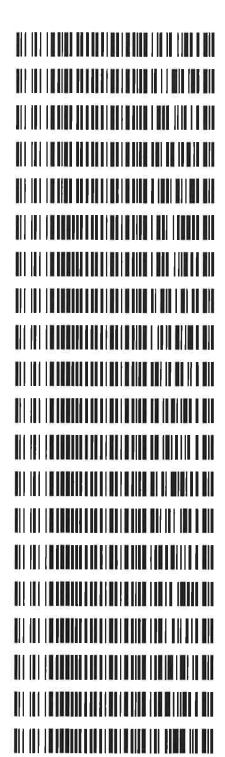
### REVIEWED

By Anne Nord at 10:26 am, Sep 22, 2018



Worklist: 2689

<u>LAB CASE</u> M2018-4077	<u>ITEM</u> 1	<u>TASK ID</u> 127038	DESCRIPTION  AM 28 Blood Multi-Drug Quant Panel 1 by LC-QC
M2018-4101	1	127039	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
M2018-4176	3	127040	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
M2018-4281	2	127041	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q0
M2018-4309	3	127042	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2398	1	127043	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2399	1	127044	AM 28 Blood Multi-Drug Quant Panel 1 by LC-QC
P2018-2413	1	127045	AM 28 Blood Multi-Drug Quant Panel 1 by LC-QC
P2018-2423	3	127046	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2425	1	127047	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2442	1	127048	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2443	1	127049	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2479	1	127050	AM 28 Blood Multi-Drug Quant Panel 1 by LC-QC
P2018-2483	1	127051	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2499	1	127052	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2505	1	127053	AM 28 Blood Multi-Drug Quant Panel 1 by LC-QC
P2018-2506	1	127054	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2508	1	127055	AM 28 Blood Multi-Drug Quant Panel 1 by LC-Q(
P2018-2509	1	127056	AM 28 Blood Multi-Drug Quant Panel 1 by LC-QC
P2018-2589	1	127057	AM 28 Blood Multi-Drug Quant Panel 1 by LC-QC



### AM# 28: Multi-Drug Quantitation in Blood by LC-MS/MS



Extraction Date: 09/13/18

Analyst: Sarah Pickle

Plate lot#: 0530563

Plate Expiration: 05/21/19

**Mobile phase A:** 5 mM Amm Form + 0.01% FA

Mobile phase B: 0.01% Formic Acid in MeOH Ethyl Acetate

20% Methanol in Water

0.5M Ammonium Hydroxide

Blank Blood Lot: 361331-1

**Column**: Agilent 120 EC-C18 (2.1x 100-4um)

**LCMS-QQQ ID**: 59740

### **Pre-Analytic:**

- Check levels of mobile phases and needle wash refill as needed. Ensure waste is not full.
- $\boxtimes$  3. Create worklist:

### **Analytic:**

- $\boxtimes$  1. Remove standards, plate, controls, and samples from cold storage. Allow to reach room temperature.
- Σ 2. Pipette 250μL blood (calibrated pipette) Pipette ID: #3 in wells of analytical (standards) plate.
- □ 3. Place on shaking incubator at ambient temp., 900rpm for 15 minutes. Shaker ID: 067105
- □ 4. Pipette 250μL 00.5M ammonium hydroxide in wells of analytical plate.
- ∑ 5. Place on shaking incubator at ambient temp., 900rpm for 15 minutes.
- ☑ 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: 067104
- ⊠ 8. Wait 5 minutes.
- ∅ 9. Add 900uL ethyl acetate.
- $\boxtimes$  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).
- SPE Dry ID: 067103
- 🖂 16. Reconstitute in 100μL 20% MeOH and heat seal plate with foil. Place in autosampler and run worklist.

### Post-Analytic

- Create batch and process data.
  - Worklist path: <u>091318 MDO SP</u> Batch Name: <u>P1a, P1b</u>
- $\boxtimes$  3. Integration linear and R<sup>2</sup> values  $\ge$  0.98 for each analyte.
- △ 4. For unknown samples and controls: response ratio within 20% of average of controls and standards, RT within +/-5% (tramadol RT +/-2%), S/N for primary transition >10 and secondary transitions >5.
- □ Signature 
   □ Signature 
   □ Did all QCs pass for each analyte? Y / N
   □ Signature 
   □ □ Signatur Add Control data to QC tracking spreadsheet
- ☐ 6. Central File Packet to include: LIMS Worklist, Method Checklist, Calibration and Control Reports.

COMMENTS: Curve Range Limited: Amphetamine 25-1000, Doxylamine 5-500, Lorazepam 10-1000, Meprobamate 5-500, Morphine 10-500, Norhydrocodone 25-1000, Phentermine 10-1000, Promethazine 5-500, Tramadol 5-250, Venlafaxine 5-500, Zolpidem 5-500, Benzoylecgonine 5-100, EDDP 10-1000, Fentanyl 1-100, Ketamine 5-500, Methadone 5-500, Norfentanyl 2.5-100, O-desmethyl-tramadol 5-250, Oxazepam 10-1000, Quetiapine 5-250

Did Not Evaluate: Norbuprenorphine

Negative control was reinjected due to carryover from a previous sample



Case P2018-2284-1 from worklist 2667 ran with this worklist. The sample was diluted with 500uL of reconstitution solvent due to a high response in the original run. Sarah Pickle acted as the primary analyst. I witnessed and approved of all methods and steps taken during the extraction.







### **Idaho State Police Forensic Services**

# AM #28 Blood Multi-Drug Confirmatory Analysis by LCMS-QQQ

Analyst: Sarah Pickle Extraction Date: 09/13/18 Worklist Number: 2689

Reagent	Lot Number	Expiration Date	Date in Service	Date Out of Service	Initials
ToxBox Benzo/Opiate Quant Plate	0530563	05/21/19			
Negative Blood	361331-1		05/25/18		
Methanol External Control Solution	121217	12/12/18	12/12/17		
Blood External Control Solution	WS121217	12/12/18	12/12/17		
0.5M Ammonium Hydroxide	082818	02/29/19	08/28/18		
Formic Acid (LCMS Grade)	095180B		11/15/17		
Water (LCMS Grade)	182702		6/21/18		
Methanol (LCMS Grade)	177145		04/11/18		
Ammonium Formate (LCMS Grade)	A0287238		01/30/17		
Ammonium Hydroxide (ACS grade or better)	053200		08/03/07		
Ethyl Acetate (ACS grade or better)	100362		06/26/17		
20% LCMS Methanol in LCMS Water	082818		08/28/18		
5mM Ammonium Formate + 0.01% Formic Acid in Water (Mobile Phase A)	091318		09/05/18		
0.01% Formic Acid in Methanol (Mobile Phase B)	082818		08/28/18		
Needle Rinse75% LCMS MeOH in LCMS Water	090418		09/04/18		

#### Methanol External Control Solution (Lot: 121217) 100 ul each 1 mg/ml. stock solution in 9600 ul MeOH

100 W Otton 1 Mg Mile Stock Bollwork in 2000 in 1/10011							
Component	Source	Source Lot Number	Expiration Date				
Methanol (LCMS)	Fisher	172516					
Trazodone	Cerilliant	FN12151403	01/01/2020				
Ketamine	Cerilliant	FE01131504	02/01/2020				
Morphine	Cerilliant	FE08141515	11/01/2020				
Quetiapine	Cerilliant	FN02021502	02/01/2020				
Prepared:	12/12/17	7					
Prepared By:	Tamara Salazar						
Expires:	12/12/18						



#### **Blood External Control Solution (Lot: WS121217)**

50 ul of methanol external control solution was added to 9950 ul of blood.

Component	Source	Source Lot Number
Negative Blood	Hemostat	361331-3
Methanol External Control Solution		121217
Prepared:	12/12/17	
Prepared by:	Tamara Salazar	
Expires:	12/12/18	

### 0.5M Ammonium Hydroxide (Lot: 082818)

Component	Source	Source Lot Number
Ammonium Hydroxide (ACS grade or better)	Fisher	053200
DI Water	142	
Prepared:	08/28/18	
Prepared By:	Tamara Salazar	
Expires:	02/29/19	

### 20% LCMS Methanol in LCMS Water (Lot: 082818)

Component	Source	Source Lot Number
MeOH (LCMS Grade)	Fisher	177145
Water (LCMS Grade)	Fisher	181370
Prepared:	08/28/18	
Prepared By:	Tamara Salazar	

#### 5mM Ammonium Formate + 0.01% Formic Acid in Water (Lot: 091318)

Conponent	Source	Source Lot Number
Ammonium Formate	Arcos Organics	A0287238
LCMS Water	Fisher	182702
Formic Acid	Fisher	095180B
Prepared:	09/13/18	
Prepared By:	Sarah Pickle	

### 0.01% Formic Acid in LCMS Methanol (Mobile Phase B) (Lot: 082818)

Component	Source	Source Lot Number
Formic Acid	Fisher	095180B
MeOH (LCMS Grade)	Fisher	177145
Prepared:	08/28/18	
Prepared By:	Tamara Salazar	

### Needle Rinse (75% LCMS MeOH in LCMS Water) (Lot: 090418)

Component	Source	Source Lot Number
MeOH (LCMS Grade)	Fisher	177145
Water (LCMS Grade)	Fisher	182702
Prepared:	09/04/18	
Prepared By:	Sarah Pickle	

### ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report



Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

 Analysis Time
 9/20/2018 1:47 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 1:56 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 1:47 PM
 Batch State
 Processed

**Analysis Info** 

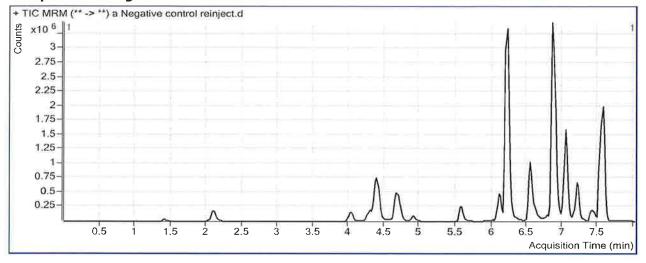
Acq Time2018-09-14 09:34Data Filea Negative control reinject.dSample TypeSample Namea Negative control reinject

**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-E2 **Sample Info** 

Inj Vol -1 Comment AM 28

#### Sample Chromatogram



Results

CompoundISTD CompoundRTResponseISTD RespResp RatioFinal ConcAmphetamineAmphetamine-D114.4037812146676891.17005.7640 < 15</td>

Negative control reinjected due to carryover in original injection. PTS



Printed at: 1:55 PM on: 9/20/2018

### ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report

**Batch Data Path** C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

 Analysis Time
 9/20/2018 1:47 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 1:55 PM
 Reporter Name
 ISPUser

 Last Calib Update
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 Batch State
 Processed

**Analysis Info** 

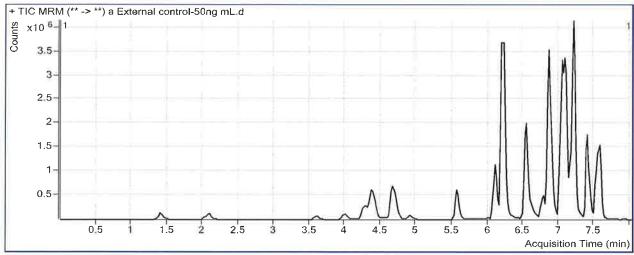
Results

Acq Time2018-09-13 19:43Data Filea External control-50ng mL.dSample TypeSample Namea External control-50ng mL

Dilution1Acq MethodMD Quant Panel 1a 7-11-18\_volume test.mPositionP1-F2Sample Info

Inj Vol -1 Comment AM 28; WS121217 50 ng trazodone, ketamine, morphine, quetiapine

### **Sample Chromatogram**



11050105						
Compound	<b>ISTD Compound</b>	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Morphine	Morphine-D6	1.408	248185	91260	2.7195	45.8088
Amphetamine	Amphetamine-D11	4.403	375902	1363185	0.2758	0.0000
Trazodone	Trazodone-D6	7.096	4530307	3386837	1.3376	42.9128
Diphenhydramine	Diphenhydramine-D3	7.234	120337	10230579	0.0118	1.3363 🤇 5
Promethazine	Promethazine-D3	7.409	122919	5595104	0.0220	2.0493 \ 5
						_



Printed at: 1:55 PM on: 9/20/2018

### ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report

Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

 Analysis Time
 9/20/2018 1:47 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 1:55 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 1:47 PM
 Batch State
 Processed

**Analysis Info** 

 Acq Time
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 a QC 10 ( QC1).d

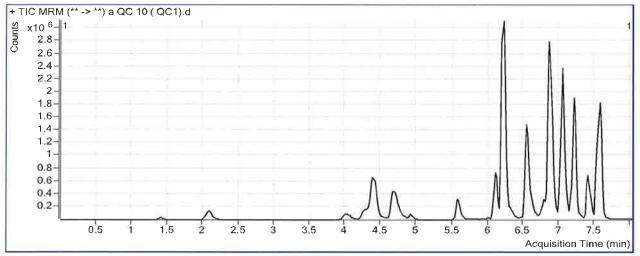
 Sample Type
 QC
 Sample Name
 a QC 10 ( QC1)

**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-A2 **Sample Info** 

Inj Vol -1 Comment AM 28

### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Morphine	Morphine-D6	1.408	40822	79753	0.5119	13.5744
Hydromorphone	Hydromorphone-D6	2.109	140168	620516	0.2259	9.0846
Codeine	Codeine-D6	4.072	58153	303088	0.1919	8.4530
Amphetamine	Amphetamine-D11	4,423	1089177	706430	1.5418	10.9957
Oxycodone	Oxycodone-D6	4.431	487567	2306819	0.2114	8.8864
Hydrocodone	Hydrocodone-D6	4.714	162645	1206924	0.1348	9.8950
Norhydrocodone	Norhydrocodone-D3	4.759	7779	304279	0.0256	18.6828
Methamphetamine	Methamphetamine-D11	4.784	306147	874460	0.3501	9.5635
6-MAM	6-MAM-D6	4.929	6202	249751	0.0248	1.1269
Phentermine	Phentermine-D5	5.626	129616	1384191	0.0936	11.0779
Dextrorphan	Dextrorphan-D3	6.102	234949	2206851	0.1065	9.5681
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	283190	1360624	0.2081	9.3543
Tramadol	Tramadol-13C-D3	6.223	1771012	9513477	0.1862	10.2092
Metoproloi	Tramadol-13C-D3	6.322	137937	9513477	0.0145	9.0674
Doxylamine	Doxylamine-D5	6.563	841114	5574786	0.1509	9.3693
Bupropion	Bupropion-D9	6.812	204032	837547	0.2436	9.1899
Zolpidem	Zolpidem-D6	6.882	1397728	9733425	0.1436	9.8648
Meprobamate	Meprobamate-D7	6.914	122925	436206	0.2818	10.7774
Venlafaxine	Venlafaxine-D6	7.046	1311278	5548837	0.2363	10.1263
Trazodone	Trazodone-D6	7.096	368451	1321564	0.2788	9.8454

Samples Report MDQ1\_012\_a QC 10 ( QC1).xlsx

Youtside curve range



# ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report Q () ()

Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	322152	1711830	0.1882	9.7679
Dextromethorphan	Dextromethorphan-D3	7.211	117156	441107	0.2656	10.8050
Diphenhydramine	Diphenhydramine-D3	7.214	700485	3718255	0.1884	10.3592
Promethazine	Promethazine-D3	7.409	432906	1741088	0.2486	10.1826
Clonazepam	Clonazepam-D4	7.445	135383	129654	1.0442	8.8893
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.521	46558	234316	0.1987	9.3642
Carisoprodol	Carisoprodol-D7	7.534	435843	2058480	0.2117	9.9083
Lorazepam	Clonazepam-D4	7.543	45618	129654	0.3518	13.1243
Alprazolam	Alprazolam-D5	7.588	1013511	3491914	0.2902	9.4083



### ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report

Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

 Analysis Time
 9/20/2018 1:47 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 1:55 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 1:47 PM
 Batch State
 Processed

**Analysis Info** 

 Acq Time
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 a QC 100 (QC2).d

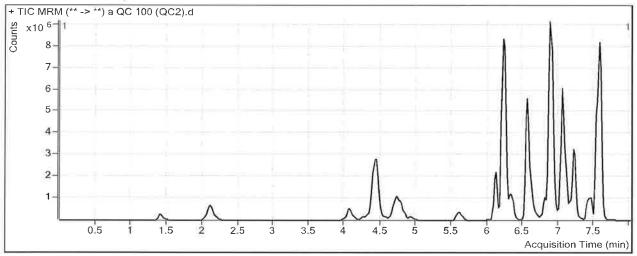
 Sample Type
 QC
 Sample Name
 a QC 100 (QC2)

**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-B2 **Sample Info** 

Inj Vol -1 Comment AM 28

### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Morphine	Morphine-D6	1.408	536688	95378	5.6269	88.2598
Hydromorphone	Hydromorphone-D6	2.109	1957819	693961	2.8212	94.1656
Codeine	Codeine-D6	4.072	766312	312558	2.4517	98.0436
Amphetamine	Amphetamine-D11	4.423	5207157	581738	8.9510	115.2587
Oxycodone	Oxycodone-D6	4.431	6528176	2518952	2.5916	97.6083
Hydrocodone	Hydrocodone-D6	4.714	2139225	1264190	1.6922	94.0126
Norhydrocodone	Norhydrocodone-D3	4.759	87174	302893	0.2878	86.1409
Methamphetamine	Methamphetamine-D11	4.784	2412745	650369	3.7098	86.0691
6-MAM	6-MAM-D6	4.929	59483	293454	0.2027	8.0973
Phentermine	Phentermine-D5	5.626	1184307	1081378	1.0952	90.9487
Dextrorphan	Dextrorphan-D3	6.122	2485356	1924777	1.2912	96.0722
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	3637213	1421873	2.5580	97.3595
Tramadol	Tramadol-13C-D3	6.243	18684410	9841804	1.8985	100.0039
Metoproloi	Tramadol-13C-D3	6.342	1572499	9841804	0.1598	98.2823
Doxylamine	Doxylamine-D5	6.563	9323813	5348283	1.7433	97. <i>7</i> 097
Bupropion	Bupropion-D9	6.812	1824120	596646	3.0573	89.2253
Zolpidem	Zolpidem-D6	6.882	17896552	11157983	1.6039	101.2642
Meprobamate	Meprobamate-D7	6.914	1633417	514449	3.1751	104.0518
Venlafaxine	Venlafaxine-D6	7.046	11876212	4739714	2.5057	99.6129
Trazodone	Trazodone-D6	7.096	2918576	970132	3.0084	95.0926

Samples Report MDQ1\_019\_a QC 100 (QC2).xlsx





### ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report ♥

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Citalopram	Citalopram-D6	7.179	2173159	981352	2.2145	97.6430
Dextromethorphan	Dextromethorphan-D3	7.211	541475	204175	2.6520	95.3341
Diphenhydramine	Diphenhydramine-D3	7.234	3994303	2129753	1.8755	96.5428
Promethazine	Promethazine-D3	7.409	1742221	632429	2.7548	100.1072
Clonazepam	Clonazepam-D4	7.445	1942728	151677	12.8084	94.8018
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.521	655042	262762	2.4929	97.2240
Carisoprodol	Carisoprodol-D7	7.534	5134740	2296745	2.2357	94.2939
Lorazepam	Clonazepam-D4	7.563	693721	151677	4.5737	87.1438
Alprazolam	Alprazolam-D5	7.588	11964480	3665437	3.2641	103.2540

Samples Report MDQ1\_019\_a QC 100 (QC2).xlsx



### ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report

Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

 Analysis Time
 9/20/2018 1:47 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 1:55 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 1:47 PM
 Batch State
 Processed

**Analysis Info** 

 Acq Time
 2018-09-14 03:18
 Data File
 a QC 250 (QC 3).d

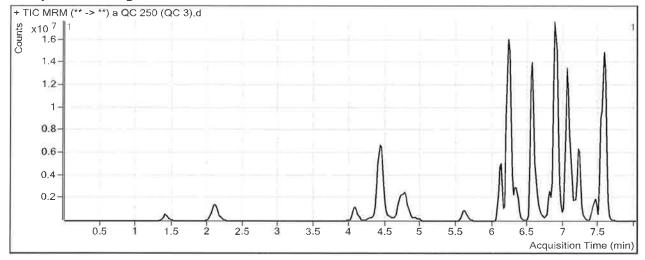
 Sample Type
 QC
 Sample Name
 a QC 250 (QC 3)

