







Worklist: 5836

<u>LAB CASE</u>	<u>ITEM</u>	<u>ITEM TYPE</u>	<u>DESCRIPTION</u>	
M2022-1191	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
M2022-1484	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
M2022-1564	2	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
M2022-1644	2	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
M2022-1661	2	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2021-3388	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-0960	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-0964	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1011	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1016	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1033	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1082	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1113	3	BCK	AM 25 Blood Multi-Drug Screen by LC-QQQ	
P2022-1113	4	BCK	AM 25 Blood Multi-Drug Screen by LC-QQQ	
P2022-1115	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1156	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1158	4	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1167	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1168	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1179	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1180	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	

Worklist: 5836

TS

<u>LAB CASE</u>	<u>ITEM</u>	<u>ITEM TYPE</u>	<u>DESCRIPTION</u>	
P2022-1215	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1218	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1225	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1226	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1227	1	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	
P2022-1228	2	BCK	AM 25/AM 26 Blood MultiDrug/THC Screen by LC-QQQ	

Request for Departure from an Analytical Method or Quality Standard

Deviation Number (assigned by QM): TOX-22-01

Date of Request: 2/3/2022

Requestor/Discipline: Celena Shrum/Toxicology

Analytical Method/Quality Standard, Revision #: AM #25, AM #28, AM #29, Revision 13

Temporary or Permanent Deviation: Permanent

Scope of Deviation (record specific information, e.g. affected programs, evidence types, expected end date; etc): Deviation will remain in place until the change is made in the next method revision.

Deviation Request (Describe detailed instructions of the changes being made; include reference to specific section number(s) in the method manual): 4.1.4 (Place plate on shaking incubator at approximately 900 rpm for approximately 15 minutes) of AM #25, AM # 28, and AM #29 is being removed. The removal of this step was tested in the validation "Addition of Compounds/Modifications for the MDS" (approved on 2/2/2022) and it was determined that that step is not necessary and can be removed.

Technical Justification for Analytical Method Deviations: Refer to validation "Addition of Compounds/Modifications for the MDS" (approved on 2/2/2022)

Technical Review

Departure approved
Comments:

Departure Not Approved
Comments:

Approver: Rachel Cutler
Title: Laboratory Manager



Date: 2/10/2022

Quality Review

Quality Approver: Jason Crowe
Title: Quality Manager
Date: 2/10/2022



AM# 25: Multi-Drug Screen in Blood and Urine by LC-MS/MS

Extraction Date: 05/02/2022

Analyst: Tamara Salazar

Plate lot#: 211015

Plate Retest Date: 04/15/2022 – ok with external control

Mobile phase A: 10mM Amm Form

Mobile phase B: 0.1% Formic Acid in MeOH

Column: Phenomenex Phenyl Hexyl (4.6x50mm, 2.6um)

Blank Blood Lot: 22B52016-2

LCMS-QQQ ID: 069901

Pre-Analytic:

- 1. Check levels of mobile phases and needle wash refill as needed. Ensure waste is not full.
- 2. Ensure correct column is installed and begin mobile phase flow allow to equilibrate ~ 30 minutes.

Analytic:

- 1. Remove standards, plate, controls, and samples from cold storage. Allow to reach room temperature.
- 2. ~~Urine Hydrolysis: In blank well, add 250µL urine, 40µL BG Turbo, and 100µL Instant Buffer I. Place on plate shaker for 5 minutes.~~ (Not applicable)
- 3. Using a calibrated pipette, pipette **250µL blood and urine** (if applicable) into wells of analytical (standards) plate. **Pipette ID: 42**
- 4. Pipette **250µL 0.5 M ammonium hydroxide** in wells of analytical plate.
- 5. Place on shaking incubator at ambient temp., 900rpm for 15 minutes.
- 6. Transfer **200-450µL of blood+base and urine+base (if applicable)** mixture to corresponding wells of SLE+ plate. Amount transferred: *250uL*
- 7. Apply positive pressure for approx. 10-15 seconds (or until no liquid remains on top of sorbent). *(Load at 85-100 PSI- Selector to the right).*
- 8. Wait 5 minutes.
- 9. Add **900uL ethyl acetate.**
- 10. Wait 5 minutes.
- 11. Apply positive pressure for approx. 15 seconds. *(10-15 PSI- Selector to the left).*
- 12. Add **900uL ethyl acetate.**
- 13. Wait 5 minutes.
- 14. Apply positive pressure for approx. 15 seconds. *(10-15 PSI- Selector to the left).*
- 15. Remove plate containing eluate. Place on SPE Dry and evaporate to dryness at approx. 35°C.
- 16. **If run contains urine or at the analyst's discretion, add 50µL 1% HCl in MeOH to wells and place plate cover on plate before drying (optional).**
- 17. Reconstitute in **100µL 20% LC MeOH** and heat seal plate with foil. Place in autosampler and run worklist.

Post-Analytic

- 1. Open quantitation software and create a new quantitation batch.
- 2. Make necessary changes to integration limits
- 3. Evaluate samples, S/N of primary transition >5 and S/N of secondary transition >3 or evaluation of peak symmetry and resolution. Within +/- 2% or 0.1 min RT of administrative control. Calculated concentration of 5 or greater or 2-5 for discretionary range.
- 4. Did all QCs pass for each analyte? If no, describe issue in comments (below).
- 5. Central File Packet to include: LIMS Worklist, Method Checklist, Calibration and Control Reports

COMMENTS:

	1	2	3	4	5	6	7	8	9	10	11	12
A	IS + Cal. 1	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	P2022-1179-1	P2022-1082-1	M2022-1644-2
B	IS + Cal. 1	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	P2022-1228-2	P2022-1168-1	P2022-1033-1	M2022-1564-2
C	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	P2022-1227-1	P2022-1167-1	P2022-1016-1	M2022-1484-1
D	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	P2022-1226-1	P2022-1158-4	P2022-1011-1	M2022-1191-1
E	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	P2022-1225-1	P2022-1156-1	P2022-0964-1	Ext Ctrl
F	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	P2022-1218-1	P2022-1115-1	P2022-0960-1	Negative
G	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	P2022-1215-1	P2022-1113-4	P2021-3388-1	IS + Cal. 1
H	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	IS + Sample	P2022-1180-1	P2022-1113-3	M2022-1661-2	IS + Cal. 1

All wells to contain 60 µl of residual DMSO



Idaho State Police Forensic Services

AM #25 Blood Multi-Drug Screen by LCMS-QQQ And AM #28 Blood Multi-Drug Confirmatory Analysis by LCMS-QQQ---Panel 1

Methanol External Control Solution (Lot: 042222)

100 μ L of 1mg/mL stock was added to each drug to 9600 μ L of LC MeOH.

<i>Component</i>	<i>Source</i>	<i>Source Lot Number</i>	<i>Expiration Date</i>
Methanol (LCMS)	Fisher	215245	N/A
Tramadol	Cerilliant	FE10051901	12/31/2024
Hydrocodone	Cerilliant	FE04241902	09/30/2024
Alprazolam	Cerilliant	FE06102008	06/30/2025
Buprenorphine	Cerilliant	FE03191903	06/31/2024
Prepared:	04/22/2022		
Expires:	04/22/2023		
Prepared By:	Celena Shrum		

Blood External Control Solution (Lot: WS042222)

*200 μ L of methanol external control solution was added to 9800 μ L of blood.
Approximately 200 ng/mL of each compound.*

<i>Component</i>	<i>Source</i>	<i>Source Lot Number</i>
Negative Blood	Lampire	22B52016-2
Methanol External Control Solution		042222
Prepared:	04/22/2022	
Expires:	04/22/2023	
Prepared by:	Celena Shrum	

