



Samples: HM19SEP

Issue Date: 10/18/2019

Q1. What extraction solvent do you use?

Lab Num	THC method	Answer
Q1. 101	LC-UV, other	MeOH
Q1. 102	LC-MS, other	Methanol
Q1. 103	AOAC 2018.11, diode array	Methanol
Q1. 105	LC-MS, other	Acetonitrile
Q1. 106	LC-UV, other	Methanol
Q1. 107	AOAC 2018.10	REAGENT ALCOHOL
Q1. 107	Other	REAGENT ALCOHOL
Q1. 108	AOAC 2018.10	Ethyl Acetate
Q1. 109	LC-UV, other	MeOH(9):CHCl3(1)
Q1. 112	GC-FID	Methanol
Q1. 113	AOAC 2018.11, diode array	MeOH
Q1. 114	GC-FID	Methanol
Q1. 115	AOAC 2018.10	80/20 Methanol/water
Q1. 116	GC-FID	methanol
Q1. 116	LC-UV, other	methanol
Q1. 118	AOAC 2018.11, diode array	Methanol
Q1. 119	LC-MS, other	Acetonitrile:MeOH 80:20
Q1. 120	LC-MS, other	95/5 Methanol/Chloroform (v/v)
Q1. 121	GC-FID	Methanol

Q1.	122	LC-MS, other	95% MeOH + 0.005% Formic Acid
Q1.	123	AOAC 2018.11, diode array	Methanol
Q1.	124	LC-UV, other	Acetonitrile
Q1.	125	LC-UV, other	Reagent alcohol
Q1.	127	LC-UV, other	Ethanol (GC) or methanol (LC)
Q1.	127	GC-MS	Ethanol (GC) or methanol (LC)
Q1.	128	GC-FID	Methanol
Q1.	129	LC-UV, other	Methanol
Q1.	131	Other	Methanol
Q1.	132	Other	ACN
Q1.	135	LC-UV, other	Methanol
Q1.	136	LC-UV, other	Methanol
Q1.	137	AOAC 2018.11, diode array	Methanol
Q1.	138	GC-FID	methanol
Q1.	139	LC-MS, other	Ethanol
Q1.	141	LC-UV, other	Methanol/chloroform (90:10)
Q1.	142	LC-UV, other	Acetonitrile
Q1.	143	GC-FID	ethanol
Q1.	144	LC-MS, other	Methanol
Q1.	145	AOAC 2018.11, diode array	methanol
Q1.	146	AOAC 2018.11, diode array	Methanol
Q1.	148	Other	LightLab Solvent
Q1.	149	LC-MS, other	Methanol
Q1.	149	LC-UV, other	Methanol
Q1.	150	LC-UV, other	LightLab Mobile Phase (~80% Methanol/20% water)
Q1.	151	GC-MS	Methanol
Q1.	152	LC-UV, other	Ethanol
Q1.	153	GC-FID	Methanol
Q1.	154	LC-UV, other	Acetonitrile

Q1.	155	AOAC 2018.11, mass spec	80 % MeOH
Q1.	155	AOAC 2018.11, diode array	80 % MeOH
Q1.	156	LC-MS, other	Methanol
Q1.	159	LC-MS, other	85% MeOH/15% H2O
Q1.	160	AOAC 2018.10	Methanol
Q1.	161	LC-UV, other	Methanol
Q1.	162	AOAC 2018.10	Methanol
Q1.	163	LC-UV, other	Methanol
Q1.	163	GC-FID	Methanol
Q1.	164	LC-MS, other	Methanol
Q1.	168	AOAC 2018.10	80% Methanol 20% Water
Q1.	169	GC-FID	Methanol
Q1.	170	GC-FID	methanol
Q1.	173	Other	methanol fortified with other solvents

Q2. What extraction method do you use (eg., sonication, shaking, other)?

