

Muse CBD Spliff - Cannabinoid Potency

Barbari
 Portland, OR 97227

Harvest/Process Date: 12/1/2021
 Sample Date: 12/2/2021
 Analysis Date: 12/3/2021
 Report Date: 12/6/2021
 Report ID: LS-211206-6

Client Batch ID: HS211201
 Metrc Batch ID:
 Metrc Sample ID:

Sample Type: Non-Infused Preroll
 Sample Plan:
 Sample Procedure:
 160721_LAB-SOP_SampleCollection-v010

Potency

Potency Analysis Date: 12/3/2021
 Potency Batch ID: CAN_120321D
 Potency Method: JAOAC 2015.1

49.4 mg/g

**Total CBD
4.94%**

1.67 mg/g

**Total THC
0.167%**

Samples: CDM-FPJ-BXG



| Analyte | Description | LOQ | RPD (%) | Min. | Max. | Conc. | Unit: mg/g |
|------------------|-------------------------------|-------|---------|------|------|--------------|------------|
| Δ9THC | Delta-9 Tetrahydrocannabinol | 0.010 | - | - | - | 0.985 | |
| THCA | Tetrahydrocannabinolic acid | 0.010 | - | - | - | 0.777 | |
| CBD | Cannabidiol | 0.010 | - | - | - | 10.9 | |
| CBDA | Cannabidiolic acid | 0.010 | - | - | - | 43.8 | |
| Δ8THC | Delta-8 Tetrahydrocannabinol* | 0.010 | - | - | - | ND | |
| THCV | Tetrahydrocannabivarin* | 0.010 | - | - | - | 0.0150 | |
| CBG | Cannabigerol* | 0.010 | - | - | - | 0.259 | |
| CBGA | Cannabigerolic acid* | 0.010 | - | - | - | 0.785 | |
| CBC | Cannabichromene* | 0.010 | - | - | - | 0.669 | |
| CBCA | Cannabichromenic acid* | 0.010 | - | - | - | 0.659 | |
| CBN | Cannabinol* | 0.010 | - | - | - | 0.0300 | |
| Total THC | Δ9THC + (THCA × 0.877) | | | | | 1.67 | |
| Total CBD | CBD + (CBDA × 0.877) | | | | | 49.4 | |
| Total | | | | | | 59.0 | |



Aaron Troyer
 Chief Science Officer

This data cannot be used for OLCC or OHA compliance for usable marijuana or marijuana products and is provided for Research and Development purposes only.



LS-211206-6

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 Metrc Sample ID:

Sample Type: Non-Infused Preroll
 Sample Plan:
 Sample Procedure:
 160721_LAB-SOP_SampleCollection-v010



Potency Quality Control Data

Potency QC Analysis Date: 12/3/2021
 Potency QC Batch ID: CAN_120321D

Method: JAOAC 2015.1
 Unit: µg/g (ppm)

| Analyte | Blank | LOQ | LCS | LCS Spike | LCS Rec (%) | Limits (%) | Notes |
|---------|-------|-------|------|-----------|-------------|------------|-------|
| Δ9THC | ND | 0.010 | 18.5 | 19.7 | 93.7 | 80 - 120 | |
| THCA | ND | 0.010 | 21.7 | 22.3 | 97.3 | 80 - 120 | |
| CBD | ND | 0.010 | 25.7 | 26.3 | 97.6 | 80 - 120 | |
| CBDA | ND | 0.010 | 22.3 | 22.3 | 99.8 | 80 - 120 | |

POTENCY - LIMIT OF DETECTION

Verified: 060221

Method: 160819_LAB-SOP_MethodValidation-CannabinoidPotency-v002.docx

| Matrix | Analyte | LOD (ppm) | LOD (mg/g) |
|---------|---------|-----------|------------|
| EXTRACT | Δ9THC | 2.8 | 0.0028 |
| | THCA | 0.56 | 0.00056 |
| | CBD | 2.22 | 0.00222 |
| | CBDA | 0.52 | 0.00052 |
| FLOWER | Δ9THC | 1.88 | 0.00188 |
| | THCA | 5.32 | 0.00532 |
| | CBD | 1.31 | 0.00131 |
| | CBDA | 0.78 | 0.00078 |

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Analysis Date: 12/3/2021

Report Date: 12/6/2021

Report ID: LS-211206-6

Client Batch ID: HS211201

Metrac Batch ID:

Metrac Sample ID:

Sample Type: Non-Infused Preroll

Sample Plan:

Sample Procedure:

160721_LAB-SOP_SampleCollection-v010

Qualifier Flag Descriptions

| | |
|-----|--|
| J | Reported result is an estimate - the value is less than the minimum calibration level but greater than the estimated detection limit (EDL) |
| U | The analyte was not detected in the sample at the estimated detection limit (EDL) |
| E | Exceeds calibration range |
| D | Dilution data - result was obtained from the analysis of a dilution |
| B | Analyte found in sample and associated blank |
| C | Co-eluting compound |
| R | Relative Percent Difference (RPD) outside control limits |
| NR | Analyte not reported because of problems in sample preparation or analysis |
| ND | Non-Detect |
| X | Results from reinjection/repeat/re-column data |
| EMC | Estimated maximum possible concentration - indicates that a peak is detected but did not meet the method required criteria |
| M | Manual integration |
| PS | Peaks split |
| HB | Control acceptance criteria are exceeded high and the associated sample is below the detection limit |
| LB | Control acceptance criteria are exceeded low and the associated sample exceeds the regulatory limit |
| ME | Marginal Exceedance |
| LR | Low Recovery Analyte |
| LOQ | Limit of Quantitation |

Muse CBD Spliff - Pesticides

Barbari
Portland, OR 97227

Harvest/Process Date: 12/1/2021
Sample Date: 12/2/2021
Analysis Date: 12/6/2021
Report Date: 12/6/2021
Report ID: LS-211206-9

Client Batch ID: HS211201
MetrC Batch ID:
MetrC Sample ID:

Sample Type: Non-Infused Preroll
Sample Plan:
Sample Procedure:
160721_LAB-SOP_SampleCollection-v010

Compliance

Pesticides

Within limits

Analysis Date: 12/6/2021

Pass 



Aaron Troyer
Chief Science Officer

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LS - 2 1 1 2 0 6 - 9

Muse CBD Spliff - Pesticides

Barbari
 Portland, OR 97227

Harvest/Process Date: 12/1/2021
 Sample Date: 12/2/2021
 Analysis Date: 12/6/2021
 Report Date: 12/6/2021
 Report ID: LS-211206-9

Client Batch ID: HS211201
 Metrc Batch ID:
 Metrc Sample ID:

Sample Type: Non-Infused Preroll
 Sample Plan:
 Sample Procedure:
 160721_LAB-SOP_SampleCollection-v010



Pesticides Analysis Date: 12/6/2021 Unit: µg/g (ppm) Pass 
 Pesticides Batch IDs: PST_120321B_2, Method: AOAC 2007.01 & EN 15662
 PST_120321A_2