TS

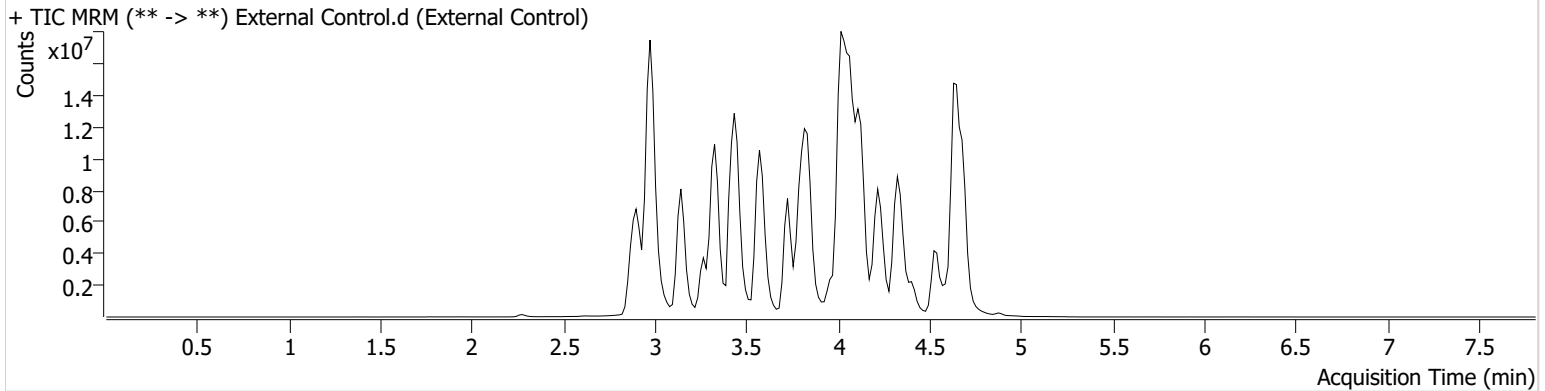


AM #25 Multi-Drug Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 25_updated with new compounds.batch.bin
Calibration Last Update 5/9/2022 1:09:39 PM

Instrument	Falco (069901)	Data File	External Control.d
Type	Sample	Sample	External Control
Acq. Method	AM 25 MDS.m	Operator	Tamara Salazar
Sample Position	P2-E12	Comment	
Injection Volume	5		
Acq. Date-Time	5/2/2022 7:37:26 PM		
Sample Info.			

Sample Chromatogram



Name	RT	Resp.	S/N	S/N	ISTD Resp.	Calc. Conc.
Alprazolam	4.636	23238459	1243.16	7691.23	26514085	56.3104
Buprenorphine	4.351	6853739	18244.19	7044.10	2536320	108.6755
Hydrocodone	2.976	11356752	642.58	2679.11	9938798	72.5489
Tramadol	3.438	47747287	2424.15	436.60	45734332	59.1388

TS



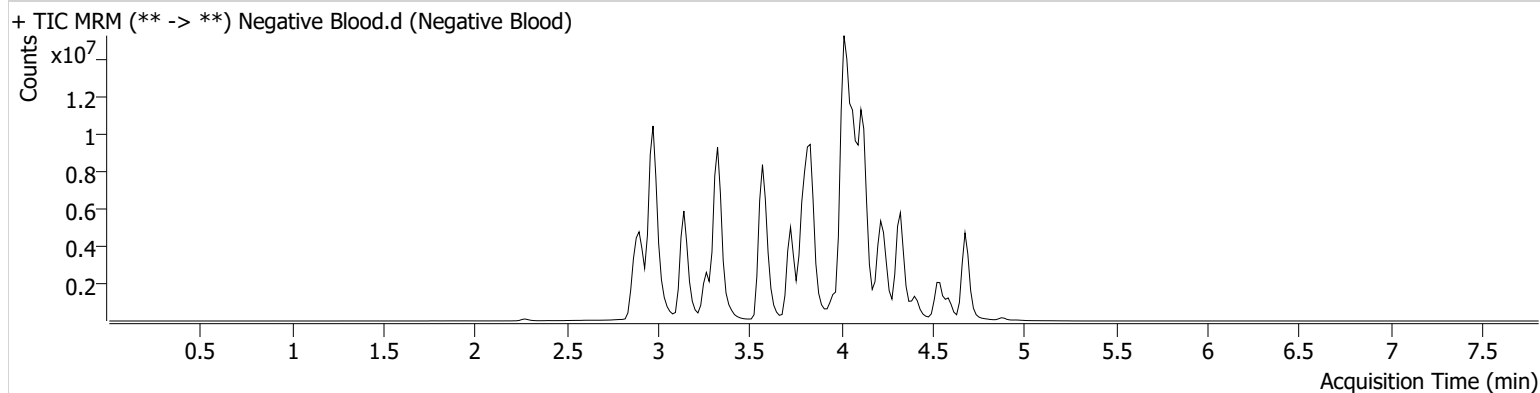
AM #25 Multi-Drug Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 25_updated with new compounds.batch.bin

Calibration Last Update 5/9/2022 1:09:39 PM

Instrument	Falco (069901)	Data File	Negative Blood.d
Type	Sample	Sample	Negative Blood
Acq. Method	AM 25 MDS.m	Operator	Tamara Salazar
Sample Position	P2-F12	Comment	
Injection Volume	5		
Acq. Date-Time	5/2/2022 7:29:02 PM		
Sample Info.			

Sample Chromatogram



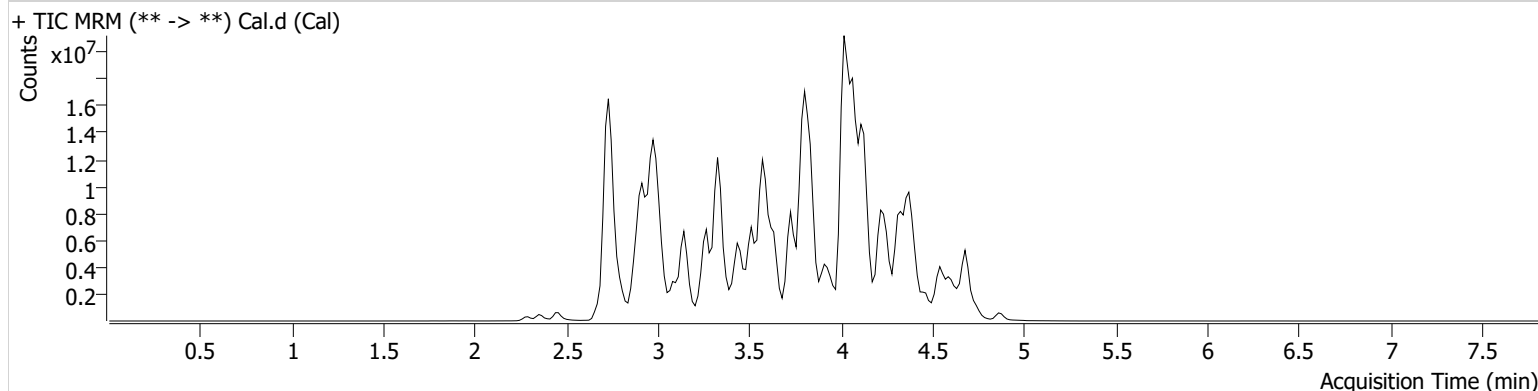
AM #25 Multi-Drug Screen Results



Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 25_updated with new compounds.batch.bin
Calibration Last Update 5/9/2022 1:09:39 PM

Instrument	Falco (069901)	Data File	Cal.d
Type	Cal	Sample	Cal
Acq. Method	AM 25 MDS.m	Operator	Tamara Salazar
Sample Position	P2-H12	Comment	
Injection Volume	5		
Acq. Date-Time	5/2/2022 7:20:28 PM		
Sample Info.			