Lab Num	THC method	Answer	
Q2.	101	LC-UV, other	Vortex and sonication
Q2.	102	LC-MS, other	Shaking
Q2.	103	AOAC 2018.11, diode array	Votex
Q2.	105	LC-MS, other	shaking
Q2.	106	LC-UV, other	Sonicate,shaking, and centerfuging
Q2.	107	AOAC 2018.10	SONICATION
Q2.	107	Other	SONICATION
Q2.	108	AOAC 2018.10	shaking
Q2.	109	LC-UV, other	Sonication
Q2.	112	GC-FID	Shaking
Q2.	113	AOAC 2018.11, diode array	Shaking

Q2.	114	GC-FID	Shaking via Geno/Grinder
Q2.	115	AOAC 2018.10	sonication, shaking
Q2.	116	GC-FID	shaking
Q2.	116	LC-UV, other	shaking
Q2.	118	AOAC 2018.11, diode array	Shaking
Q2.	119	LC-MS, other	sonication
Q2.	120	LC-MS, other	sonication
Q2.	121	GC-FID	Shaking
Q2.	122	LC-MS, other	Sonication
Q2.	123	AOAC 2018.11, diode array	Vortex
Q2.	124	LC-UV, other	Sonication
Q2.	125	LC-UV, other	Shaking
Q2.	127	GC-MS	Sonication
Q2.	127	LC-UV, other	Sonication
Q2.	128	GC-FID	Genogrinder
Q2.	129	LC-UV, other	Shaking
Q2.	131	Other	Shaking
Q2.	132	Other	Shaking or Sonicating
Q2.	135	LC-UV, other	Sonication
Q2.	136	LC-UV, other	Shaking
Q2.	137	AOAC 2018.11, diode array	Sonication and Shaking
Q2.	138	GC-FID	shaking
Q2.	139	LC-MS, other	sonication
Q2.	141	LC-UV, other	Shaking
Q2.	142	LC-UV, other	Sonication
Q2.	143	GC-FID	bead beet
Q2.	144	LC-MS, other	Sonication, shaking, centrifuging
Q2.	145	AOAC 2018.11, diode array	sonication
Q2.	146	AOAC 2018.11, diode array	Vortexing

Q2. 148	Other	vortexing
Q2. 149	LC-UV, other	Vortex for 3minutes
Q2. 149	LC-MS, other	Vortex for 3minutes
Q2. 150	LC-UV, other	Shaking for 4 minutes
Q2. 151	GC-MS	Vortex
Q2. 152	LC-UV, other	Sonication
Q2. 153	GC-FID	Shaking
Q2. 154	LC-UV, other	Sonicate 20 min, Centrifuge 10 min
Q2. 155	AOAC 2018.11, mass spec	Shaking with Geno Grinder
Q2. 155	AOAC 2018.11, diode array	Shaking with Geno Grinder
Q2. 156	LC-MS, other	Shaking
Q2. 159	LC-MS, other	Shaking for 1 hr at 100 RPM
Q2. 160	AOAC 2018.10	Sonication
Q2. 161	LC-UV, other	Shaking
Q2. 162	AOAC 2018.10	Spex grinder, Vortex Mixer, Centrifuge
Q2. 163	LC-UV, other	Shaking
Q2. 163	GC-FID	Shaking
Q2. 164	LC-MS, other	Shaking on Genogrinder
Q2. 168	AOAC 2018.10	Sonication
Q2. 169	GC-FID	Shaking
Q2. 170	GC-FID	genogrinding, 5 min/1000
Q2. 173	Other	sonication and vortexing

Q3. and Q4. What is your sample mass and extractant volume?

