

REVIEWED
By tsalazar at 3:40 pm, Jan 17, 2019

REVIEWED
By tsalazar at 10:14 am, Jan 24, 2019

1/14/2019

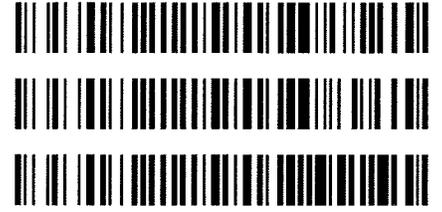
Worklist: 2883

<u>LAB CASE</u>	<u>ITEM</u>	<u>TASK ID</u>	<u>DESCRIPTION</u>	
C2018-2554	1	135033	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2560	1	135139	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2569	1	135197	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2570	1	135199	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2570	2	135201	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2577	1	135370	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2604	1	135779	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2605	1	135781	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2606	1	135783	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2607	1	135785	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2608	1	135787	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2609	1	135789	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2610	1	135791	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2611	1	135794	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2018-2612	2	135797	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2019-0004	1	135863	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2019-0007	1	135871	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2019-0015	1	135889	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2019-0016	1	135892	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2019-0044	1	136356	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2019-0054	1	136401	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2019-0064	2	136539	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	
C2019-0080	1	136642	AM 25/AM 26 Blood MultiDrug/THC Screen by Lf	



Worklist: 2883

<u>LAB CASE</u>	<u>ITEM</u>	<u>TASK ID</u>	<u>DESCRIPTION</u>
C2019-0087	1	136926	AM 25/AM 26 Blood MultiDrug/THC Screen by L
C2019-0097	1	136975	AM 25/AM 26 Blood MultiDrug/THC Screen by L
C2019-0101	1	137026	AM 25/AM 26 Blood MultiDrug/THC Screen by L



A handwritten signature or mark, possibly a stylized 'A' or similar character, is located in the bottom right corner of the page.

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

Extraction Date: 1/14/19
Plate lot#: 0543908

Analyst: Anne Nord
Plate Expiration: November 28 2019

Mobile phase A: 10mM Amm Form
0.5M Ammonium Hydroxide

Mobile phase B: 0.1% Formic Acid in MeOH
Ethyl Acetate LC Methanol

Blank Blood Lot: 18G207D7

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

LCMS-QQQ ID: 62340

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.
- 3. Create worklist: Data Path Name: D:\2019 data\am 25-26\011419 AM 25-26

Analytic:

- 1. Remove standards, plate, controls, and samples from cold storage. Allow to reach room temperature.
- 2. Pipette **250µL blood (calibrated pipette) Pipette ID: 1926134** in wells of analytical (standards) plate.
- 3. Place on shaking incubator at ambient temp., 900rpm for 15 minutes. *Shaker ID: 66759*
- 4. Pipette **250µL 00.5M ammonium hydroxide** in wells of analytical plate.
- 5. Place on shaking incubator at ambient temp., 900rpm for 15 minutes.
- 6. Transfer **300µL of blood+base** mixture to corresponding wells of SLE+ plate.
- 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) Manifold ID: 66792
- 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.
SPE Dry ID: 66819
- 16. Reconstitute in **100µL 100% 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.
Batch Name: mdsp1, mdsp2
- 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. ~~> 1/3 the response of administrative control.~~ ~~A~~ calculated concentration 5 or greater, or 2-5 for discretionary range. AMN
- 4. Did all QCs pass for each analyte? Y / N yes
- 5. Central File Packet to include: LIMS Worklist, Method Checklist, Calibration and Control Reports

COMMENTS:



Toxicology AM method 25 external prep information

working solution 10000 ng/ml in meoh Hydromorphone, Hydrocodone, Nortriptyline, Sertraline

Stock solution 1mg/ml 100 ul each in 9600ul meOH

Ppd 4/23/18 Exp: 4/23/19 lot 42318 by Amn

Drug	lot	expiration
Hydromorphone	FE04101502	6/1/2020
Hydrocodone	FE09091505	9/1/2020
nortriptyline	FN06191503	8/1/2020
sertraline	FN01081501	3/1/2020

AM 25 control 100 ul working solution (42318) in 9900 ul neg blood
ppd 04/23/18 exp 4/23/19 lot 42318