Sample Chromatogram



Name	RT	Resp.	S/N	S/N	ISTD Resp.	Calc. Conc.
10-OH-Carbazepine	3.793	2561565	185.76	635.11	17148856	10.0000
6-MAM	2.895	38280	8692.76	119.78	1250868	10.0000
7-aminoclonazepam	3.605	897111	707.23	301.27	3481772	10.0000
7-aminoflunitrazepam	3.805	1090439	281.68	399.53	3481772	10.0000
9-Hydroxyrisperidone	3.828	5696343	10837471.29	5204.97	24485057	10.0000
Acetyl Fentanyl	3.802	246248	136.32	74730.60	30298553	10.0000
Acetyl Norfentanyl	2.919	328273	281.64	1578.92	30298553	10.0000
a-hydroxyalprazolam	4.541	135962	122.87	730.34	3481772	10.0000
alpha-hydroxymidazolam	4.616	1407736	539.99	504.16	3481772	10.0000
Alpha-PHP	3.794	2837744	22284.36	6480.90	30298553	10.0000
alpha-PVP	3.533	4429758	433.13	349.40	10514426	10.0000
Alprazolam	4.636	1638708	498.15	588.60	10528321	10.0000
Amitriptyline	4.409	834523	182.51	159.83	2948825	10.0000
Amphetamine	2.923	3333714	956.11	4519.68	10514426	10.0000
Benzoyllecgonine	3.405	134899	212.78	28.38	260241	10.0000
Brompheniramine	4.018	68106	127.57	256.88	39584840	10.0000
Buprenorphine	4.336	503107	26514.91	31901.52	2023340	10.0000
Bupropion	3.748	4082240	1737.73	1236.82	16383915	10.0000
Carbamazepine	4.258	7554106	1908.99	4102.34	293809	10.0000
Carisoprodol	4.256	983271	360096.95	100.84	5676018	10.0000
Chlordiazepoxide	4.745	304241	215.44	605.57	10528321	10.0000
Chlorpheniramine	3.930	5275651	12524.16	13.22	39584840	10.0000
Chlorpromazine	4.588	634817	425842.21	198.31	2701003	10.0000
Citalopram	4.064	2475413	566.63	1253.06	39584840	10.0000
Clomipramine	4.604	861219	9305.36	5895.62	39584840	10.0000
Clonazepam	4.465	520899	1650.43	75620.02	10528321	10.0000
Clonazolam	4.400	881583	215052.55	102213.76	10528321	10.0000
Clozapine	4.217	3225538	2000.01	743.74	13035962	10.0000
Cocaethylene	3.772	3665094	1311375.21	63054.84	24771233	10.0000
Cocaine	3.573	3794444	906.05	814.83	24771233	10.0000
Codeine	2.793	308926	3610.14	2363.78	7601110	10.0000
Cyclobenzaprine	4.332	1353309	1226.86	19.53	2948825	10.0000
Desipramine	4.364	2230032	405.67	562.51	2948825	10.0000

Cal

AM #25 Multi-Drug Screen Results



Name	RT	Resp.	S/N	S/N	ISTD Resp.	Calc. Conc.
Dextromethorphan	4.053	1398511	285.65	192.76	8301976	10.0000
Dextrorphan	3.377	1986256	467.32	231.77	8301976	10.0000
Diazepam	4.868	783541	1620.42	1264.73	10528321	10.0000
Dihydrocodeine	2.746	765608	304.93	304.19	7601110	10.0000
Diphenhydramine	4.024	7281304	1640.56	1696.12	39584840	10.0000
Doxepin	4.130	1335918	424.32	103.17	15921898	10.0000
Doxylamine	3.637	7735381	416.92	404.70	8301976	10.0000
Duloxetine	4.314	21903	11020.75	247.54	334150	10.0000
EDDP	4.069	1182377	959.10	130.53	2942911	10.0000
Estazolam	4.561	3024859	477.34	646.27	10528321	10.0000
Etizolam	4.646	257814	168018.01	499953.42	10528321	10.0000
Fentanyl	4.032	165126	138.70	18317.92	12493447	10.0000
Flualprazolam	4.509	652192	325219.07	4226.98	10528321	10.0000
Flunitrazepam	4.589	1024961	667.35	507.42	10528321	10.0000
Fluoxetine	4.328	907882	17958.76	59.36	1211555	10.0000
Flurazepam	4.137	2016733	308948.12	59780.92	10528321	10.0000
Hydrocodone	2.976	1197199	1161.83	539.70	7601110	10.0000
Hydromorphone	2.459	1086955	1094.91	324.65	302169	10.0000
Hydroxyzine	4.461	1742568	1285.42	136.12	39584840	10.0000
Imipramine	4.377	3261890	1083.42	525.92	2948825	10.0000
Ketamine	3.425	3155324	1788.83	132.48	9477431	10.0000
Lamotrigine	3.577	253088	3691.30	1302.88	39584840	10.0000
Levamisole	2.950	2258789	1263.85	219.52	24771233	10.0000
Levetiracetam	2.677	1401484	312.99	1145.24	39584840	10.0000
Lorazepam	4.464	212331	140.94	129.42	10528321	10.0000
Maprotiline	4.409	597967	87.11	28839.46	2948825	10.0000
MDA	3.028	2502468	1056.86	267.97	28178876	10.0000
MDEA	3.242	3845616	784.33	411.09	28178876	10.0000
MDMA	3.089	4791549	7087.73	310.01	28178876	10.0000
Meperidine	3.593	2218485	170.86	351.19	8301976	10.0000
Meprobamate	3.704	767602	167.06	241.88	5676018	10.0000
Methadone	4.389	3985448	299.67	373.57	2942911	10.0000
Methamphetamine	3.014	6479428	1626.60	340.38	28178876	10.0000
Methocarbamol	3.609	438739	174.80	266.59	2942911	10.0000
Methylphenidate	3.518	9153722	589.07	189.26	18242323	10.0000
Metoprolol	3.453	531684	344.30	204.96	8301976	10.0000
Midazolam	4.740	532352	725.15	244919.76	10528321	10.0000
Mirtazapine	3.792	2517797	1882.88	1452.71	8301976	10.0000
Mitragynine	4.137	308422	109302.10	296059.85	8301976	10.0000
Morphine	2.293	219411	547.47	460.88	302169	10.0000
Norbuprenorphine	3.829	56297	30510.81	40086.48	2023340	10.0000
Nordiazepam	4.732	672153	1334404.05	304.69	10528321	10.0000
Norfentanyl	3.348	5855439	1497.61	164.16	30298553	10.0000
Norhydrocodone	2.931	99952	77.95	1687.47	302169	10.0000
Norketamine	3.488	647128	344.64	5694.22	9477431	10.0000
Normeperidine	3.610	2329466	1792.55	543.17	39584840	10.0000
Noroxycodone	2.899	996406	∞	113.75	9477431	10.0000
Nortriptyline	4.410	566205	306.52	237.56	2948825	10.0000
O-desmethyl-tramadol	2.933	6169266	1213.92	292.95	39584840	10.0000
O-desmethylvenlafaxine	3.268	1452060	350.83	1047.43	7216672	10.0000
Olanzapine	3.726	1389083	858717.09	8034.37	293809	10.0000
Oxazepam	4.546	993315	564391.92	108.50	4128094	10.0000
Oxycodone	2.912	1982403	461.18	746.72	9477431	10.0000
Oxymorphone	2.350	989910	182.84	979.15	302169	10.0000
Paroxetine	4.325	132586	193.80	33180.32	1211555	10.0000
Phenazepam	4.661	898189	9849.47	371188.39	10528321	10.0000
Phencyclidine	3.917	4722005	1026.55	1124.36	8301976	10.0000
Phentermine	3.168	1306942	58.29	17.12	18242323	10.0000
Phenytoin	4.164	474318	692.82	556.30	293809	10.0000
Primidone	3.504	1260709	531.45	318.71	293809	10.0000

Cal

TS

AM #25 Multi-Drug Screen Results



Name	RT	Resp.	S/N	S/N	ISTD Resp.	Calc. Conc.
Promethazine	4.299	3622829	243.12	171.03	39584840	10.0000
Pseudoephedrine	2.738	50812248	688.05	1439.74	28178876	10.0000
Quetiapine	4.353	2666796	2333.20	1566.85	32339277	10.0000
Risperidone	4.013	3888239	1274140.95	4048.22	24485057	10.0000
Sertraline	4.544	219889	26846.50	12146.03	1211555	10.0000
Sufentanil	4.322	111257	42027.42	216.71	30298553	10.0000
Tapentadol	3.457	4267413	1993.20	1380.71	9477431	10.0000
Temazepam	4.699	1803627	274.92	98.78	10528321	10.0000
Topiramate	3.877	41569	25951.93	27.38	203668	10.0000
Tramadol	3.438	6988161	∞	68.24	39584840	10.0000
Trazodone	4.369	3829446	7834.60	806.89	15921898	10.0000
Venlafaxine	3.806	4666607	611.70	172.37	1211555	10.0000
Zaleplon	4.360	1173290	1187.11	294.29	32339277	10.0000
Zolpidem	4.128	5905808	6363.88	1317.06	32339277	10.0000
Zopiclone	3.968	666772	566388.64	355569.03	3068965	10.0000

