| Ethoprophos | <LOQ | 0.2 / 0.10 | Spinosad | <LOQ | 0.2 / 0.10 | |
| Etofenprox | <LOQ | 0.4 / 0.20 | Spiromesifen | <LOQ | 0.2 / 0.10 | |
| Etoxazole | <LOQ | 0.2 / 0.10 | Spirotetramat | <LOQ | 0.2 / 0.10 | |
| Fenoxycarb | <LOQ | 0.2 / 0.10 | Spiroxamine | <LOQ | 0.4 / 0.20 | |
| Fenpyroximate | <LOQ | 0.4 / 0.20 | Tebuconazole | <LOQ | 0.4 / 0.20 | |
| Fipronil | <LOQ | 0.4 / 0.20 | Thiacloprid | <LOQ | 0.2 / 0.10 | |
| Fonicamid | <LOQ | 1.0 / 0.50 | Thiamethoxam | <LOQ | 0.2 / 0.10 | |
| Fludioxonil | <LOQ | 0.4 / 0.20 | Trifloxystrobin | <LOQ | 0.2 / 0.10 | |
| Hexythiazox | <LOQ | 1.0 / 0.50 | | | | |
| Pesticide Screen | PASS | | | | | |

LOQ= Limit of Quantification

Microbiological Contaminants (Oregon Compliance Standard OAR 333-007-0390)

| ANALYSIS DATE: Not Tested | | | |
|----------------------------|--------------|------------|----------|
| Microbiological screening | Colony count | CFU/g | Results: |
| Total coliforms | Not tested | Not tested | N/A |
| Escherichia coli (E. coli) | Not tested | Not tested | N/A |

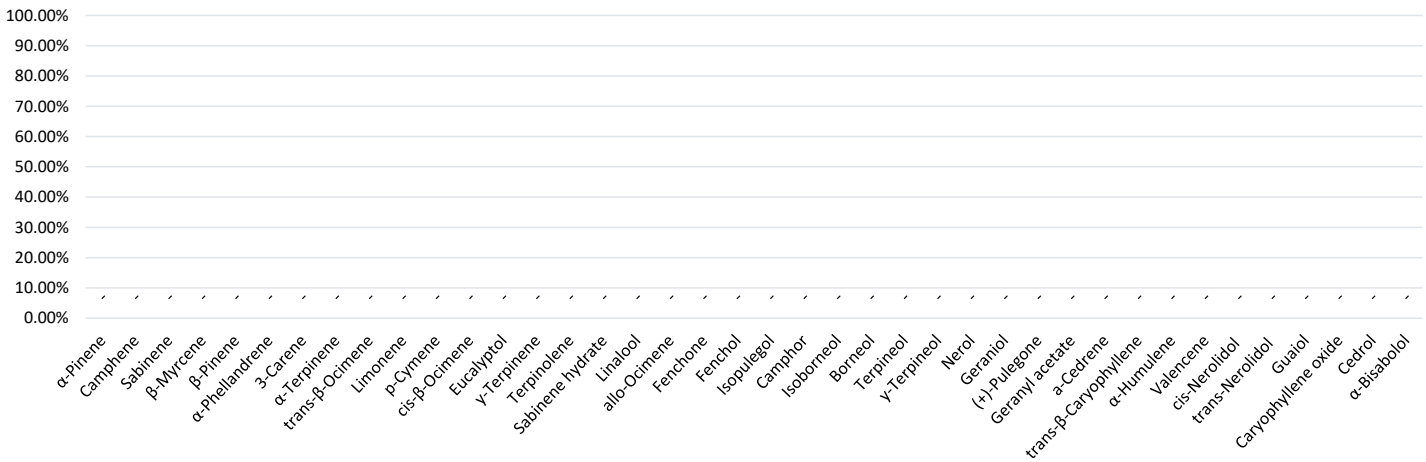


| | |
|------------------|---------------------------|
| Juniper Batch #: | 20JA0057.01_A-B Composite |
| Intake Date: | 2020-01-07 |

Terpene Profile

| ANALYSIS DATE: Not Tested | | | Instrument: GC/MS | | Method: JA-Terpene-Proprietary |
|---------------------------|------|---|-----------------------|------|--------------------------------|
| Compound | µg/g | % | Compound | µg/g | % |
| α-Pinene | | | Isopulegol | | |
| Camphene | | | Camphor | | |
| Sabinene | | | Isoborneol | | |
| β-Myrcene | | | Borneol | | |
| β-Pinene | | | Terpineol | | |
| α-Phellandrene | | | γ-Terpineol | | |
| 3-Carene | | | Nerol | | |
| α-Terpinene | | | Geraniol | | |
| trans-β-Ocimene | | | (+)-Pulegone | | |
| Limonene | | | Geranyl acetate | | |
| p-Cymene | | | α-Cedrene | | |
| cis-β-Ocimene | | | trans-β-Caryophyllene | | |
| Eucalyptol | | | α-Humulene | | |
| γ-Terpinene | | | Valencene | | |
| Terpinolene | | | cis-Nerolidol | | |
| Sabinene hydrate | | | trans-Nerolidol | | |
| Linalool | | | Guaiol | | |
| allo-Ocimene | | | Caryophyllene oxide | | |
| Fenchone | | | Cedrol | | |
| Fenchol | | | α-Bisabolol | | |
| | | | TOTAL | | |

Terpene Profile*



* Profile expressed as a percent of total terpenes

Batch QC WorkGroup ID:

Potency PO-2020-01-07-01

Pesticides Pest-2020-01-07-01

Residual Solvents RS-2020-01-07-01

Disclaimer

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