Lab Num	THC method	Answer
Q3. 101	LC-UV, other	sample mass (g): 0.1500 extractant volume (mL): 15
Q3. 102	LC-MS, other	sample mass (g): 0.2 extractant volume (mL): 40
Q3. 103	AOAC 2018.11, diode array	sample mass (g): 1 grams extractant volume (mL): 2 ml

Q3. 105	LC-MS, other	sample mass (g): 1 extractant volume (mL): 40
Q3. 106	LC-UV, other	sample mass (g): 0.1 extractant volume (mL): 10mls
Q3. 107	Other	sample mass (g): 0.2 extractant volume (mL): 20
Q3. 107	AOAC 2018.10	sample mass (g): 0.2 extractant volume (mL): 20
Q3. 108	AOAC 2018.10	sample mass (g): 0.5g extractant volume (mL): 15
Q3. 109	LC-UV, other	sample mass (g): 0.1-.175g extractant volume (mL): 10
Q3. 112	GC-FID	sample mass (g): 0.20 extractant volume (mL): 40.0
Q3. 113	AOAC 2018.11, diode array	sample mass (g): 0.5 extractant volume (mL): 10
Q3. 114	GC-FID	sample mass (g): 0.2 extractant volume (mL): 40
Q3. 115	AOAC 2018.10	sample mass (g): 0.2 g extractant volume (mL): 25 mls
Q3. 116	GC-FID	sample mass (g): 0.2 extractant volume (mL): 40
Q3. 116	LC-UV, other	sample mass (g): 0.2 extractant volume (mL): 40
Q3. 118	AOAC 2018.11, diode array	sample mass (g): 0.5g extractant volume (mL): 10mL
Q3. 119	LC-MS, other	sample mass (g): 0.2 extractant volume (mL): 40
Q3. 120	LC-MS, other	sample mass (g): 0.1 g extractant volume (mL): 5 mL
Q3. 121	GC-FID	sample mass (g): 0.2 extractant volume (mL): 40
Q3. 122	LC-MS, other	sample mass (g): 0.1 extractant volume (mL): 250
Q3. 123	AOAC 2018.11, diode array	sample mass (g): 2g extractant volume (mL): 10mL
Q3. 124	LC-UV, other	sample mass (g): 1 g extractant volume (mL): 10 mL
Q3. 125	LC-UV, other	sample mass (g): 0.5 grams extractant volume (mL): 10 mL
Q3. 127	LC-UV, other	sample mass (g): 0.015 extractant volume (mL): 1.5
Q3. 127	GC-MS	sample mass (g): 0.015 extractant volume (mL): 1.5
Q3. 128	GC-FID	sample mass (g): 0.2g extractant volume (mL): 40mls
Q3. 129	LC-UV, other	sample mass (g): 4 extractant volume (mL): 20
Q3. 131	Other	sample mass (g): 0.5 extractant volume (mL): 20
Q3. 132	Other	sample mass (g): 0.5 extractant volume (mL): 5
Q3. 135	LC-UV, other	sample mass (g): 0.200g extractant volume (mL): 10mL
Q3. 136	LC-UV, other	sample mass (g): 0.2000 g extractant volume (mL): 1.0000 ml
Q3. 137	AOAC 2018.11, diode array	sample mass (g): 0.5 g extractant volume (mL): 15 mL