AM# 26: Screening of THC and Metabolites in Blood and Urine by LC-MS/MS

Extraction Date: 05-02-2022

Analyst: Tamara Salazar

Plate lot#: 220309

Plate Retest Date: 09/09/2022

Mobile phase A: 10mM Amm Form in LCMS Water

Mobile phase B: 0.1% Formic acid in MeOH

Column: Phenomenex Phenyl Hexyl (4.6x50mm, 2.6um)

Blank Blood Lot: 22B52016-2

LCMS-QQQ ID: 069901

Pre-Analytic:

- 1. Check levels of mobile phases and needle wash refill as needed. Ensure waste is not full.
- 2. Ensure correct column is installed and begin mobile phase flow allow to equilibrate ~ 30 minutes.

Analytic:

- 1. Remove standards, plate, controls, and samples from cold storage. Allow to reach room temperature.
- 2. **Urine hydrolysis: add 1.5mL urine to blank plate, add 250µl 1N KOH. Shake and incubate at 40 degrees for 15 minutes.** 05/10/22 TS
Using a calibrated pipette, add **1000µl blood and urine (if applicable) (calibrated pipette)** into the appropriate wells of analytical (standards) plate. **Pipette ID: 42**
- 3. Place on shaking incubator at ambient temp., 900rpm for 15 minutes.
- 4. Pipette **500µL 0.1% formic acid in water blood sample, 500 µL saturated phosphate buffer in urine** in wells of analytical plate.
- 5. Place on shaking incubator at ambient temp., 900rpm for 15 minutes.
- 6. Transfer **700-800µL of blood+acid or urine+acid** mixture to corresponding wells of SLE+ plate. Amount transferred: 750 uL
- 7. Apply positive pressure for approx. 10-15 seconds (or until no liquid remains on top of sorbent). **(Load at 85-100 PSI- Selector to the right)**
- 8. Wait 5 minutes.
- 9. Add **2.25mL MTBE. (Add in 3 increments of 750uL)**
- 10. Wait 5 minutes.
- 11. Apply positive pressure for approx. 15 seconds. **(10-15 PSI- Selector to the left).**
- 12. Add **2.25mL Hexane. (Add in 3 increments of 750uL)**
- 13. Wait 5 minutes.
- 14. Apply positive pressure for approx. 15 seconds. **(10-15 PSI- Selector to the left).**
- 15. Remove plate containing eluate. Place on SPE Dry and evaporate to dryness at approx. 35°C.
- 16. Reconstitute in **100µL 100% MeOH** and heat seal plate with foil. Place in autosampler and run worklist.

Post-Analytic

- 1. Create batch and process data.
- 2. Make any necessary integration changes, R² values ≥0.98 for each analyte
- 3. RT +/- 2% or 0.100 min, whichever is greater
- 4. Confirmation testing on case samples with a response for THC and OH-THC of 3ng/mL or greater and/or Carboxy-THC at 10ng/mL or greater (analyst discretion between 5-10ng/mL) may be pursued.
- 5. Did all QCs pass for each analyte? (if not, describe in comments section)
- 6. Central File Packet to include: LIMS Worklist, Method Checklist, Calibration and Control Reports

COMMENTS: Run stopped due to high pressure on case sample P2022-1082. The pressure was corrected, and the run continued without issue.

TS

	1	2	3	4	5	6
A	IS + Cal. 1	IS + QC_1	P2022-0960-1	P2022-1158-4	P2022-1226-1	IS + QC_1
B	IS + Cal. 2	Neg Blood	P2022-0964-1	P2022-1167-1	P2022-1227-1	IS + Cal. 7
C	IS + Cal. 3	M2022-1191-1	P2022-1011-1	P2022-1168-1	P2022-1228-2	IS + Cal. 6
D	IS + Cal. 4	M2022-1484-1	P2022-1016-1	P2022-1179-1	M2022-1661-2	IS + Cal. 5
E	IS + Cal. 5	M2022-1564-2	P2022-1033-1	P2022-1180-1	P2022-1225-1	IS + Cal. 4
F	IS + Cal. 6	M2022-1644-2	P2022-1082-1	P2022-1215-1	IS + Sample	IS + Cal. 3
G	IS + Cal. 7	M2022-1661-2**	P2022-1115-1	P2022-1218-1	IS + Sample	IS + Cal. 2
H	IS + QC_1	P2021-3388-1	P2022-1156-1	P2022-1225-1**	IS + QC_1	IS + Cal. 1

All wells to contain 100 µl of residual DMSO

**Sample moved on SLE plate, step 6 of the extraction, due to a clot

TS

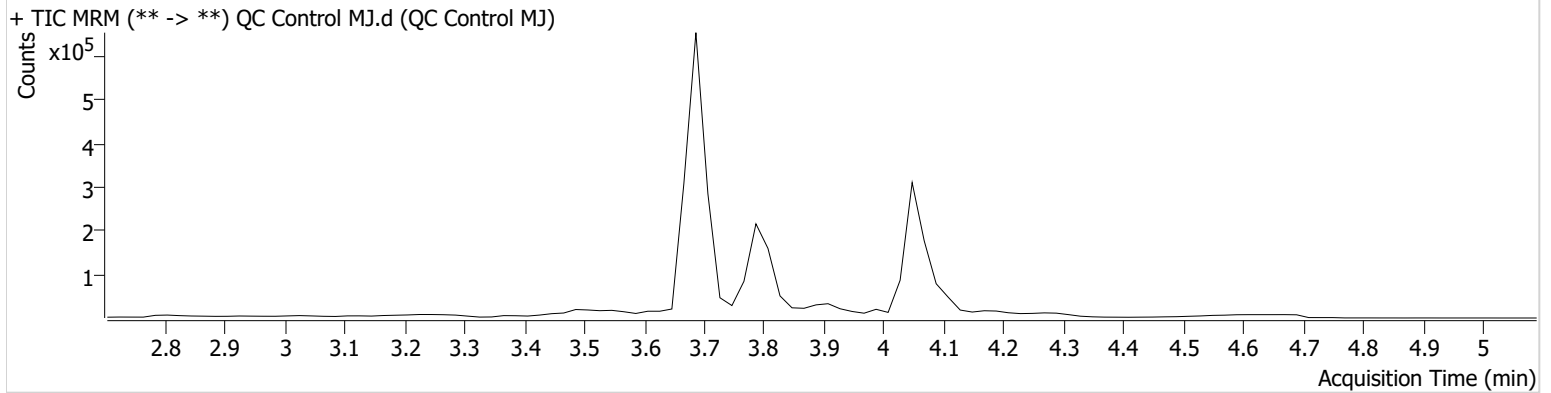


AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	QC Control MJ.d
Type	QC	Sample	QC Control MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-H1	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 2:38:01 PM		

Sample Chromatogram



Name	RT	Resp.	ISTD Resp.	Final Conc.
THC	4.102	2708	81102	4.5504 ng/ml
THC-COOH	3.810	62875	326008	16.2635 ng/ml
THC-OH	3.696	11759	1440535	4.7645 ng/ml