**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-C2 **Sample Info** 

Inj Vol -1 Comment AM 28

### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Morphine	Morphine-D6	1.408	1315452	83352	15.7819	236.5322
Hydromorphone	Hydromorphone-D6	2.109	4654493	619723	7.5106	247.8944
Codeine	Codeine-D6	4.072	1795345	282593	6.3531	252.7102
Amphetamine	Amphetamine-D11	4.423	13358597	637315	20.9608	284.2599
Oxycodone	Oxycodone-D6	4.431	16258294	2256588	7.2048	269.5603
Hydrocodone	Hydrocodone-D6	4.714	5421798	1201475	4.5126	246.3482
Norhydrocodone	Norhydrocodone-D3	4.759	212625	274008	0.7760	211.7164
Methamphetamine	Methamphetamine-D11	4.784	7955779	727880	10.9301	250.4855
6-MAM	6-MAM-D6	4.929	155658	250432	0.6216	24.5121
Phentermine	Phentermine-D5	5.626	3726883	1286604	2.8967	234.6141
Dextrorphan	Dextrorphan-D3	6.122	6940091	2079935	3.3367	245.4158
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	7933917	1220467	6.5007	245.0144
Tramadol	Tramadol-13C-D3	6.243	44797194	10199934	4.3919	230.7609
Metoprolol	Tramadol-13C-D3	6.342	4320502	10199934	0.4236	260.2832
Doxylamine	Doxylamine-D5	6.563	26468324	5794809	4.5676	254.3844
Bupropion	Bupropion-D9	6.812	4865327	623871	7.7986	224.0924
Zolpidem	Zolpidem-D6	6.882	40432613	9747445	4.1480	260.4955
Meprobamate	Meprobamate-D7	6.914	3713298	430615	8.6232	279.6917
Venlafaxine	Venlafaxine-D6	7.046	32437532	5172315	6.2714	248.1033
Trazodone	Trazodone-D6	7.096	6637865	839818	7.9039	247.9804

Samples Report MDQ1\_027\_a QC 250 (QC 3).xisx





# ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report 9 00 750

Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	4803074	859186	5.5903	244.0454
Dextromethorphan	Dextromethorphan-D3	7.211	1233489	159953	7.7116	274.5474
Diphenhydramine	Diphenhydramine-D3	7.234	9951665	1905738	5.2219	267.4947
Promethazine	Promethazine-D3	7.409	1872997	263850	7.0987	255.9719
Clonazepam	Clonazepam-D4	7.445	4230443	121138	34.9226	256.2998
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.521	1428737	226011	6.3215	243.8457
Carisoprodol	Carisoprodol-D7	7.534	11460701	1682023	6.8136	285.1680
Lorazepam	Clonazepam-D4	7.563	1493647	121138	12.3302	223.1347
Alprazolam	Alprazolam-D5	7.588	24810428	2935256	8.4526	266.9829

Samples Report MDQ1\_027\_a QC 250 (QC 3).xlsx



### ISP FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report

Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

 Analysis Time
 9/20/2018 1:47 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 1:55 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 1:47 PM
 Batch State
 Processed

**Analysis Info** 

 Acq Time
 2018-09-14 04:52
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 a QC 1000 (QC 4) recon. 300.d

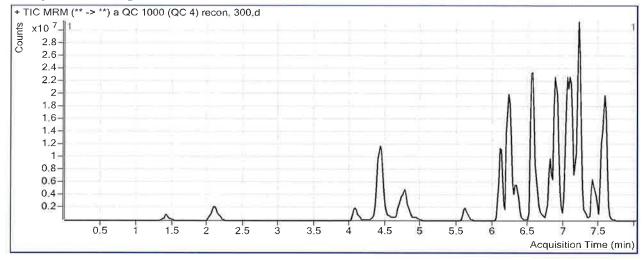
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 QC
 Sample Name
 a QC 1000 (QC 4) recon. 300

**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-D2 **Sample Info** 

Inj Vol -1 Comment AM 28

#### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	Final Conc
Morphine	Morphine-D6	1.408	2023182	30989	65.2867	959.3540
Hydromorphone	Hydromorphone-D6	2.109	7284506	205112	35.5148	1165.9359
Codeine	Codeine-D6	4.072	2768911	102679	26.9667	1069.9177
Amphetamine	Amphetamine-D11	4.423	26492929	313198	84.5883	1179.6298
Oxycodone	Oxycodone-D6	4.431	25794940	797626	32.3396	1206.4354
Hydrocodone	Hydrocodone-D6	4.714	9063593	432488	20.9568	1134.5199
Norhydrocodone	Norhydrocodone-D3	4.759	438300	104569	4.1915	1090.3071
Methamphetamine	Methamphetamine-D11	4.784	15952407	337146	47.3160	1079.0480
6-MAM	6-MAM-D6	4.929	241703	94416	2.5600	100.4773
Phentermine	Phentermine-D5	5.626	8258940	620797	13.3038	1064.5551
Dextrorphan	Dextrorphan-D3	6.102	1 <b>7</b> 51 <b>7</b> 528	1177987	14.8707	1087.5491
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	11944086	406690	29.3690	1101.4404
Tramadol	Tramadol-13C-D3	6.243	66226728	3896203	16.9978	891.8183
Metoprolol	Tramadol-13C-D3	6.342	8571488	3896203	2.2000	1351.1501
Doxylamine	Doxylamine-D5	6.563	53522430	2901470	18.4467	1024.3188
Bupropion	Bupropion-D9	6.812	18490230	505840	36.5535	1042.0260
Zolpidem	Zolpidem-D6	6.882	58168184	3472070	16.7532	1049.4329
Meprobamate	Meprobamate-D7	6.914	5492464	120014	45.7653	1477.0900
Venlafaxine	Venlafaxine-D6	7.046	62787453	2821109	22.2563	878.4274
Trazodone	Trazodone-D6	7.096	33158659	960602	34.5186	1079.1640

Samples Report MDQ1\_030\_a QC 1000 (QC 4) recon. 300.xlsx

\* Sample reconstituted in 300 ML of 20% methand. Do not use QC data. \*

### 

15	8
10	1

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	26059813	1032647	25.2359	1096.0410
Dextromethorphan	Dextromethorphan-D3	7.211	8585769	266526	32.2136	1142.4302
Diphenhydramine	Diphenhydramine-D3	7.234	46918441	2381599	19.7004	1007.1154
Promethazine	Promethazine-D3	7.409	16043141	488547	32.8385	1179.5492
Clonazepam	Clonazepam-D4	7.445	6564464	44973	145.9636	1067.2200
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.521	2078824	69676	29.8357	1144.3473
Carisoprodol	Carisoprodol-D7	7.534	14907045	572818	26.0240	1086.1250
Lorazepam	Clonazepam-D4	7.563	2334666	44973	51.9123	917.1095
Alprazolam	Alprazolam-D5	7.588	34551365	964642	35.8178	1130.5362



**Batch Data Path** 

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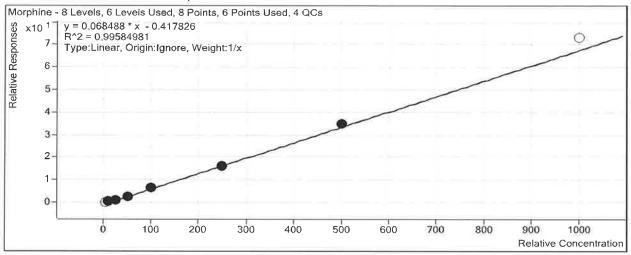
Last Calib Update

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundMorphineInternal StandardMorphine-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	9.2	184.5
a cal 2-10ng	2	$\square$	10	12.6	125.9
a QC 10 ( QC1)	2	$\square$	10	13.6	135.7
a cal 3-25ng	3	$\square$	25	22.9	91.5
a cal 4-50ng	4	$\square$	50	41.4	82.9
a cal 5-100ng	5		100	99.5	99.5
a QC 100 (QC2)	5		100	88.3	88.3
a cal 6-250ng	6		250	242.6	97.1
a QC 250 (QC 3)	6		250	236.5	94.6
a cal 7-500ng	7		500	516.0	103.2
a cal 8-1000ng	8		1000	1073.1	107.3
a QC 1000 (QC 4) recon. 300	8		1000	959.4	95.9

istdnew1.xlsx Page 1 of 29



**Batch Data Path** 

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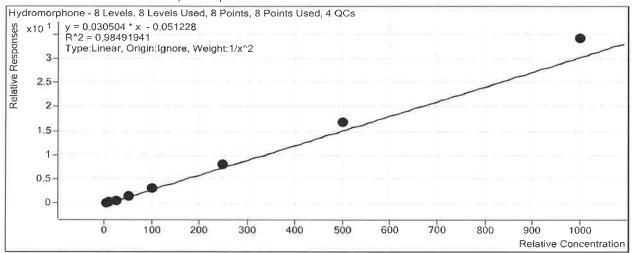
**Last Calib Update** 

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundHydromorphoneInternal StandardHydromorphone-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	5.4	108.7
a cal 2-10ng	2		10	9.1	90.7
a QC 10 ( QC1)	2		10	9.1	90.8
a cal 3-25ng	3	$\square$	25	20.8	83.4
a cal 4-50ng	4	$\square$	50	45.2	90.4
a cal 5-100ng	5	$\square$	100	99.5	99.5
a QC 100 (QC2)	5		100	94.2	94.2
a cal 6-250ng	6		250	263.0	105.2
a QC 250 (QC 3)	6		250	247.9	99.2
a cal 7-500ng	7		500	550.1	110.0
a cal 8-1000ng	8		1000	1121.3	112.1
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1165.9	116.6

istdnew1.xlsx Page 2 of 29



**Batch Data Path** 

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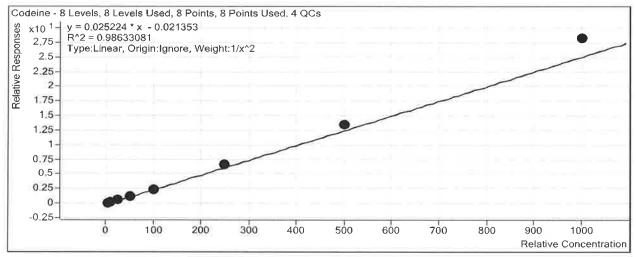
**Last Calib Update** 

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundCodeineInternal StandardCodeine-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\square$	5	5.5	110.4
a cal 2-10ng	2	☑	10	8.3	83.2
a QC 10 ( QC1)	2	$\square$	10	8.5	84.5
a cal 3-25ng	3		25	23.4	93.6
a cal 4-50ng	4		50	45.6	91.2
a cal 5-100ng	5		100	97.4	97.4
a QC 100 (QC2)	5	$\square$	100	98.0	98.0
a cal 6-250ng	6		250	263.2	105.3
a QC 250 (QC 3)	6		250	252.7	101.1
a cal 7-500ng	7	✓	500	535.5	107.1
a cal 8-1000ng	8	$\overline{\square}$	1000	1117.4	111.7
a QC 1000 (QC 4) recon. 300	8		1000	1069.9	107.0

istdnew1.xlsx Page 3 of 29

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**Batch Data Path** 

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Last Calib Update

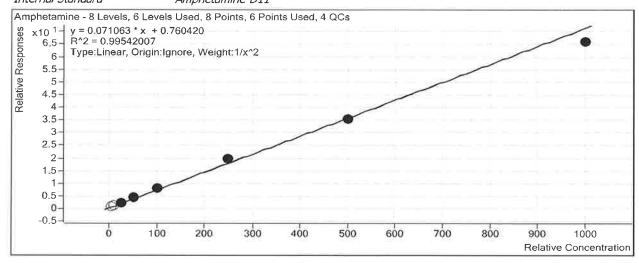
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound
Internal Standard

Amphetamine Amphetamine-D11



Sample	Level	Enabled	Exp Conc	Final Conc	Ассигасу
a cal 1-5ng	1		5	5.3	106.2
a cal 2-10ng	2		10	10.0	100.0
a QC 10 ( QC1)	2	$\square$	10	11.0	110.0
a cal 3-25ng	3		25	24.4	97.7
a cal 4-50ng	4		50	50.6	101.3
a cal 5-100ng	5		100	105.3	105.3
a QC 100 (QC2)	5		100	115.3	115.3
a cal 6-250ng	6		250	265.5	106.2
a QC 250 (QC 3)	6		250	284.3	113.7
a cal 7-500ng	7	☑	500	489.4	97.9
a cal 8-1000ng	8	$\overline{\square}$	1000	916.4	91.6
a QC 1000 (QC 4) recon. 300	8		1000	1179.6	118.0

istdnew1.xlsx Page 4 of 29



**Batch Data Path** 

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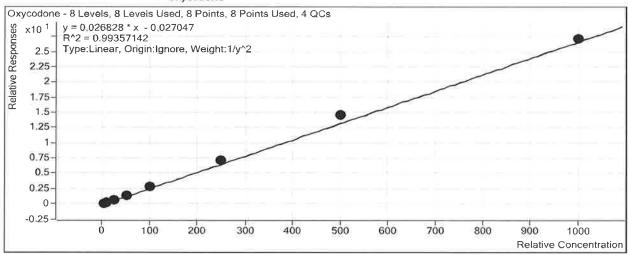
**Last Calib Update** 

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundOxycodoneInternal StandardOxycodone-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	5.3	105.3
a cal 2-10ng	2	Ø	10	9.3	93.2
a QC 10 ( QC1)	2	$\square$	10	8.9	88.9
a cal 3-25ng	3		25	22.8	91.2
a cal 4-50ng	4		50	48.2	96.4
a cal 5-100ng	5		100	103.8	103.8
a QC 100 (QC2)	5	$\square$	100	97.6	97.6
a cal 6-250ng	6	$\square$	250	267.3	106.9
a QC 250 (QC 3)	6	Ø	250	269.6	107.8
a cal 7-500ng	7	V	500	543.5	108.7
a cal 8-1000ng	8	abla	1000	1011.7	101.2
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1206.4	120.6

istdnew1.xlsx Page 5 of 29



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

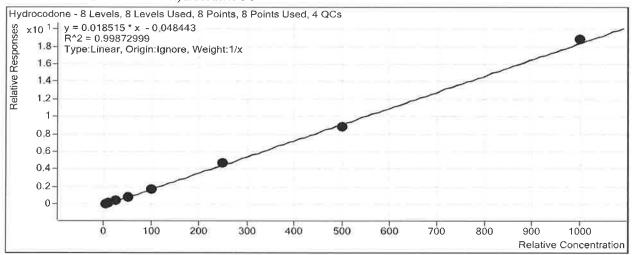
**Last Calib Update** 

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundHydrocodoneInternal StandardHydrocodone-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	6.0	119.2
a cal 2-10ng	2		10	10.4	103.6
a QC 10 ( QC1)	2	$\square$	10	9.9	99.0
a cal 3-25ng	3		25	21.1	84.3
a cal 4-50ng	4	☑	50	47.1	94.1
a cal 5-100ng	5	$\square$	100	97.3	97.3
a QC 100 (QC2)	5	$\square$	100	94.0	94.0
a cal 6-250ng	6		250	257.9	103.2
a QC 250 (QC 3)	6	$\square$	250	246.3	98.5
a cal 7-500ng	7		500	482.4	96.5
a cal 8-1000ng	8	$\square$	1000	1017.9	101.8
a QC 1000 (QC 4) recon. 300	8		1000	1134.5	113.5

istdnew1.xlsx Page 6 of 29

**Batch Data Path** 

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Last Calib Update

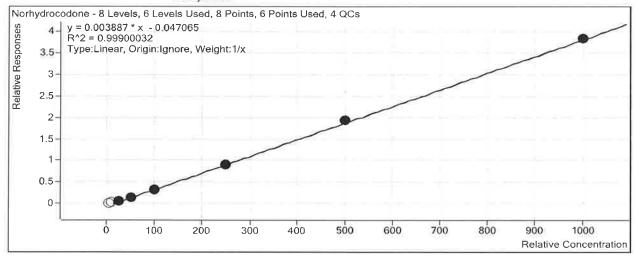
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound Internal Standard

Norhydrocodone Norhydrocodone-D3



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	15.1	301.3
a cal 2-10ng	2		10	18.2	182.1
a QC 10 ( QC1)	2	$\square$	10	18.7	186.8
a cal 3-25ng	3		25	28.4	113.7
a cal 4-50ng	4		50	46.1	92.1
a cal 5-100ng	5		100	93.3	93.3
a QC 100 (QC2)	5		100	86.1	86.1
a cal 6-250ng	6	☑	250	247.3	98.9
a QC 250 (QC 3)	6		250	211.7	84.7
a cal 7-500ng	7		500	509.9	102.0
a cal 8-1000ng	8	$\square$	1000	1000.1	100.0
a QC 1000 (QC 4) recon. 300	8		1000	1090.3	109.0

istdnew1.xlsx Page 7 of 29





**Batch Data Path** 

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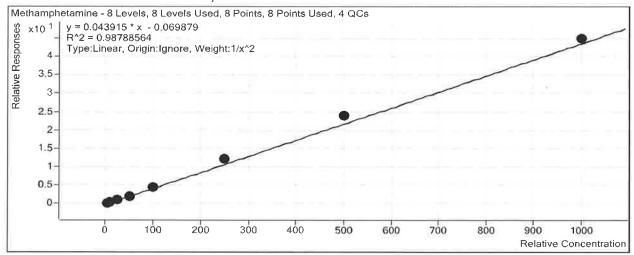
**Last Calib Update** 

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundMethamphetamineInternal StandardMethamphetamine-D11



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\square$	5	5.4	108.0
a cal 2-10ng	2		10	9.0	90.1
a QC 10 ( QC1)	2	$\overline{\checkmark}$	10	9.6	95.6
a cal 3-25ng	3		25	21.9	87.7
a cal 4-50ng	4		50	45.1	90.2
a cal 5-100ng	5	☑	100	100.2	100.2
a QC 100 (QC2)	5	☑	100	86.1	86.1
a cal 6-250ng	6	$\square$	250	280.7	112.3
a QC 250 (QC 3)	6	$\square$	250	250.5	100.2
a cal 7-500ng	7		500	545.5	109.1
a cal 8-1000ng	8		1000	1023.4	102.3
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1079.0	107.9

istdnew1.xlsx Page 8 of 29



**Batch Data Path** 

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**Last Calib Update** 

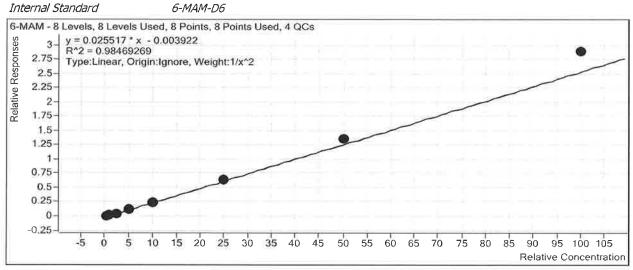
9/20/2018 1:47 PM

6-MAM

**Analyst Name** 

ISP TOX

**Target Compound**Internal Standard



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\overline{\mathbf{v}}$	0.5	0.5	99.1
a cal 2-10ng	2		1	1.1	111.1
a QC 10 ( QC1)	2	$\square$	1	1.1	112.7
a cal 3-25ng	3		2.5	2.0	81.0
a cal 4-50ng	4	$\square$	5	4.7	94.1
a cal 5-100ng	5		10	9.2	92.0
a QC 100 (QC2)	5		10	8.1	81.0
a cal 6-250ng	6		25	25.5	102.1
a QC 250 (QC 3)	6	$\square$	25	24.5	98.0
a cal 7-500ng	7	$\square$	50	53.7	107.5
a cal 8-1000ng	8		100	113.2	113.2
a QC 1000 (QC 4) recon. 300	8	$\square$	100	100.5	100.5

istdnew1.xlsx Page 9 of 29



**Batch Data Path** 

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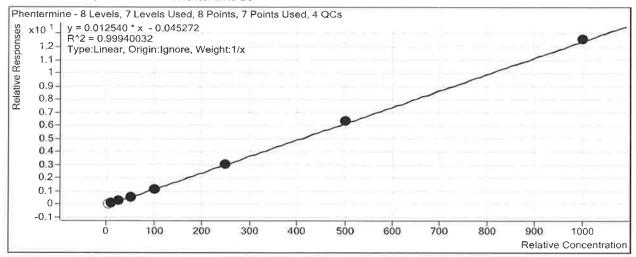
**Last Calib Update** 

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundPhentermineInternal StandardPhentermine-D5