neg blood lot 17120718

by Amn

Concentration 100ng/ml hydrocodone, nortriptyline, sertraline, hydromorphone

Compound Method			p1 cal 1-2a			p1 cal 1-2a Results					Qualifier 1 M...			Qualifier 1 Results			ISTD Method		ISTD Results						
Name	Transition	Acq. Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.	Name	RT	Resp.								
6-MAM	328.2 -> 165...	1/14/2019 4:05 PM	5.360	1612	10.0000	5.24	328.2 -> 211...	20.85	1224	6-MAM-D6	5.319	39423	6-MAM	328.2 -> 165...	1/14/2019 4:05 PM	5.360	1612	10.0000	5.24	328.2 -> 211...	20.85	1224	6-MAM-D6	5.319	39423
7-Aminoclonazepam	286.1 -> 121...	1/14/2019 4:05 PM	5.591	18225	10.0000	74.05	286.1 -> 222...	97.44	10152	7-Aminoclonazepam-D4	5.590	66608	7-Aminoclonazepam	286.1 -> 121...	1/14/2019 4:05 PM	5.591	18225	10.0000	74.05	286.1 -> 222...	97.44	10152	7-Aminoclonazepam-D4	5.590	66608
Benzylecgonine	290.1 -> 168...	1/14/2019 4:05 PM	5.406	13155	10.0000	80.54	290.1 -> 105...	333.55	8668	Benzylecgonine-D8	5.405	59067	Benzylecgonine	290.1 -> 168...	1/14/2019 4:05 PM	5.406	13155	10.0000	80.54	290.1 -> 105...	333.55	8668	Benzylecgonine-D8	5.405	59067
Metoprolol	268.2 -> 116...	1/14/2019 4:05 PM	5.573	23842	10.0000	72.99	268.2 -> 56.3	35.63	20339	Noroxycodone-D3	5.078	98907	Metoprolol	268.2 -> 116...	1/14/2019 4:05 PM	5.573	23842	10.0000	72.99	268.2 -> 56.3	35.63	20339	Noroxycodone-D3	5.078	98907
a-hydroxyalprazolam	325.1 -> 297...	1/14/2019 4:05 PM	6.339	5880	10.0000	101.88	325.1 -> 215...	539.97	33318	a-hydroxyalprazolam-D5	6.317	29222	a-hydroxyalprazolam	325.1 -> 297...	1/14/2019 4:05 PM	6.339	5880	10.0000	101.88	325.1 -> 215...	539.97	33318	a-hydroxyalprazolam-D5	6.317	29222
Alprazolam	232.2 -> 91.0	1/14/2019 4:05 PM	5.885	114916	10.0000	111.07	232.2 -> 77.1	130.12	41159	alpha-PVP-d8	5.802	467647	Alprazolam	232.2 -> 91.0	1/14/2019 4:05 PM	5.885	114916	10.0000	111.07	232.2 -> 77.1	130.12	41159	alpha-PVP-d8	5.802	467647
Amphetamine	309.1 -> 281...	1/14/2019 4:05 PM	6.403	40051	10.0000	333.69	309.1 -> 205...	7109...	39742	Alprazolam-D5	6.402	160530	Amphetamine	309.1 -> 281...	1/14/2019 4:05 PM	6.403	40051	10.0000	333.69	309.1 -> 205...	7109...	39742	Alprazolam-D5	6.402	160530
Cocaine	136.1 -> 91.1	1/14/2019 4:05 PM	4.992	135349	10.0000	85.21	136.1 -> 119...	16.28	59177	Amphetamine-D11	4.951	124481	Cocaine	136.1 -> 91.1	1/14/2019 4:05 PM	4.992	135349	10.0000	85.21	136.1 -> 119...	16.28	59177	Amphetamine-D11	4.951	124481
Bupropion	304.2 -> 182...	1/14/2019 4:05 PM	5.813	130730	10.0000	152.38	304.2 -> 105...	70.61	29666	Cocaine-D3	5.792	512121	Bupropion	304.2 -> 182...	1/14/2019 4:05 PM	5.813	130730	10.0000	152.38	304.2 -> 105...	70.61	29666	Cocaine-D3	5.792	512121
Carisoprodol	240.1 -> 184...	1/14/2019 4:05 PM	6.108	101219	10.0000	444.03	240.1 -> 131...	40.04	44831	Carisoprodol-D7	6.084	331488	Carisoprodol	240.1 -> 184...	1/14/2019 4:05 PM	6.108	101219	10.0000	444.03	240.1 -> 131...	40.04	44831	Carisoprodol-D7	6.084	331488
Citalopram	261.2 -> 176...	1/14/2019 4:05 PM	6.086	46686	10.0000	73.72	261.2 -> 55.3	5325...	35170	Citalopram-D6	6.114	692058	Citalopram	261.2 -> 176...	1/14/2019 4:05 PM	6.086	46686	10.0000	73.72	261.2 -> 55.3	5325...	35170	Citalopram-D6	6.114	692058
Clonazepam	325.2 -> 109...	1/14/2019 4:05 PM	6.135	147858	10.0000	190.76	325.2 -> 262...	39.73	5211	Clonazepam-D4	6.279	23302	Clonazepam	325.2 -> 109...	1/14/2019 4:05 PM	6.135	147858	10.0000	190.76	325.2 -> 262...	39.73	5211	Clonazepam-D4	6.279	23302
Codeine	316.1 -> 269...	1/14/2019 4:05 PM	6.279	14327	10.0000	64.06	316.1 -> 213...	19.60	5090	Codeine-D6	5.281	34332	Codeine	316.1 -> 269...	1/14/2019 4:05 PM	6.279	14327	10.0000	64.06	316.1 -> 213...	19.60	5090	Codeine-D6	5.281	34332
Cyclobenzaprine	300.2 -> 215...	1/14/2019 4:05 PM	5.324	6809	10.0000	3199.39	300.2 -> 165...	27.24	26815	Cyclobenzaprine-D3	6.449	433793	Cyclobenzaprine	300.2 -> 215...	1/14/2019 4:05 PM	5.324	6809	10.0000	3199.39	300.2 -> 165...	27.24	26815	Cyclobenzaprine-D3	6.449	433793
Dextromethorphan	276.2 -> 214...	1/14/2019 4:05 PM	6.471	96911	10.0000	842.51	276.2 -> 231...	183.65	34544	Dextromethorphan-D3	6.145	198194	Dextromethorphan	276.2 -> 214...	1/14/2019 4:05 PM	6.471	96911	10.0000	842.51	276.2 -> 231...	183.65	34544	Dextromethorphan-D3	6.145	198194
Dextropropriphan	272.2 -> 171...	1/14/2019 4:05 PM	6.165	40306	10.0000	951.57	272.2 -> 147...	2395...	21393	Dextropropriphan-D3	5.554	176302	Dextropropriphan	272.2 -> 171...	1/14/2019 4:05 PM	6.165	40306	10.0000	951.57	272.2 -> 147...	2395...	21393	Dextropropriphan-D3	5.554	176302
Diazepam	258.2 -> 157...	1/14/2019 4:05 PM	5.575	35523	10.0000	99.77	258.2 -> 133...	248.47	25416	Diazepam-D5	6.630	152245	Diazepam	258.2 -> 157...	1/14/2019 4:05 PM	5.575	35523	10.0000	99.77	258.2 -> 133...	248.47	25416	Diazepam-D5	6.630	152245
Dihydrocodeine	285.1 -> 193...	1/14/2019 4:05 PM	6.651	34169	10.0000	70.23	285.1 -> 153...	30.25	12564	Dihydrocodeine-D6	5.036	94532	Dihydrocodeine	285.1 -> 193...	1/14/2019 4:05 PM	6.651	34169	10.0000	70.23	285.1 -> 153...	30.25	12564	Dihydrocodeine-D6	5.036	94532
Diphenhydramine	302.2 -> 198...	1/14/2019 4:05 PM	5.079	21215	10.0000	109.00	302.2 -> 128...	69.42	63542	Diphenhydramine-D3	6.107	11034.	Diphenhydramine	302.2 -> 198...	1/14/2019 4:05 PM	5.079	21215	10.0000	109.00	302.2 -> 128...	69.42	63542	Diphenhydramine-D3	6.107	11034.
Doxylamine	256.2 -> 167...	1/14/2019 4:05 PM	6.108	245619	10.0000	344.94	256.2 -> 152...	120.03	1365...	Doxylamine-D5	5.736	940016	Doxylamine	256.2 -> 167...	1/14/2019 4:05 PM	6.108	245619	10.0000	344.94	256.2 -> 152...	120.03	1365...	Doxylamine-D5	5.736	940016
EDDP	271.2 -> 182...	1/14/2019 4:05 PM	5.757	189800	10.0000	208.81	271.2 -> 167...	514.67	45665	EDDP-D3	6.041	797231	EDDP	271.2 -> 182...	1/14/2019 4:05 PM	5.757	189800	10.0000	208.81	271.2 -> 167...	514.67	45665	EDDP-D3	6.041	797231
Fentanyl	279.2 -> 235...	1/14/2019 4:05 PM	6.041	147698	10.0000	1167.39	279.2 -> 250...	134.12	19127	Fentanyl-D5	6.500	12992.	Fentanyl	279.2 -> 235...	1/14/2019 4:05 PM	6.041	147698	10.0000	1167.39	279.2 -> 250...	134.12	19127	Fentanyl-D5	6.500	12992.
Fluoxetine	337.2 -> 105...	1/14/2019 4:05 PM	6.520	25477	10.0000	38.95	337.2 -> 188...	43.13	7141	Fluoxetine-D6	6.279	10512.	Fluoxetine	337.2 -> 105...	1/14/2019 4:05 PM	6.520	25477	10.0000	38.95	337.2 -> 188...	43.13	7141	Fluoxetine-D6	6.279	10512.
Hydrocodone	310.1 -> 44.3	1/14/2019 4:05 PM	5.527	193059	10.0000	29375.12	310.1 -> 148...	∞	11984	Hydrocodone-D6	5.485	155891	Hydrocodone	310.1 -> 44.3	1/14/2019 4:05 PM	5.527	193059	10.0000	29375.12	310.1 -> 148...	∞	11984	Hydrocodone-D6	5.485	155891
Hydromorphone	300.2 -> 198...	1/14/2019 4:05 PM	5.527	23935	10.0000	25.13	300.2 -> 128...	∞	10814	Hydromorphone-D6	4.818	48455	Hydromorphone	300.2 -> 198...	1/14/2019 4:05 PM	5.527	23935	10.0000	25.13	300.2 -> 128...	∞	10814	Hydromorphone-D6	4.818	48455
Ketamine	286.2 -> 184...	1/14/2019 4:05 PM	4.881	15899	10.0000	10.70	286.2 -> 157...	21.45	32147	Ketamine-D4	6.067	323772	Ketamine	286.2 -> 184...	1/14/2019 4:05 PM	4.881	15899	10.0000	10.70	286.2 -> 157...	21.45	32147	Ketamine-D4	6.067	323772
Mirtazapine	238.1 -> 125...	1/14/2019 4:05 PM	6.088	77963	10.0000	122.86	238.1 -> 220...	168.36	1095...	Tramadol-13C-D3	5.573	838001	Mirtazapine	238.1 -> 125...	1/14/2019 4:05 PM	6.088	77963	10.0000	122.86	238.1 -> 220...	168.36	1095...	Tramadol-13C-D3	5.573	838001
Mirtazapine	266.2 -> 195...	1/14/2019 4:05 PM	6.453	177960	10.0000	218.86	266.2 -> 72.3	464.50	66421	Tramadol-13C-D3	5.573	838001	Mirtazapine	266.2 -> 195...	1/14/2019 4:05 PM	6.453	177960	10.0000	218.86	266.2 -> 72.3	464.50	66421	Tramadol-13C-D3	5.573	838001
Mirtazapine	399.2 -> 238...	1/14/2019 4:05 PM	6.517	28495	10.0000	6057.19	399.2 -> 174...	35.23	17820	Meproramate-D7	5.660	112095	Mirtazapine	399.2 -> 238...	1/14/2019 4:05 PM	6.517	28495	10.0000	6057.19	399.2 -> 174...	35.23	17820	Meproramate-D7	5.660	112095
Meproramate	219.1 -> 158...	1/14/2019 4:05 PM	5.661	19764	10.0000	40.51	219.1 -> 97.1	219.93	1458.	Methadone-D9	6.319	844972	Meproramate	219.1 -> 158...	1/14/2019 4:05 PM	5.661	19764	10.0000	40.51	219.1 -> 97.1	219.93	1458.	Methadone-D9	6.319	844972
Methadone	310.2 -> 265...	1/14/2019 4:05 PM	6.320	137636	10.0000	158.72	310.2 -> 105...	∞	31948	Methamphetamine-D11	5.112	265626	Methadone	310.2 -> 265...	1/14/2019 4:05 PM	6.320	137636	10.0000	158.72	310.2 -> 105...	∞	31948	Methamphetamine-D11	5.112	265626
Methamphetamine	150.1 -> 91.1	1/14/2019 4:05 PM	5.153	86962	10.0000	18.78	150.1 -> 119...	4.86	2436	Morphine-D6	4.557	3174	Methamphetamine	150.1 -> 91.1	1/14/2019 4:05 PM	5.153	86962	10.0000	18.78	150.1 -> 119...	4.86	2436	Morphine-D6	4.557	3174
Morphine	286.2 -> 201...	1/14/2019 4:05 PM	4.618	4332	10.0000	∞	286.2 -> 165...	18.75	4540	Norbuprenorphine-D3	5.988	28203	Morphine	286.2 -> 201...	1/14/2019 4:05 PM	4.618	4332	10.0000	∞	286.2 -> 165...	18.75	4540	Norbuprenorphine-D3	5.988	28203
Norbuprenorphine	286.2 -> 201...	1/14/2019 4:05 PM	4.618	4332	10.0000	∞	286.2 -> 165...	18.75	4540	Norbuprenorphine-D3	5.988	28203	Norbuprenorphine	286.2 -> 201...	1/14/2019 4:05 PM	4.618	4332	10.0000	∞	286.2 -> 165...	18.75	4540	Norbuprenorphine-D3	5.988	28203
Nordiazepam	414.3 -> 101...	1/14/2019 4:05 PM	5.989	5584	10.0000	22.66	414.3 -> 57.3	136.86	11316	Nordiazepam-D5	6.492	52807	Nordiazepam												

Compound Method			p1 cal 1-2a			p1 cal 1-2a Results						Qualifier 1 M...			Qualifier 1 Results			ISTD Method		ISTD Results	
Name	Transition	Acq. Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.	Name	RT	Resp.				
Oxycodone	316.2 -> 298...	1/14/2019 4:05 PM	5.300	40101	10.0000	262.58	316.2 -> 241...	16.94	11928	Oxycodone-D6	5.259	18714C									
Oxymorphone	302.1 -> 284...	1/14/2019 4:05 PM	4.614	35904	10.0000	22.27	302.1 -> 227...	127.16	10842	Oxymorphone-D3	4.572	159412									
Phentermine	150.1 -> 65.2	1/14/2019 4:05 PM	5.274	24698	10.0000	11.43	150.1 -> 133...	∞	389	Phentermine-D5	5.254	345202									
Promethazine	285.1 -> 86.2	1/14/2019 4:05 PM	6.631	354118	10.0000	1547.40	285.1 -> 71.3	41.95	75755	Promethazine-D3	6.610	18990.									
Quetiapine	384.2 -> 253...	1/14/2019 4:05 PM	6.660	241940	10.0000	1978.49	384.2 -> 221...	547.08	1331...	Quetiapine-D8	6.619	345126									
Sertraline	306.1 -> 158...	1/14/2019 4:05 PM	6.628	50106	10.0000	11200.82	306.1 -> 275...	5443...	50251	Sertraline-D3	6.607	252435									
Temazepam	301.1 -> 255...	1/14/2019 4:05 PM	6.467	58561	10.0000	515.78	301.1 -> 283...	26.92	20819	Temazepam-D5	6.466	273152									
Tramadol	264.2 -> 58.3	1/14/2019 4:05 PM	5.574	174838	10.0000	103.72	264.2 -> 43.3	8.75	9913	Tramadol-13C-D3	5.573	838001									
Trazodone	372.2 -> 176...	1/14/2019 4:05 PM	6.864	221250	10.0000	294.11	372.2 -> 148...	226.75	1580...	Trazodone-D6	6.843	10227..									
Venlafaxine	278.2 -> 58.3	1/14/2019 4:05 PM	5.878	175039	10.0000	133.77	278.2 -> 260...	52.42	32818	Venlafaxine-D6	5.857	758695									
Zolpidem	308.2 -> 235...	1/14/2019 4:05 PM	6.343	176148	10.0000	315.55	308.2 -> 263...	536.09	57801	Zolpidem-D6	6.341	910385									