TS

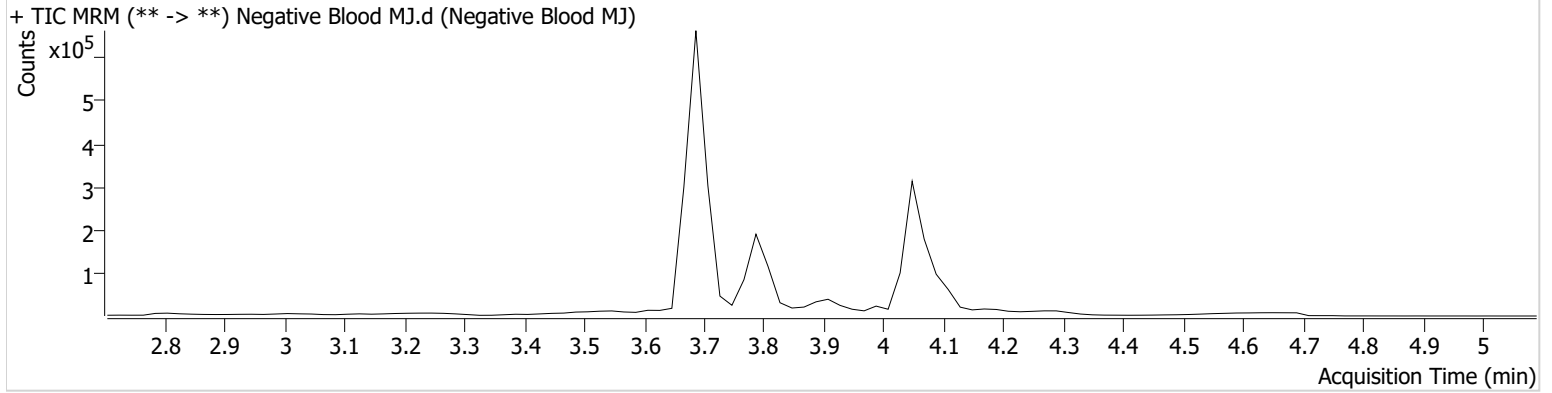


AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	Negative Blood MJ.d
Type	Sample	Sample	Negative Blood MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-B2	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 2:53:20 PM		
Sample Info.			

Sample Chromatogram

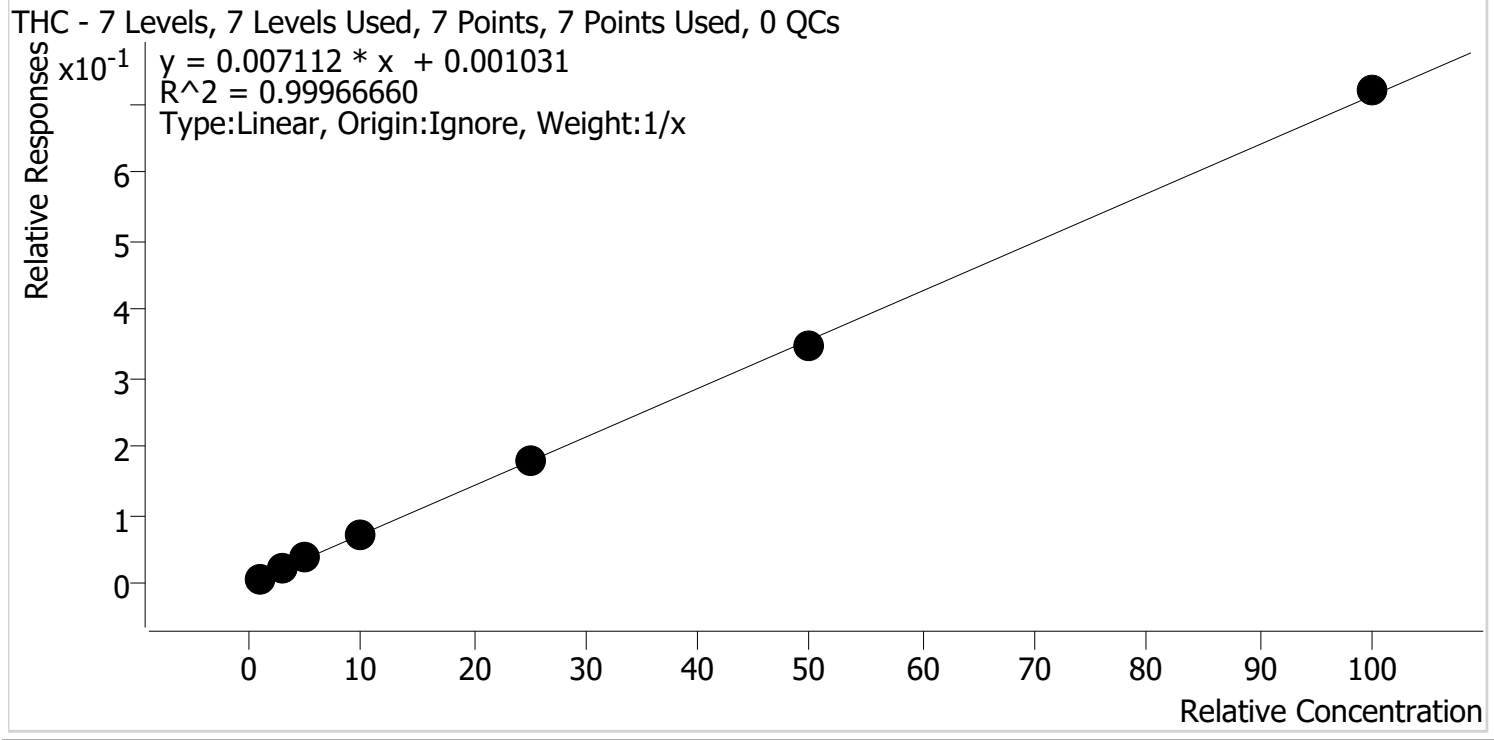


TS



AM #26 Cannabinoids Screen Calibration Curve Report

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Last Cal. Update 5/5/2022 12:58 PM
Analyst Name ISP\Datastor
Analyte THC **Internal Standard** THC-D3



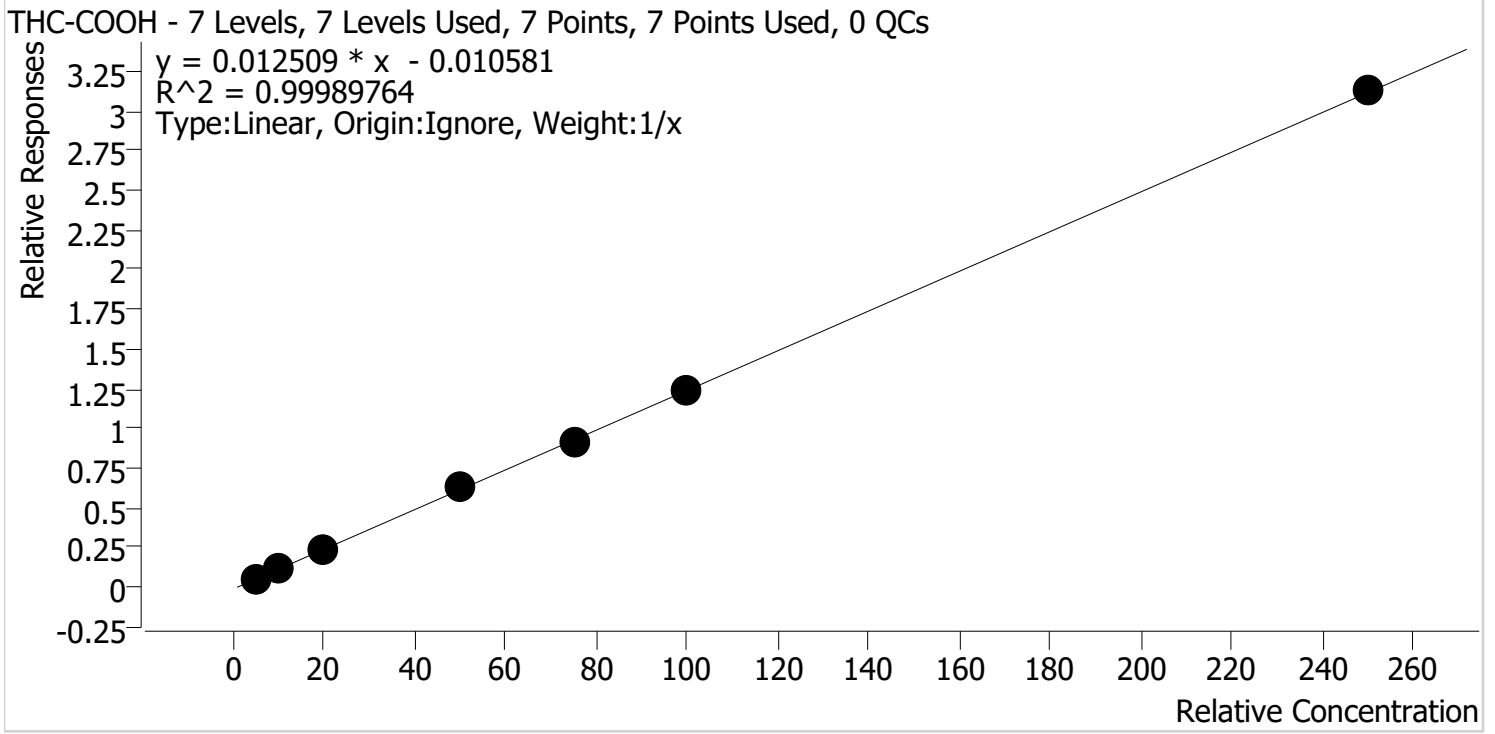
Sample	Level	Enabled	Expected Concentration	Final Concentration	Accuracy
Cal 1 MJ	1	✓	1.0	1.0	95.8
Cal 2 MJ	2	✓	3.0	3.0	101.7
Cal 3 MJ	3	✓	5.0	5.3	105.2
Cal 4 MJ	4	✓	10.0	9.9	98.8
Cal 5 MJ	5	✓	25.0	25.0	99.8
Cal 6 MJ	6	✓	50.0	48.8	97.7
Cal 7 MJ	7	✓	100.0	101.0	101.0

