

## **Certificate of Analysis**

## **Analytical Test Report**

Client:	Final Report	MCR-S21-78664 Rev.01.00	Laboratory:
New England			MCR Labs
Treatment Access			85 Speen St. Lower Level
Franklin, MA	Report Date:	9 JANUARY 2022	Framingham, MA 01701
508-528-0093	· ·		508-872-6666
Reg # 002			
	METRC Tag:	1A40A0300000068000091793	

Sample ID #	Sample Name	Batch	Matrix	Date Received	Date Tested	Sample Weight
MCR-S21- 78664	JOINT GROUND - F18835	SCC-211031- 138-J	Flower	28 December 2021	29 December 2021- 09 January 2022	6 g

The test results presented in this report are accurate, complete, and compliant with the MCR Labs quality control criteria.

Authorization

Carlos Cruz

Data Quality Manager



## **Case Narrative:**

This sample was received by MCR Labs from a RMD agent in a sealed container. For cannabinoids, the sample was extracted using organic solvents and analyzed via High Performance Liquid Chromatography (HPLC-UV). For microbiological contaminants, the sample was prepared using cultured enrichments, was incubated for set periods of time, and analyzed via an automated Most Probable Number (MPN) methodology. For pathogenic bacterial contaminants, the sample was analyzed via a quantitative Polymerase Chain Reaction (qPCR). Pathogenic screen includes all six STEC strains, including O157. For mycotoxin and pesticide contaminants, the sample was extracted using organic solvents, and analyzed via Liquid Chromatography - Tandem Mass Spectrometry (LC-MS/MS). For heavy metals, the sample was extracted using nitric acid and microwave digestion, and analyzed via Inductively Coupled Plasma Mass Spectrometry (ICP-MS). The collected data was compared to data collected from analytical reference standards at known concentrations. QA/QC data is available upon request. Unless specified by regulation, measurement uncertainty is not taken into account when reporting results and making a statement of conformity. Values reported below quantitation limits are for informational purposes.

This report and all information herein shall not be reproduced, except in its entirety, without the expressed consent of MCR Labs. Results apply only to the sample supplied to MCR Labs.

## Requested Testing:

Test	Code	Procedure	Analytes Tested	Dispositio n
Cannabinoid Profile	CN	MCR-TM-0011	CBDVA, CBDV, CBDA, CBGA, CBG, CBD, THCV, THCVA, CBCV, CBN, CBNA, D9-THC, D8-THC, CBL, THCA, CBC, CBCA, CBLA, CBT	N/A
Microbiological Screen	MB	MCR-TM-0006 MCR-TM-0012	Bacterial (Total Aerobic, Total Coliform, Bile-Tolerant Gram Negative), Yeast and Mold, Pathogenic (E. coli, Salmonella)	Pass
Mycotoxin Screen	MY	MCR-TM-0009	Aflatoxin B1, Aflatoxin B2, Aflatoxin G1, Aflatoxin G2, Ochratoxin A	Pass
Heavy Metals Screen	НМ	MCR-TM-0008	Arsenic (As), Cadmium (Cd), Lead (Pb), Mercury (Hg)	Pass
Pesticides Screen	PS	MCR-TM-0009	Bifenazate, Bifenthrin, Cyfluthrin, Etoxazole, Imazalil, Imidacloprid, Myclobutanil, Spiromesifen, Trifloxystrobin	Pass

Cannabinoid Prof	:In IMOD :	TIA 00441	
Cannaninoid Prot	IIe IIVIC.K-I	I IVI-()()111	

Analyst: JN/TM

Test Date: 30 Dec 21

The sample was analyzed for cannabinoids via High Performance Liquid Chromatography (HPLC-UV). The collected data was compared to data collected from certified analytical reference standards at known concentrations.