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	7.1	141.6
a cal 2-10ng	2		10	11.7	116.7
a QC 10 ( QC1)	2		10	11.1	110.8
a cal 3-25ng	3		25	23.3	93.4
a cal 4-50ng	4		50	47.1	94.1
a cal 5-100ng	5	$\square$	100	96.4	96.4
a QC 100 (QC2)	5	☑	100	90.9	90.9
a cal 6-250ng	6		250	243.5	97.4
a QC 250 (QC 3)	6	$\square$	250	234.6	93.8
a cal 7-500ng	7	$\checkmark$	500	506.8	101.4
a cal 8-1000ng	8		1000	1006.3	100.6
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1064.6	106.5

istdnew1.xlsx Page 10 of 29



**Batch Data Path** 

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**Last Calib Update** 

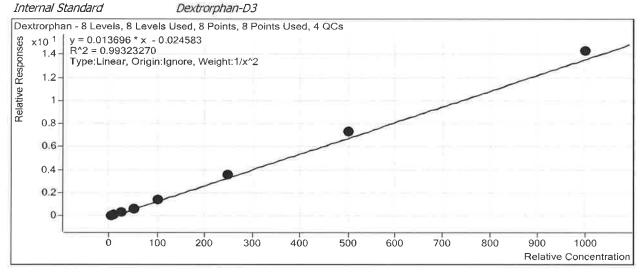
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound

Dextrorphan



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	5.3	106.5
a cal 2-10ng	2	Ø	10	9.2	92.0
a QC 10 ( QC1)	2		10	9.6	95.7
a cal 3-25ng	3	$\square$	25	22.0	87.9
a cal 4-50ng	4	Ø	50	48.4	96.7
a cal 5-100ng	5	abla	100	100.3	100.3
a QC 100 (QC2)	5	$\square$	100	96.1	96.1
a cal 6-250ng	6	☑	250	261.4	104.6
a QC 250 (QC 3)	6	$\square$	250	245.4	98.2
a cal 7-500ng	7		500	536.9	107.4
a cal 8-1000ng	8		1000	1045.8	104.6
a QC 1000 (QC 4) recon. 300	8		1000	1087.5	108.8

istdnew1.xlsx Page 11 of 29



**Batch Data Path** 

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Last Calib Update

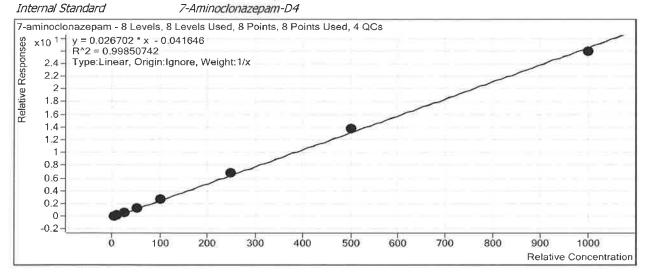
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound

7-aminoclonazepam



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\square$	5	5.4	108.7
a cal 2-10ng	2		10	9.8	98.4
a QC 10 ( QC1)	2	$ \mathbf{Y} $	10	9.4	93.5
a cal 3-25ng	3		25	21.9	87.8
a cal 4-50ng	4		50	48.4	96.8
a cal 5-100ng	5		100	103.3	103.3
a QC 100 (QC2)	5	$\square$	100	97.4	97.4
a cal 6-250ng	6	☑	250	259 <i>.7</i>	103.9
a QC 250 (QC 3)	6	$\square$	250	245.0	98.0
a cal 7-500ng	7	$\square$	500	520.6	104.1
a cal 8-1000ng	8		1000	970.8	97.1
a QC 1000 (QC 4) recon. 300	8		1000	1101.4	110.1

istdnew1.xlsx Page 12 of 29



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

Last Calib Update

9/20/2018 1:47 PM

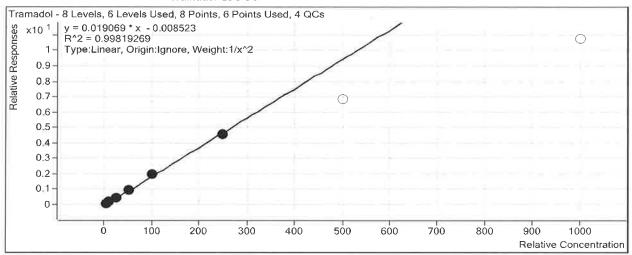
**Analyst Name** 

ISP TOX

Target Compound

Tramadol

Internal Standard Tramadol-13C-D3



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\square$	5	5.0	100.5
a cal 2-10ng	2	Ø	10	10.0	99.7
a QC 10 ( QC1)	2	Ø	10	10.2	102.1
a cal 3-25ng	3	$\square$	25	24.0	96.0
a cal 4-50ng	4		50	51.2	102.4
a cal 5-100ng	5	$\overline{\checkmark}$	100	105.0	105.0
a QC 100 (QC2)	5	$\checkmark$	100	100.0	100.0
a cal 6-250ng	6		250	240.8	96.3
a QC 250 (QC 3)	6		250	230.8	92.3
a cal 7-500ng	7		500	358.9	71.8
a cal 8-1000ng	8		1000	563.9	56.4
a QC 1000 (QC 4) recon. 300	8		1000	891.8	89.2

istdnew1.xlsx Page 13 of 29



**Batch Data Path** 

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Last Calib Update

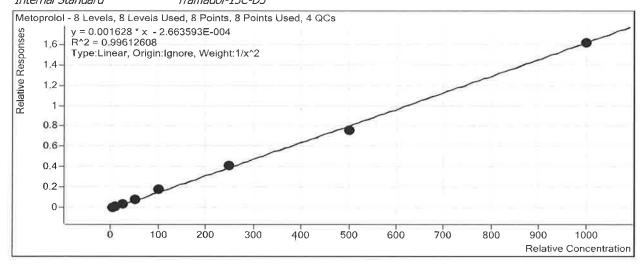
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound
Internal Standard

Metoprolol Tramadol-13C-D3



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	5.2	103.6
a cal 2-10ng	2		10	9.2	91.6
a QC 10 ( QC1)	2	$\checkmark$	10	9.1	90.7
a cal 3-25ng	3		25	25.0	99.9
a cal 4-50ng	4	$\square$	50	50.9	101.9
a cal 5-100ng	5	$\square$	100	108.8	108.8
a QC 100 (QC2)	5		100	98.3	98.3
a cal 6-250ng	6	$\square$	250	253.4	101.3
a QC 250 (QC 3)	6	$\square$	250	260.3	104.1
a cal 7-500ng	7		500	468.8	93.8
a cal 8-1000ng	8		1000	991.3	99.1
a QC 1000 (QC 4) recon. 300	8		1000	1351.2	135.1

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**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

Last Calib Update

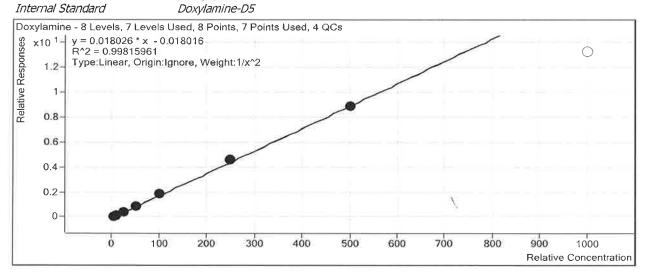
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound

Doxylamine



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\overline{\checkmark}$	5	5.1	102.2
a cal 2-10ng	2		10	9.7	97.5
a QC 10 ( QC1)	2		10	9.4	93.7
a cal 3-25ng	3	$\square$	25	23.5	94.2
a cal 4-50ng	4		50	49.7	99.3
a cal 5-100ng	5		100	104.8	104.8
a QC 100 (QC2)	5	$\square$	100	97.7	97.7
a cal 6-250ng	6	$\overline{\checkmark}$	250	257.6	103.0
a QC 250 (QC 3)	6		250	254.4	101.8
a cal 7-500ng	7	$\square$	500	494.8	99.0
a cal 8-1000ng	8		1000	736.0	73.6
a QC 1000 (QC 4) recon. 300	8		1000	1024.3	102.4

istdnew1.xlsx Page 15 of 29



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

**Last Calib Update** 

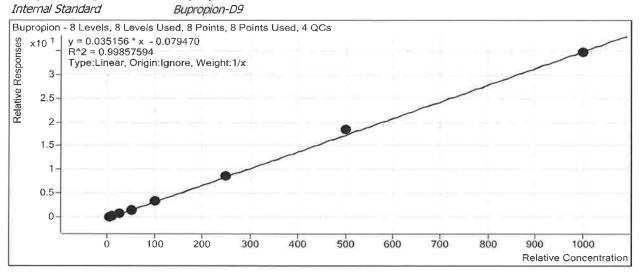
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound

Bupropion



Sample	Level	Enabled	Exp Conc	<b>Final Conc</b>	Accuracy
a cal 1-5ng	1	$\square$	5	6.2	124.4
a cal 2-10ng	2		10	9.2	92.3
a QC 10 ( QC1)	2	☑	10	9.2	91.9
a cal 3-25ng	3	$\square$	25	23.9	95.4
a cal 4-50ng	4	$\square$	50	44.4	88.8
a cal 5-100ng	5	$\square$	100	96.2	96.2
a QC 100 (QC2)	5	$\square$	100	89.2	89.2
a cal 6-250ng	6	$\square$	250	248.3	99.3
a QC 250 (QC 3)	6	$\square$	250	224.1	89.6
a cal 7-500ng	7	Ø	500	524.2	104.8
a cal 8-1000ng	8	$\square$	1000	987.6	98.8
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1042.0	104.2

istdnew1.xlsx Page 16 of 29



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

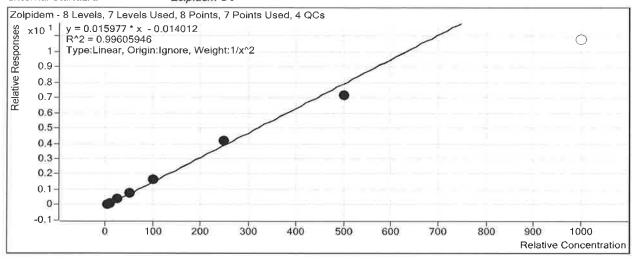
Last Calib Update

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundZolpidemInternal StandardZolpidem-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	5.0	100.3
a cal 2-10ng	2		10	9.9	99.1
a QC 10 ( QC1)	2	$\square$	10	9.9	98.6
a cal 3-25ng	3	Ø	25	24.7	98.7
a cal 4-50ng	4		50	50.3	100.5
a cal 5-100ng	5	$\square$	100	106.3	106.3
a QC 100 (QC2)	5		100	101.3	101.3
a cal 6-250ng	6	$\square$	250	262.7	105.1
a QC 250 (QC 3)	6		250	260.5	104.2
a cal 7-500ng	7		500	449.8	90.0
a cal 8-1000ng	8		1000	673.9	67.4
a QC 1000 (QC 4) recon. 300	8		1000	1049.4	104.9

istdnew1.xlsx Page 17 of 29



**Batch Data Path** 

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Last Calib Update

9/20/2018 1:47 PM

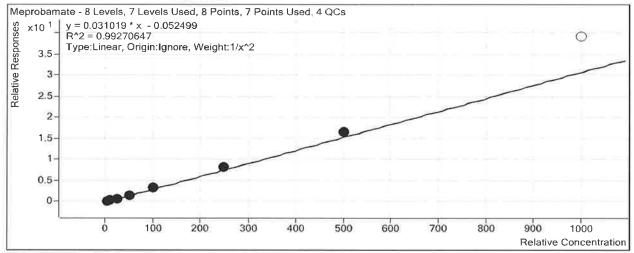
**Analyst Name** 

ISP TOX

Target Compound

Meprobamate

Internal Standard Meprobamate-D7



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	5.1	102.5
a cal 2-10ng	2	Ø	10	10.0	100.5
a QC 10 ( QC1)	2	Ø	10	10.8	107.8
a cal 3-25ng	3	$\square$	25	22.2	88.7
a cal 4-50ng	4	$\square$	50	45.5	91.1
a cal 5-100ng	5	$\square$	100	105.6	105.6
a QC 100 (QC2)	5	$\square$	100	104.1	104.1
a cal 6-250ng	6		250	262.2	104.9
a QC 250 (QC 3)	6	$\square$	250	279.7	111.9
a cal 7-500ng	7	$\square$	500	534.2	106.8
a cal 8-1000ng	8		1000	1264.7	126.5
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1477.1	147.7

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**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

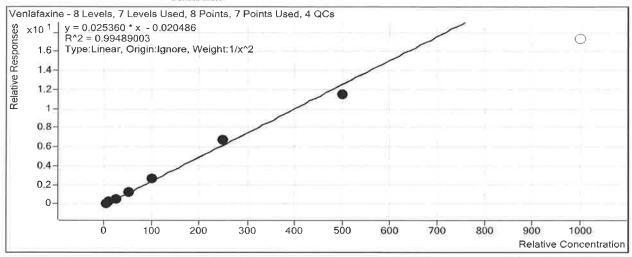
Last Calib Update

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundVenlafaxineInternal StandardVenlafaxine-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\square$	5	5.0	100.2
a cal 2-10ng	2	$\square$	10	10.1	101.4
a QC 10 ( QC1)	2	$\square$	10	10.1	101.3
a cal 3-25ng	3		25	23.4	93.7
a cal 4-50ng	4		50	49.8	99.5
a cal 5-100ng	5	abla	100	108.2	108.2
a QC 100 (QC2)	5	$\square$	100	99.6	99.6
a cal 6-250ng	6	$\square$	250	264.7	105.9
a QC 250 (QC 3)	6		250	248.1	99.2
a cal 7-500ng	7		500	456.1	91.2
a cal 8-1000ng	8		1000	683.5	68.3
a QC 1000 (QC 4) recon. 300	8		1000	878.4	87.8

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**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

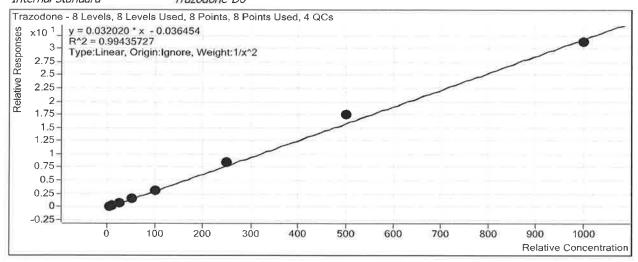
Last Calib Update

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundTrazodoneInternal StandardTrazodone-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	5.3	105.1
a cal 2-10ng	2		10	9.3	93.5
a QC 10 ( QC1)	2		10	9.8	98.5
a cal 3-25ng	3	$\square$	25	22.7	91.0
a cal 4-50ng	4		50	49.5	99.1
a cal 5-100ng	5	$\square$	100	97.5	97.5
a QC 100 (QC2)	5	$\square$	100	95.1	95.1
a cal 6-250ng	6		250	266.2	106.5
a QC 250 (QC 3)	6		250	248.0	99.2
a cal 7-500ng	7	$\checkmark$	500	548.7	109.7
a cal 8-1000ng	8		1000	977.2	97.7
a QC 1000 (QC 4) recon. 300	8		1000	1079.2	107.9

istdnew1.xlsx Page 20 of 29





**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

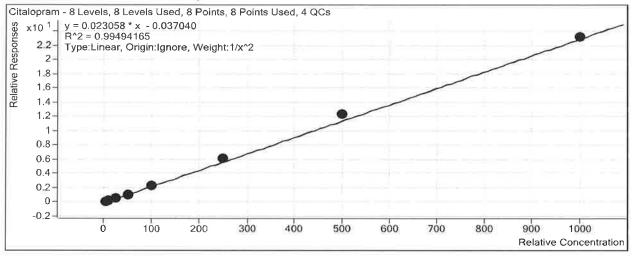
**Last Calib Update** 

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundCitalopramInternal StandardCitalopram-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\square$	5	5.2	103.7
a cal 2-10ng	2	$\square$	10	9.7	97.3
a QC 10 ( QC1)	2		10	9.8	97.7
a cal 3-25ng	3	$\square$	25	22.6	90.5
a cal 4-50ng	4	$\square$	50	46.2	92.5
a cal 5-100ng	5	$\square$	100	101.3	101.3
a QC 100 (QC2)	5		100	97.6	97.6
a cal 6-250ng	6	$\square$	250	268.1	107.2
a QC 250 (QC 3)	6		250	244.0	97.6
a cal 7-500ng	7		500	534.1	106.8
a cal 8-1000ng	8	$\square$	1000	1006.3	100.6
a QC 1000 (QC 4) recon. 300	8	Ø	1000	1096.0	109.6

istdnew1.xlsx Page 21 of 29



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

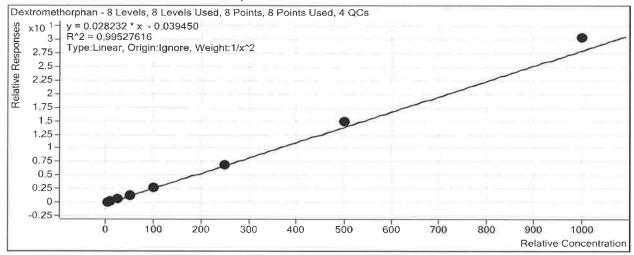
**Last Calib Update** 

9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundDextromethorphanInternal StandardDextromethorphan-D3



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\square$	5	5.2	104.4
a cal 2-10ng	2	$\square$	10	9.6	95.9
a QC 10 ( QC1)	2	$\square$	10	10.8	108.0
a cal 3-25ng	3		25	22.4	89.5
a cal 4-50ng	4		50	48.4	96.9
a cal 5-100ng	5		100	100.7	100.7
a QC 100 (QC2)	5	$\square$	100	95.3	95.3
a cal 6-250ng	6		250	248.0	99.2
a QC 250 (QC 3)	6	$\square$	250	274.5	109.8
a cal 7-500ng	7	$\square$	500	528.9	105.8
a cal 8-1000ng	8	$\overline{\mathbf{Z}}$	1000	1077.0	107.7
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1142.4	114.2

istdnew1.xlsx Page 22 of 29



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

**Last Calib Update** 

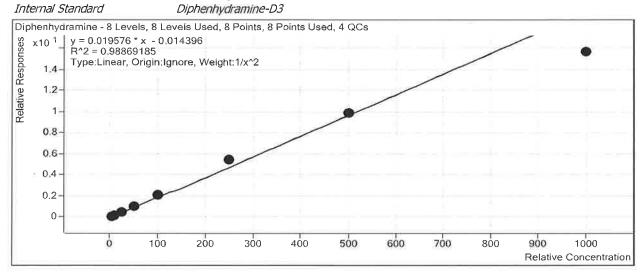
9/20/2018 1:47 PM

**Analyst Name** 

**ISP TOX** 

Target Compound

Diphenhydramine



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\overline{\checkmark}$	5	5.1	101.1
a cal 2-10ng	2	$\square$	10	9.6	95.8
a QC 10 ( QC1)	2		10	10.4	103.6
a cal 3-25ng	3		25	25.7	102.7
a cal 4-50ng	4		50	50.0	100.0
a cal 5-100ng	5	☑	100	107.6	107.6
a QC 100 (QC2)	5	☑	100	96.5	96.5
a cal 6-250ng	6		250	277.9	111.2
a QC 250 (QC 3)	6		250	267.5	107.0
a cal 7-500ng	7		500	508.0	101.6
a cal 8-1000ng	8	$ \overline{\checkmark} $	1000	801.9	80.2
a QC 1000 (QC 4) recon. 300	8		1000	1007.1	100.7

istdnew1.xlsx Page 23 of 29



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

Last Calib Update

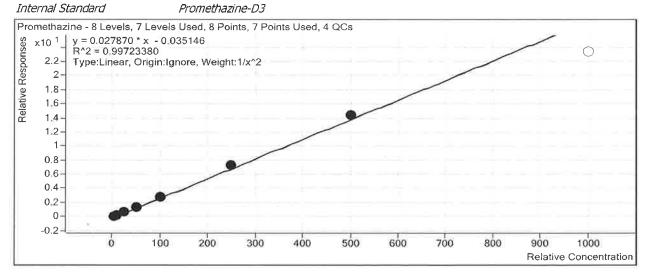
9/20/2018 1:47 PM

**Analyst Name** 

**ISP TOX** 

Target Compound

Promethazine



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	5.1	102.6
a cal 2-10ng	2		10	9.8	97.8
a QC 10 ( QC1)	2		10	10.2	101.8
a cal 3-25ng	3	$\square$	25	23.5	93.8
a cal 4-50ng	4	$\square$	50	47.5	95.0
a cal 5-100ng	5	$\square$	100	101.9	101.9
a QC 100 (QC2)	5		100	100.1	100.1
a cal 6-250ng	6		250	263.7	105.5
a QC 250 (QC 3)	6		250	256.0	102.4
a cal 7-500ng	7	☑	500	516.7	103.3
a cal 8-1000ng	8		1000	840.3	84.0
a QC 1000 (QC 4) recon. 300	8		1000	1179.5	118.0

istdnew1.xlsx Page 24 of 29





**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

Last Calib Update

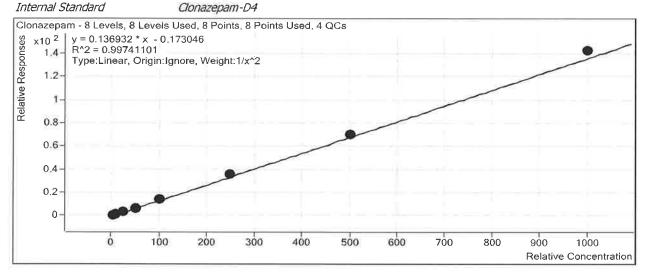
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