| Analyte | JFM-WNJ-NXW | Limits | LOQ | Notes | Status | Analyte | JFM-WNJ-NXW | Limits | LOQ | Notes | Status |
|---------------------|-------------|--------|-----|-------|--------|--------------------|-------------|--------|-----|-------|--------|
| Abamectin | ND | 0.5 | 0.4 | | Pass | Metalaxyl | ND | 0.2 | 0.2 | | Pass |
| Acephate | ND | 0.4 | 0.2 | | Pass | Methiocarb | ND | 0.2 | 0.2 | | Pass |
| Acequinocyl | ND | 2.0 | 0.2 | | Pass | Methomyl | ND | 0.4 | 0.2 | | Pass |
| Acetamiprid | ND | 0.2 | 0.2 | | Pass | Methyl Parathion | ND | 0.2 | 0.2 | | Pass |
| Aldicarb | ND | 0.4 | 0.2 | | Pass | MGK-264 | ND | 0.2 | 0.2 | | Pass |
| Azoxystrobin | ND | 0.2 | 0.2 | | Pass | Myclobutanil | ND | 0.2 | 0.2 | | Pass |
| Bifenazate | ND | 0.2 | 0.2 | | Pass | Naled | ND | 0.5 | 0.4 | | Pass |
| Bifenthrin | ND | 0.2 | 0.2 | | Pass | Oxamyl | ND | 1.0 | 0.2 | | Pass |
| Boscalid | ND | 0.4 | 0.2 | | Pass | Paclobutrazol | ND | 0.4 | 0.2 | | Pass |
| Carbaryl | ND | 0.2 | 0.2 | | Pass | Permethrins | ND | 0.2 | 0.2 | | Pass |
| Carbofuran | ND | 0.2 | 0.2 | | Pass | Phosmet | ND | 0.2 | 0.2 | | Pass |
| Chlorantraniliprole | ND | 0.2 | 0.2 | | Pass | Piperonyl Butoxide | ND | 2.0 | 0.2 | | Pass |
| Chlorfenapyr | ND | 1.0 | 1.0 | | Pass | Prallethrin | ND | 0.2 | 0.2 | | Pass |
| Chlorpyrifos | ND | 0.2 | 0.2 | | Pass | Propiconazole | ND | 0.4 | 0.2 | | Pass |
| Clofentezine | ND | 0.2 | 0.2 | | Pass | Propoxur | ND | 0.2 | 0.2 | | Pass |
| Cyfluthrin | ND | 1.0 | 1.0 | | Pass | Pyrethrins | ND | 1.0 | 1.0 | | Pass |
| Cypermethrin | ND | 1.0 | 1.0 | | Pass | Pyridaben | ND | 0.2 | 0.2 | | Pass |
| Daminozide | ND | 1.0 | 0.4 | | Pass | Spinosad | ND | 0.2 | 0.2 | | Pass |
| Diazinon | ND | 0.2 | 0.2 | | Pass | Spiromesifen | ND | 0.2 | 0.2 | | Pass |
| Dichlorvos (DDVP) | ND | 1.0 | 0.2 | | Pass | Spirotetramat | ND | 0.2 | 0.2 | | Pass |
| Dimethoate | ND | 0.2 | 0.2 | | Pass | Spiroxamine | ND | 0.4 | 0.2 | | Pass |
| Ethoprophos | ND | 0.2 | 0.2 | | Pass | Tebuconazole | ND | 0.4 | 0.2 | | Pass |
| Etofenprox | ND | 0.4 | 0.2 | | Pass | Thiacloprid | ND | 0.2 | 0.2 | | Pass |
| Etoxazole | ND | 0.2 | 0.2 | | Pass | Thiamethoxam | ND | 0.2 | 0.2 | | Pass |
| Fenoxycarb | ND | 0.2 | 0.2 | | Pass | Trifloxystrobin | ND | 0.2 | 0.2 | | Pass |
| Fenpyroximate | ND | 0.4 | 0.2 | | Pass | | | | | | |
| Fipronil | ND | 0.4 | 0.2 | | Pass | | | | | | |
| Fonicamid | ND | 1.0 | 0.2 | | Pass | | | | | | |
| Fludioxonil | ND | 0.4 | 0.4 | | Pass | | | | | | |
| Hexythiazox | ND | 1.0 | 0.2 | | Pass | | | | | | |
| Imazalil | ND | 0.2 | 0.2 | | Pass | | | | | | |
| Imidacloprid | ND | 0.4 | 0.2 | | Pass | | | | | | |
| Kresoxim-methyl | ND | 0.4 | 0.4 | | Pass | | | | | | |
| Malathion | ND | 0.2 | 0.2 | | Pass | | | | | | |

Muse CBD Spliff - Pesticides

Barbari
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 Sample Date: 12/2/2021
 Analysis Date: 12/6/2021
 Report Date: 12/6/2021
 Report ID: LS-211206-9

Client Batch ID: HS211201
 Metrc Batch ID:
 Metrc Sample ID:

Sample Type: Non-Infused Preroll
 Sample Plan:
 Sample Procedure:
 160721_LAB-SOP_SampleCollection-v010

 **Pesticides**
 Quality Control Data

Pesticides QC Analysis Date: 12/6/2021 Unit: µg/g (ppm)
 Pesticides Batch ID: PST_120321A_2 Method: AOAC 2007.01 & EN 15662

| Analyte | Blank | LOQ | LCS | LCS Spike | LCS Rec (%) | Limits (%) | Notes |
|------------------|-------|-------|--------|-----------|-------------|------------|-------|
| Methyl Parathion | ND | 0.002 | 0.0407 | 0.0500 | 81.5 | 50 - 150 | |

| Analyte | Blank | LOQ | LCS | LCS Spike | LCS Rec (%) | Limits (%) | Notes |
|---------|-------|-----|-----|-----------|-------------|------------|-------|
|---------|-------|-----|-----|-----------|-------------|------------|-------|

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 Report Date: 12/6/2021
 Report ID: LS-211206-9

Client Batch ID: HS211201
 Metrc Batch ID:
 Metrc Sample ID:

Sample Type: Non-Infused Preroll
 Sample Plan:
 Sample Procedure:
 160721_LAB-SOP_SampleCollection-v010