Table 1 - S21-78664 JOINT GROUND - F18835 SCC-211031-138-J Flower Cannabinoid Testing

Analyte	Cannabinoid	Conc. (weight %)	Conc. (mg/g)	LOQ (weight %)	LOD (weight %)
CBDVA	Cannabidivarinic acid	0.1%	1.0	0.04%	0.01%
CBDV	Cannabidivarin	ND	ND	0.04%	0.01%
CBDA	Cannabidiolic acid	11.0%	110.0	0.04%	0.01%
CBGA	Cannabigerolic acid	0.7%	7.0	0.04%	0.01%
CBG	Cannabigerol	0.1%	1.0	0.04%	0.02%
CBD	Cannabidiol	0.2%	2.0	0.04%	0.01%
THCV	Tetrahydrocannabivarin	ND	ND	0.04%	0.01%
THCVA	Tetrahydrocannabivarinic acid	0.1%	1.0	0.04%	0.01%
CBCV	Cannabichromevarin	ND	ND	0.04%	0.01%
CBN	Cannabinol	ND	ND	0.04%	0.01%
CBNA	Cannabinolic acid	ND	ND	0.04%	0.01%
Δ9-ΤΗС	Δ9-Tetrahydrocannabinol	0.4%	4.0	0.04%	0.01%
Δ8-THC	Δ8-Tetrahydrocannabinol	ND	ND	0.04%	0.01%
CBL	Cannabicyclol	ND	ND	0.04%	0.01%
THCA	Tetrahydrocannabinolic acid	6.5%	65.0	0.04%	0.01%
CBC	Cannabichromene	ND	ND	0.04%	0.01%
CBCA	Cannabichromenic acid	0.7%	7.0	0.20%	0.02%
CBLA	Cannabicyclolic acid	ND	ND	0.04%	0.01%
СВТ	Cannabicitran	ND	ND	0.04%	0.01%

Note: There are no limits established by the Massachusetts Department of Public Health for cannabinoid concentrations. ND = Not Detected. LOQ = Limit of Quantitation. LOD = Limit of Detection.

Microbiological Screen [MCR-TM-0006]

Analyst: NM/AL

Test Date: 29 Dec - 01 Jan 22

The sample was analyzed for microbiological contaminants via an automated Most Probable Number (MPN) methodology with cultured enrichments.

Table 2 - S21-78664 JOINT GROUND - F18835 SCC-211031-138-J Flower Microbiological Testing

Test ID	Test Analysis	Results	Unit	Limits	Disposition
21-78664-AC	Total Viable Aerobic Bacteria	<100	CFU/g	10⁵ CFU/g	Pass
21-78664-YM	Total Yeast and Mold	$=2.1 \times 10^{2}$	CFU/g	10⁴ CFU/g	Pass
21-78664-CC	Total Coliforms	<100	CFU/g	10 <sup>3</sup> CFU/g	Pass
21-78664-EB	Total Bile-Tolerant Gram Negative Bacteria	<100	CFU/g	10 <sup>3</sup> CFU/g	Pass

Note: CFU = colony forming unit. Testing limits established by the Massachusetts Department of Public Health, Protocol for Sampling and Analysis of Finished Medical Marijuana Products and Marijuana-Infused Products for Massachusetts Registered Medical Marijuana Dispensaries, Exhibit 6.

Pathogenic Bacterial Screen [MCR-TM-0012]

Analyst: JDM

Test Date: 01 Jan 22

The sample was analyzed for pathogenic bacterial contamination via a quantitative Polymerase Chain Reaction (qPCR).

Table 3 - S21-78664 JOINT GROUND - F18835 SCC-211031-138-J Flower Pathogen Testing

Test ID	Test Analysis	Result	Units	Limits	Disposition
S21-78664-ECPT	STEC	Not Detected	N/A	Not Detected in 1g	Pass
S21-78664-SPT	Salmonella	Not Detected	N/A	Not Detected in 1g	Pass

Note: Testing limits established by the Massachusetts Department of Public Health, Protocol for Sampling and Analysis of Finished Medical Marijuana Products and Marijuana-Infused Products for Massachusetts Registered Medical Marijuana Dispensaries, Exhibit 6. NT = Not tested. STEC = Shiga Toxin producing E. coli

Mycotoxin Screen [MCR-TM-0009]

Analyst: TJS/JW

Test Date: 29 Dec 21

The sample was analyzed via Liquid Chromatography - Tandem Mass Spectrometry (LC-MS/MS).