**Target Compound**Internal Standard

Clonazepam



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\overline{\checkmark}$	5	5.2	103.8
a cal 2-10ng	2	$\square$	10	9.6	95.6
a QC 10 ( QC1)	2		10	8.9	88.9
a cal 3-25ng	3		25	23.3	93.2
a cal 4-50ng	4		50	48.1	96.3
a cal 5-100ng	5	$\overline{\checkmark}$	100	100.4	100.4
a QC 100 (QC2)	5		100	94.8	94.8
a cal 6-250ng	6	☑	250	261.3	104.5
a QC 250 (QC 3)	6		250	256.3	102.5
a cal 7-500ng	7		500	510.2	102.0
a cal 8-1000ng	8	☑	1000	1042.2	104.2
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1067.2	106.7

istdnew1.xlsx Page 25 of 29





**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

**Last Calib Update** 

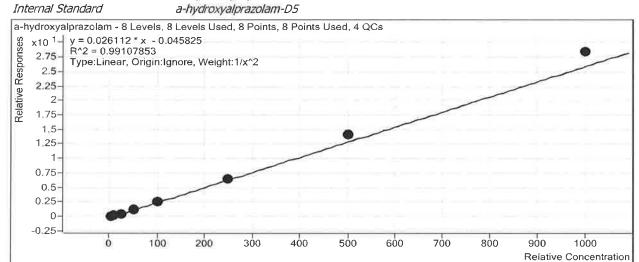
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound

a-hydroxyalprazolam



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\square$	5	5.2	103.6
a cal 2-10ng	2		10	10.0	100.3
a QC 10 ( QC1)	2		10	9.4	93.6
a cal 3-25ng	3	$\square$	25	20.8	83.3
a cal 4-50ng	4		50	47.0	94.0
a cal 5-100ng	5		100	101.0	101.0
a QC 100 (QC2)	5	$   \overline{\mathcal{Q}} $	100	97.2	97.2
a cal 6-250ng	6	abla	250	252.0	100.8
a QC 250 (QC 3)	6	Ø	250	243.8	97.5
a cal 7-500ng	7		500	540.1	108.0
a cal 8-1000ng	8	$\overline{\checkmark}$	1000	1089.9	109.0
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1144.3	114.4

istdnew1.xlsx Page 26 of 29



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

Last Calib Update

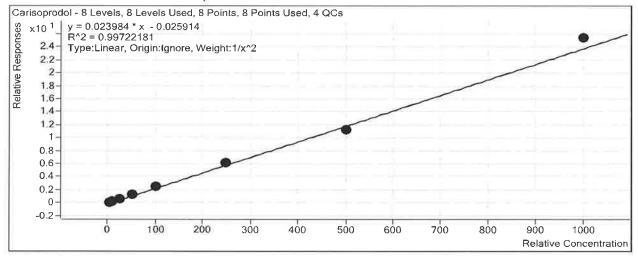
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target CompoundCaInternal StandardCa

Carisoprodol - D7



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\checkmark$	5	5.2	103.6
a caí 2-10ng	2		10	9.4	93.9
a QC 10 ( QC1)	2		10	9.9	99.1
a cal 3-25ng	3		25	24.1	96.3
a cal 4-50ng	4	$\square$	50	50.0	100.0
a cal 5-100ng	5	$\square$	100	103.4	103.4
a QC 100 (QC2)	5	$\square$	100	94.3	94.3
a cal 6-250ng	6	$\square$	250	255.8	102.3
a QC 250 (QC 3)	6	$\square$	250	285.2	114.1
a cal 7-500ng	7	$\square$	500	472.2	94.4
a cal 8-1000ng	8	$\square$	1000	1060.2	106.0
a QC 1000 (QC 4) recon. 300	8	☑	1000	1086.1	108.6

istdnew1.xlsx Page 27 of 29



**Batch Data Path** 

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**Last Calib Update** 

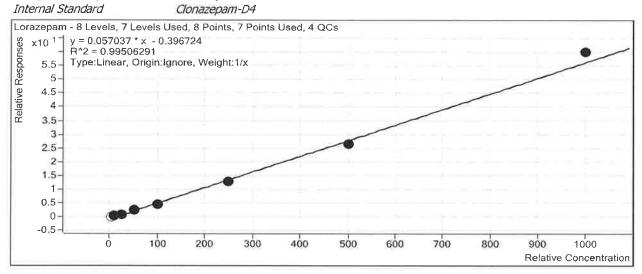
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound

Lorazepam Clonazepam-D4



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1		5	10.1	202.7
a cal 2-10ng	2	$\square$	10	13.0	129.7
a QC 10 ( QC1)	2		10	13.1	131.2
a cal 3-25ng	3	$\square$	25	22.9	91.4
a cal 4-50ng	4	$\square$	50	47.8	95.6
a cal 5-100ng	5		100	90.3	90.3
a QC 100 (QC2)	5		100	87.1	87.1
a cal 6-250ng	6	☑	250	232.9	93.2
a QC 250 (QC 3)	6	$\square$	250	223.1	89.3
a cal 7-500ng	7		500	471.0	94.2
a cal 8-1000ng	8		1000	1057.2	105.7
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	917.1	91.7

istdnew1.xlsx Page 28 of 29



**Batch Data Path** 

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**Last Calib Update** 

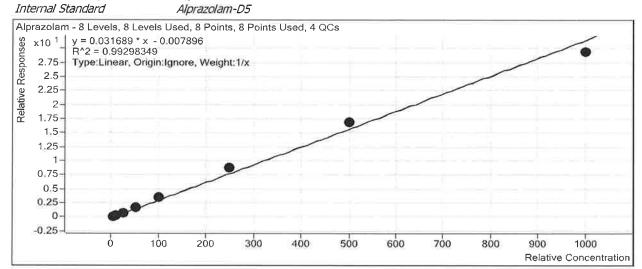
9/20/2018 1:47 PM

**Analyst Name** 

ISP TOX

Target Compound

Alprazolam



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
a cal 1-5ng	1	$\overline{\checkmark}$	5	4.5	90.2
a cal 2-10ng	2		10	9.1	91.2
a QC 10 ( QC1)	2	$\checkmark$	10	9.4	94.1
a cal 3-25ng	3		25	23.8	95.3
a cal 4-50ng	4	$   \overline{\checkmark} $	50	50.5	101.0
a cal 5-100ng	5		100	111.0	111.0
a QC 100 (QC2)	5		100	103.3	103.3
a cal 6-250ng	6	$\square$	250	278.8	111.5
a QC 250 (QC 3)	6	Ø	250	267.0	106.8
a cal 7-500ng	7		500	535.2	107.0
a cal 8-1000ng	8	$   \overline{\mathcal{L}} $	1000	927.1	92.7
a QC 1000 (QC 4) recon. 300	8	$\square$	1000	1130.5	113.1

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**Batch Data Path** C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

 Analysis Time
 9/20/2018 1:47 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 1:54 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 1:47 PM
 Batch State
 Processed

**Analysis Info** 

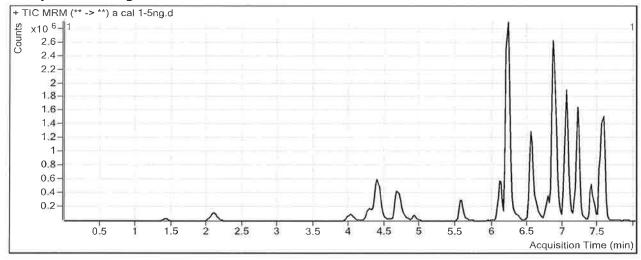
Acq Time2018-09-13 14:28Data Filea cal 1-5ng.dSample TypeCalibrationSample Namea cal 1-5ng

**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

Position P1-A1 Sample Info

Inj Vol -1 Comment AM 28

#### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Morphine	Morphine-D6	1.408	22341	104345	0.2141	9.2269
Hydromorphone	Hydromorphone-D6	2.109	78447	684703	0.1146	5.4353
Codeine	Codeine-D6	4.072	35609	301952	0.1179	5.5217
Amphetamine	Amphetamine-D11	4.403	833027	732074	1.1379	5.3119
Oxycodone	Oxycodone-D6	4.431	265556	2325821	0.1142	5.2640
Hydrocodone	Hydrocodone-D6	4.714	79888	1289721	0.0619	5.9620
Norhydrocodone	Norhydrocodone-D3	4.759	3725	324014	0.0115	15.0641
Methamphetamine	Methamphetamine-D11	4.784	138397	827361	0.1673	5.4004
6-MAM	6-MAM-D6	4.909	2498	286653	0.0087	0.4953
Phentermine	Phentermine-D5	5.606	58820	1352283	0.0435	7.0791
Dextrorphan	Dextrorphan-D3	6.102	97586	2017569	0.0484	5.3264
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	152441	1473847	0.1034	5.4332
Tramadol	Tramadol-13C-D3	6.243	819408	9385022	0.0873	5.0255
Metoprolol	Tramadol-13C-D3	6.322	76681	9385022	0.0082	5,1811
Doxylamine	Doxylamine-D5	6.563	409785	5530610	0.0741	5.1097
Bupropion	Bupropion-D9	6.812	138851	997758	0.1392	6.2190
Zolpidem	Zolpidem-D6	6.882	655042	9901801	0.0662	5.0175
Meprobamate	Meprobamate-D7	6.914	51833	486959	0.1064	5.1240
Venlafaxine	Venlafaxine-D6	7.046	547551	5138554	0.1066	5.0096

159000

1206573

7.096

Samples Report MDQ1\_000\_a cal 1-5ng.xlsx

Trazodone-D6

Trazodone

Printed at: 1:54 PM on: 9/20/2018

5.2539

0.1318



Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Citalopram	Citalopram-D6	7.179	134599	1631118	0.0825	5.1851
Dextromethorphan	Dextromethorphan-D3	7.191	47662	441886	0.1079	5.2179
Diphenhydramine	Diphenhydramine-D3	7.214	297619	3520823	0.0845	5.0536
Promethazine	Promethazine-D3	7.409	158424	1469806	0.1078	5.1286
Clonazepam	Clonazepam-D4	7.445	75069	139643	0.5376	5.1896
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.501	20074	224398	0.0895	5.1807
Carisoprodol	Carisoprodol-D7	7.534	212955	2166564	0.0983	5.1786
Lorazepam	Clonazepam-D4	7.543	25323	139643	0.1813	10.1349
Alprazolam	Alprazolam-D5	7.568	478823	3544980	0.1351	4.5115

Samples Report MDQ1\_000\_a cal 1-5ng.xlsx



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**Analysis Info** 

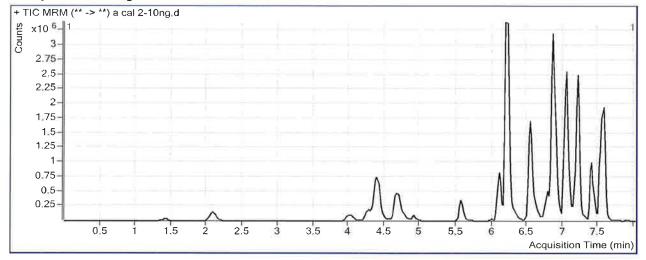
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**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-B1 **Sample Info** 

Inj Vol -1 Comment AM 28

#### **Sample Chromatogram**



Results
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Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Morphine	Morphine-D6	1.408	47213	106282	0.4442	12.5868
Hydromorphone	Hydromorphone-D6	2.109	162020	718733	0.2254	9.0693
Codeine	Codeine-D6	4.072	61001	323486	0.1886	8.3224
Amphetamine	Amphetamine-D11	4.403	1178930	801288	1.4713	10.0034
Oxycodone	Oxycodone-D6	4.431	580982	2606588	0.2229	9.3162
Hydrocodone	Hydrocodone-D6	4.695	191301	1334793	0.1433	10.3573
Norhydrocodone	Norhydrocodone-D3	4.739	7867	331328	0.0237	18.2145
Methamphetamine	Methamphetamine-D11	4.784	285912	877222	0.3259	9.0131
6-MAM	6-MAM-D6	4.929	7131	291886	0.0244	1.1112
Phentermine	Phentermine-D5	5.606	142809	1412349	0.1011	11.6740
Dextrorphan	Dextrorphan-D3	6.102	250949	2473209	0.1015	9.2033
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	341424	1543919	0.2211	9.8415
Tramadol	Tramadol-13C-D3	6.223	1934008	10646878	0.1817	9.9728
Metoprolol	Tramadol-13C-D3	6.322	156048	10646878	0.0147	9.1642
Doxylamine	Doxylamine-D5	6.563	996414	6317371	0.1577	9.7492
Bupropion	Bupropion-D9	6.812	323760	1321353	0.2450	9.2302
Zolpidem	Zolpidem-D6	6.882	1540652	10677065	0.1443	9.9082
Meprobamate	Meprobamate-D7	6.894	137818	531912	0.2591	10.0454
Venlafaxine	Venlafaxine-D6	7.046	1423537	6017250	0.2366	10.1366
Trazodone	Trazodone-D6	7.096	458625	1745003	0.2628	9.3465

Samples Report MDQ1\_001\_a cal 2-10ng.xlsx



Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	398141	2124755	0.1874	9.7328
Dextromethorphan	Dextromethorphan-D3	7.211	151344	654445	0.2313	9.5887
Diphenhydramine	Diphenhydramine-D3	7.214	882115	5097297	0.1731	9.5758
Promethazine	Promethazine-D3	7.409	592452	2494115	0.2375	9.7843
Clonazepam	Clonazepam-D4	7.445	158276	139341	1.1359	9.5590
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.501	51752	239593	0.2160	10.0268
Carisoprodol	Carisoprodol-D7	7.534	458253	2297952	0.1994	9.3950
Lorazepam	Clonazepam-D4	7.543	47775	139341	0.3429	12.9669
Alprazolam	Alprazolam-D5	7.568	1067164	3796163	0.2811	9.1202

Samples Report MDQ1\_001\_a cal 2-10ng.xlsx



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**Analysis Info** 

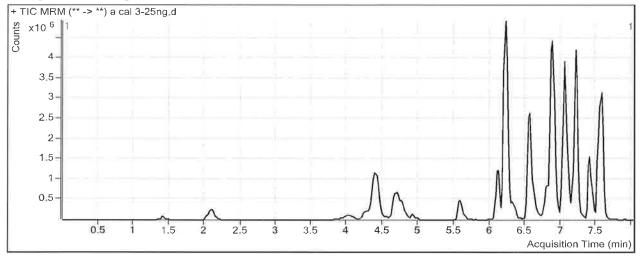
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**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-C1 **Sample Info** 

Inj Vol -1 Comment AM 28

### Sample Chromatogram



#### Results

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Morphine	Morphine-D6	1.408	122479	106550	1.1495	22.8845
Hydromorphone	Hydromorphone-D6	2.109	462425	791223	0.5844	20.8388
Codeine	Codeine-D6	4.052	192017	337384	0.5691	23.4094
Amphetamine	Amphetamine-D11	4.403	2504243	1002907	2.4970	24.4370
Oxycodone	Oxycodone-D6	4.431	1613893	2760332	0.5847	22.8013
Hydrocodone	Hydrocodone-D6	4.714	532669	1558475	0.3418	21.0769
Norhydrocodone	Norhydrocodone-D3	4.739	25104	395626	0.0635	28.4292
Methamphetamine	Methamphetamine-D11	4.784	1347517	1508348	0.8934	21.9347
6-MAM	6-MAM-D6	4.929	15670	328107	0.0478	2.0253
Phentermine	Phentermine-D5	5.626	500922	2024942	0.2474	23.3380
Dextrorphan	Dextrorphan-D3	6.122	778885	2817844	0.2764	21.9765
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	967673	1777944	0.5443	21.9426
Tramadol	Tramadol-13C-D3	6.243	5278837	11748642	0.4493	24.0092
Metoprolol	Tramadol-13C-D3	6.342	474447	11748642	0.0404	24.9627
Doxylamine	Doxylamine-D5	6.563	2914175	7171241	0.4064	23.5426
Bupropion	Bupropion-D9	6.812	1078509	1420546	0.7592	23.8566
Zolpidem	Zolpidem-D6	6.882	4592588	12077043	0.3803	24.6778
Meprobamate	Meprobamate-D7	6.914	386201	607794	0.6354	22.1771
Venlafaxine	Venlafaxine-D6	7.046	3961920	6909585	0.5734	23.4182
Trazodone	Trazodone-D6	7.096	1492500	2157607	0.6917	22.7417

Samples Report MDQ1\_002\_a cal 3-25ng.xlsx



# Multi-Drug Confirmatory Analysis Report Q (Q ) 3 **ISP FORENSICS - Pocatello Instrument # 59740**

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	1316731	2715328	0.4849	22.6366
Dextromethorphan	Dextromethorphan-D3	7.211	466112	787276	0.5921	22.3685
Diphenhydramine	Diphenhydramine-D3	7.234	2864414	5869528	0.4880	25.6653
Promethazine	Promethazine-D3	7.409	1822133	2945470	0.6186	23.4580
Clonazepam	Clonazepam-D4	7.445	482927	160103	3.0164	23.2919
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.521	153810	308858	0.4980	20.8262
Carisoprodol	Carisoprodol-D7	7.534	1387668	2515484	0.5517	24.0809
Lorazepam	Clonazepam-D4	7.563	145149	160103	0.9066	22.8505
Alprazolam	Alprazolam-D5	7.568	3065679	4102771	0.7472	23.8289

Samples Report MDQ1\_002\_a cal 3-25ng.xlsx



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**Analysis Info** 

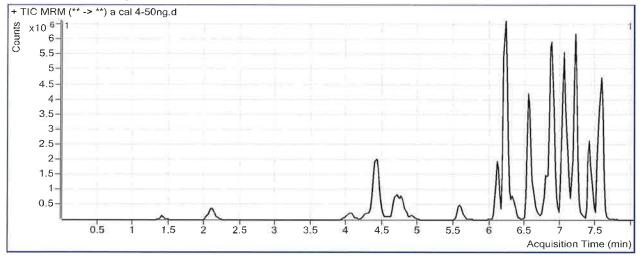
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**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-D1 **Sample Info** 

Inj Vol -1 Comment AM 28

### **Sample Chromatogram**



#### Results

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Morphine	Morphine-D6	1.408	254174	105023	2.4202	41.4379
Hydromorphone	Hydromorphone-D6	2.109	966830	728632	1.3269	45.1786
Codeine	Codeine-D6	4.052	364746	323021	1.1292	45.6115
Amphetamine	Amphetamine-D11	4.403	4112091	943507	4.3583	50.6296
Oxycodone	Oxycodone-D6	4.410	3379292	2667921	1.2666	48.2208
Hydrocodone	Hydrocodone-D6	4.714	1163914	1414358	0.8229	47.0637
Norhydrocodone	Norhydrocodone-D3	4.759	47057	356505	0.1320	46.0609
Methamphetamine	Methamphetamine-D11	4.784	2376009	1243375	1.9109	45.1061
6-MAM	6-MAM-D6	4.929	35421	305125	0.1161	4.7031
Phentermine	Phentermine-D5	5.606	997699	1830751	0.5450	47.0702
Dextrorphan	Dextrorphan-D3	6.102	1 <i>77</i> 6980	2786133	0.6378	48.3621
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	1985062	1587346	1.2506	48.3934
Tramadol	Tramadol-13C-D3	6.223	11192132	11559424	0.9682	51.2212
Metoprolol	Tramadol-13C-D3	6.342	955795	11559424	0.0827	50.9403
Doxylamine	Doxylamine-D5	6.563	6116887	6972205	0.8773	49.6686
Bupropion	Bupropion-D9	6.812	2331157	1573910	1.4811	44.3912
Zolpidem	Zolpidem-D6	6.882	9028262	11444527	0.7889	50.2513
Meprobamate	Meprobamate-D7	6.894	773935	569051	1.3600	45.5380
Venlafaxine	Venlafaxine-D6	7.046	8670238	6983903	1.2415	49.7616
Trazodone	Trazodone-D6	7.096	3126990	2018236	1.5494	49.5257