Pesticides Quality Control Data

Pesticides QC Analysis Date: 12/6/2021 Unit: µg/g (ppm)
 Pesticides Batch ID: PST_120321B_2 Method: AOAC 2007.01 & EN 15662

| Analyte | Blank | LOQ | LCS | LCS Spike | LCS Rec (%) | Limits (%) | Notes | Analyte | Blank | LOQ | LCS | LCS Spike | LCS Rec (%) | Limits (%) | Notes |
|---------------------|-------|-------|--------|-----------|-------------|------------|-------|--------------------|-------|-------|--------|-----------|-------------|------------|-------|
| Abamectin | ND | 0.002 | 0.0464 | 0.0500 | 92.8 | 50 - 150 | | Metalaxyl | ND | 0.002 | 0.0535 | 0.0500 | 107 | 50 - 150 | |
| Acephate | ND | 0.002 | 0.0555 | 0.0500 | 111 | 50 - 150 | | Methiocarb | ND | 0.002 | 0.0544 | 0.0500 | 109 | 50 - 150 | |
| Acequinocyl | ND | 0.002 | 0.0504 | 0.0500 | 101 | 50 - 150 | | Methomyl | ND | 0.002 | 0.0541 | 0.0500 | 108 | 50 - 150 | |
| Acetamiprid | ND | 0.002 | 0.0521 | 0.0500 | 104 | 50 - 150 | | MGK-264 | ND | 0.002 | 0.0487 | 0.0500 | 97.3 | 50 - 150 | |
| Aldicarb | ND | 0.002 | 0.0541 | 0.0500 | 108 | 50 - 150 | | Myclobutanil | ND | 0.002 | 0.0614 | 0.0500 | 123 | 50 - 150 | |
| Azoxystrobin | ND | 0.002 | 0.0541 | 0.0500 | 108 | 50 - 150 | | Naled | ND | 0.002 | 0.0645 | 0.0500 | 129 | 50 - 150 | |
| Bifenazate | ND | 0.002 | 0.0591 | 0.0500 | 118 | 50 - 150 | | Oxamyl | ND | 0.002 | 0.0516 | 0.0500 | 103 | 50 - 150 | |
| Bifenthrin | ND | 0.002 | 0.0523 | 0.0500 | 105 | 50 - 150 | | Paclobutrazol | ND | 0.002 | 0.0477 | 0.0500 | 95.4 | 50 - 150 | |
| Boscalid | ND | 0.002 | 0.0544 | 0.0500 | 109 | 50 - 150 | | Permethrins | ND | 0.002 | 0.0442 | 0.0500 | 88.4 | 50 - 150 | |
| Carbaryl | ND | 0.002 | 0.0496 | 0.0500 | 99.1 | 50 - 150 | | Phosmet | ND | 0.002 | 0.0524 | 0.0500 | 105 | 50 - 150 | |
| Carbofuran | ND | 0.002 | 0.0596 | 0.0500 | 119 | 50 - 150 | | Piperonyl Butoxide | ND | 0.002 | 0.0588 | 0.0500 | 118 | 50 - 150 | |
| Chlorantraniliprole | ND | 0.002 | 0.0510 | 0.0500 | 102 | 50 - 150 | | Prallethrin | ND | 0.002 | 0.0483 | 0.0500 | 96.6 | 50 - 150 | |
| Chlorfenapyr | ND | 0.002 | 0.0569 | 0.0500 | 114 | 50 - 150 | | Propiconazole | ND | 0.002 | 0.0476 | 0.0500 | 95.2 | 50 - 150 | |
| Chlorpyrifos | ND | 0.002 | 0.0504 | 0.0500 | 101 | 50 - 150 | | Propoxur | ND | 0.002 | 0.0529 | 0.0500 | 106 | 50 - 150 | |
| Clofentezine | ND | 0.002 | 0.0554 | 0.0500 | 111 | 50 - 150 | | Pyrethrins | ND | 0.002 | 0.0467 | 0.0500 | 93.5 | 50 - 150 | |
| Cyfluthrin | ND | 0.002 | 0.0555 | 0.0500 | 111 | 50 - 150 | | Pyridaben | ND | 0.002 | 0.0529 | 0.0500 | 106 | 50 - 150 | |
| Cypermethrin | ND | 0.002 | 0.0462 | 0.0500 | 92.3 | 50 - 150 | | Spinosad | ND | 0.002 | 0.0475 | 0.0500 | 95.0 | 50 - 150 | |
| Daminozide | ND | 0.002 | 0.0528 | 0.0500 | 106 | 50 - 150 | | Spiromesifen | ND | 0.002 | 0.0540 | 0.0500 | 108 | 50 - 150 | |
| Diazinon | ND | 0.002 | 0.0573 | 0.0500 | 115 | 50 - 150 | | Spirotetramat | ND | 0.002 | 0.0547 | 0.0500 | 109 | 50 - 150 | |
| Dichlorvos (DDVP) | ND | 0.002 | 0.0480 | 0.0500 | 95.9 | 50 - 150 | | Spiroxamine | ND | 0.002 | 0.0552 | 0.0500 | 110 | 50 - 150 | |
| Dimethoate | ND | 0.002 | 0.0561 | 0.0500 | 112 | 50 - 150 | | Tebuconazole | ND | 0.002 | 0.0529 | 0.0500 | 106 | 50 - 150 | |
| Ethoprophos | ND | 0.002 | 0.0520 | 0.0500 | 104 | 50 - 150 | | Thiacloprid | ND | 0.002 | 0.0595 | 0.0500 | 119 | 50 - 150 | |
| Etofenprox | ND | 0.002 | 0.0509 | 0.0500 | 102 | 50 - 150 | | Thiamethoxam | ND | 0.002 | 0.0538 | 0.0500 | 108 | 50 - 150 | |
| Etoazole | ND | 0.002 | 0.0543 | 0.0500 | 109 | 50 - 150 | | Trifloxystrobin | ND | 0.002 | 0.0524 | 0.0500 | 105 | 50 - 150 | |
| Fenoxycarb | ND | 0.002 | 0.0520 | 0.0500 | 104 | 50 - 150 | | | | | | | | | |
| Fenpyroximate | ND | 0.002 | 0.0465 | 0.0500 | 93.0 | 50 - 150 | | | | | | | | | |
| Fipronil | ND | 0.002 | 0.0502 | 0.0500 | 100 | 50 - 150 | | | | | | | | | |
| Fonicamid | ND | 0.002 | 0.0516 | 0.0500 | 103 | 50 - 150 | | | | | | | | | |
| Fludioxonil | ND | 0.002 | 0.0520 | 0.0500 | 104 | 50 - 150 | | | | | | | | | |
| Hexythiazox | ND | 0.002 | 0.0508 | 0.0500 | 102 | 50 - 150 | | | | | | | | | |
| Imazalil | ND | 0.002 | 0.0582 | 0.0500 | 116 | 50 - 150 | | | | | | | | | |
| Imidacloprid | ND | 0.002 | 0.0585 | 0.0500 | 117 | 50 - 150 | | | | | | | | | |
| Kresoxim-methyl | ND | 0.002 | 0.0556 | 0.0500 | 111 | 50 - 150 | | | | | | | | | |
| Malathion | ND | 0.002 | 0.0551 | 0.0500 | 110 | 50 - 150 | | | | | | | | | |