The collected data was compared to data collected from analytical reference standards at known concentrations.

Table 4 - S21-78664 JOINT GROUND - F18835 SCC-211031-138-J Flower Mycotoxin Testing

Test ID	Test Analysis	Result	LOD (ppb)	LOQ (ppb)	Limits (ppb)	Disposition
S21-78664-AFB1	Aflatoxin B1	Not Detected	3.3	10	20	Pass
S21-78664-AFB2	Aflatoxin B2	Not Detected	3.3	10	20	Pass
S21-78664-AFG1	Aflatoxin G1	Not Detected	3.3	10	20	Pass
S21-78664-AFG2	Aflatoxin G2	Not Detected	3.3	10	20	Pass
S21-78664-OTA	Ochratoxin A	Not Detected	5	10	20	Pass

Note: ND = Not Detected; LOD = Limit of Detection; LOQ = Limit of Quantitation; ppb = part per billion. Testing limits established by the Massachusetts Department of Public Health, Protocol for Sampling and Analysis of Finished Medical Marijuana Products and Marijuana-Infused Products for Massachusetts Registered Medical Marijuana Dispensaries, Exhibit 6.

Heavy Metals Screen [MCR-TM-0008]

Analyst: NM/JE/AI

Test Date: 09 Jan 22

The sample was analyzed via Inductively Coupled Plasma Mass Spectrometry. The collected data was compared to data collected from certified analytical reference standards at known concentrations.

Table 5 - S21-78664 JOINT GROUND - F18835 SCC-211031-138-J Flower Heavy Metal Testing

Test ID	Test Analysis	Result, ppb	LOD ppb	LOQ ppb	Limits ppb	Dispositi on	Limits (ingestion) ppb	Dispositio n (ingestion)
S21-78664-HM	Arsenic	ND	43.7	132.4	200	Pass	1500	Pass
S21-78664-HM	Cadmium	ND	25.1	76.0	200	Pass	500	Pass
S21-78664-HM	Mercury	ND	17.1	51.0	100	Pass	1500	Pass
S21-78664-HM	Lead	ND	27.1	82.0	500	Pass	1000	Pass

Note: ND = Not Detected; LOD = Limit of Detection; LOQ = Limit of Quantitation; BQL = Below Quantitation Limit; ppb = part per billion. Testing limits established by the Massachusetts Department of Public Health, Protocol for Sampling and Analysis of Finished Medical Marijuana Products and Marijuana-Infused Products for Massachusetts Registered Medical Marijuana Dispensaries, Exhibit 4.

Pesticides Screen [MCR-TM-0009]

Analyst: TJS/JW

Test Date: 29 Dec 21

The sample was analyzed via Liquid Chromatography - Tandem Mass Spectrometry (LC-MS/MS). The collected data was compared to data collected from analytical reference standards at known concentrations.

Table 6 - S21-78664 JOINT GROUND - F18835 SCC-211031-138-J Flower Pesticide Testing

Test Analysis	Result, ppb	LOD ppb	LOQ ppb	Limits ppb	Disposition
Bifenazate	ND	125	375	750	Pass
Bifenthrin	ND	83.3	250	500	Pass
Cyfluthrin	ND	166.7	500	1000	Pass
Etoxazole	ND	58.3	175	350	Pass
Imazalil	ND	4.2	12.5	25	Pass
Imidacloprid	ND	50	150	300	Pass
Myclobutanil	ND	83.3	250	500	Pass
Spiromesifen	ND	333.3	1000	2000	Pass
Trifloxystrobin	ND	91.7	275	550	Pass

Note: ND = Not Detected; LOD = Limit of Detection; LOQ = Limit of Quantitation; ppb = part per billion; N/A = not available. Testing limits established by the Massachusetts Department of Public Health, Protocol for Sampling and Analysis of Finished Medical Marijuana Products and Marijuana-Infused Products for Massachusetts Registered Medical Marijuana Dispensaries, Exhibit 5.

END OF REPORT