TS



AM #26 Cannabinoids Screen Calibration Curve Report

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Last Cal. Update 5/5/2022 12:58 PM
Analyst Name ISP\Datastor
Analyte THC-COOH **Internal Standard** THC-COOH-D9



Sample	Level	Enabled	Expected Concentration	Final Concentration	Accuracy
Cal 1 MJ	1	✓	5.0	5.2	103.4
Cal 2 MJ	2	✓	10.0	9.8	97.7
Cal 3 MJ	3	✓	20.0	19.7	98.7
Cal 4 MJ	4	✓	50.0	50.7	101.5
Cal 5 MJ	5	✓	75.0	74.3	99.1
Cal 6 MJ	6	✓	100.0	99.4	99.4
Cal 7 MJ	7	✓	250.0	250.9	100.4

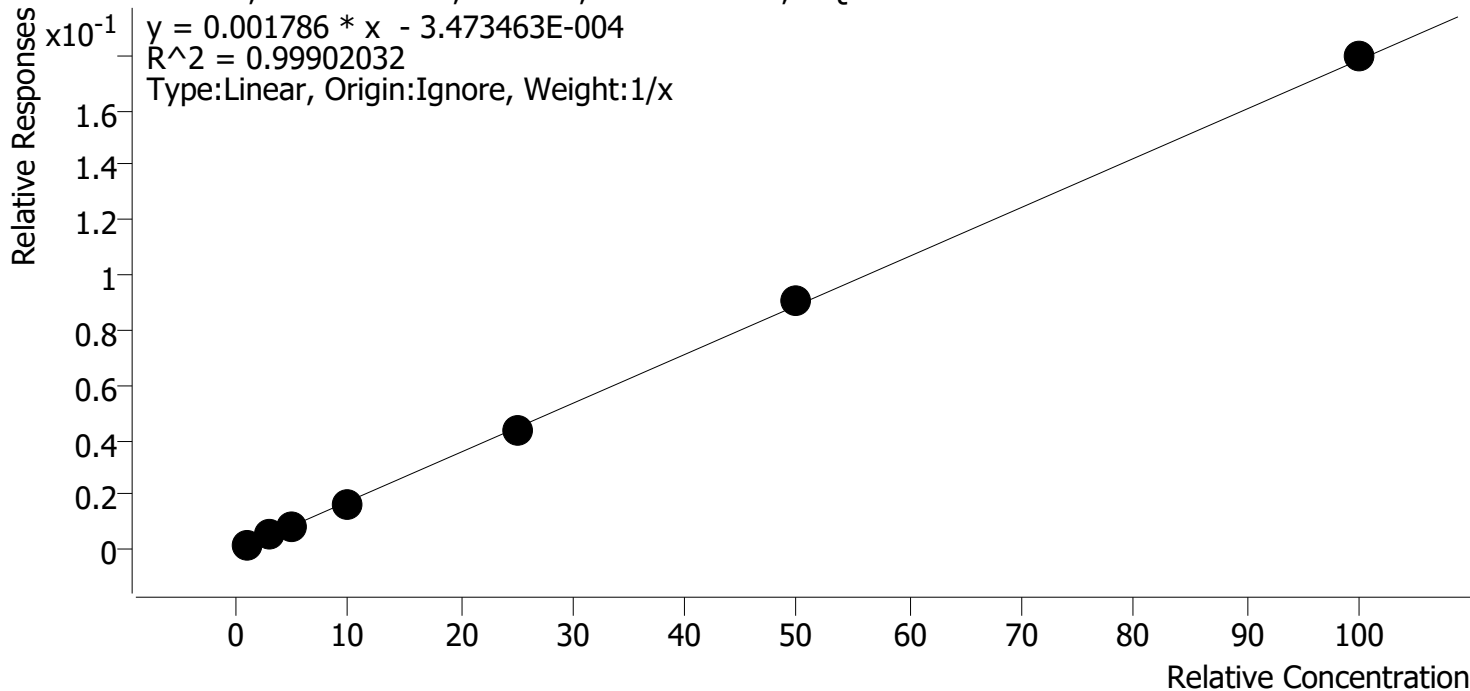
TS



AM #26 Cannabinoids Screen Calibration Curve Report

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Last Cal. Update 5/5/2022 12:58 PM
Analyst Name ISP\Datastor
Analyte THC-OH **Internal Standard** THC-OH-D3

THC-OH - 7 Levels, 7 Levels Used, 7 Points, 7 Points Used, 0 QCs



Sample	Level	Enabled	Expected Concentration	Final Concentration	Accuracy
Cal 1 MJ	1	✓	1.0	1.2	117.9
Cal 2 MJ	2	✓	3.0	2.9	98.3
Cal 3 MJ	3	✓	5.0	4.6	91.3
Cal 4 MJ	4	✓	10.0	9.2	91.8
Cal 5 MJ	5	✓	25.0	24.6	98.5
Cal 6 MJ	6	✓	50.0	50.8	101.6
Cal 7 MJ	7	✓	100.0	100.7	100.7

TS

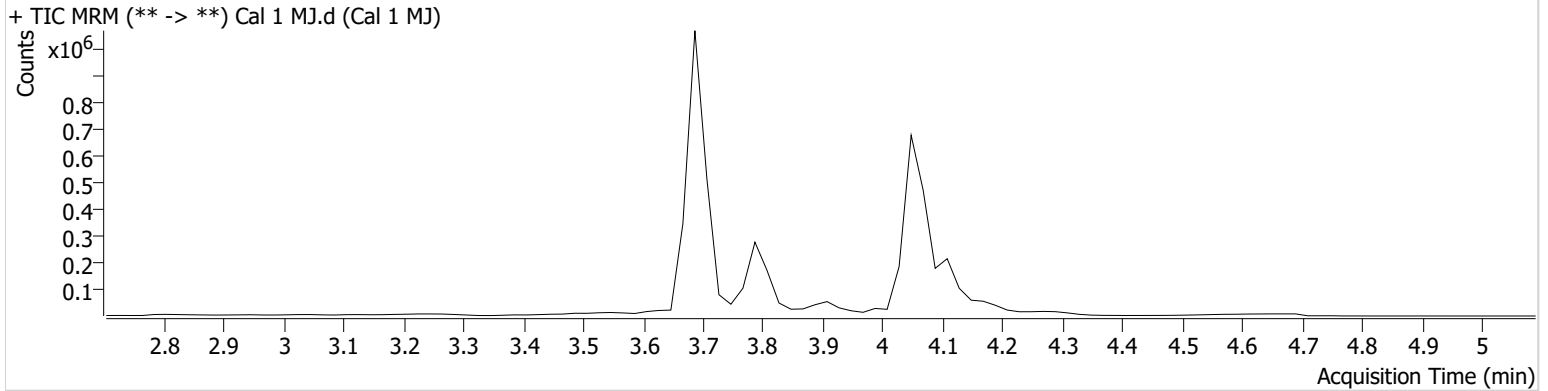


AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	Cal 1 MJ.d
Type	Cal	Sample	Cal 1 MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-A1	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 1:51:54 PM		