Compound Method		p1 negative control				p1 negative control Results				Qualifier 1 M...				Qualifier 1 R...				ISTD Method		ISTD Results	
Name	Transition	Acq. Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.	Name	RT	Resp.				
6-MAM	328.2 -> 165...	1/14/2019 4:24 PM						328.2 -> 211...				6-MAM-D6	5.339	41925							
7-aminoclonazepam	286.1 -> 121...	1/14/2019 4:24 PM						286.1 -> 222...				7-Aminoclonazepam-D4	5.611	89511							
Benzoylcegonine	290.1 -> 168...	1/14/2019 4:24 PM						290.1 -> 105...				Benzoylcegonine-D8	5.405	54818							
Metoprolol	268.2 -> 116...	1/14/2019 4:24 PM						268.2 -> 56.3				Noroxycodone-D3	5.098	95545							
a-hydroxyalprazolam	325.1 -> 297...	1/14/2019 4:24 PM						325.1 -> 215...				a-hydroxyalprazolam-D5	6.317	31898							
alpha-PVP	232.2 -> 91.0	1/14/2019 4:24 PM						232.2 -> 77.1				alpha-PVP-d8	5.822	480730							
Alprazolam	309.1 -> 281...	1/14/2019 4:24 PM						309.1 -> 205...				Alprazolam-D5	6.402	163813							
Amphetamine	136.1 -> 91.1	1/14/2019 4:24 PM						136.1 -> 119...				Amphetamine-D11	4.971	132776							
Cocaine	304.2 -> 182...	1/14/2019 4:24 PM						304.2 -> 105...				Cocaine-D3	5.813	505581							
Bupropion	240.1 -> 184...	1/14/2019 4:24 PM						240.1 -> 131...				Bupropion-D9	6.067	433443							
Carisoprodol	261.2 -> 176...	1/14/2019 4:24 PM						261.2 -> 55.3				Carisoprodol-D7	6.084	338269							
Citalopram	325.2 -> 109...	1/14/2019 4:24 PM						325.2 -> 262...				Citalopram-D6	6.134	700673							
Clonazepam	316.1 -> 269...	1/14/2019 4:24 PM						316.1 -> 213...				Clonazepam-D4	6.279	24980							
Codeine	300.2 -> 215...	1/14/2019 4:24 PM						300.2 -> 165...				Codeine-D6	5.281	32758							
Cyclobenzaprine	276.2 -> 214...	1/14/2019 4:24 PM						276.2 -> 231...				Cyclobenzaprine-D3	6.449	403154							
Dextromethorphan	272.2 -> 171...	1/14/2019 4:24 PM						272.2 -> 147...				Dextromethorphan-D3	6.165	184251							
Dextrophan	258.2 -> 157...	1/14/2019 4:24 PM						258.2 -> 133...				Dextrophan-D3	5.575	164735							
Diazepam	285.1 -> 193...	1/14/2019 4:24 PM						285.1 -> 153...				Diazepam-D5	6.650	149897							
Dihydrocodeine	302.2 -> 198...	1/14/2019 4:24 PM						302.2 -> 128...				Dihydrocodeine-D6	5.036	98872							
Diphenhydramine	256.2 -> 167...	1/14/2019 4:24 PM						256.2 -> 152...				Diphenhydramine-D3	6.107	11647...							
Doxylamine	271.2 -> 182...	1/14/2019 4:24 PM						271.2 -> 167...				Doxylamine-D5	5.756	923813							
EDDP	279.2 -> 235...	1/14/2019 4:24 PM						279.2 -> 250...				EDDP-D3	6.061	825701							
Fentanyl	337.2 -> 105...	1/14/2019 4:24 PM						337.2 -> 188...				Fentanyl-D5	6.500	12562...							
Fluoxetine	310.1 -> 44.3	1/14/2019 4:24 PM						310.1 -> 148...				Fluoxetine-D6	6.299	948284							
Hydrocodone	300.2 -> 198...	1/14/2019 4:24 PM						300.2 -> 128...				Hydrocodone-D6	5.485	164564							
Hydromorphone	286.2 -> 184...	1/14/2019 4:24 PM						286.2 -> 157...				Hydromorphone-D6	4.839	53483							
Ketamine	238.1 -> 125...	1/14/2019 4:24 PM						238.1 -> 220...				Ketamine-D4	6.087	337108							
Mirtazapine	266.2 -> 195...	1/14/2019 4:24 PM						266.2 -> 72.3				Tramadol-13C-D3	5.594	817593							
Mirtazapine	399.2 -> 238...	1/14/2019 4:24 PM						399.2 -> 174...				Tramadol-13C-D3	5.594	817593							
Meproamate	219.1 -> 158...	1/14/2019 4:24 PM						219.1 -> 97.1				Mepramate-D7	5.681	125685							
Methadone	310.2 -> 265...	1/14/2019 4:24 PM						310.2 -> 105...				Methadone-D9	6.319	823881							
Methamphetamine	150.1 -> 91.1	1/14/2019 4:24 PM						150.1 -> 119...				Methamphetamine-D11	5.132	306891							
Morphine	286.2 -> 201...	1/14/2019 4:24 PM						286.2 -> 165...				Morphine-D6	4.577	4523							
Norbuprenorphine	414.3 -> 101...	1/14/2019 4:24 PM						414.3 -> 57.3				Norbuprenorphine-D3	6.009	31883							
Nordiazepam	271.1 -> 140...	1/14/2019 4:24 PM						271.1 -> 208...				Nordiazepam-D5	6.492	48875							
Nortentanyl	233.2 -> 84.2	1/14/2019 4:24 PM						233.2 -> 55.3				Nortentanyl-D5	5.455	586710							
Norhydrocodone	286.2 -> 199...	1/14/2019 4:24 PM						286.2 -> 171...				Norhydrocodone-D3	5.184	58944							
Noroxycodone	302.1 -> 284...	1/14/2019 4:24 PM						302.1 -> 186...				Noroxycodone-D3	5.098	95545							
O-desmethy/-tramadol	250.2 -> 58.3	1/14/2019 4:24 PM						250.2 -> 42.3				O-desmethy/-tramadol...	5.088	723361							
Oxazepam	287.1 -> 240...	1/14/2019 4:24 PM						287.1 -> 268...				Oxazepam-D5	6.324	44386							

Compound Method		p1 negative control				p1 negative control Results				Qualifier 1 M...			Qualifier 1 R...			ISTD Method		ISTD Results	
Name	Transition	Acq. Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.	Name	RT	Resp.		
Oxycodone	316.2 -> 298...	1/14/2019 4:24 PM						316.2 -> 241...				Oxycodone-D6	5.259	190783					
Oxymorphone	302.1 -> 284...	1/14/2019 4:24 PM						302.1 -> 227...				Oxymorphone-D3	4.592	173625					
Phentermine	150.1 -> 65.2	1/14/2019 4:24 PM						150.1 -> 133...				Phentermine-D5	5.274	381671					
Promethazine	285.1 -> 86.2	1/14/2019 4:24 PM						285.1 -> 71.3				Promethazine-D3	6.610	16838...					
Quetiapine	384.2 -> 253...	1/14/2019 4:24 PM						384.2 -> 221...				Quetiapine-D8	6.639	356338					
Setraline	306.1 -> 158...	1/14/2019 4:24 PM						306.1 -> 275...				Setraline-D3	6.627	231587					
Temazepam	301.1 -> 255...	1/14/2019 4:24 PM						301.1 -> 283...				Temazepam-D5	6.466	289943					
Tramadol	264.2 -> 58.3	1/14/2019 4:24 PM						264.2 -> 43.3				Tramadol-13C-D3	5.594	817593					
Trazodone	372.2 -> 176...	1/14/2019 4:24 PM						372.2 -> 148...				Trazodone-D6	6.843	803008					
Venlafaxine	278.2 -> 58.3	1/14/2019 4:24 PM						278.2 -> 260...				Venlafaxine-D6	5.878	784812					
Zolpidem	308.2 -> 235...	1/14/2019 4:24 PM						308.2 -> 263...				Zolpidem-D6	6.341	936513					

Compound Method		p1 external control			p1 external control Results			Qualifier 1 M...			Qualifier 1 Results			ISTD Method		ISTD Results	
Name	Transition	Acq. Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.			
6-MAM	328.2 -> 165...	1/14/2019 4:44 PM						328.2 -> 211...				6-MAM-D6	5.339	34982			
7-aminoclonazepam	286.1 -> 121...	1/14/2019 4:44 PM						286.1 -> 222...				7-Aminoclonazepam-D4	5.590	99531			
Benzoylcegonine	290.1 -> 168...	1/14/2019 4:44 PM						290.1 -> 105...				Benzoylcegonine-D8	5.405	48772			
Metoprolol	268.2 -> 116...	1/14/2019 4:44 PM						268.2 -> 56.3				Noroxycodone-D3	5.078	94244			
a-hydroxyalprazolam	325.1 -> 297...	1/14/2019 4:44 PM						325.1 -> 215...				a-hydroxyalprazolam-D5	6.317	36942			
alpha-PVP	232.2 -> 91.0	1/14/2019 4:44 PM						232.2 -> 77.1				alpha-PVP-d8	5.802	463689			
Alprazolam	309.1 -> 281...	1/14/2019 4:44 PM						309.1 -> 205...				Alprazolam-D5	6.402	170942			
Amphetamine	136.1 -> 91.1	1/14/2019 4:44 PM						136.1 -> 119...				Amphetamine-D11	4.951	140209			
Cocaine	304.2 -> 182...	1/14/2019 4:44 PM						304.2 -> 105...				Cocaine-D3	5.792	459477			
Bupropion	240.1 -> 184...	1/14/2019 4:44 PM						240.1 -> 131...				Bupropion-D9	6.067	394875			
Carisoprodol	261.2 -> 176...	1/14/2019 4:44 PM						261.2 -> 55.3				Carisoprodol-D7	6.084	320500			
Citalopram	325.2 -> 109...	1/14/2019 4:44 PM						325.2 -> 262...				Citalopram-D6	6.114	680743			
Clonazepam	316.1 -> 269...	1/14/2019 4:44 PM						316.1 -> 213...				Clonazepam-D4	6.279	21432			
Codeine	300.2 -> 215...	1/14/2019 4:44 PM						300.2 -> 165...				Codeine-D6	5.261	30841			
Cyclobenzaprine	276.2 -> 214...	1/14/2019 4:44 PM						276.2 -> 231...				Cyclobenzaprine-D3	6.449	409285			
Dextromethorphan	272.2 -> 171...	1/14/2019 4:44 PM						272.2 -> 147...				Dextromethorphan-D3	6.165	179989			
Dextrophan	258.2 -> 157...	1/14/2019 4:44 PM						258.2 -> 133...				Dextrophan-D3	5.575	152423			
Diazepam	285.1 -> 193...	1/14/2019 4:44 PM						285.1 -> 153...				Diazepam-D5	6.630	143091			
Dihydrocodeine	302.2 -> 198...	1/14/2019 4:44 PM						302.2 -> 128...				Dihydrocodeine-D6	5.036	91819			
Diphenhydramine	256.2 -> 167...	1/14/2019 4:44 PM						256.2 -> 152...				Diphenhydramine-D3	6.107	11154...			
Doxylamine	271.2 -> 182...	1/14/2019 4:44 PM						271.2 -> 167...				Doxylamine-D5	5.736	849370			
EDDP	279.2 -> 235...	1/14/2019 4:44 PM						279.2 -> 250...				EDDP-D3	6.041	764643			
Fentanyl	337.2 -> 105...	1/14/2019 4:44 PM						337.2 -> 188...				Fentanyl-D5	6.500	11982...			
Fluoxetine	310.1 -> 44.3	1/14/2019 4:44 PM						310.1 -> 148...				Fluoxetine-D6	6.279	991869			
Hydrocodone	300.2 -> 198...	1/14/2019 4:44 PM	5.527	229949	97.3574			300.2 -> 128...			1084...	Hydrocodone-D6	5.485	153832			
Hydromorphone	286.2 -> 184...	1/14/2019 4:44 PM	4.881	126727	86.1603			286.2 -> 157...			94506	Hydromorphone-D6	4.818	44825			
Ketamine	238.1 -> 125...	1/14/2019 4:44 PM						238.1 -> 220...				Ketamine-D4	6.067	327930			
Mirtazapine	266.2 -> 195...	1/14/2019 4:44 PM						266.2 -> 72.3				Tramadol-13C-D3	5.573	803514			
Mirtazapine	399.2 -> 238...	1/14/2019 4:44 PM						399.2 -> 174...				Tramadol-13C-D3	5.573	803514			
Meprobamate	219.1 -> 158...	1/14/2019 4:44 PM						219.1 -> 97.1				Meprobamate-D7	5.660	109636			
Methadone	310.2 -> 265...	1/14/2019 4:44 PM						310.2 -> 105...				Methadone-D9	6.319	783820			
Methamphetamine	150.1 -> 91.1	1/14/2019 4:44 PM						150.1 -> 119...				Methamphetamine-D11	5.112	327013			
Morphine	286.2 -> 201...	1/14/2019 4:44 PM						286.2 -> 165...				Morphine-D6	4.597	3907			
Norbuprenorphine	414.3 -> 101...	1/14/2019 4:44 PM						414.3 -> 57.3				Norbuprenorphine-D3	5.988	28405			
Nordiazepam	271.1 -> 140...	1/14/2019 4:44 PM						271.1 -> 208...				Nordiazepam-D5	6.492	48777			
Norfentanyl	233.2 -> 84.2	1/14/2019 4:44 PM						233.2 -> 55.3				Norfentanyl-D5	5.434	527672			
Norhydrocodone	286.2 -> 199...	1/14/2019 4:44 PM						286.2 -> 171...				Norhydrocodone-D3	5.163	54122			
Noroxycodone	302.1 -> 284...	1/14/2019 4:44 PM						302.1 -> 186...				Noroxycodone-D3	5.078	94244			
O-desmethyl-tramadol	250.2 -> 58.3	1/14/2019 4:44 PM						250.2 -> 42.3				O-desmethyl-tramadol-...	5.068	678501			
Oxazepam	287.1 -> 240...	1/14/2019 4:44 PM						287.1 -> 268...				Oxazepam-D5	6.324	48980			