Samples Report MDQ1\_003\_a cai 4-50ng.xisx





# Multi-Drug Confirmatory Analysis Report Q CQ Compound Pram-D6 **ISP FORENSICS - Pocatello Instrument # 59740**

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	2808408	2729685	1.0288	46.2252
Dextromethorphan	Dextromethorphan-D3	7.211	1054882	794343	1.3280	48.4360
Diphenhydramine	Diphenhydramine-D3	7.234	6085109	6310810	0.9642	49.9927
Promethazine	Promethazine-D3	7.409	4288011	3326847	1.2889	47.5089
Clonazepam	Clonazepam-D4	7.445	945500	147323	6.4179	48.1329
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.501	301986	255605	1.1815	47.0001
Carisoprodol	Carisoprodol-D7	7.534	2734917	2331825	1.1729	49.9819
Lorazepam	Clonazepam-D4	7.563	343016	147323	2.3283	47.7771
Alprazolam	Alprazolam-D5	7.568	6032361	3789945	1.5917	50.4769

Samples Report MDQ1\_003\_a cal 4-50ng.xlsx



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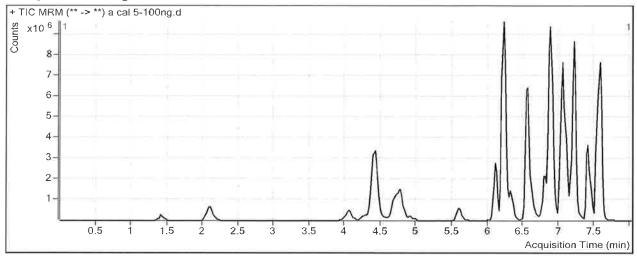
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**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

**Position** P1-E1 **Sample Info** 

Inj Vol -1 Comment AM 28

### Sample Chromatogram



#### Results

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Morphine	Morphine-D6	1.408	507185	79319	6.3942	99.4628
Hydromorphone	Hydromorphone-D6	2.109	1956875	655648	2.9846	99.5230
Codeine	Codeine-D6	4.052	733495	301255	2.4348	97.3718
Amphetamine	Amphetamine-D11	4.403	6848273	831013	8.2409	105.2653
Oxycodone	Oxycodone-D6	4.410	6744377	2446560	2.7567	103.7605
Hydrocodone	Hydrocodone-D6	4.714	2304504	1314442	1.7532	97.3098
Norhydrocodone	Norhydrocodone-D3	4.739	96966	307333	0.3155	93.2666
Methamphetamine	Methamphetamine-D11	4.784	5028140	1161165	4.3303	100.1976
6-MAM	6-MAM-D6	4.929	64771	280678	0.2308	9.1973
Phentermine	Phentermine-D5	5.606	1833563	1575911	1.1635	96.3963
Dextrorphan	Dextrorphan-D3	6.102	3157972	2340741	1.3491	100.2990
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	4033667	1484922	2.7164	103.2905
Tramadol	Tramadol-13C-D3	6.223	20694703	10384292	1.9929	104.9548
Metoprolol	Tramadol-13C-D3	6,322	1836575	10384292	0.1769	108.7731
Doxylamine	Doxylamine-D5	6.563	11319768	6048215	1.8716	104.8249
Bupropion	Bupropion-D9	6.812	3798774	1150545	3.3017	96.1780
Zolpidem	Zolpidem-D6	6.882	18292742	10858221	1.6847	106.3193
Meprobamate	Meprobamate-D7	6.894	1597571	495858	3.2218	105.5589
Venlafaxine	Venlafaxine-D6	7.046	15429876	5667620	2.7225	108.1610
Trazodone	Trazodone-D6	7.096	5539012	1795130	3.0856	97.5019

Samples Report MDQ1\_004\_a cal 5-100ng.xlsx



# Multi-Drug Confirmatory Analysis Report of Cal 5 Compound Pram-D6 RT Page 25 **ISP FORENSICS - Pocatello Instrument # 59740**

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	5122241	2228424	2.2986	101.2920
Dextromethorphan	Dextromethorphan-D3	7.211	1952429	696165	2.8045	100.7368
Diphenhydramine	Diphenhydramine-D3	7.234	10831924	5180350	2.0910	107.5507
Promethazine	Promethazine-D3	7.409	7632676	2720655	2.8055	101.9245
Clonazepam	Clonazepam-D4	7.445	1799089	132496	13.5784	100.4256
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.501	621077	239704	2.5910	100.9808
Carisoprodol	Carisoprodol-D7	7.534	5203562	2120086	2.4544	103.4145
Lorazepam	Clonazepam-D4	7.563	629761	132496	4.7531	90.2886
Alprazolam	Alprazolam-D5	7.568	11606821	3305731	3.5111	111.0480

Samples Report MDQ1\_004\_a cal 5-100ng.xlsx





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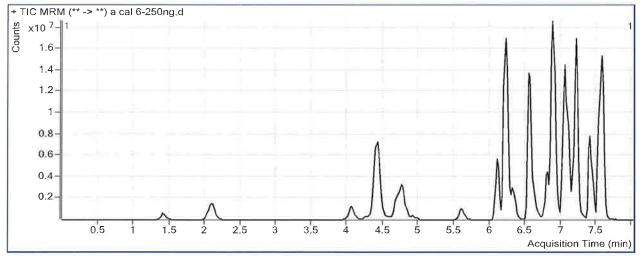
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**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

Position P1-F1 Sample Info

Inj Vol -1 Comment AM 28

### Sample Chromatogram



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	Final Conc
Morphine	Morphine-D6	1.408	1330194	82107	16.2007	242.6482
Hydromorphone	Hydromorphone-D6	2.109	4974898	624006	7.9725	263.0369
Codeine	Codeine-D6	4.052	1885913	285006	6,6171	263.1758
Amphetamine	Amphetamine-D11	4.403	15020135	765163	19.6300	265.5333
Oxycodone	Oxycodone-D6	4.410	17086410	2391957	7.1433	267.2666
Hydrocodone	Hydrocodone-D6	4.695	5628843	1190752	4.7271	257.9344
Norhydrocodone	Norhydrocodone-D3	4.759	243631	266489	0.9142	247.2787
Methamphetamine	Methamphetamine-D11	4.784	11072584	903369	12.2570	280.7013
6-MAM	6-MAM-D6	4.929	169580	261943	0.6474	25.5246
Phentermine	Phentermine-D5	5.606	4186688	1392020	3.0076	243.4624
Dextrorphan	Dextrorphan-D3	6.102	7550247	2123482	3.5556	261.3991
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	9322982	1352609	6.8926	259.6901
Tramadol	Tramadol-13C-D3	6.223	44864935	9787865	4.5837	240.8201
Metoprolol	Tramadol-13C-D3	6.342	4035649	9787865	0.4123	253.3624
Doxylamine	Doxylamine-D5	6.563	26127098	5649253	4.6249	257.5622
Bupropion	Bupropion-D9	6.812	8884234	1027044	8.6503	248.3185
Zolpidem	Zolpidem-D6	6.882	42168555	10080001	4.1834	262.7090
Meprobamate	Meprobamate-D7	6.914	3797064	469873	8.0810	262.2119
Venlafaxine	Venlafaxine-D6	7.046	34857689	5209471	6.6912	264.6585

12989928

1530706

7.096

Samples Report MDQ1\_005\_a cal 6-250ng.xlsx

Trazodone-D6

Trazodone

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8.4862





# FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report 9 6916 **ISP FORENSICS - Pocatello Instrument # 59740**

Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	Final Conc
Citalopram	Citalopram-D6	7.179	12171236	1980978	6.1441	268.0623
Dextromethorphan	Dextromethorphan-D3	7.211	4288469	615975	6.9621	248.0003
Diphenhydramine	Diphenhydramine-D3	7.234	24116172	4444115	5.4265	277.9462
Promethazine	Promethazine-D3	7.409	19058077	2605837	7.3136	263.6829
Clonazepam	Clonazepam-D4	7.445	4554558	127924	35.6037	261.2740
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.521	1492698	228390	6.5357	252.0490
Carisoprodol	Carisoprodol-D7	7.534	11399295	1866028	6.1089	255.7827
Lorazepam	Clonazepam-D4	7.563	1648657	127924	12.8878	232.9119
Alprazolam	Alprazolam-D5	7.568	25469143	2885687	8.8260	278.7681

Samples Report MDQ1\_005\_a cal 6-250ng.xlsx



Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

 Analysis Time
 9/20/2018 1:47 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 1:55 PM
 Reporter Name
 ISPUser

 Last Calib Update
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 Batch State
 Processed

**Analysis Info** 

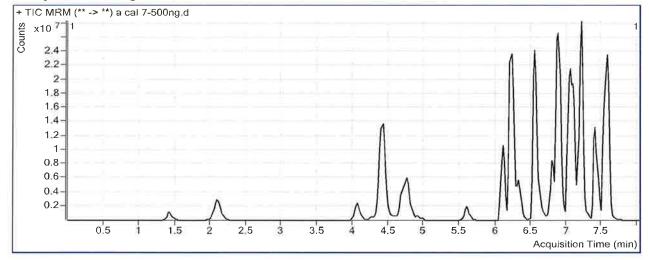
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**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

Position P1-G1 Sample Info

Inj Vol -1 Comment AM 28

### Sample Chromatogram



#### Results

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Morphine	Morphine-D6	1.408	2636972	75513	34.9208	515.9798
Hydromorphone	Hydromorphone-D6	2.109	9757030	583203	16.7301	550.1304
Codeine	Codeine-D6	4.052	3733905	276879	13.4857	535.4756
Amphetamine	Amphetamine-D11	4.403	27619603	777185	35.5380	489.3917
Oxycodone	Oxycodone-D6	4.410	35283257	2424274	14.5542	543.4995
Hydrocodone	Hydrocodone-D6	4.695	11038128	1242635	8.8828	482.3890
Norhydrocodone	Norhydrocodone-D3	4.759	443997	229452	1.9350	509.8673
Methamphetamine	Methamphetamine-D11	4.784	19557590	818867	23.8837	545.4598
6-MAM	6-MAM-D6	4.929	354770	259512	1.3671	53.7284
Phentermine	Phentermine-D5	5.606	8143120	1290540	6.3099	506.8069
Dextrorphan	Dextrorphan-D3	6.102	15075846	2057188	7.3284	536.8602
7-aminoclonazepam	7-Aminoclonazepam-D4	6.196	17146894	1237273	13.8586	520.5 <i>7</i> 07
Tramadol	Tramadol-13C-D3	6.223	69923528	10229428	6.8355	358.9055
Metoprolol	Tramadol-13C-D3	6.322	7806003	10229428	0.7631	468.7759
Doxylamine	Doxylamine-D5	6.542	50940567	5723003	8.9010	494.7792
Bupropion	Bupropion-D9	6.791	17722732	965801	18.3503	524.2355
Zolpidem	Zolpidem-D6	6.882	68510439	9552538	7.1720	449.7594
Meprobamate	Meprobamate-D7	6.894	7226522	437507	16.5175	534.1897
Venlafaxine	Venlafaxine-D6	7.046	59202438	5127397	11.5463	456.1060
Trazodone	Trazodone-D6	7.096	26896615	1533961	17.5341	548.7329

Samples Report MDQ1\_006\_a cal 7-500ng.xlsx





Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	21575763	1757077	12.2793	534.1385
Dextromethorphan	Dextromethorphan-D3	7.191	8704947	584548	14.8917	528.8760
Diphenhydramine	Diphenhydramine-D3	7.214	42776160	4307708	9.9301	508.0095
Promethazine	Promethazine-D3	7.409	32962074	2294634	14.3648	516.6906
Clonazepam	Clonazepam-D4	7.445	8384377	120317	69.6857	510.1713
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.501	2958902	210489	14.0573	540.0951
Carisoprodol	Carisoprodol-D7	7.534	17293829	1530378	11.3004	472.2373
Lorazepam	Clonazepam-D4	7.563	3184570	120317	26.4682	471.0098
Alprazolam	Alprazolam-D5	7.568	41233701	2432475	16.9513	535.1749

Samples Report MDQ1\_006\_a cal 7-500ng.xlsx



Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1a.batch.bin

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 ISPUser

 Report Time
 9/20/2018 1:55 PM
 Reporter Name
 ISPUser

 Last Calib Update
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 Batch State
 Processed

**Analysis Info** 

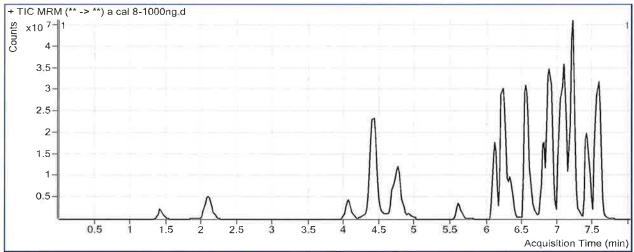
Acq Time2018-09-13 18:08Data Filea cal 8-1000ng.dSample TypeCalibrationSample Namea cal 8-1000ng

**Dilution** 1 **Acq Method** MD Quant Panel 1a 7-11-18\_volume test.m

Position P1-H1 Sample Info

Inj Vol -1 Comment AM 28

### Sample Chromatogram



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Morphine	Morphine-D6	1.408	5066775	69338	73.0737	1073.0525
Hydromorphone	Hydromorphone-D6	2.089	19012155	556697	34.1517	1121.2515
Codeine	Codeine-D6	4.052	7066684	250900	28.1654	1117.4379
Amphetamine	Amphetamine-D11	4.403	48958310	743149	65.8796	916.3595
Oxycodone	Oxycodone-D6	4.410	67679588	2496068	27.1145	1011.6732
Hydrocodone	Hydrocodone-D6	4.695	21692409	1153987	18.7978	1017.9069
Norhydrocodone	Norhydrocodone-D3	4.739	797434	207622	3.8408	1000.0973
Methamphetamine	Methamphetamine-D11	4.764	40950339	912595	44.8724	1023.4031
6-MAM	6-MAM-D6	4.929	728890	252618	2.8853	113.2289
Phentermine	Phentermine-D5	5.606	16036945	1275540	12.5727	1006.2523
Dextrorphan	Dextrorphan-D3	6.102	28451930	1989808	14.2988	1045.7930
7-aminoclonazepam	7-Aminoclonazepam-D4	6.216	28255472	1091718	25.8817	970.8381
Tramadol	Tramadol-13C-D3	6.223	93667439	8717044	10.7453	563.9371
Metoprolol	Tramadol-13C-D3	6.322	14069306	8717044	1.6140	991.3145
Doxylamine	Doxylamine-D5	6.542	81320869	6138090	13.2486	735.9570
Bupropion	Bupropion-D9	6.812	36420282	1051421	34.6391	987.5711
Zolpidem	Zolpidem-D6	6.882	96547608	8978459	10.7532	673.9068
Meprobamate	Meprobamate-D7	6.914	12894059	329127	39.1765	1264.6784
Venlafaxine	Venlafaxine-D6	7.046	86208140	4979472	17.3127	683.4896
Trazodone	Trazodone-D6	7.096	51216073	1638657	31.2549	977.2376

Samples Report MDQ1\_007\_a cal 8-1000ng.xlsx





Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Citalopram	Citalopram-D6	7.179	39291504	1696046	23.1665	1006.2948
Dextromethorphan	Dextromethorphan-D3	7.211	17205364	566606	30.3657	1076.9751
Diphenhydramine	Diphenhydramine-D3	7.234	68204614	4348775	15.6836	801.9225
Promethazine	Promethazine-D3	7.409	52945581	2264131	23.3845	840.3278
Clonazepam	Clonazepam-D4	7.445	14643333	102738	142.5308	1042.1510
a-hydroxyalprazolam	a-hydroxyalprazolam-D5	7.501	5527110	194516	28.4147	1089.9306
Carisoprodol	Carisoprodol-D7	7.534	29503608	1161509	25.4011	1060.1521
Lorazepam	Clonazepam-D4	7.543	6154245	102738	59.9023	1057.1951
Alprazolam	Alprazolam-D5	7.588	57386914	1953916	29.3702	927.0713

Samples Report MDQ1\_007\_a cal 8-1000ng.xlsx



Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 Reporter Name
 ISPUser

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 Batch State
 Processed

**Analysis Info** 

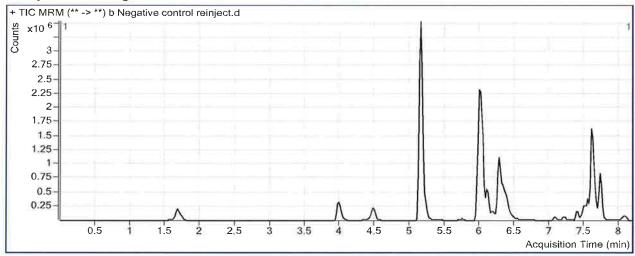
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**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

Position P1-E2 Sample Info

Inj Vol -1 Comment AM 28

#### Sample Chromatogram



Negative control reinjected due to carryover in original injection. 5





**Batch Data Path** C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

 Analysis Time
 9/20/2018 2:01 PM
 Analyst Name
 ISPUser

 Report Time
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 Reporter Name
 ISPUser

 Last Calib Update
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 Batch State
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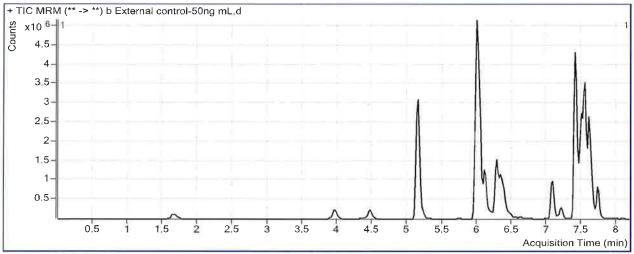
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Position P1-F2 Sample Info

Inj Vol -1 Comment AM 28; WS121217 50 ng trazodone, ketamine, morphine, quetiapine

### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Ketamine	Ketamine-D4	6.002	8354548	6044425	1.3822	60.2355
Mitragynine	EDDP-D3	7.156	8902	1084971	0.0082	2.0957
Quetiapine	Quetiapine-D8	7.399	9155361	2191975	4.1768	43.0980
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	23425	2271793	0.0103	2.8173 < 5
Fluoxetine	Fluoxetine-D6	7.541	84438	8134515	0.0104	0.7357 < 25
Sertraline	Sertraline-D3	7.603	39349	3720178	0.0106	1.9093
Temazepam	Temazepam-D5	7.626	19182	4169707	0.0046	2.1384 < 5





**Batch Data Path** C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

 Analysis Time
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 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:04 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 2:01 PM
 Batch State
 Processed

**Analysis Info** 

 Acq Time
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 b QC 10 ( QC1).d

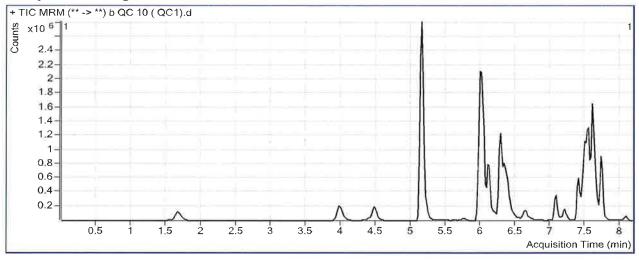
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 QC
 Sample Name
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**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

Position P1-A2 Sample Info

Inj Vol -1 Comment AM 28

#### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	Final Conc
Oxymorphone	Oxymorphone-D3	1.688	155917	671271	0.2323	9.0669
Dihydrocodeine	Dihydrocodeine-D6	4.011	161095	960954	0.1676	10.0193
Noroxycodone	Noroxycodone-D3	4.508	218179	874526	0.2495	9.0315
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	1873735	9615061	0.1949	10.1156
Benzoylecgonine	Benzoylecgonine-d8	5.751	22983	83434	0.2755	15.2052
Ketamine	Ketamine-D4	6.002	881850	4176817	0.2111	9.9304
- Norfentanyl	Norfentanyl-D5	6.044	67657	4876531	0.0139	1.6407-4
Cocaine	Cocaine-d3	6.272	289675	4680460	0.0619	9.6682
alpha-PVP	alpha-PVP-d8	6.368	402128	2533454	0.1587	9.4151
Mirtazapine	alpha-PVP-d8	6.645	325049	2533454	0.1283	9.1035
Fentanyl	Fentanyl-D5	7.078	1 <i>7</i> 550	1248765	0.0141	1.2344
Mitragynine	EDDP-D3	7.156	71896	411649	0.1747	7.8896
EDDP	EDDP-D3	7.209	73102	411649	0.1776	13.9743
Quetiapine	Quetiapine-D8	7.399	850467	899835	0.9451	10.4313
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	150655	695653	0.2166	10.5632
Methadone	Methadone-D9	7.502	627776	2518258	0.2493	11.0186
Fluoxetine	Fluoxetine-D6	7.541	494519	2372060	0.2085	9.8849
Oxazepam	Oxazepam-D5	7.568	49527	298985	0.1657	13.2878
Buprenorphine	Buprenorphine-D4	7.576	12409	341610	0.0363	0.9973