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Barbari

Portland, OR 97227

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Sample Date: 12/2/2021

Analysis Date: 12/6/2021

Report Date: 12/6/2021

Report ID: LS-211206-9

Client Batch ID: HS211201

Metrac Batch ID:

Metrac Sample ID:

Sample Type: Non-Infused Preroll

Sample Plan:

Sample Procedure:

160721_LAB-SOP_SampleCollection-v010

Qualifier Flag Descriptions

| | |
|-----|--|
| J | Reported result is an estimate - the value is less than the minimum calibration level but greater than the estimated detection limit (EDL) |
| U | The analyte was not detected in the sample at the estimated detection limit (EDL) |
| E | Exceeds calibration range |
| D | Dilution data - result was obtained from the analysis of a dilution |
| B | Analyte found in sample and associated blank |
| C | Co-eluting compound |
| R | Relative Percent Difference (RPD) outside control limits |
| NR | Analyte not reported because of problems in sample preparation or analysis |
| ND | Non-Detect |
| X | Results from reinjection/repeat/re-column data |
| EMC | Estimated maximum possible concentration - indicates that a peak is detected but did not meet the method required criteria |
| M | Manual integration |
| PS | Peaks split |
| HB | Control acceptance criteria are exceeded high and the associated sample is below the detection limit |
| LB | Control acceptance criteria are exceeded low and the associated sample exceeds the regulatory limit |
| ME | Marginal Exceedance |
| LR | Low Recovery Analyte |
| LOQ | Limit of Quantitation |