Compound Method		p1 external control		p1 external control Results					Qualifier 1 M...		Qualifier 1 Results			ISTD Method		ISTD Results	
Name	Transition	Acq. Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.			
Oxycodone	316.2 -> 298...	1/14/2019 4:44 PM						316.2 -> 241...				Oxycodone-D6	5.238	168251			
Oxymorphone	302.1 -> 284...	1/14/2019 4:44 PM						302.1 -> 227...				Oxymorphone-D3	4.572	146683			
Phentermine	150.1 -> 65.2	1/14/2019 4:44 PM						150.1 -> 133...				Phentermine-D5	5.274	394460			
Promethazine	285.1 -> 86.2	1/14/2019 4:44 PM						285.1 -> 71.3				Promethazine-D3	6.610	17739...			
Quetiapine	384.2 -> 253...	1/14/2019 4:44 PM						384.2 -> 221...				Quetiapine-D8	6.619	345247			
Serrtraline	306.1 -> 158...	1/14/2019 4:44 PM	6.628	521371	113.1826	54795...		306.1 -> 275...		50510...	4703..	Serrtraline-D3	6.607	232080			
Temazepam	301.1 -> 255...	1/14/2019 4:44 PM						301.1 -> 283...				Temazepam-D5	6.466	270844			
Tramadol	264.2 -> 58.3	1/14/2019 4:44 PM						264.2 -> 43.3				Tramadol-13C-D3	5.573	803514			
Trazodone	372.2 -> 176...	1/14/2019 4:44 PM						372.2 -> 148...				Trazodone-D6	6.843	702436			
Venlafaxine	278.2 -> 58.3	1/14/2019 4:44 PM						278.2 -> 260...				Venlafaxine-D6	5.878	721530			
Zolpidem	308.2 -> 235...	1/14/2019 4:44 PM						308.2 -> 263...				Zolpidem-D6	6.341	882991			

Compound Method		p2 cal 1-2b		p2 cal 1-2b Results				Qualifier 1 M...		Qualifier 1 Results		ISTD Method		ISTD Results	
Name	Transition	Acq. Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.	
Acetylfentanyl	323.2 -> 188...	1/14/2019 4:14...	6.327	16079	10.0000	630.88	323.2 -> 105...	21.97	21211	Acetylfentanyl-D5	6.306	12298...			
alpha-hydroxymidazol...	342.1 -> 324...	1/14/2019 4:14...	6.406	36453	10.0000	167.23	342.1 -> 203...	8569.37	23741	alpha-hydroxymidazolam-	6.385	266665			
Amitriptyline	278.2 -> 91.2	1/14/2019 4:14...	6.577	142285	10.0000	∞	278.2 -> 105...	∞	74687	Amitriptyline-D3	6.556	387022			
Acetylornfantanyl	219.1 -> 84.2	1/14/2019 4:14...	5.019	9484	10.0000	42.65	219.1 -> 56.3	23.45	2129	Acetylornfantanyl-D5	4.996	429195			
Carbamazepine	237.1 -> 193...	1/14/2019 4:14...	6.116	22833	10.0000	875.18	237.1 -> 194...	714.80	1952...	Carbamazepine-13C6	6.115	10577...			
Chlordiazepoxide	300.1 -> 227...	1/14/2019 4:14...	6.533	24386	10.0000	6431.33	300.1 -> 282...	44.51	19128	Chlordiazepoxide-D5	6.533	266460			
Sufentanil	387.2 -> 238...	1/14/2019 4:14...	6.908	20210	10.0000	93.67	387.2 -> 111...	64.29	17983	Sufentanil-D5	6.907	10620...			
Desipramine	267.2 -> 72.3	1/14/2019 4:14...	6.397	196058	10.0000	170.75	267.2 -> 44.3	∞	1024...	Desipramine-D3	6.397	10053...			
Doxepin	280.2 -> 107...	1/14/2019 4:14...	6.313	97808	10.0000	44.80	280.2 -> 77.2	∞	36160	Doxepin-D3	6.312	545968			
Estazolam	295.1 -> 267...	1/14/2019 4:14...	6.331	39675	10.0000	258.75	295.1 -> 205...	169.82	36767	Estazolam-D5	6.330	207143			
Flunitrazepam	314.1 -> 268...	1/14/2019 4:14...	6.389	28939	10.0000	102.06	314.1 -> 239...	64.91	11136	Flunitrazepam-D7	6.389	6628			
Flurazepam	388.2 -> 315...	1/14/2019 4:14...	6.504	156159	10.0000	188.77	388.2 -> 317...	162.69	35944	Zopiclone-D4	6.362	197231			
Imipramine	281.2 -> 86.2	1/14/2019 4:14...	6.516	308717	10.0000	∞	281.2 -> 58.3	∞	1674...	Imipramine-D3	6.495	823036			
Levamisole	205.1 -> 91.2	1/14/2019 4:14...	5.447	44454	10.0000	114.72	205.1 -> 178...	20.67	41530	Sufentanil-D5	6.907	10620...			
Maprotiline	278.2 -> 91.2	1/14/2019 4:14...	6.396	38540	10.0000	∞	278.2 -> 117...	45728...	26712	Amitriptyline-D3	6.556	387022			
MDA	180.1 -> 163...	1/14/2019 4:14...	5.166	55750	10.0000	∞	180.1 -> 105...	16.22	35229	MDA-D5	5.166	272150			
MDEA	208.1 -> 163...	1/14/2019 4:14...	5.426	97408	10.0000	∞	208.1 -> 105...	∞	71811	MDEA-D6	5.406	425602			
MDMA	194.1 -> 163...	1/14/2019 4:14...	5.286	101352	10.0000	39.65	194.1 -> 105...	∞	66913	MDMA-D6	5.265	58965			
Meperidine	248.2 -> 220...	1/14/2019 4:14...	5.850	55218	10.0000	∞	248.2 -> 174...	200.33	34472	Meperidine-D4	5.850	246888			
Methylphenidate	234.2 -> 84.2	1/14/2019 4:14...	5.709	247798	10.0000	∞	234.2 -> 56.3	322.49	58103	Meperidine-D4	5.850	246888			
Midazolam	326.1 -> 223...	1/14/2019 4:14...	6.549	19245	10.0000	24.02	326.1 -> 249...	120.17	18852	Midazolam-D4	6.549	305788			
Normeperidine	234.1 -> 42.3	1/14/2019 4:14...	5.709	67045	10.0000	∞	234.1 -> 160...	∞	50516	Normeperidine-D4	5.708	215836			
7-Aminoflunitrazepam	284.1 -> 135...	1/14/2019 4:14...	5.762	24591	10.0000	180.62	284.1 -> 93.2	32.61	7300	7-aminoflunitrazepam-D7	5.742	105554			
Nortriptyline	264.2 -> 91.2	1/14/2019 4:14...	6.418	69376	10.0000	∞	264.2 -> 233...	313.83	54653	Nortriptyline-D3	6.418	265639			
Phenazepam	349.0 -> 206...	1/14/2019 4:14...	6.445	24692	10.0000	2148.40	349.0 -> 183...	134.48	16596	Phenazepam-D4	6.445	82273			
Phencyclidine	244.2 -> 86.2	1/14/2019 4:14...	5.972	160597	10.0000	∞	244.2 -> 91.1	∞	1242...	Phencyclidine-D5	5.951	796404			
Phenylethylamine	253.1 -> 104...	1/14/2019 4:14...	6.032	2229	10.0000	923.39	253.1 -> 182...	4.04	765	Phenylethylamine-D10	6.011	11392			
Pseudoephedrine	166.1 -> 148...	1/14/2019 4:14...	4.764	947852	10.0000	∞	166.1 -> 133...	180.14	1809...	Pseudoephedrine-D3	4.763	50592...			
Tapentadol	222.2 -> 107...	1/14/2019 4:14...	5.568	136441	10.0000	∞	222.2 -> 121...	∞	53151	Tapentadol-D3	5.568	651314			
Zaleplon	306.1 -> 236...	1/14/2019 4:14...	6.186	49259	10.0000	320.16	306.1 -> 264...	348.41	34708	Zaleplon-D4	6.186	199294			
Zopiclone	389.1 -> 244...	1/14/2019 4:14...	6.362	42884	10.0000	66.22	389.1 -> 216...	∞	25482	Zopiclone-D4	6.362	197231			