Sample Chromatogram



Name	RT	Resp.	ISTD Resp.	Final Conc.	
THC	4.122	3245	413830	0.9576 ng/ml	Low
THC-COOH	3.810	26378	487823	5.1685 ng/ml	
THC-OH	3.696	4293	2442358	1.1785 ng/ml	Low

TS

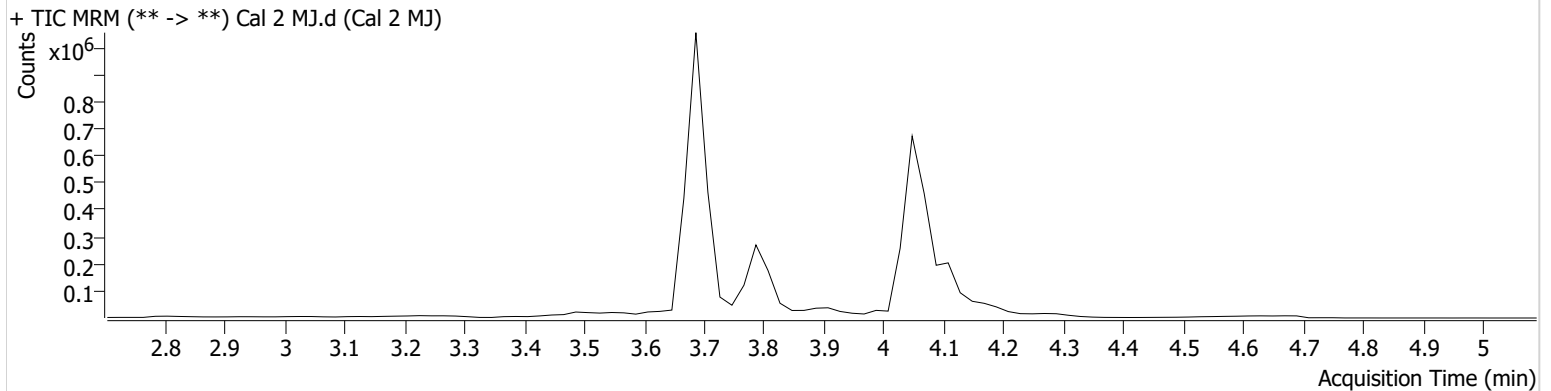


AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	Cal 2 MJ.d
Type	Cal	Sample	Cal 2 MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-B1	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 1:58:37 PM		

Sample Chromatogram



Name	RT	Resp.	ISTD Resp.	Final Conc.
THC	4.122	8934	393193	3.0497 ng/ml
THC-COOH	3.810	49284	441659	9.7662 ng/ml
THC-OH	3.696	11763	2391732	2.9479 ng/ml Low

TS

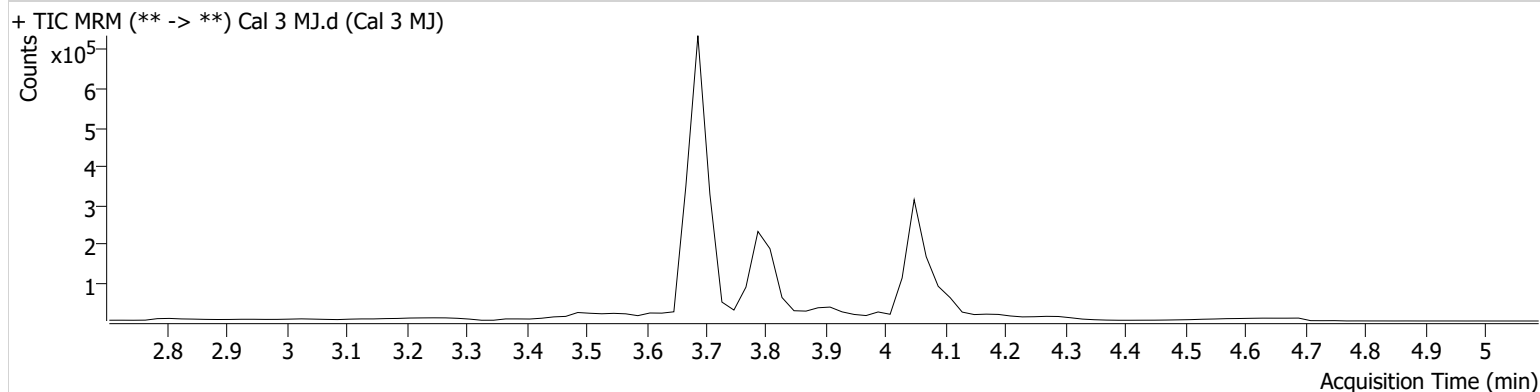


AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	Cal 3 MJ.d
Type	Cal	Sample	Cal 3 MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-C1	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 2:05:11 PM		

Sample Chromatogram



Name	RT	Resp.	ISTD Resp.	Final Conc.
THC	4.122	3804	98951	5.2597 ng/ml
THC-COOH	3.810	81753	345853	19.7423 ng/ml
THC-OH	3.696	13031	1669555	4.5641 ng/ml

TS

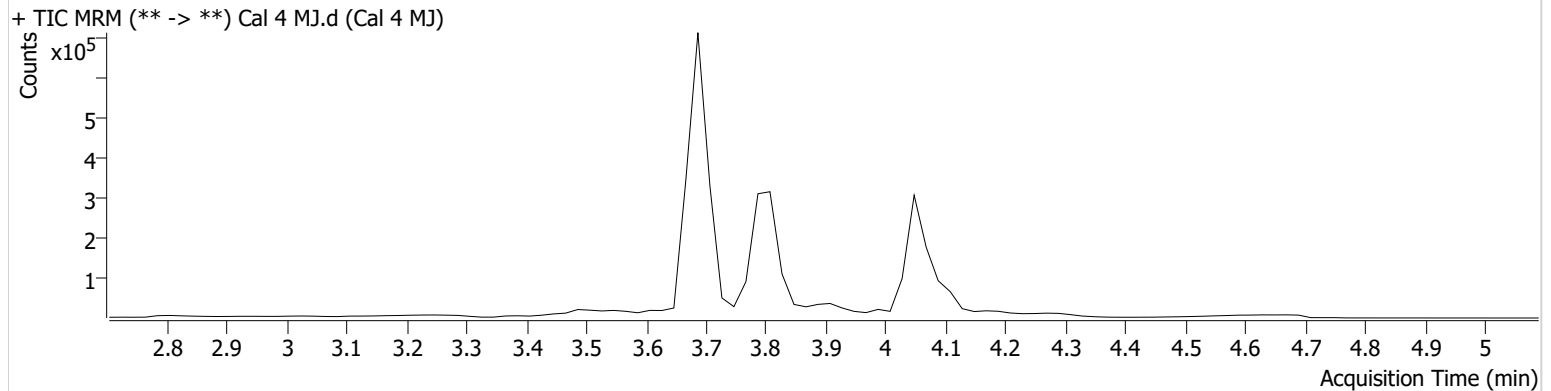


AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	Cal 4 MJ.d
Type	Cal	Sample	Cal 4 MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-D1	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 2:11:45 PM		