Samples Report MDQ1\_013\_b QC 10 ( QC1).xlsx

\*outside curve range





Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Sertraline	Sertraline-D3	7.603	169069	1055189	0.1602	9.0062
Temazepam	Temazepam-D5	7.626	467424	2815540	0.1660	10.0449
Nordiazepam	Nordiazepam-D5	7.695	130021	410883	0.3164	9.5051
Diazepam	Diazepam-D5	7.731	356444	1611646	0.2212	10.4268

Samples Report MDQ1\_013\_b QC 10 ( QC1).xlsx





**Batch Data Path** C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:04 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 2:01 PM
 Batch State
 Processed

**Analysis Info** 

 Acq Time
 2018-09-13 23:54
 Data File
 b QC 100 (QC2).d

 Sample Type
 QC
 Sample Name
 b QC 100 (QC2)

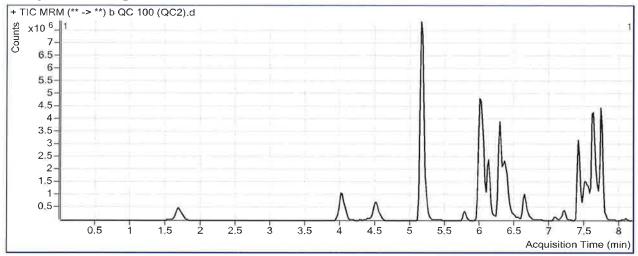
 Dilution
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 Acq Method
 MD Quant Panel 1b

Dilution 1 Acq Method MD Quant Panel 1b 7-11-18\_volume test.m

**Position** P1-B2 **Sample Info** 

Inj Vol -1 Comment AM 28

### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Oxymorphone	Oxymorphone-D3	1.688	2094334	735060	2.8492	93.4054
Dihydrocodeine	Dihydrocodeine-D6	4.031	2182994	1104500	1.9765	97.2809
Noroxycodone	Noroxycodone-D3	4.508	2902925	904070	3.2110	97.8582
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	22288273	10538984	2.1148	103.7457
Benzoylecgonine	Benzoylecgonine-d8	5.771	420671	90758	4.6351	243.9071
Ketamine	Ketamine-D4	6.002	10501871	4616237	2.2750	98.5872
Norfentanyl	Norfentanyl-D5	6.044	878602	4968118	0.1768	8.7154
Cocaine	Cocaine-d3	6.272	3478539	4753292	0.7318	92.3902
alpha-PVP	alpha-PVP-d8	6.368	4527434	2380555	1.9018	96.8543
Mirtazapine	alpha-PVP-d8	6.645	2365834	2380555	0.9938	53.9860
Norbuprenorphine	Norbuprenorphine-D3	6.994	980	8621	0.1137	-7.3966 Did not
Fentanyl	Fentanyl-D5	7.078	60758	371999	0.1633	9.8756 evaluate
Mitragynine	EDDP-D3	7.176	308846	283901	1.0879	39.6775
EDDP	EDDP-D3	7.209	577132	283901	2.0329	83.8432
Quetiapine	Quetiapine-D8	7.399	7006160	655047	10.6957	108,9939
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	532614	222914	2.3893	92.1608
Methadone	Methadone-D9	7.502	2690213	1002240	2.6842	108.2618
Fluoxetine	Fluoxetine-D6	7.541	1557221	688930	2.2603	104.6521
Oxazepam	Oxazepam-D5	7.568	661808	376494	1.7578	94.5444

Samples Report MDQ1\_017\_b QC 100 (QC2).xlsx





### 

Compound	<b>ISTD Compound</b>	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Buprenorphine	Buprenorphine-D4	7.576	44966	129416	0.3475	9.1676
Sertraline	Sertraline-D3	7.603	588677	310889	1.8935	91.2048
Temazepam	Temazepam-D5	7.626	6795828	3421395	1.9863	99.2057
Nordiazepam	Nordiazepam-D5	7.695	2081229	522686	3.9818	98.3705
Diazepam	Diazepam-D5	7.731	4639977	1964738	2.3616	90.6710

Samples Report MDQ1\_017\_b QC 100 (QC2).xlsx





**Batch Data Path** C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:04 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 2:01 PM
 Batch State
 Processed

**Analysis Info** 

 Acq Time
 2018-09-14 03:34
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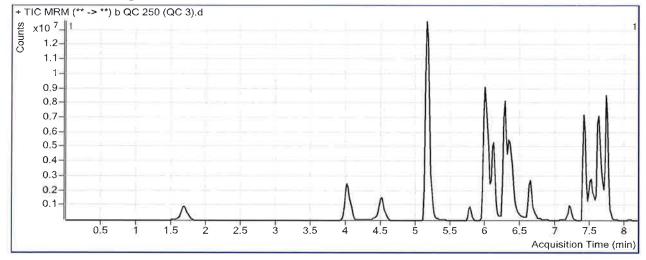
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**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

**Position** P1-C2 **Sample Info** 

Inj Vol -1 Comment AM 28

### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Oxymorphone	Oxymorphone-D3	1.688	4863965	653435	7.4437	241.4765
Dihydrocodeine	Dihydrocodeine-D6	4.011	5308795	1014092	5.2350	254.4823
Noroxycodone	Noroxycodone-D3	4.508	6853309	826326	8.2937	250.3111
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	48938853	9786996	5.0004	244.4642
Benzoylecgonine	Benzoylecgonine-d8	5.771	1116218	77727	14.3607	754.1053 Out side
Ketamine	Ketamine-D4	6.002	24991740	4265898	5.8585	252.5235 Curve range
Norfentanyl	Norfentanyl-D5	6.044	2537416	4881973	0.5198	23.6006
Cocaine	Cocaine-d3	6.272	8785271	4588837	1.9145	238.4255
alpha-PVP	alpha-PVP-d8	6.368	12003961	2588560	4.6373	234.0730
Mirtazapine	alpha-PVP-d8	6.645	6383671	2588560	2.4661	130.3340
-Norbuprenorphine	Norbuprenorphine-D3	7.034	2850	7024	0.4057	-20.0695 Did not
Fentanyl	Fentanyl-D5	7.078	87741	228867	0.3834	22.6131 Evaluate
Mitragynine	EDDP-D3	7.176	673660	347510	1.9385	69.2883
EDDP	EDDP-D3	7.209	1899373	347510	5.4657	213.1202
Quetiapine	Quetiapine-D8	7.399	17182983	597263	28.7696	291.6927
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	645208	109080	5.9150	224.5668
Methadone	Methadone-D9	7.502	5682347	802356	7.0821	283.9001
Fluoxetine	Fluoxetine-D6	7.541	1485257	263816	5.6299	260.2773
Oxazepam	Oxazepam-D5	7.568	1402983	299281	4.6878	244.0793

Samples Report MDQ1\_023\_b QC 250 (QC 3).xlsx





Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Buprenorphine	Buprenorphine-D4	7.576	89890	84426	1.0647	28.0028
Sertraline	Sertraline-D3	7.603	531857	107897	4.9293	235.1705
Temazepam	Temazepam-D5	7.626	14117348	2861758	4.9331	243.5487
Nordiazepam	Nordiazepam-D5	7.695	4225663	424491	9.9546	243.1804
Diazepam	Diazepam-D5	7.731	10352182	1622064	6.3821	241.3956

Samples Report MDQ1\_023\_b QC 250 (QC 3).xlsx



**Batch Data Path** C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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**Analysis Info** 

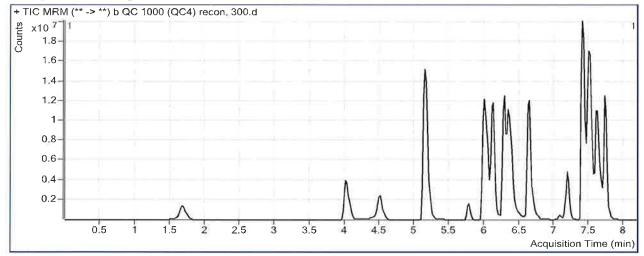
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Dilution 1 Acq Method MD Quant Panel 1b 7-11-18\_volume test.m

Position P1-D2 Sample Info

Inj Vol -1 Comment AM 28

### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Oxymorphone	Oxymorphone-D3	1.688	7834177	226636	34.5673	1115.6166
Dihydrocodeine	Dihydrocodeine-D6	4.011	8206104	321075	25.5582	1234.9233
Noroxycodone	Noroxycodone-D3	4.508	11502500	307879	37.3605	1122.1443
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	66299959	3379031	19.6210	957.4602
Benzoylecgonine	Benzoylecgonine-d8	5.771	1994225	28604	69.7175	3658.0682
Ketamine	Ketamine-D4	6.002	41560650	1644446	25.2733	1086.5243
Norfentanyl	Norfentanyl-D5	6.044	5327438	2187693	2.4352	106.7485
Cocaine	Cocaine-d3	6.272	14944966	1745552	8.5617	1059.2229
alpha-PVP	alpha-PVP-d8	6.368	25503496	1255312	20.3165	1020.5816
Mirtazapine	alpha-PVP-d8	6.645	29607198	1255312	23.5855	1225.5145
Norbuprenorphine	Norbuprenorphine-D3	7.014	24855	11284	2.2027	98.0612
Fentanyl	Fentanyl-D5	7.078	783853	403552	1.9424	112.8608
Mitragynine	EDDP-D3	7.176	4746487	286118	16.5892	579.2635
EDDP	EDDP-D3	7.189	7691578	286118	26.8825	1019.6661
Quetiapine	Quetiapine-D8	7.399	50851743	570350	89.1588	902,1338
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	5039250	165620	30.4265	1145.0922
Methadone	Methadone-D9	7.502	36261900	1361640	26.6310	1064.6285
Fluoxetine	Fluoxetine-D6	7.541	10507853	418895	25.0847	1158.8130
Oxazepam	Oxazepam-D5	7.568	2326541	103876	22.3972	1147.8813

Samples Report MDQ1\_026\_b QC 1000 (QC4) recon. 300.xlsx

Printed at: 2:04 PM on: 9/20/2018

\* Sample reconstituted in 300 UL of 20% methanal. Do not use QC data \* PTS





Compound	<b>ISTD Compound</b>	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Buprenorphine	Buprenorphine-D4	7.576	564876	122176	4.6235	121.4547
Sertraline	Sertraline-D3	7.603	4222962	171804	24.5802	1167.0772
Temazepam	Temazepam-D5	7.626	20458741	914649	22.3679	1097.5470
Nordiazepam	Nordiazepam-D5	7.695	6584270	131235	50.1716	1218.2289
Diazepam	Diazepam-D5	7.731	16428639	552885	29.7144	1116.1053

Samples Report MDQ1\_026\_b QC 1000 (QC4) recon. 300.xlsx



**Batch Data Path** 

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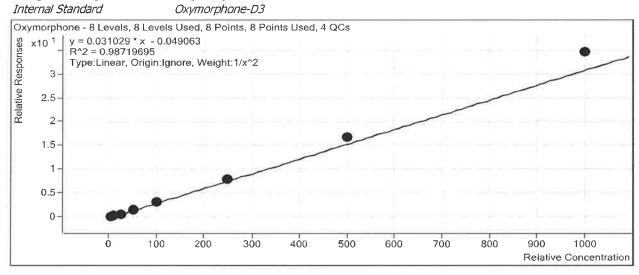
9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compound

Oxymorphone



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	5.4	108.2
b cal 2-10ng	2		10	9.1	90.8
b QC 10 ( QC1)	2		10	9.1	90.7
b cal 3-25ng	3	$\square$	25	21.2	84.7
b cal 4-50ng	4		50	45.9	91.7
b cal 5-100ng	5	☑	100	100.3	100.3
b QC 100 (QC2)	5	Ø	100	93.4	93.4
b cal 6-250ng	6	$ \mathbf{\nabla}$	250	258.9	103.6
b QC 250 (QC 3)	6		250	241.5	96.6
b cal 7-500ng	7	$\square$	500	544.9	109.0
b cal 8-1000ng	8		1000	1116.8	111.7
b QC 1000 (QC4) recon. 300	8	$\square$	1000	1115.6	111.6

istdnew1.xlsx Page 1 of 24



**Batch Data Path** 

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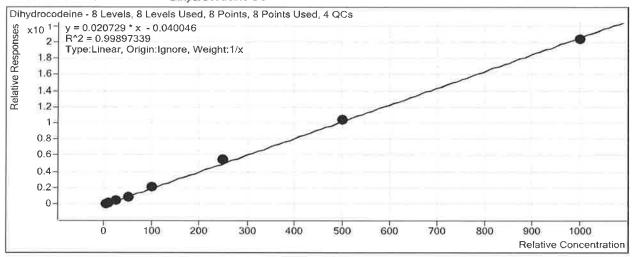
**Last Calib Update** 

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundDihydrocodeineInternal StandardDihydrocodeine-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	5.7	113.3
b cal 2-10ng	2	$\square$	10	9.6	95.6
ь QC 10 ( QC1)	2		10	10.0	100.2
b cal 3-25ng	3		25	22.4	89.7
b cal 4-50ng	4	$\square$	50	46.7	93.3
b cal 5-100ng	5	abla	100	103.0	103.0
b QC 100 (QC2)	5	☑	100	97.3	97.3
b cal 6-250ng	6	$\square$	250	264.4	105.8
b QC 250 (QC 3)	6		250	254.5	101.8
b cal 7-500ng	7		500	504.5	100.9
b cal 8-1000ng	8	abla	1000	983.7	98.4
b QC 1000 (QC4) recon. 300	8	$\square$	1000	1234.9	123.5

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**Batch Data Path** 

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Last Calib Update

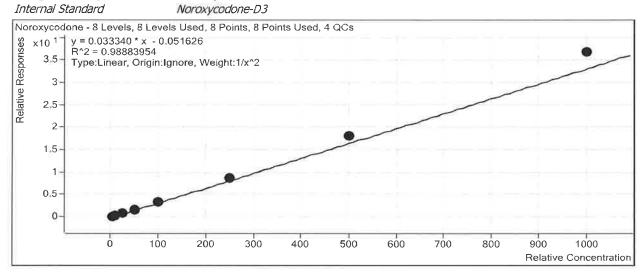
9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compound

Noroxycodone



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\overline{\checkmark}$	5	5.4	108.1
b cal 2-10ng	2	$\square$	10	9.0	90.0
b QC 10 ( QC1)	2	✓	10	9.0	90.3
b cal 3-25ng	3		25	21.9	87.5
b cal 4-50ng	4	✓	50	45.6	91.3
b cal 5-100ng	5		100	99.9	99.9
b QC 100 (QC2)	5	$\square$	100	97.9	97.9
b cal 6-250ng	6		250	260.9	104.4
ь QC 250 (QC 3)	6		250	250.3	100.1
b cal 7-500ng	7	$\square$	500	541.4	108.3
b cal 8-1000ng	8		1000	1105.2	110.5
b QC 1000 (QC4) recon. 300	8	Ø	1000	1122.1	112.2

istdnew1.xlsx Page 3 of 24

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**Batch Data Path** 

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**Last Calib Update** 

9/20/2018 2:01 PM

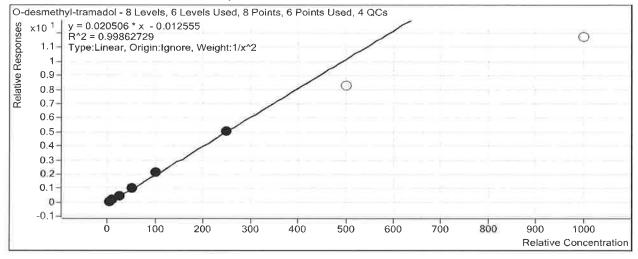
**Analyst Name** 

ISP TOX

Target Compound

O-desmethyl-tramadol

Internal Standard O-desmethyl-tramadol-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	5.1	101.4
b cal 2-10ng	2	☑	10	9.8	98.1
b QC 10 ( QC1)	2	$\square$	10	10.1	101.2
b cal 3-25ng	3	$   \overline{\square} $	25	23.9	95.7
b cal 4-50ng	4		50	51.0	101.9
b cal 5-100ng	5		100	104.1	104.1
b QC 100 (QC2)	5	$\checkmark$	100	103.7	103.7
b cal 6-250ng	6	☑	250	246.8	98.7
b QC 250 (QC 3)	6		250	244.5	97.8
b cal 7-500ng	7		500	404.6	80.9
b cal 8-1000ng	8		1000	572.4	57.2
b QC 1000 (QC4) recon. 300	8		1000	957.5	95.7

istdnew1.xlsx



**Batch Data Path** 

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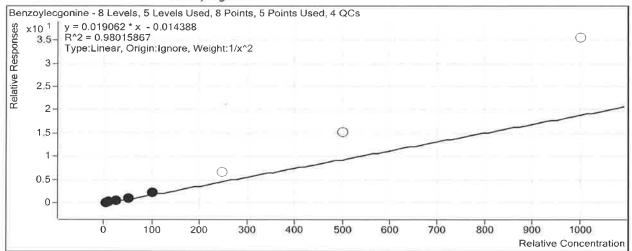
**Last Calib Update** 

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundBenzoylecgonineInternal StandardBenzoylecgonine-d8



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	5.3	105.3
b cal 2-10ng	2	Ø	10	9.3	93.1
b QC 10 ( QC1)	2		10	15.2	152.1
b cal 3-25ng	3	$\square$	25	22.0	88.1
b cal 4-50ng	4	$\square$	50	48.7	97.4
b cal 5-100ng	5		100	116.1	116.1
b QC 100 (QC2)	5		100	243.9	243.9
b cal 6-250ng	6		250	351.0	140.4
b QC 250 (QC 3)	6		250	754.1	301.6
b cal 7-500ng	7		500	801.6	160.3
b cal 8-1000ng	8		1000	1861.3	186.1
b QC 1000 (QC4) recon. 300	8	☑	1000	3658.1	365.8

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**Batch Data Path** 

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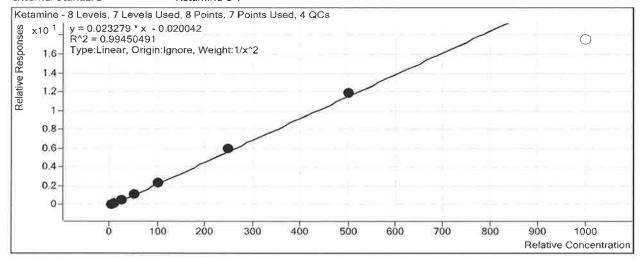
Last Calib Update

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundKetamineInternal StandardKetamine-D4



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	5.2	104.4
b cal 2-10ng	2		10	9.5	94.6
b QC 10 ( QC1)	2		10	9.9	99.3
b cal 3-25ng	3	$\square$	25	22.0	88.1
b cal 4-50ng	4		50	52.2	104.4
b cal 5-100ng	5		100	103.7	103.7
b QC 100 (QC2)	5	$\square$	100	98.6	98.6
b cal 6-250ng	6	$\checkmark$	250	257.1	102.8
b QC 250 (QC 3)	6	$\square$	250	252.5	101.0
b cal 7-500ng	7	$\square$	500	510.5	102.1
b cal 8-1000ng	8		1000	753.7	75.4
b QC 1000 (QC4) recon. 300	8		1000	1086.5	108.7

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**Batch Data Path** 

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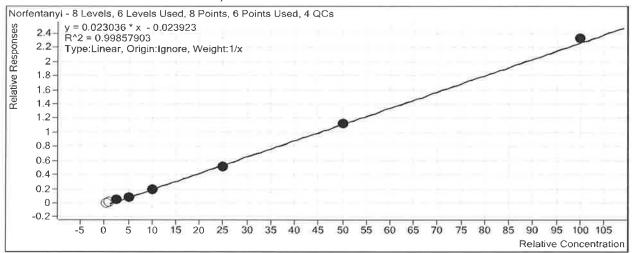
Last Calib Update

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundNorfentanylInternal StandardNorfentanyl-D5