Compound Method		p2 negative control		p2 negative control Results					Qualifier 1 M...			Qualifier 1 R...			ISTD Method		ISTD Results	
Name	Transition	Acq. Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.				
Acetylferantyl	323.2 -> 188...	1/14/2019 4:34 PM						323.2 -> 105...				Acetylferantyl-D5	6.306	12838...				
alpha-hydroxymidazol...	342.1 -> 324...	1/14/2019 4:34 PM						342.1 -> 203...				alpha-hydroxymidazolam...	6.385	3135295				
Amtripyline	278.2 -> 91.2	1/14/2019 4:34 PM						278.2 -> 105...				Amtripyline-D3	6.556	362985				
Acetylroferantyl	219.1 -> 84.2	1/14/2019 4:34 PM						219.1 -> 56.3				Acetylroferantyl-D5	5.017	424444				
Carbamazepine	237.1 -> 193...	1/14/2019 4:34 PM						237.1 -> 194...				Carbamazepine-13C6	6.115	10850...				
Chlordiazepoxide	300.1 -> 227...	1/14/2019 4:34 PM						300.1 -> 282...				Chlordiazepoxide-D5	6.533	290500				
Sufentanil	387.2 -> 238...	1/14/2019 4:34 PM						387.2 -> 111...				Sufentanil-D5	6.907	911304				
Desipramine	267.2 -> 72.3	1/14/2019 4:34 PM						267.2 -> 44.3				Desipramine-D3	6.397	972422				
Doxepin	280.2 -> 107...	1/14/2019 4:34 PM						280.2 -> 77.2				Doxepin-D3	6.312	524534				
Estazolam	295.1 -> 267...	1/14/2019 4:34 PM						295.1 -> 205...				Estazolam-D5	6.330	212730				
Flunitrazepam	314.1 -> 268...	1/14/2019 4:34 PM						314.1 -> 239...				Flunitrazepam-D7	6.368	8239				
Flurazepam	388.2 -> 315...	1/14/2019 4:34 PM						388.2 -> 317...				Zopiclone-D4	6.362	142840				
Imipramine	281.2 -> 86.2	1/14/2019 4:34 PM						281.2 -> 58.3				Imipramine-D3	6.495	787978				
Levamisole	205.1 -> 91.2	1/14/2019 4:34 PM						205.1 -> 178...				Sufentanil-D5	6.907	911304				
Maprotiline	278.2 -> 91.2	1/14/2019 4:34 PM						278.2 -> 117...				Amtripyline-D3	6.556	362985				
MDA	180.1 -> 163...	1/14/2019 4:34 PM						180.1 -> 105...				MDA-D5	5.166	290571				
MDEA	208.1 -> 163...	1/14/2019 4:34 PM						208.1 -> 105...				MDEA-D6	5.426	447331				
MDMA	194.1 -> 163...	1/14/2019 4:34 PM						194.1 -> 105...				MDMA-D6	5.265	62528				
Meperidine	248.2 -> 220...	1/14/2019 4:34 PM						248.2 -> 174...				Meperidine-D4	5.850	262716				
Methylphenidate	234.2 -> 84.2	1/14/2019 4:34 PM						234.2 -> 56.3				Meperidine-D4	5.850	262716				
Midazolam	326.1 -> 223...	1/14/2019 4:34 PM						326.1 -> 249...				Midazolam-D4	6.549	316588				
Normeperidine	234.1 -> 42.3	1/14/2019 4:34 PM						234.1 -> 160...				Normeperidine-D4	5.708	226281				
7-Aminoflunitrazepam	284.1 -> 135...	1/14/2019 4:34 PM						284.1 -> 93.2				7-aminoflunitrazepam-D7	5.742	136769				
Nortriptyline	264.2 -> 91.2	1/14/2019 4:34 PM						264.2 -> 233...				Nortriptyline-D3	6.418	260803				
Phenazepam	349.0 -> 206...	1/14/2019 4:34 PM						349.0 -> 183...				Phenazepam-D4	6.425	94298				
Phencyclidine	244.2 -> 86.2	1/14/2019 4:34 PM						244.2 -> 91.1				Phencyclidine-D5	5.972	778491				
Phenylethylamine	253.1 -> 104...	1/14/2019 4:34 PM						253.1 -> 182...				Phenylethylamine-D10	6.011	13822				
Pseudoephedrine	166.1 -> 148...	1/14/2019 4:34 PM						166.1 -> 133...				Pseudoephedrine-D3	4.763	53122...				
Tapentadol	222.2 -> 107...	1/14/2019 4:34 PM						222.2 -> 121...				Tapentadol-D3	5.568	660427				
Zaleplon	306.1 -> 236...	1/14/2019 4:34 PM						306.1 -> 264...				Zaleplon-D4	6.186	207273				
Zopiclone	389.1 -> 244...	1/14/2019 4:34 PM						389.1 -> 216...				Zopiclone-D4	6.362	142840				

Compound Method		p2 external control			p2 external control Results			Qualifier 1 M...			Qualifier 1 Results			ISTD Method		ISTD Results	
Name	Transition	Acq Date-Time	RT	Resp.	Calc. Conc.	S/N	MI	Transition	MI	S/N	Area	Name	RT	Resp.			
Acetylferantyl	323.2 -> 188...	1/14/2019 4:53...						323.2 -> 105...				Acetylferantyl-D5	6.306	12091...			
alpha-hydroxymidazol...	342.1 -> 324...	1/14/2019 4:53...						342.1 -> 203...				alpha-hydroxymidazolam...	6.385	324915			
Amiripylone	278.2 -> 91.2	1/14/2019 4:53...						278.2 -> 105...				Amiripylone-D3	6.556	362975			
Acetylferantyl	219.1 -> 84.2	1/14/2019 4:53...						219.1 -> 56.3				Acetylferantyl-D5	5.017	406985			
Carbamazepine	237.1 -> 193...	1/14/2019 4:53...						237.1 -> 194...				Carbamazepine-13C6	6.095	10036...			
Chlordiazepoxide	300.1 -> 227...	1/14/2019 4:53...						300.1 -> 282...				Chlordiazepoxide-D5	6.533	271370			
Sufentanil	387.2 -> 238...	1/14/2019 4:53...						387.2 -> 111...				Sufentanil-D5	6.887	778830			
Desipramine	267.2 -> 72.3	1/14/2019 4:53...						267.2 -> 44.3				Desipramine-D3	6.376	10215...			
Doxepin	280.2 -> 107...	1/14/2019 4:53...						280.2 -> 77.2				Doxepin-D3	6.292	525933			
Estazolam	295.1 -> 267...	1/14/2019 4:53...						295.1 -> 205...				Estazolam-D5	6.330	243757			
Flunitrazepam	314.1 -> 268...	1/14/2019 4:53...						314.1 -> 239...				Flunitrazepam-D7	6.368	8801			
Flurazepam	388.2 -> 315...	1/14/2019 4:53...						388.2 -> 317...				Zopiclone-D4	6.362	153883			
Imipramine	281.2 -> 86.2	1/14/2019 4:53...						281.2 -> 58.3				Imipramine-D3	6.495	779305			
Levamisole	205.1 -> 91.2	1/14/2019 4:53...						205.1 -> 178...				Sufentanil-D5	6.887	778830			
Maprotiline	278.2 -> 91.2	1/14/2019 4:53...						278.2 -> 117...				Amiripylone-D3	6.556	362975			
MDA	180.1 -> 163...	1/14/2019 4:53...						180.1 -> 105...				MDA-D5	5.166	296707			
MDEA	208.1 -> 163...	1/14/2019 4:53...						208.1 -> 105...				MDEA-D6	5.406	425950			
MDMA	194.1 -> 163...	1/14/2019 4:53...						194.1 -> 105...				MDMA-D6	5.265	58654			
Meperidine	248.2 -> 220...	1/14/2019 4:53...						248.2 -> 174...				Meperidine-D4	5.829	246958			
Methylphenidate	234.2 -> 84.2	1/14/2019 4:53...						234.2 -> 56.3				Meperidine-D4	5.829	246958			
Midazolam	326.1 -> 223...	1/14/2019 4:53...						326.1 -> 249...				Midazolam-D4	6.549	280411			
Normeperidine	234.1 -> 42.3	1/14/2019 4:53...						234.1 -> 160...				Normeperidine-D4	5.708	191258			
7-Amino-flunitrazepam	284.1 -> 135...	1/14/2019 4:53...						284.1 -> 93.2				7-Amino-flunitrazepam-D7	5.742	145543			
Nortriptyline	264.2 -> 91.2	1/14/2019 4:53...	6.418	596935				264.2 -> 233...		2055...	5447...	Nortriptyline-D3	6.418	257172			
Phenazepam	349.0 -> 206...	1/14/2019 4:53...						349.0 -> 183...				Phenazepam-D4	6.425	87488			
Phencyclidine	244.2 -> 86.2	1/14/2019 4:53...						244.2 -> 91.1				Phencyclidine-D5	5.951	717921			
Phenylethylamine	253.1 -> 104...	1/14/2019 4:53...						253.1 -> 182...				Phenylethylamine-D10	6.011	13753			
Pseudoephedrine	166.1 -> 148...	1/14/2019 4:53...						166.1 -> 133...				Pseudoephedrine-D3	4.763	49461...			
Tapentadol	222.2 -> 107...	1/14/2019 4:53...						222.2 -> 121...				Tapentadol-D3	5.568	616170			
Zaleplon	306.1 -> 236...	1/14/2019 4:53...						306.1 -> 264...				Zaleplon-D4	6.186	192557			
Zopiclone	389.1 -> 244...	1/14/2019 4:53...						389.1 -> 216...				Zopiclone-D4	6.362	153883			

AM# 26: THC and Metabolites Screen in Blood by LC-MS/MS

Extraction Date: 1/14/19

Analyst: Anne Nord

Plate lot#: 0539904

Plate Expiration: 09/10/2019

Mobile phase A: 10mM Ammonium Formate
0.1% Formic Acid in Water

Mobile phase B: 0.1% Formic acid in MeOH
MTBE Hexane

Blank Blood Lot: 18G207D7

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

LCMS-QQQ ID: 62340

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.
- 3. Create worklist: D:\2019 data\am 25-26\011419 AM 25-26

Analytic:

- 1. Remove standards, plate, controls, and samples from cold storage. Allow to reach room temperature.
- 2. Pipette **1000 µL blood (calibrated pipette) Pipette ID: k52558g** in wells of analytical (standards) plate.
 - Blank blood for locations containing standards/QCs and internal standards
 - Sample blood for locations containing only internal standards
- 3. Place on shaking incubator at ambient temp., 900rpm for 15 minutes. *Shaker ID: 66759*
- 4. Pipette **500 µL 0.1% formic acid** in wells of analytical plate.
- 5. Place on shaking incubator at ambient temp., 900rpm for 15 minutes.
- 6. Transfer **800 µL of blood+base** mixture to corresponding wells of SLE+ plate.
- 7. Apply positive pressure for approx. 4 seconds (or until no liquid remains on top of sorbent).
(Load at 85-100 PSI- Selector to the right) Manifold ID: 66792
- 8. Wait 5 minutes.
- 9. Add **2.25 mL 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 **2.25 mL 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.
SPE Dry ID: 66819
- 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.
Batch Name: cann screen
- 2. Calculated sample concentration of 3 ng/mL or greater for THC and THC-OH, a calculated sample concentration of 10 ng/mL or greater for Carboxy-THC.
- 3. Retention time within +/- 2% or +/- .100 min whichever is greater of the average retention time of the calibrators.
- 4. Did all QCs pass for each analyte? Y / N
- 5. Central File Packet to include: LIMS Worklist, Method Checklist, Calibration and Control Reports

COMMENTS:



ISP FORENSICS - Cd'A

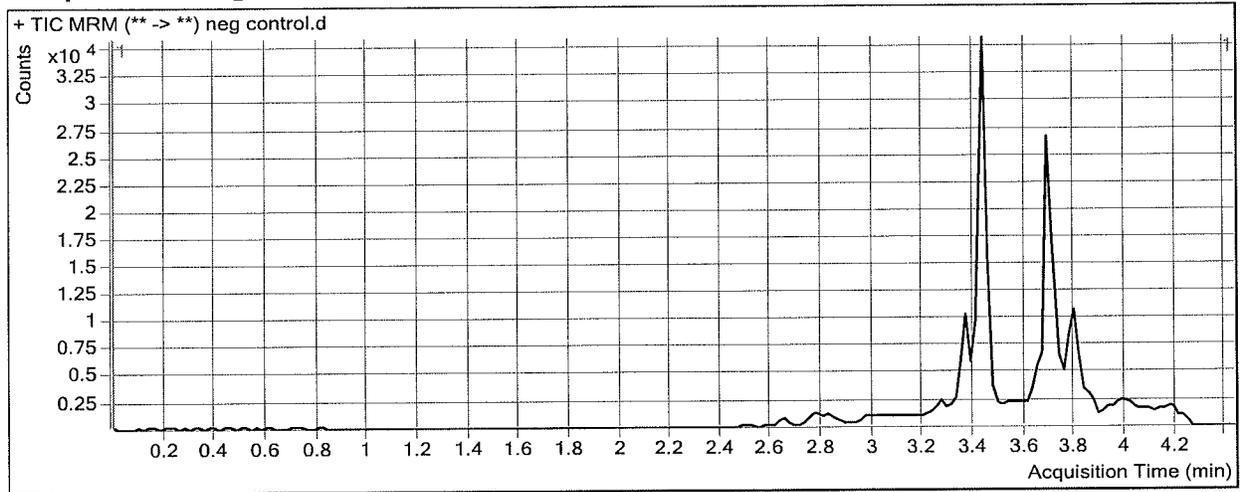
Cannabinoid Screen Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin
Analysis Time 1/15/2019 11:01 AM **Analyst Name** ISP Tox
Report Time 1/15/2019 11:02 AM **Reporter Name** ISP Tox
Last Calib Update 1/15/2019 11:01 AM **Batch State** Processed

Analysis Info

Acq Time 2019-01-15 09:57 **Data File** neg control.d
Sample Type Sample **Sample Name** neg control
Dilution 1 **Acq Method** Screen THC 8-2017.m
Position P1-A2 **Sample Info**
Inj Vol -1 **Comment** AM 26 Cannabinoid screen

Sample Chromatogram



ISP FORENSICS - Cd'A

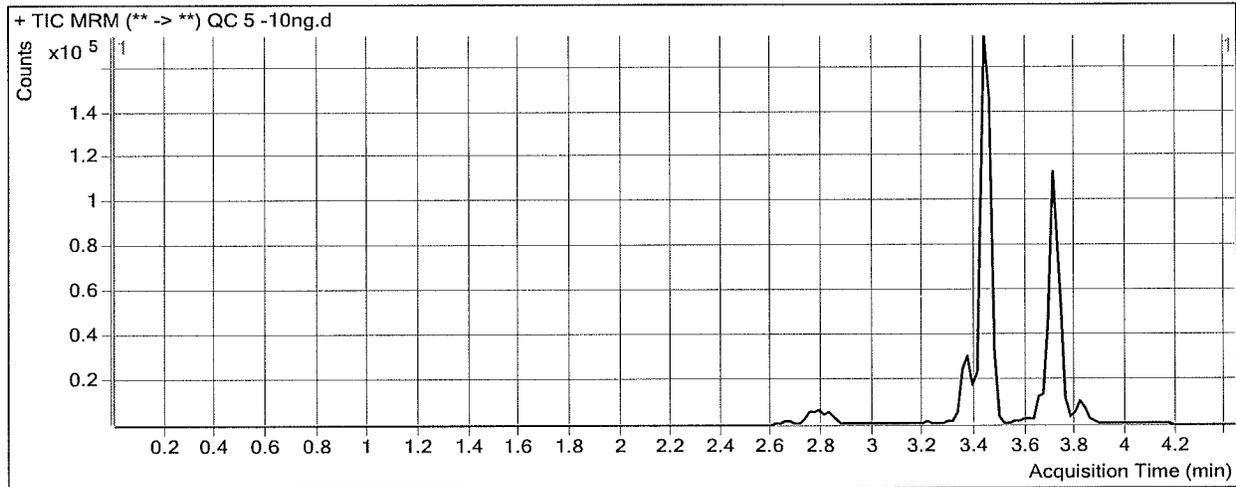
Cannabinoid Screen Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin
Analysis Time 1/15/2019 11:01 AM **Analyst Name** ISP Tox
Report Time 1/15/2019 11:02 AM **Reporter Name** ISP Tox
Last Calib Update 1/15/2019 11:01 AM **Batch State** Processed

Analysis Info

Acq Time 2019-01-15 02:41 **Data File** QC 5 -10ng.d
Sample Type QC **Sample Name** QC 5 -10ng
Dilution 1 **Acq Method** Screen THC 8-2017.m
Position P1-H1 **Sample Info**
Inj Vol -1 **Comment** AM 26 Cannabinoid screen 5 ng THC, THC-OH, 10 ng C-THC

Sample Chromatogram



Results

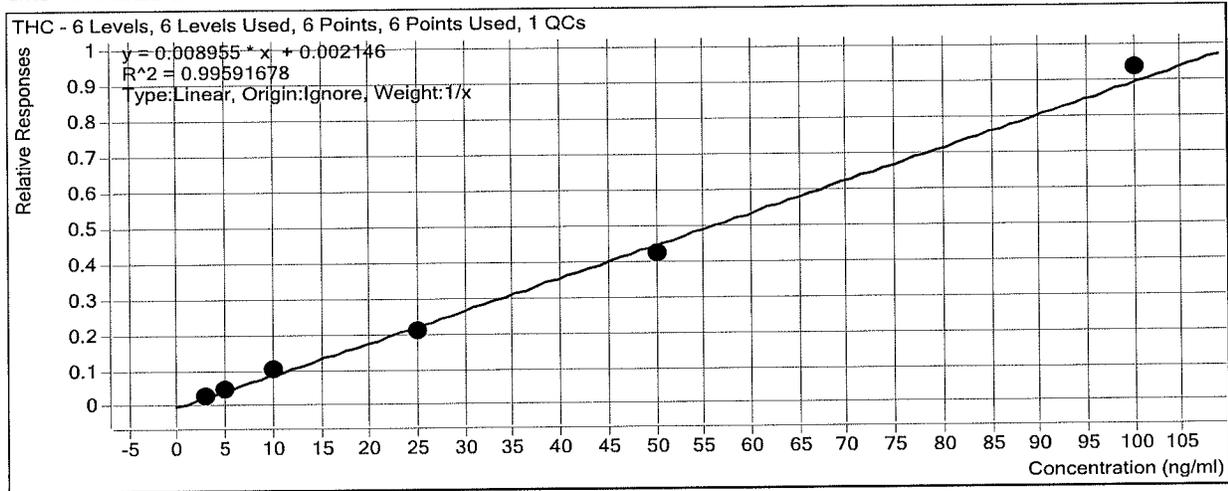
Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
THC-COOH	3.366	16477	81363	0.2025	11.2741
THC-OH	3.453	15802	424609	0.0372	5.0461
THC	3.820	296	8749	0.0339	3.5431

ISP Forensics Calibration Curve Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin

Last Calib Update 1/15/2019 11:01 AM **Analyst Name** ISP TOX

Target Compound *THC*
Internal Standard *THC-d3*



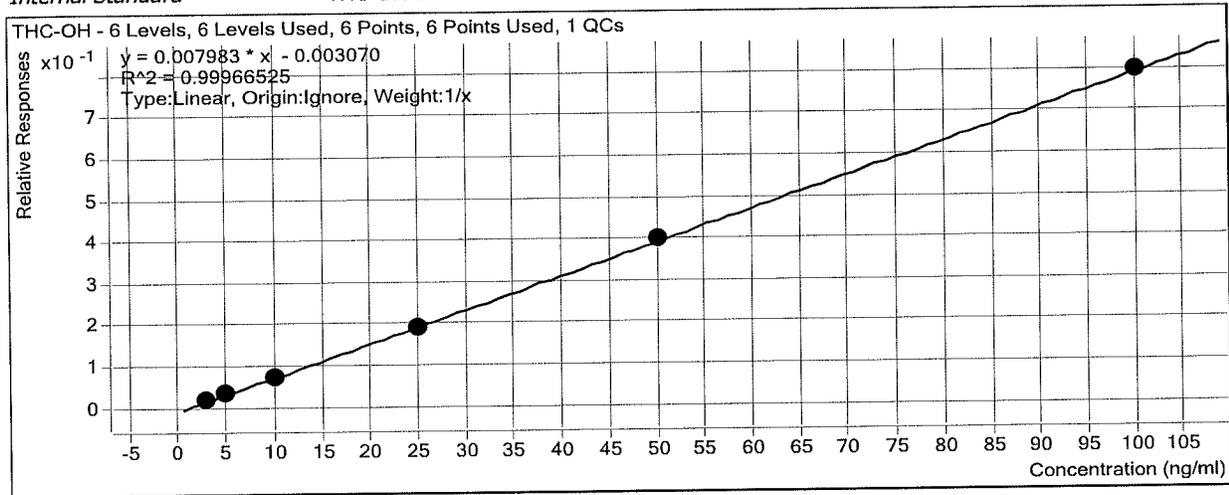
Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
cal 1 - 3ng	1	<input checked="" type="checkbox"/>	3	3.2	106.3
cal 2 - 5ng	2	<input checked="" type="checkbox"/>	5	4.7	93.4
cal 3 - 10ng	3	<input checked="" type="checkbox"/>	10	11.0	109.5
cal 4 - 25ng	4	<input checked="" type="checkbox"/>	25	23.2	92.8
cal 5 - 50ng	5	<input checked="" type="checkbox"/>	50	47.1	94.1
cal 6 - 100ng	6	<input checked="" type="checkbox"/>	100	103.9	103.9
QC 5 - 10ng	7	<input checked="" type="checkbox"/>	5	3.5	70.9