Q3. 138	GC-FID	sample mass (g): 0.5 extractant volume (mL): 20
Q3. 139	LC-MS, other	sample mass (g): 0.1 g extractant volume (mL): 10 ml
Q3. 141	LC-UV, other	sample mass (g): 0.2 grams extractant volume (mL): 40 mL
Q3. 142	LC-UV, other	sample mass (g): 0.3 extractant volume (mL): 4.0
Q3. 143	GC-FID	sample mass (g): 15mg extractant volume (mL): 1.5
Q3. 144	LC-MS, other	sample mass (g): 1.1 g extractant volume (mL): 40 mL
Q3. 145	AOAC 2018.11, diode array	sample mass (g): 25 extractant volume (mL): 25
Q3. 146	AOAC 2018.11, diode array	sample mass (g): 0.25g, 0.5g extractant volume (mL): 40mL
Q3. 148	Other	sample mass (g): 1 extractant volume (mL): 10
Q3. 149	LC-MS, other	sample mass (g): 0.2g extractant volume (mL): 25
Q3. 149	LC-UV, other	sample mass (g): 0.2g extractant volume (mL): 25
Q3. 150	LC-UV, other	sample mass (g): Depended on analyte, 500mg for CBD/CBDA/CBN, 1000mg for D
Q3. 151	GC-MS	sample mass (g): 0.1 extractant volume (mL): 2
Q3. 152	LC-UV, other	sample mass (g): 0.1 extractant volume (mL): 10
Q3. 153	GC-FID	sample mass (g): 0.20 extractant volume (mL): 40
Q3. 154	LC-UV, other	sample mass (g): 1 g extractant volume (mL): 10 ml
Q3. 155	AOAC 2018.11, mass spec	sample mass (g): 2.0 extractant volume (mL): 30.0
Q3. 155	AOAC 2018.11, diode array	sample mass (g): 2.0 extractant volume (mL): 30.0
Q3. 156	LC-MS, other	sample mass (g): 1 extractant volume (mL): 40
Q3. 159	LC-MS, other	sample mass (g): 0.2 grams extractant volume (mL): 25 mL
Q3. 160	AOAC 2018.10	sample mass (g): 175mg extractant volume (mL): 4ml
Q3. 161	LC-UV, other	sample mass (g): 0.050 g extractant volume (mL): 5 mL
Q3. 162	AOAC 2018.10	sample mass (g): 0.2 g extractant volume (mL): 20 mL
Q3. 163	GC-FID	sample mass (g): .5g extractant volume (mL): 25
Q3. 163	LC-UV, other	sample mass (g): .5g extractant volume (mL): 25
Q3. 164	LC-MS, other	sample mass (g): 0.2 extractant volume (mL): 20
Q3. 168	AOAC 2018.10	sample mass (g): 1 gram extractant volume (mL): 25 mL
Q3. 169	GC-FID	sample mass (g): 0.20 extractant volume (mL): 40
Q3. 170	GC-FID	sample mass (g): 0.2 extractant volume (mL): 32

Q3. 173 Other sample mass (g): 0.45 | extractant volume (mL): 5.0

Q5. Do you perform predecarboxylation step of the extract prior to instrumental analysis?

Lab Num	THC method	Answer
Q5. 101	LC-UV, other	no
Q5. 102	LC-MS, other	no
Q5. 103	AOAC 2018.11, diode array	no
Q5. 105	LC-MS, other	no
Q5. 106	LC-UV, other	no
Q5. 107	Other	yes
Q5. 107	AOAC 2018.10	yes
Q5. 108	AOAC 2018.10	no
Q5. 109	LC-UV, other	no
Q5. 112	GC-FID	no
Q5. 113	AOAC 2018.11, diode array	no
Q5. 114	GC-FID	No
Q5. 115	AOAC 2018.10	no
Q5. 116	GC-FID	no
Q5. 116	LC-UV, other	no
Q5. 118	AOAC 2018.11, diode array	no
Q5. 119	LC-MS, other	no
Q5. 120	LC-MS, other	no
Q5. 121	GC-FID	no
Q5. 122	LC-MS, other	No
Q5. 123	AOAC 2018.11, diode array	no
Q5. 124	LC-UV, other	No
Q5. 125	LC-UV, other	no
Q5. 127	LC-UV, other	no

Q5.	127	GC-MS	no
Q5.	128	GC-FID	No
Q5.	129	LC-UV, other	NO
Q5.	131	Other	no
Q5.	132	Other	No
Q5.	135	LC-UV, other	No
Q5.	136	LC-UV, other	No
Q5.	137	AOAC 2018.11, diode array	No
Q5.	138	GC-FID	no
Q5.	139	LC-MS, other	no
Q5.	141	LC-UV, other	No
Q5.	142	LC-UV, other	no
Q5.	143	GC-FID	yes
Q5.	144	LC-MS, other	no
Q5.	145	AOAC 2018.11, diode array	no
Q5.	146	AOAC 2018.11, diode array	no
Q5.	148	Other	no
Q5.	149	LC-MS, other	no
Q5.	149	LC-UV, other	no
Q5.	150	LC-UV, other	No
Q5.	151	GC-MS	No
Q5.	152	LC-UV, other	no
Q5.	153	GC-FID	no
Q5.	154	LC-UV, other	no
Q5.	155	AOAC 2018.11, diode array	no
Q5.	155	AOAC 2018.11, mass spec	no
Q5.	156	LC-MS, other	no
Q5.	159	LC-MS, other	no
Q5.	160	AOAC 2018.10	No