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		0.5	1.3	267.2
b cal 2-10ng	2		1	1.7	168.4
b QC 10 ( QC1)	2	$\square$	1	1.6	164.1
b cal 3-25ng	3	Ø	2.5	2.8	113.4
b cal 4-50ng	4	$\square$	5	4.7	94.1
b cal 5-100ng	5	$\square$	10	9.7	97.1
b QC 100 (QC2)	5		10	8.7	87.2
b cal 6-250ng	6		25	23.5	94.0
b QC 250 (QC 3)	6	$\square$	25	23.6	94.4
b cal 7-500ng	7	$\square$	50	49.7	99.3
b cal 8-1000ng	8	abla	100	102.1	102.1
b QC 1000 (QC4) recon. 300	8		100	106.7	106.7

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**Batch Data Path** 

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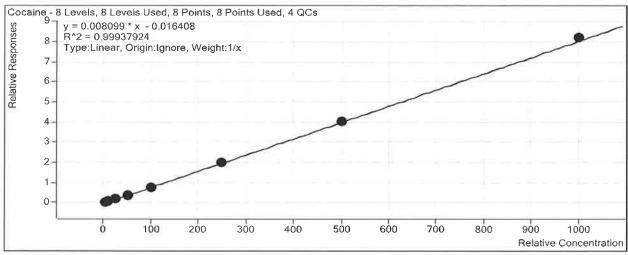
**Last Calib Update** 

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundCocaineInternal StandardCocaine-d3



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	6.1	121.8
b cal 2-10ng	2	☑	10	9.6	96.4
b QC 10 ( QC1)	2		10	9.7	96.7
b cal 3-25ng	3	$\square$	25	23.6	94.4
b cal 4-50ng	4		50	45.5	91.0
b cal 5-100ng	5	$\square$	100	96.9	96.9
b QC 100 (QC2)	5	$\square$	100	92.4	92.4
b cal 6-250ng	6	$\square$	250	246.7	98.7
ь QC 250 (QC 3)	6	$\square$	250	238.4	95.4
b cal 7-500ng	7	Ø	500	497.0	99.4
b cal 8-1000ng	8		1000	1014.6	101.5
b QC 1000 (QC4) recon. 300	8	$\square$	1000	1059.2	105.9

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**Batch Data Path** 

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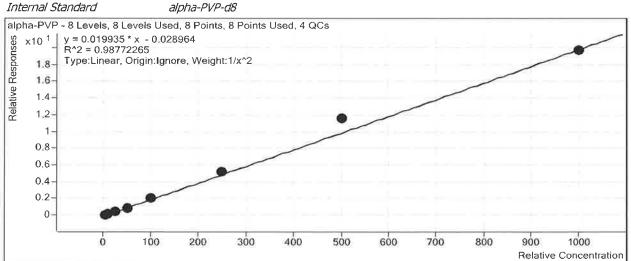
**Last Calib Update** 

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compoundalpha-PVPInternal Standardalpha-PVP-d8



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	5.3	106.8
b cal 2-10ng	2		10	9.1	90.8
ь QC 10 ( QC1)	2		10	9.4	94.2
b cal 3-25ng	3	$\square$	25	23.5	93.9
b cal 4-50ng	4	$\square$	50	43.2	86.3
b cal 5-100ng	5		100	101.8	101.8
b QC 100 (QC2)	5	$\square$	100	96.9	96.9
b cal 6-250ng	6		250	262.9	105.2
b QC 250 (QC 3)	6		250	234.1	93.6
b cal 7-500ng	7	☑	500	582.0	116.4
b cal 8-1000ng	8		1000	988.1	98.8
b QC 1000 (QC4) recon. 300	8	$\square$	1000	1020.6	102.1

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**Batch Data Path** 

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Last Calib Update

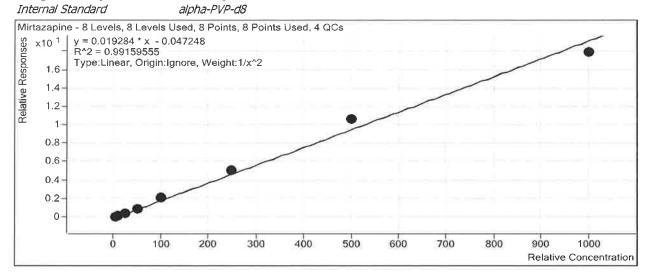
9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compound

Mirtazapine



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	5.2	104.7
b cal 2-10ng	2	$\square$	10	9.4	94.3
b QC 10 ( QC1)	2	$\square$	10	9.1	91.0
b cal 3-25ng	3	☑	25	22.8	91.3
b cal 4-50ng	4	$\square$	50	46.2	92.5
b cal 5-100ng	5	$\square$	100	108.7	108.7
b QC 100 (QC2)	5	☑	100	54.0	54.0
b cal 6-250ng	6	Ø	250	262.8	105.1
b QC 250 (QC 3)	6	$\square$	250	130.3	52.1
b cal 7-500ng	7		500	552.3	110.5
b cal 8-1000ng	8	$\square$	1000	929.7	93.0
b QC 1000 (QC4) recon. 300	8	$\square$	1000	1225.5	122.6

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**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

**Last Calib Update** 

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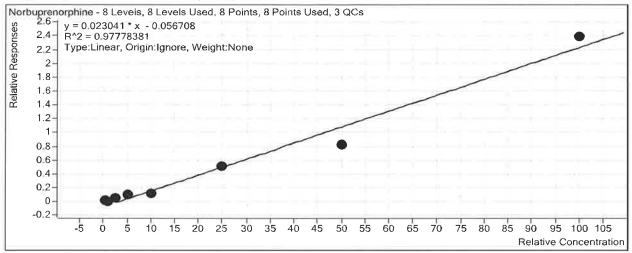
**Analyst Name** 

ISP TOX

Target Compound

Norbuprenorphine

Internal Standard Norbuprenorphine-D3



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	0.5	2.9	578.1
b cal 2-10ng	2	☑	1	2.8	282.1
b cal 2-10ng	2		1	2.8	282.1
b cal 3-25ng	3	$\square$	2.5	4.8	192.4
b cal 4-50ng	4		5	6.6	131.5
b cal 5-100ng	5	$\square$	10	7.8	78.1
b QC 100 (QC2)	5	Ø	10	7.4	74.0
b cal 6-250ng	6	☑	25	24.9	99.5
b QC 250 (QC 3)	6	☑	25	20.1	80.3
b cal 7-500ng	7	Ø	50	38.3	76.6
b cal 8-1000ng	8		100	105.9	105.9
b QC 1000 (QC4) recon. 300	8		100	98.1	98.1



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**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

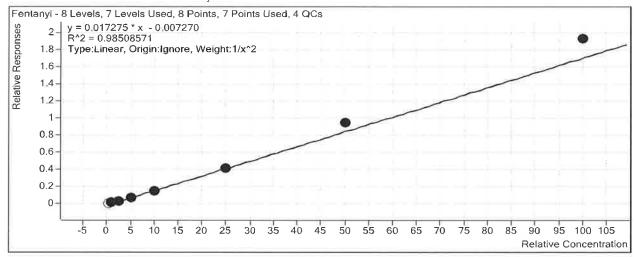
**Last Calib Update** 

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundFentanylInternal StandardFentanyl-D5



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		0.5	1.0	194.1
b cal 2-10ng	2	$\square$	1	1.1	107.5
Ь QC 10 ( QC1)	2	☑	1	1.2	123.4
b cal 3-25ng	3		2.5	2.2	88.0
b cal 4-50ng	4	$\square$	5	4.4	88.4
b cal 5-100ng	5		10	9.3	93.1
b QC 100 (QC2)	5	Ø	10	9.9	98.8
b cal 6-250ng	6		25	24.8	99.2
b QC 250 (QC 3)	6	$\square$	25	22.6	90.5
b cal 7-500ng	7	$\square$	50	55.8	111.6
b cal 8-1000ng	8	$\square$	100	112.2	112.2
b QC 1000 (QC4) recon. 300	8		100	112.9	112.9

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**Batch Data Path** 

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**Last Calib Update** 

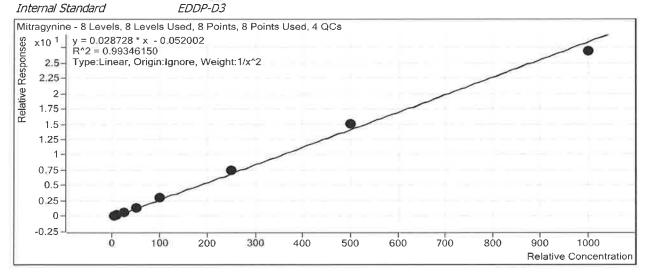
9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compound

Mitragynine



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	5.3	106.2
b cal 2-10ng	2		10	8.9	89.0
ь QC 10 ( QC1)	2		10	7.9	78.9
b cal 3-25ng	3	$\square$	25	23.8	95.3
b cal 4-50ng	4	$\checkmark$	50	48.7	97.4
b cal 5-100ng	5	$\square$	100	108.6	108.6
b QC 100 (QC2)	5	$\square$	100	39.7	39.7
b cal 6-250ng	6		250	259.0	103.6
b QC 250 (QC 3)	6	$\square$	250	69.3	27.7
b cal 7-500ng	7		500	530.0	106.0
b cal 8-1000ng	8		1000	939.9	94.0
b QC 1000 (QC4) recon. 300	8	$\square$	1000	579.3	57.9

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**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

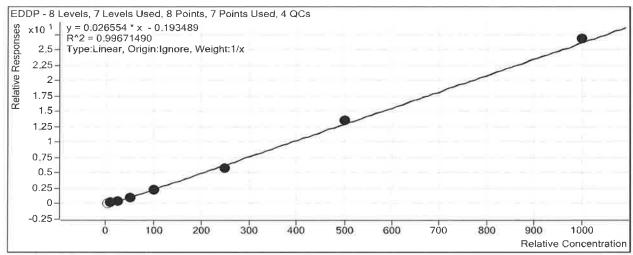
Last Calib Update

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundEDDPInternal StandardEDDP-D3



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	10.4	208.9
b cal 2-10ng	2	$\square$	10	12.7	126.9
b QC 10 ( QC1)	2		10	14.0	139.7
b cal 3-25ng	3	$\overline{\mathbf{Q}}$	25	24.3	97.1
b cal 4-50ng	4		50	43.9	87.7
b cal 5-100ng	5		100	92.7	92.7
b QC 100 (QC2)	5	$\checkmark$	100	83.8	83.8
b cal 6-250ng	6	$\square$	250	225.2	90.1
b QC 250 (QC 3)	6		250	213.1	85.2
b cal 7-500ng	7	✓	500	518.1	103.6
b cal 8-1000ng	8	$\overline{\checkmark}$	1000	1018.1	101.8
b QC 1000 (QC4) recon. 300	8		1000	1019.7	102.0

istdnew1.xlsx Page 14 of 24



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

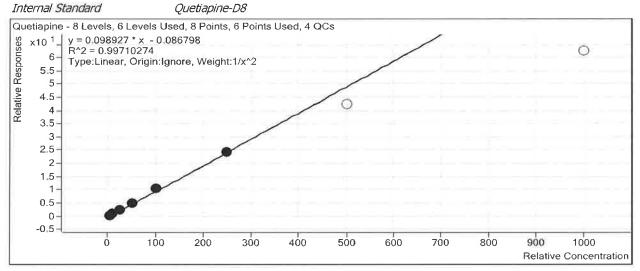
Last Calib Update

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundQuetiapineInternal StandardQuetiapine-D8



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	5.0	100.8
b cal 2-10ng	2		10	10.0	100.5
b QC 10 ( QC1)	2	$\overline{\checkmark}$	10	10.4	104.3
b cal 3-25ng	3		25	23.3	93.3
b cal 4-50ng	4		50	49.8	99.7
b cal 5-100ng	5	$\overline{\checkmark}$	100	107.0	107.0
ь QC 100 (QC2)	5		100	109.0	109.0
b cal 6-250ng	6		250	246.7	98.7
b QC 250 (QC 3)	6		250	291.7	116.7
b cal 7-500ng	7		500	431.6	86.3
b cal 8-1000ng	8		1000	632.3	63.2
b QC 1000 (QC4) recon. 300	8		1000	902.1	90.2

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**Batch Data Path** 

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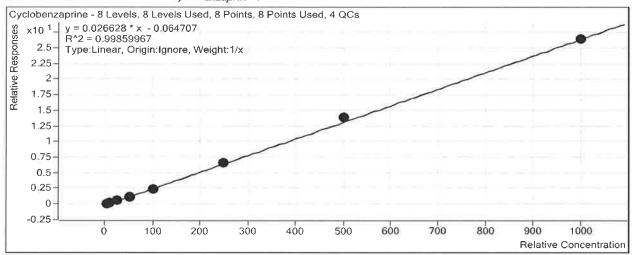
Last Calib Update

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundCyclobenzaprineInternal StandardCyclobenzaprine-D3



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	5.9	118.3
b cal 2-10ng	2	$\overline{\square}$	10	10.4	103.6
b QC 10 ( QC1)	2		10	10.6	105.6
b cal 3-25ng	3	$\checkmark$	25	23.6	94.5
b cal 4-50ng	4		50	44.2	88.5
b cal 5-100ng	5	$\checkmark$	100	91.8	91.8
b QC 100 (QC2)	5		100	92.2	92.2
b cal 6-250ng	6		250	249.4	99.8
b QC 250 (QC 3)	6		250	224.6	89.8
b cal 7-500ng	7		500	520.7	104.1
b cal 8-1000ng	8		1000	993.9	99.4
b QC 1000 (QC4) recon. 300	8	$\checkmark$	1000	1145.1	114.5

istdnew1.xlsx Page 16 of 24

15 D

**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

Last Calib Update

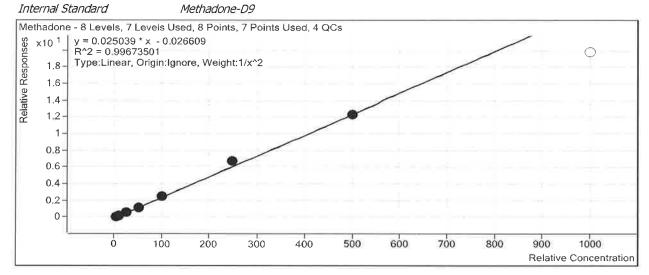
9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compound

Methadone



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	5.2	103.9
b cal 2-10ng	2	$\square$	10	9.2	92.5
b QC 10 ( QC1)	2		10	11.0	110.2
b cal 3-25ng	3	$\square$	25	25.1	100.5
b cal 4-50ng	4		50	47.9	95.8
b cal 5-100ng	5		100	101.5	101.5
b QC 100 (QC2)	5		100	108.3	108.3
b cal 6-250ng	6		250	267.3	106.9
b QC 250 (QC 3)	6		250	283.9	113.6
b cal 7-500ng	7		500	494.9	99.0
b cal 8-1000ng	8		1000	790.5	79.0
b QC 1000 (QC4) recon. 300	8		1000	1064.6	106.5

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15



**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

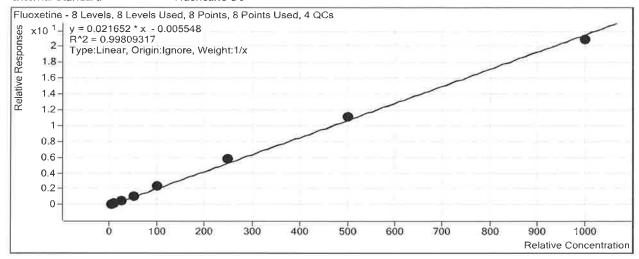
Last Calib Update

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundFluoxetineInternal StandardFluoxetine-D6



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	4.8	95.2
b cal 2-10ng	2		10	9.6	96.2
b QC 10 ( QC1)	2		10	9.9	98.8
b cal 3-25ng	3	$\square$	25	24.0	96.1
b cal 4-50ng	4	$\square$	50	50.2	100.4
b cal 5-100ng	5		100	105.6	105.6
b QC 100 (QC2)	5		100	104.7	104.7
b cal 6-250ng	6	$\checkmark$	250	268.8	107.5
b QC 250 (QC 3)	6		250	260.3	104.1
b cal 7-500ng	7		500	512.7	102.5
b cal 8-1000ng	8		1000	964.3	96.4
b QC 1000 (QC4) recon. 300	8	$\square$	1000	1158.8	115.9

istdnew1.xlsx Page 18 of 24





**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

Last Calib Update

9/20/2018 2:01 PM

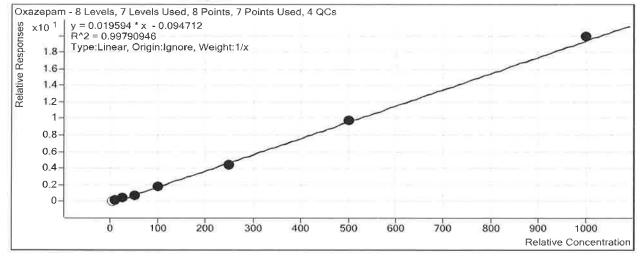
**Analyst Name** 

ISP TOX

Target Compound

Oxazepam





Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	9.2	184.9
b cal 2-10ng	2	$\square$	10	12.2	122.1
b QC 10 ( QC1)	2		10	13.3	132.9
b cal 3-25ng	3	$\square$	25	24.1	96.5
b cal 4-50ng	4	$\square$	50	42.7	85.4
b cal 5-100ng	5	$\square$	100	100.7	100.7
Ь QC 100 (QC2)	5		100	94.5	94.5
b cal 6-250ng	6		250	230.9	92.4
b QC 250 (QC 3)	6		250	244.1	97.6
b cal 7-500ng	7	$\square$	500	505.2	101.0
b cal 8-1000ng	8	$\square$	1000	1019.2	101.9
b QC 1000 (QC4) recon. 300	8	$\square$	1000	1147.9	114.8

istdnew1.xlsx Page 19 of 24





**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

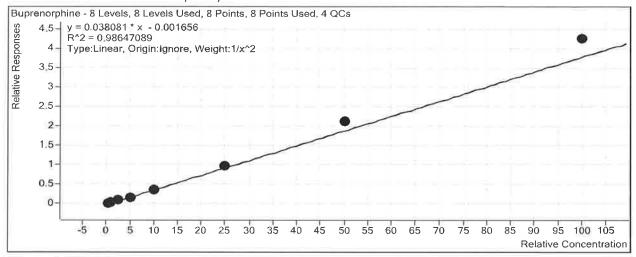
Last Calib Update

9/20/2018 2:01 PM

**Analyst Name** 

**ISP TOX** 

Target CompoundBuprenorphineInternal StandardBuprenorphine-D4



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		0.5	0.5	108.0
b cal 2-10ng	2		1	0.9	91.0
b QC 10 ( QC1)	2		1	1.0	99.7
b cal 3-25ng	3		2.5	2.2	87.0
b cal 4-50ng	4	$\square$	5	4.4	89.0
b cal 5-100ng	5		10	9.8	98.4
Ь QC 100 (QC2)	5	$\square$	10	9.2	91.7
b cal 6-250ng	6		25	25.8	103.0
b QC 250 (QC 3)	6		25	28.0	112.0
b cal 7-500ng	7	$\square$	50	55.9	111.8
b cal 8-1000ng	8		100	111.7	111.7
b QC 1000 (QC4) recon. 300	8		100	121.5	121.5

istdnew1.xlsx Page 20 of 24





**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

**Last Calib Update** 

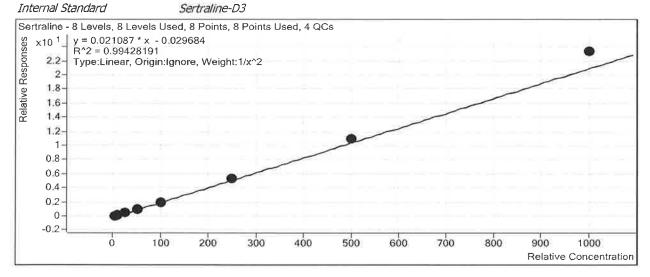
9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compound

Sertraline



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	5.3	105.3
b cal 2-10ng	2	$\square$	10	9.3	92.9
ь QC 10 ( QC1)	2		10	9.0	90.1
b cal 3-25ng	3		25	23.6	94.6
b cal 4-50ng	4		50	46.5	93.1
b cal 5-100ng	5	$\checkmark$	100	97.0	97.0
ь QC 100 (QC2)	5	$\checkmark$	100	91.2	91.2
b cal 6-250ng	6	$\checkmark$	250	255.2	102.1
b QC 250 (QC 3)	6	$\square$	250	235.2	94.1
b cal 7-500ng	7	$\overline{\mathbf{v}}$	500	521.4	104.3
b cal 8-1000ng	8		1000	1107.6	110.8
b QC 1000 (QC4) recon. 300	8	$\checkmark$	1000	1167.1	116.7

istdnew1.xlsx Page 21 of 24





**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

Last Calib Update

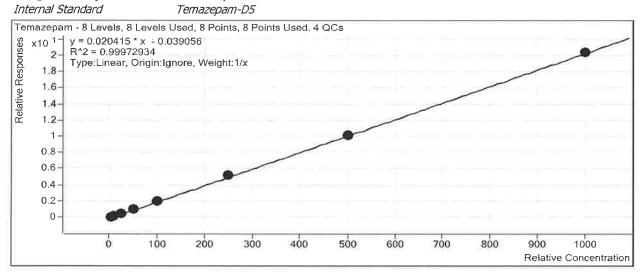
9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compound