ISP Forensics Calibration Curve Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin

Last Calib Update 1/15/2019 11:01 AM **Analyst Name** ISP TOX

Target Compound *THC-OH*
Internal Standard *THC-OH-d3*



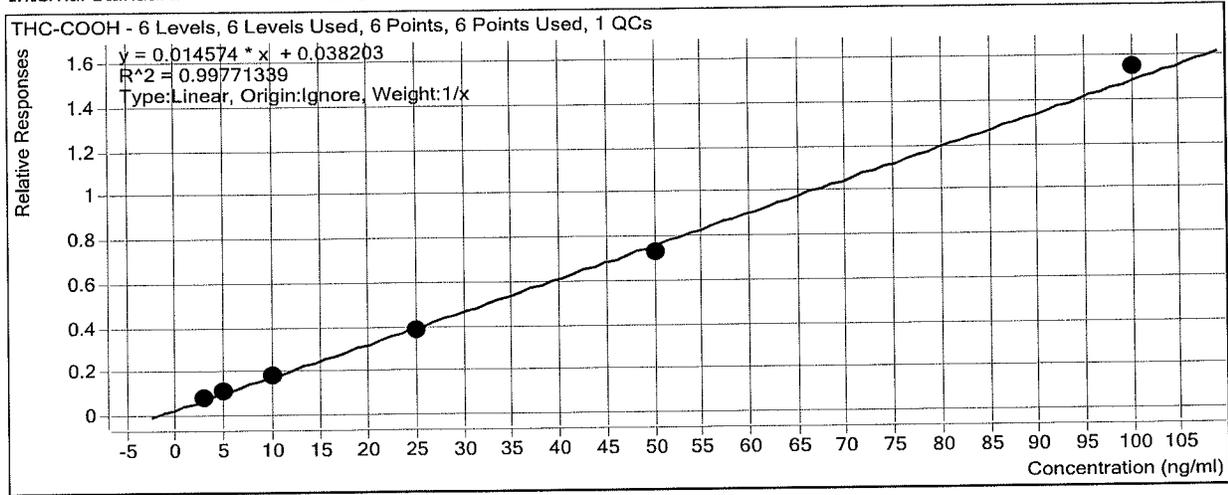
Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
cal 1 - 3ng	1	<input checked="" type="checkbox"/>	3	3.2	106.6
cal 2 - 5ng	2	<input checked="" type="checkbox"/>	5	4.9	97.6
cal 3 - 10ng	3	<input checked="" type="checkbox"/>	10	9.6	96.1
cal 4 - 25ng	4	<input checked="" type="checkbox"/>	25	24.6	98.3
cal 5 - 50ng	5	<input checked="" type="checkbox"/>	50	50.7	101.3
cal 6 - 100ng	6	<input checked="" type="checkbox"/>	100	100.1	100.1
QC 5 - 10ng	7	<input checked="" type="checkbox"/>	5	5.0	100.9

ISP Forensics Calibration Curve Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin

Last Calib Update 1/15/2019 11:01 AM **Analyst Name** ISP TOX

Target Compound *THC-COOH*
Internal Standard *THC-COOH-d9*



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
cal 1 - 3ng	1	<input checked="" type="checkbox"/>	3	3.2	107.3
cal 2 - 5ng	2	<input checked="" type="checkbox"/>	5	4.9	97.3
cal 3 - 10ng	3	<input checked="" type="checkbox"/>	10	10.2	101.6
cal 4 - 25ng	4	<input checked="" type="checkbox"/>	25	23.9	95.5
cal 5 - 50ng	5	<input checked="" type="checkbox"/>	50	47.4	94.9
cal 6 - 100ng	6	<input checked="" type="checkbox"/>	100	103.5	103.5
QC 5 - 10ng	7	<input checked="" type="checkbox"/>	10	11.3	112.7

ISP FORENSICS - Cd'A

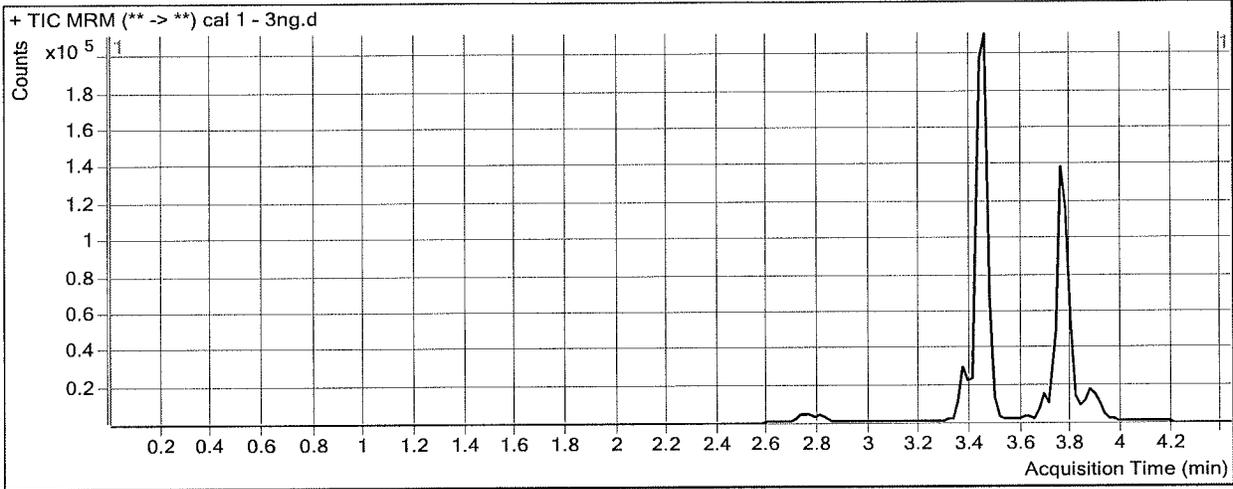
Cannabinoid Screen Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin
Analysis Time 1/15/2019 11:01 AM **Analyst Name** ISP Tox
Report Time 1/15/2019 11:02 AM **Reporter Name** ISP Tox
Last Calib Update 1/15/2019 11:01 AM **Batch State** Processed

Analysis Info

Acq Time 2019-01-15 02:01 **Data File** cal 1 - 3ng.d
Sample Type Calibration **Sample Name** cal 1 - 3ng
Dilution 1 **Acq Method** Screen THC 8-2017.m
Position p1-b1 **Sample Info**
Inj Vol -1 **Comment** AM 26 Cannabinoid screen

Sample Chromatogram



Results

Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
THC-COOH	3.386	7597	89267	0.0851	3.2182
THC-OH	3.453	13012	579291	0.0225	3.1982
THC	3.880	771	25126	0.0307	3.1880

ISP FORENSICS - Cd'A

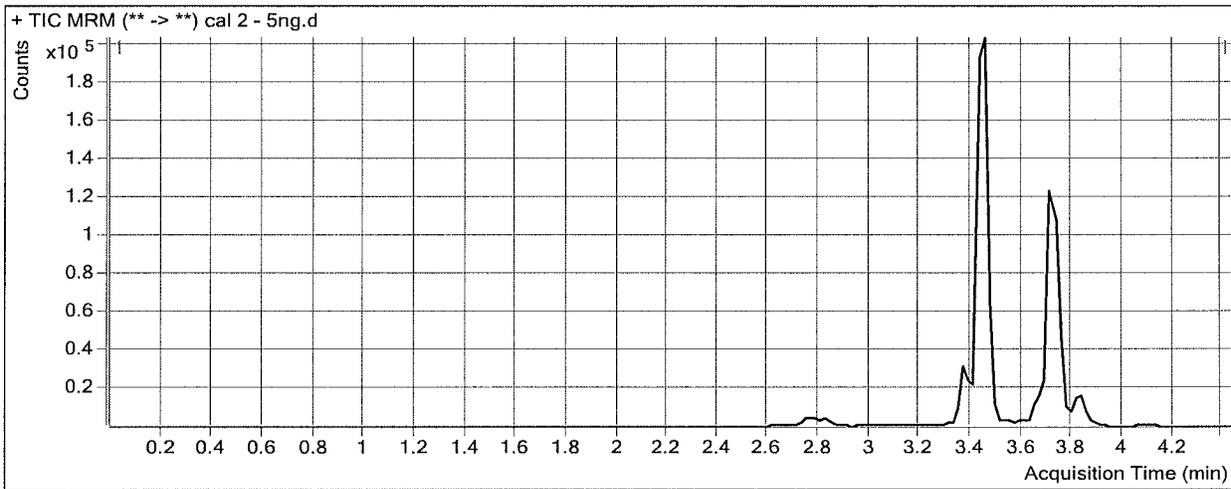
Cannabinoid Screen Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin
Analysis Time 1/15/2019 11:01 AM **Analyst Name** ISP Tox
Report Time 1/15/2019 11:02 AM **Reporter Name** ISP Tox
Last Calib Update 1/15/2019 11:01 AM **Batch State** Processed

Analysis Info

Acq Time 2019-01-15 02:07 **Data File** cal 2 - 5ng.d
Sample Type Calibration **Sample Name** cal 2 - 5ng
Dilution 1 **Acq Method** Screen THC 8-2017.m
Position P1-C1 **Sample Info**
Inj Vol -1 **Comment** AM 26 Cannabinoid screen

Sample Chromatogram



Results

Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
THC-COOH	3.386	9520	87237	0.1091	4.8669
THC-OH	3.453	19794	551670	0.0359	4.8789
THC	3.820	921	20954	0.0439	4.6680