Sample Chromatogram



Name	RT	Resp.	ISTD Resp.	Final Conc.
THC	4.122	7341	102918	9.8833 ng/ml
THC-COOH	3.810	208587	334239	50.7339 ng/ml
THC-OH	3.696	24575	1531836	9.1761 ng/ml

TS



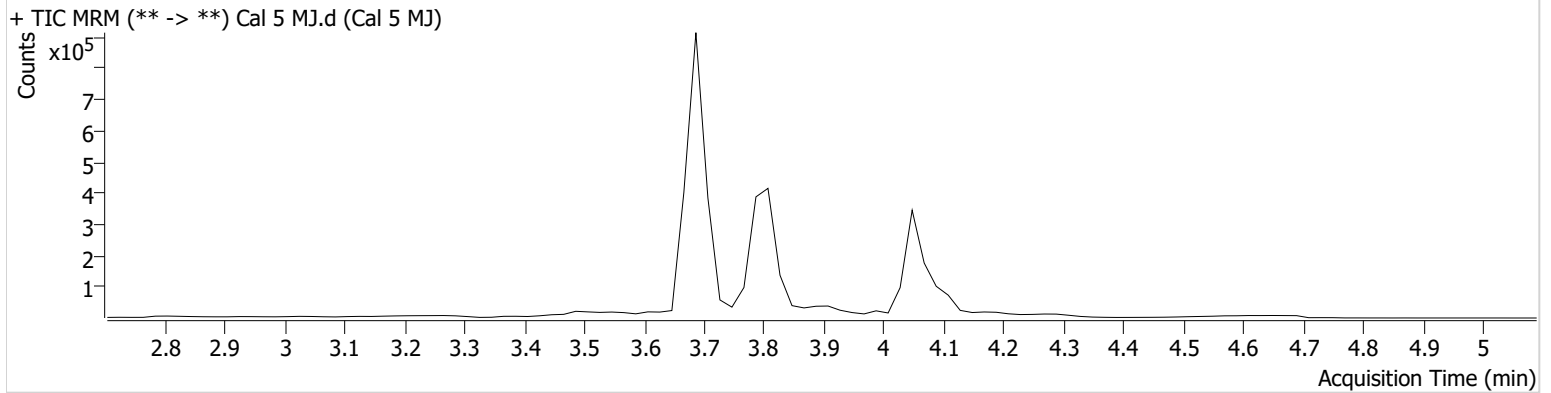
AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	Cal 5 MJ.d
Type	Cal	Sample	Cal 5 MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-E1	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 2:18:19 PM		

Sample Info.

Sample Chromatogram



Name	RT	Resp.	ISTD Resp.	Final Conc.
THC	4.122	19597	109775	24.9549 ng/ml
THC-COOH	3.810	305083	332050	74.2939 ng/ml
THC-OH	3.696	67659	1550029	24.6319 ng/ml

TS

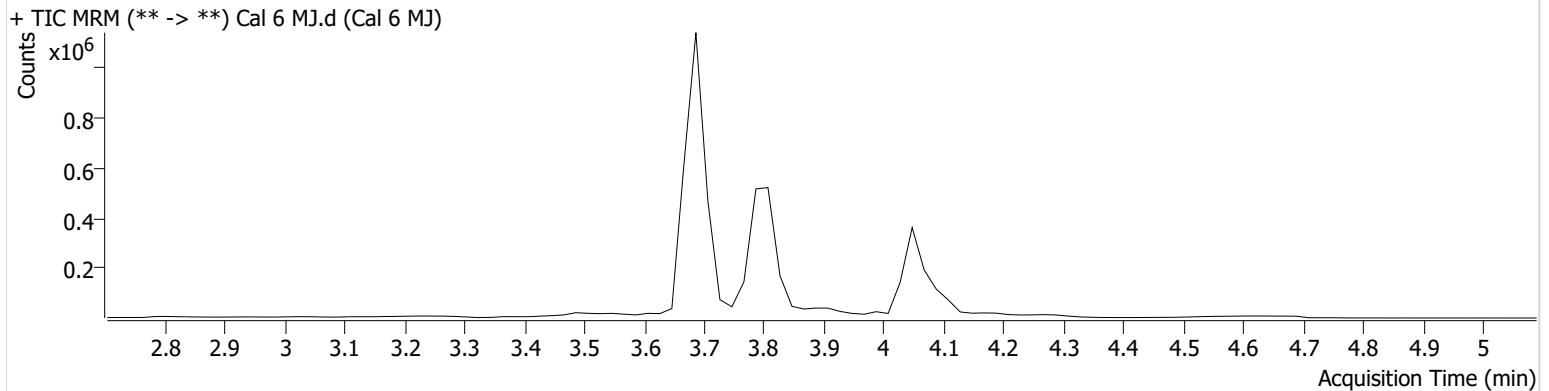


AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	Cal 6 MJ.d
Type	Cal	Sample	Cal 6 MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-F1	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 2:24:53 PM		

Sample Chromatogram



Name	RT	Resp.	ISTD Resp.	Final Conc.
THC	4.102	37559	107788	48.8473 ng/ml
THC-COOH	3.810	425020	344906	99.3547 ng/ml
THC-OH	3.696	140227	1550923	50.8129 ng/ml

TS

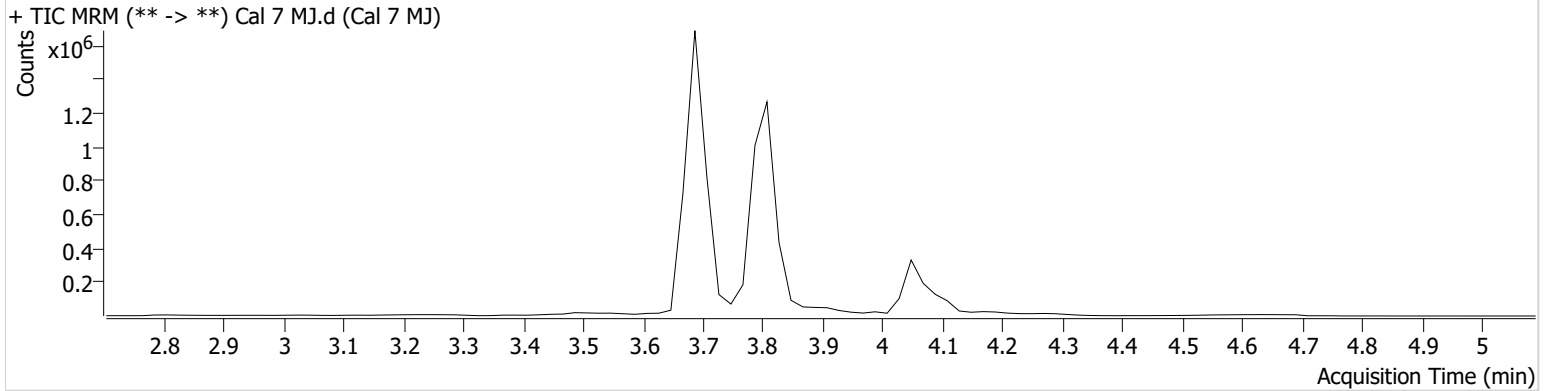


AM #26 Cannabinoids Screen Results

Batch results D:\MassHunter\Data\2022\AM 25-26\050222 AM 25 26 TS\QuantResults\AM 26.batch.bin
Calibration Last Update 5/5/2022 12:58:37 PM

Instrument	Falco (069901)	Data File	Cal 7 MJ.d
Type	Cal	Sample	Cal 7 MJ
Acq. Method	AM 26 THCS CDA.m	Operator	Tamara Salazar
Sample Position	P1-G1	Comment	
Injection Volume	10		
Acq. Date-Time	5/2/2022 2:31:27 PM		

Sample Chromatogram



Name	RT	Resp.	ISTD Resp.	Final Conc.
THC	4.102	71833	99807	101.0476 ng/ml
THC-COOH	3.810	1122472	358788	250.9405 ng/ml
THC-OH	3.696	285983	1593185	100.6886 ng/ml