Q5.	161	LC-UV, other	no
Q5.	162	AOAC 2018.10	no
Q5.	163	LC-UV, other	no
Q5.	163	GC-FID	no
Q5.	164	LC-MS, other	no
Q5.	168	AOAC 2018.10	No
Q5.	169	GC-FID	no
Q5.	170	GC-FID	no
Q5.	173	Other	no

Q6. Do you determine measurement uncertainty for total THC considering both precision and trueness (see sheet entitled uncertainty)?

Lab Num	THC method	Answer
Q6. 101	LC-UV, other	no
Q6. 102	LC-MS, other	no
Q6. 103	AOAC 2018.11, diode array	no
Q6. 105	LC-MS, other	no
Q6. 106	LC-UV, other	yes
Q6. 107	Other	no
Q6. 107	AOAC 2018.10	no
Q6. 108	AOAC 2018.10	no
Q6. 109	LC-UV, other	no
Q6. 112	GC-FID	no
Q6. 113	AOAC 2018.11, diode array	no
Q6. 114	GC-FID	no
Q6. 115	AOAC 2018.10	no
Q6. 116	GC-FID	no
Q6. 116	LC-UV, other	no
Q6. 118	AOAC 2018.11, diode array	no

Q6.	119	LC-MS, other	no
Q6.	120	LC-MS, other	yes
Q6.	121	GC-FID	no
Q6.	122	LC-MS, other	No
Q6.	123	AOAC 2018.11, diode array	yes
Q6.	124	LC-UV, other	yes
Q6.	125	LC-UV, other	no
Q6.	127	GC-MS	no
Q6.	127	LC-UV, other	no
Q6.	128	GC-FID	No
Q6.	129	LC-UV, other	NO
Q6.	131	Other	no
Q6.	132	Other	yes
Q6.	135	LC-UV, other	No
Q6.	136	LC-UV, other	No
Q6.	137	AOAC 2018.11, diode array	no
Q6.	138	GC-FID	no
Q6.	141	LC-UV, other	No
Q6.	142	LC-UV, other	no
Q6.	143	GC-FID	no
Q6.	146	AOAC 2018.11, diode array	no
Q6.	148	Other	no
Q6.	149	LC-MS, other	no
Q6.	149	LC-UV, other	no
Q6.	150	LC-UV, other	No
Q6.	151	GC-MS	No
Q6.	152	LC-UV, other	no
Q6.	153	GC-FID	no
Q6.	154	LC-UV, other	no

Q6.	156	LC-MS, other	no
Q6.	159	LC-MS, other	no
Q6.	160	AOAC 2018.10	No
Q6.	161	LC-UV, other	no
Q6.	162	AOAC 2018.10	no
Q6.	163	LC-UV, other	no
Q6.	163	GC-FID	no
Q6.	164	LC-MS, other	yes
Q6.	168	AOAC 2018.10	No
Q6.	169	GC-FID	yes
Q6.	170	GC-FID	no
Q6.	173	Other	yes

Q7. If yes to previous question, what is your expanded measurement uncertainty, U, for % total THC in hemp?

Lab Num	THC method	Answer	
Q7.	106	LC-UV, other	0.01
Q7.	114	GC-FID	NA
Q7.	120	LC-MS, other	0.060%
Q7.	123	AOAC 2018.11, diode array	0.0036%
Q7.	124	LC-UV, other	0.013
Q7.	129	LC-UV, other	N/A
Q7.	132	Other	0.04%
Q7.	135	LC-UV, other	NA
Q7.	143	GC-FID	no
Q7.	146	AOAC 2018.11, diode array	N/A
Q7.	148	Other	N/A
Q7.	164	LC-MS, other	0.0340
Q7.	169	GC-FID	0.13

Q7. 173 Other

2.5% RSD