ISP FORENSICS - Cd'A

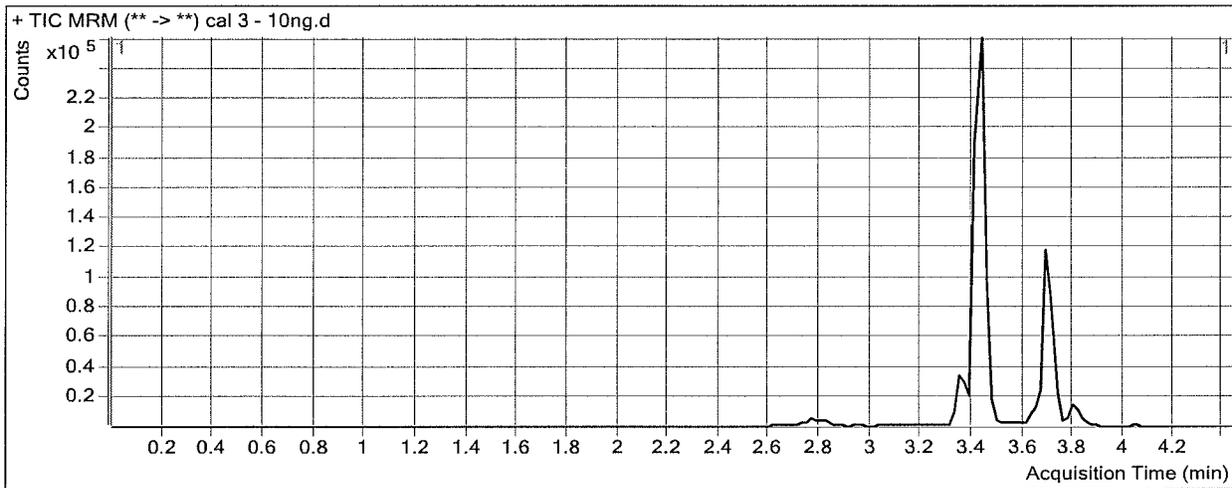
Cannabinoid Screen Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin
Analysis Time 1/15/2019 11:01 AM **Analyst Name** ISP Tox
Report Time 1/15/2019 11:02 AM **Reporter Name** ISP Tox
Last Calib Update 1/15/2019 11:01 AM **Batch State** Processed

Analysis Info

Acq Time 2019-01-15 02:14 **Data File** cal 3 - 10ng.d
Sample Type Calibration **Sample Name** cal 3 - 10ng
Dilution 1 **Acq Method** Screen THC 8-2017.m
Position p1-d1 **Sample Info**
Inj Vol -1 **Comment** AM 26 Cannabinoid screen

Sample Chromatogram



Results

Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
THC-COOH	3.366	17439	93614	0.1863	10.1613
THC-OH	3.433	45932	623459	0.0737	9.6129
THC	3.800	1721	17167	0.1002	10.9541

ISP FORENSICS - Cd'A

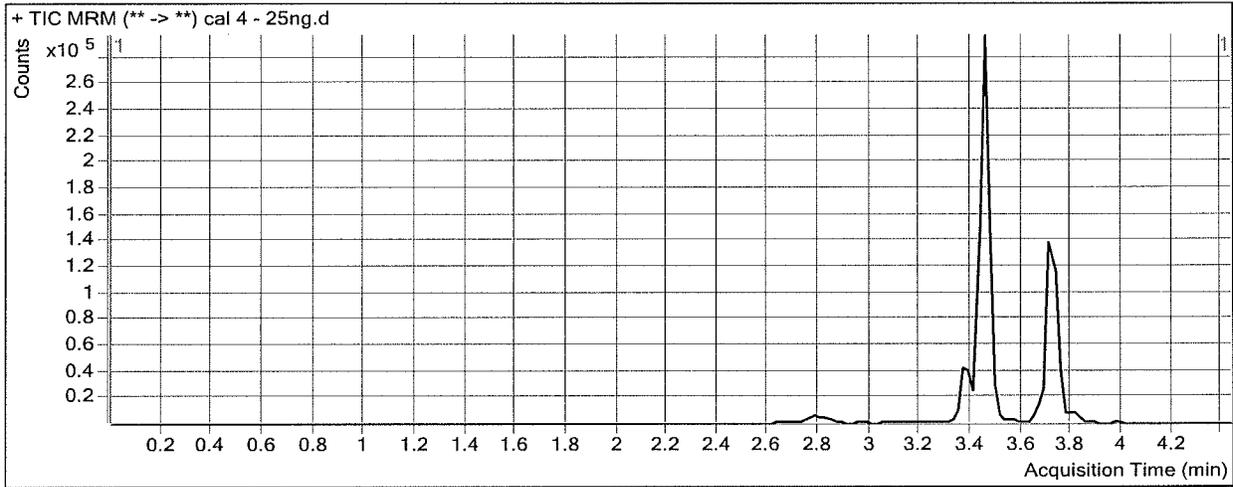
Cannabinoid Screen Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin
Analysis Time 1/15/2019 11:01 AM **Analyst Name** ISP Tox
Report Time 1/15/2019 11:02 AM **Reporter Name** ISP Tox
Last Calib Update 1/15/2019 11:01 AM **Batch State** Processed

Analysis Info

Acq Time 2019-01-15 02:21 **Data File** cal 4 - 25ng.d
Sample Type Calibration **Sample Name** cal 4 - 25ng
Dilution 1 **Acq Method** Screen THC 8-2017.m
Position P1-E1 **Sample Info**
Inj Vol -1 **Comment** AM 26 Cannabinoid screen

Sample Chromatogram



Results

Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
THC-COOH	3.386	37569	97334	0.3860	23.8638
THC-OH	3.453	115971	600679	0.1931	24.5684
THC	3.820	1280	6102	0.2098	23.1890

ISP FORENSICS - Cd'A

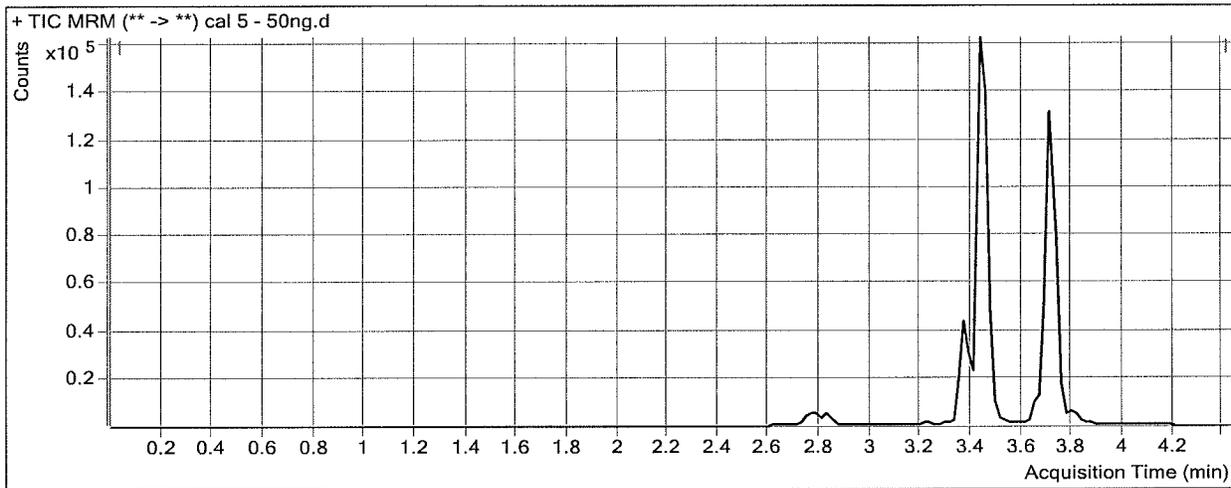
Cannabinoid Screen Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin
Analysis Time 1/15/2019 11:01 AM **Analyst Name** ISP Tox
Report Time 1/15/2019 11:02 AM **Reporter Name** ISP Tox
Last Calib Update 1/15/2019 11:01 AM **Batch State** Processed

Analysis Info

Acq Time 2019-01-15 02:27 **Data File** cal 5 - 50ng.d
Sample Type Calibration **Sample Name** cal 5 - 50ng
Dilution 1 **Acq Method** Screen THC 8-2017.m
Position p1-f1 **Sample Info**
Inj Vol -1 **Comment** AM 26 Cannabinoid screen

Sample Chromatogram



Results

Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
THC-COOH	3.366	44359	60811	0.7295	47.4325
THC-OH	3.453	120422	299974	0.4014	50.6701
THC	3.800	1801	4252	0.4237	47.0742

ISP FORENSICS - Cd'A

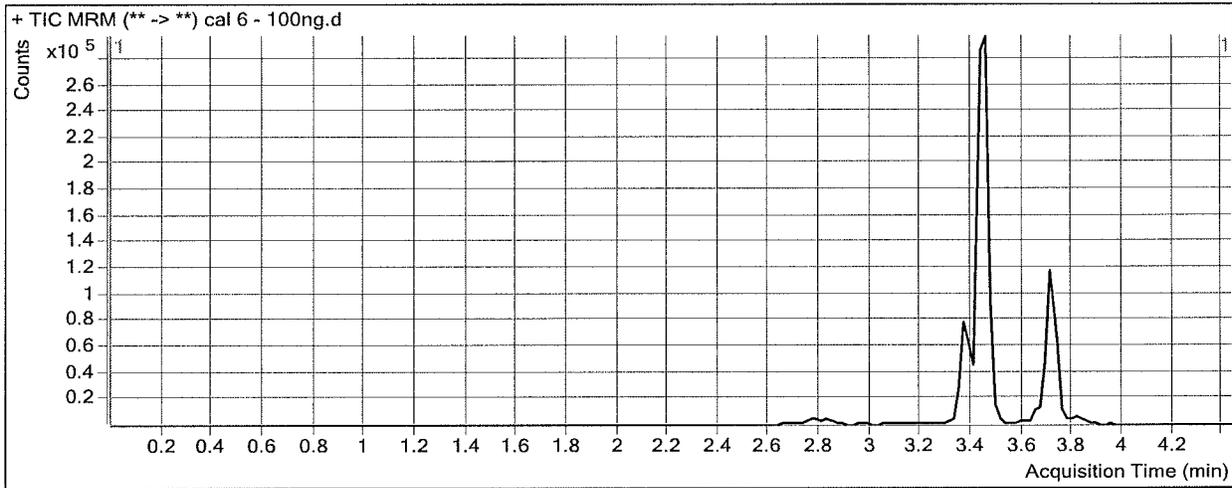
Cannabinoid Screen Report

Batch Data Path D:\2019 Data\am25-26\011419 AM 25-26\QuantResults\cann screen.batch.bin
Analysis Time 1/15/2019 11:01 AM **Analyst Name** ISP Tox
Report Time 1/15/2019 11:02 AM **Reporter Name** ISP Tox
Last Calib Update 1/15/2019 11:01 AM **Batch State** Processed

Analysis Info

Acq Time 2019-01-15 02:34 **Data File** cal 6 - 100ng.d
Sample Type Calibration **Sample Name** cal 6 - 100ng
Dilution 1 **Acq Method** Screen THC 8-2017.m
Position P1-G1 **Sample Info**
Inj Vol -1 **Comment** AM 26 Cannabinoid screen

Sample Chromatogram



Results

Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
THC-COOH	3.366	115256	74554	1.5459	103.4573
THC-OH	3.453	346974	435992	0.7958	100.0714
THC	3.820	4153	4452	0.9328	103.9266