Temazepam



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1	$\square$	5	5.7	113.2
b cal 2-10ng	2	☑	10	9.7	96.6
ь QC 10 ( QC1)	2	$\square$	10	10.0	100.4
b cal 3-25ng	3	$\square$	25	23.4	93.4
b cal 4-50ng	4		50	48.5	97.0
b cal 5-100ng	5		100	97.4	97.4
b QC 100 (QC2)	5	Ø	100	99.2	99.2
b cal 6-250ng	6	$\square$	250	256.3	102.5
b QC 250 (QC 3)	6	☑	250	243.5	97.4
b cal 7-500ng	7	☑	500	500.3	100.1
b cal 8-1000ng	8		1000	998.9	99.9
b QC 1000 (QC4) recon. 300	8		1000	1097.5	109.8

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**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

**Last Calib Update** 

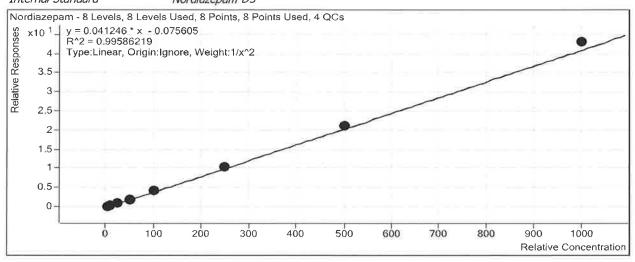
9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target Compound
Internal Standard

Nordiazepam Nordiazepam-D5



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	5.2	104.7
b cal 2-10ng	2	$\square$	10	9.5	94.6
b QC 10 ( QC1)	2		10	9.5	95.1
b cal 3-25ng	3	$\square$	25	23.0	91.8
b cal 4-50ng	4		50	46.8	93.6
b cal 5-100ng	5	$\square$	100	104.2	104.2
ь QC 100 (QC2)	5	$\square$	100	98.4	98.4
b cal 6-250ng	6	☑	250	258.0	103.2
b QC 250 (QC 3)	6		250	243.2	97.3
b cal 7-500ng	7	$\square$	500	516.9	103.4
b cal 8-1000ng	8		1000	1045.5	104.5
b QC 1000 (QC4) recon. 300	8	$\square$	1000	1218.2	121.8

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**Batch Data Path** 

C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

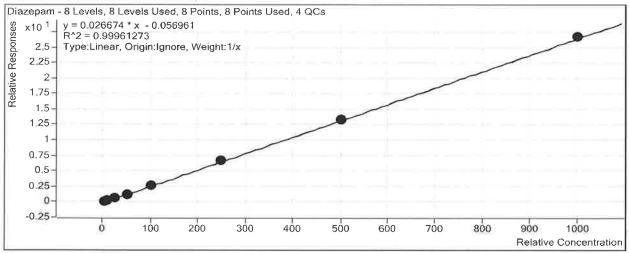
**Last Calib Update** 

9/20/2018 2:01 PM

**Analyst Name** 

ISP TOX

Target CompoundDiazepamInternal StandardDiazepam-D5



Sample	Level	Enabled	Exp Conc	Final Conc	Accuracy
b cal 1-5ng	1		5	5.9	117.1
b cal 2-10ng	2	$\square$	10	9.9	99.4
ь QC 10 ( QC1)	2	☑	10	10.4	104.3
b cal 3-25ng	3	$\square$	25	23.3	93.2
b cal 4-50ng	4	$\square$	50	46.3	92.7
b cal 5-100ng	5		100	96.8	96.8
b QC 100 (QC2)	5		100	90.7	90.7
b cal 6-250ng	6		250	249.4	99.8
b QC 250 (QC 3)	6		250	241.4	96.6
b cal 7-500ng	7		500	503.5	100.7
b cal 8-1000ng	8		1000	1004.9	100.5
b QC 1000 (QC4) recon. 300	8		1000	1116.1	111.6

istdnew1.xlsx Page 24 of 24



Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

 Analysis Time
 9/20/2018 2:01 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:03 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 2:01 PM
 Batch State
 Processed

**Analysis Info** 

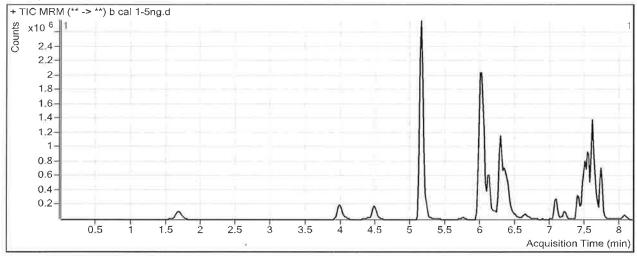
Acq Time2018-09-13 14:44Data Fileb cal 1-5ng.dSample TypeCalibrationSample Nameb cal 1-5ng

**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

Position P1-A1 Sample Info

Inj Vol -1 Comment AM 28

#### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Oxymorphone	Oxymorphone-D3	1.688	86956	731652	0.1188	5.4115
Dihydrocodeine	Dihydrocodeine-D6	4.031	82218	1062211	0.0774	5.6660
Noroxycodone	Noroxycodone-D3	4.508	122839	954973	0.1286	5.4066
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	944604	10331020	0.0914	5.0712
Benzoylecgonine	Benzoylecgonine-d8	5.771	7962	92636	0.0860	5.2638
Ketamine	Ketamine-D4	6.002	437894	4314640	0.1015	5.2207
Norfentanyl	Norfentanyl-D5	6.044	33726	4921289	0.0069	1.3360
Cocaine	Cocaine-d3	6.272	155960	4740970	0.0329	6.0881
alpha-PVP	alpha-PVP-d8	6.368	195626	2523447	0.0775	5.3417
Mirtazapine	alpha-PVP-d8	6.645	135613	2523447	0.0537	5.2370
Norbuprenorphine	Norbuprenorphine-D3	7.014	218	22070	0.0099	2.8904
Fentanyl	Fentanyl-D5	7.098	9872	1039794	0.0095	0.9704
Mitragynine	EDDP-D3	7.176	37098	369063	0.1005	5.3091
EDDP	EDDP-D3	7.209	30939	369063	0.0838	10.4437
Quetiapine	Quetiapine-D8	7.399	316627	768777	0.4119	5.0406
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	50946	548760	0.0928	5.9166
Methadone	Methadone-D9	7.482	210176	2031878	0.1034	5.1938
Fluoxetine	Fluoxetine-D6	7.541	178167	1826918	0.0975	4.7604
Oxazepam	Oxazepam-D5	7.568	26656	308313	0.0865	9.2461

Samples Report MDQ1\_000\_b cal 1-5ng.xlsx





# Multi-Drug Confirmatory Analysis Report 5 Cq 1 1 **ISP FORENSICS - Pocatello Instrument # 59740**

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Buprenorphine	Buprenorphine-D4	7.576	4632	2 <del>44</del> 877	0.0189	0.5402
Sertraline	Sertraline-D3	7.603	59923	736429	0.0814	5.2665
Temazepam	Temazepam-D5	7.605	227947	2981624	0.0765	5,6578
Nordiazepam	Nordiazepam-D5	7.675	62479	445515	0.1402	5.2331
Diazepam	Diazepam-D5	7.731	168096	1695156	0.0992	5.8529

Samples Report MDQ1\_000\_b cal 1-5ng.xlsx





Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 9/20/2018 2:01 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:03 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 2:01 PM
 Batch State
 Processed

**Analysis Info** 

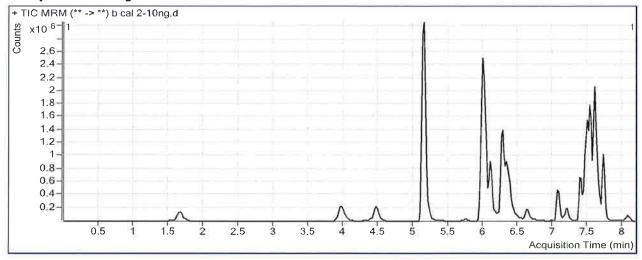
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**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

Position P1-B1 Sample Info

Inj Vol -1 Comment AM 28

#### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Oxymorphone	Oxymorphone-D3	1.668	183766	789274	0.2328	9.0848
Dihydrocodeine	Dihydrocodeine-D6	4.011	180665	1143207	0.1580	9.5558
Noroxycodone	Noroxycodone-D3	4.488	252058	1014152	0.2485	9.0032
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	2077955	11014797	0.1887	9.8121
Benzoylecgonine	Benzoylecgonine-d8	5.751	16062	98491	0.1631	9.3098
Ketamine	Ketamine-D4	6.002	968956	4843046	0.2001	9.4554
Norfentanyl	Norfentanyl-D5	6.044	83750	5630008	0.0149	1.6842
Cocaine	Cocaine-d3	6.272	329318	5342429	0.0616	9.6376
alpha-PVP	alpha-PVP-d8	6.368	449198	2953621	0.1521	9.0819
Mirtazapine	alpha-PVP-d8	6.645	397560	2953621	0.1346	9.4301
Norbuprenorphine	Norbuprenorphine-D3	6.974	222	26800	0.0083	2.8209
Fentanyl	Fentanyl-D5	7.078	20485	1812852	0.0113	1.0749
Mitragynine	EDDP-D3	7.176	103396	507861	0.2036	8.8969
EDDP	EDDP-D3	7.209	72867	507861	0.1435	12.6900
Quetiapine	Quetiapine-D8	7.399	996846	1099129	0.9069	10.0452
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	204581	969020	0.2111	10.3587
Methadone	Methadone-D9	7.482	706792	3447928	0.2050	9.2494
Fluoxetine	Fluoxetine-D6	7.541	634465	3130938	0.2026	9.6155
Oxazepam	Oxazepam-D5	7.568	48351	334422	0.1446	12.2124





Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Buprenorphine	Buprenorphine-D4	7.576	13783	417620	0.0330	0.9101
Sertraline	Sertraline-D3	7.583	232939	1401177	0.1662	9.2916
Temazepam	Temazepam-D5	7.605	594722	3761419	0.1581	9.6577
Nordiazepam	Nordiazepam-D5	7.675	167635	533155	0.3144	9.4561
Diazepam	Diazepam-D5	7.731	414929	1993553	0.2081	9.9382

Samples Report MDQ1\_001\_b cal 2-10ng.xlsx



Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:03 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 2:01 PM
 Batch State
 Processed

**Analysis Info** 

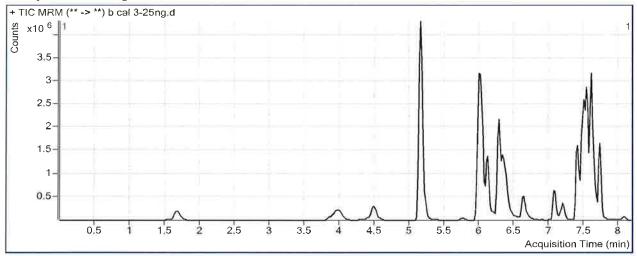
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**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

Position P1-C1 Sample Info

Inj Vol -1 Comment AM 28

#### Sample Chromatogram



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Oxymorphone	Oxymorphone-D3	1.688	503893	828661	0.6081	21.1785
Dihydrocodeine	Dihydrocodeine-D6	4.011	480151	1129652	0.4250	22.4370
Noroxycodone	Noroxycodone-D3	4.508	766224	1130134	0.6780	21.8843
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	5724022	11970054	0.4782	23.9322
Benzoylecgonine	Benzoylecgonine-d8	5.751	45421	111964	0.4057	22.0363
Ketamine	Ketamine-D4	6.002	2775054	5635595	0.4924	22.0136
Norfentanyl	Norfentanyl-D5	6.044	261886	6324001	0.0414	2.8361
Cocaine	Cocaine-d3	6.272	1032136	5909296	0.1747	23.5933
alpha-PVP	alpha-PVP-d8	6.368	1454533	3314383	0.4389	23.4671
Mirtazapine	alpha-PVP-d8	6.645	1302081	3314383	0.3929	22.8224
Norbuprenorphine	Norbuprenorphine-D3	7.014	1633	30170	0.0541	4.8106
Fentanyl	Fentanyl-D5	7.078	71057	2312400	0.0307	2.1996
Mitragynine	EDDP-D3	7.156	357904	565660	0.6327	23.8344
EDDP	EDDP-D3	7.209	255229	565660	0.4512	24.2788
Quetiapine	Quetiapine-D8	7.399	3109456	1399506	2.2218	23.3366
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	665951	1180579	0.5641	23.6143
Methadone	Methadone-D9	7.482	2538071	4212717	0.6025	25.1239
Fluoxetine	Fluoxetine-D6	7.541	2138417	4153076	0.5149	24.0373
Oxazepam	Oxazepam-D5	7.547	124620	329764	0.3779	24.1203

Samples Report MDQ1\_002\_b cal 3-25ng.xlsx





#### 

Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Buprenorphine	Buprenorphine-D4	7.576	38053	468779	0.0812	2.1751
Sertraline	Sertraline-D3	7.583	868385	1851898	0.4689	23.6452
Temazepam	Temazepam-D5	7.605	1719813	3929442	0.4377	23.3514
Nordiazepam	Nordiazepam-D5	7.675	484028	555505	0.8713	22.9581
Diazepam	Diazepam-D5	7.731	1193537	2114706	0.5644	23.2943

Samples Report MDQ1 $\_$ 002 $\_$ b cal 3-25ng.xlsx





Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:03 PM
 Reporter Name
 ISPUser

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 Batch State
 Processed

**Analysis Info** 

 Acq Time
 2018-09-13 16:18
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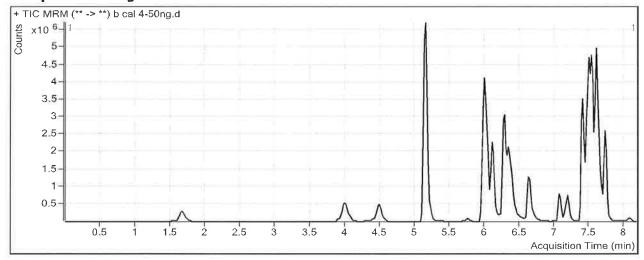
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 Sample Name
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**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

**Position** P1-D1 **Sample Info** 

Inj Vol -1 Comment AM 28

#### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Oxymorphone	Oxymorphone-D3	1.668	1047410	762438	1.3738	45.8550
Dihydrocodeine	Dihydrocodeine-D6	4.011	1045023	1126815	0.9274	46.6726
Noroxycodone	Noroxycodone-D3	4.488	1589577	1081409	1.4699	45.6372
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	12106302	11724907	1.0325	50.9651
Benzoylecgonine	Benzoylecgonine-d8	5.751	90078	98528	0.9142	48.7150
Ketamine	Ketamine-D4	6.002	6032828	5048987	1.1949	52.1883
Norfentanyl	Norfentanyl-D5	6.044	528348	6258234	0.0844	4.7033
Cocaine	Cocaine-d3	6.272	2133915	6059646	0.3522	45.5095
alpha-PVP	alpha-PVP-d8	6.368	3057766	3677072	0.8316	43.1670
Mirtazapine	alpha-PVP-d8	6.625	3105251	3677072	0.8445	46.2425
Norbuprenorphine	Norbuprenorphine-D3	6.994	3883	40973	0.0948	6.5745
Fentanyl	Fentanyl-D5	7.078	175177	2534792	0.0691	4.4214
Mitragynine	EDDP-D3	7,156	936924	695851	1.3464	48.6783
EDDP	EDDP-D3	7.189	675831	695851	0.9712	43.8626
Quetiapine	Quetiapine-D8	7.399	7491959	1546918	4.8432	49.8341
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	1651816	1483525	1.1134	44.2451
Methadone	Methadone-D9	7.482	6027498	5141481	1.1723	47.8820
Fluoxetine	Fluoxetine-D6	7.541	5338256	4936993	1.0813	50.1959
Oxazepam	Oxazepam-D5	7.568	300044	404389	0.7420	42.7002

Samples Report MDQ1\_003\_b cal 4-50ng.xlsx



# Multi-Drug Confirmatory Analysis Report 5 Cal 4 Compound RT **ISP FORENSICS - Pocatello Instrument # 59740**

Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Buprenorphine	Buprenorphine-D4	7.576	103463	616598	0.1678	4.4498
Sertraline	Sertraline-D3	7.603	1993744	2094685	0.9518	46.5456
Temazepam	Temazepam-D5	7.605	3903527	4104546	0.9510	48.4966
Nordiazepam	Nordiazepam-D5	7.675	1201123	647603	1.8547	46.8002
Diazepam	Diazepam-D5	7.731	2442888	2072367	1.1788	46.3274

Samples Report MDQ1\_003\_b cal 4-50ng.xlsx





Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 9/20/2018 2:01 PM
 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:03 PM
 Reporter Name
 ISPUser

 Last Calib Update
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 Batch State
 Processed

**Analysis Info** 

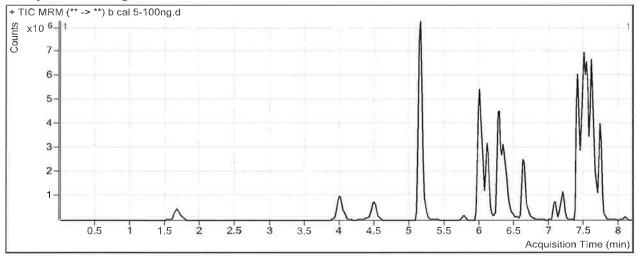
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**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

Position P1-E1 Sample Info

Inj Vol -1 Comment AM 28

#### **Sample Chromatogram**



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Oxymorphone	Oxymorphone-D3	1.668	2090008	682596	3.0619	100.2588
Dihydrocodeine	Dihydrocodeine-D6	4.011	2185748	1043530	2.0946	102.9792
Noroxycodone	Noroxycodone-D3	4.488	3078857	939272	3.2779	99.8668
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	23207804	10940653	2.1212	104.0580
Benzoylecgonine	Benzoylecgonine-d8	5.751	220788	100458	2.1978	116.0504
Ketamine	Ketamine-D4	6.002	11686360	4882480	2.3935	103.6795
Norfentanyl	Norfentanyl-D5	6.044	1053185	5273716	0.1997	9.7075
Cocaine	Cocaine-d3	6.272	4119382	5358877	0.7687	96.9449
alpha-PVP	alpha-PVP-d8	6.368	5952190	2976356	1.9998	101.7695
Mirtazapine	alpha-PVP-d8	6.625	6095488	2976356	2.0480	108.6508
Norbuprenorphine	Norbuprenorphine-D3	6.994	4571	37113	0.1232	7.8068
Fentanyl	Fentanyl-D5	7.078	346591	2258210	0.1535	9.3054
Mitragynine	EDDP-D3	7.156	1680230	547849	3.0670	108.5676
EDDP	EDDP-D3	7.209	1243273	547849	2.2694	92.7499
Quetiapine	Quetiapine-D8	7.399	13804932	1314602	10.5012	107.0284
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	3144232	1320790	2.3806	91.8319
Methadone	Methadone-D9	7.482	10931539	4347519	2.5144	101.4817
Fluoxetine	Fluoxetine-D6	7.541	9414258	4126721	2.2813	105.6195
Oxazepam	Oxazepam-D5	7.568	569181	303080	1.8780	100.6774

Samples Report MDQ1\_004\_b cal 5-100ng.xlsx





Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Buprenorphine	Buprenorphine-D4	7.576	173969	466237	0.3731	9.8419
Sertraline	Sertraline-D3	7.603	3522141	1747874	2.0151	96.9701
Temazepam	Temazepam-D5	7.626	6570529	3370143	1.9496	97.4107
Nordiazepam	Nordiazepam-D5	7.675	2155013	510317	4.2229	104.2157
Diazepam	Diazepam-D5	7.731	4378024	1734097	2.5247	96.7834

Samples Report MDQ1\_004\_b cal 5-100ng.xlsx



Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 ISPUser

 Report Time
 9/20/2018 2:04 PM
 Reporter Name
 ISPUser

 Last Calib Update
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 Batch State
 Processed

**Analysis Info** 

Results

Fentanyl

Mitragynine

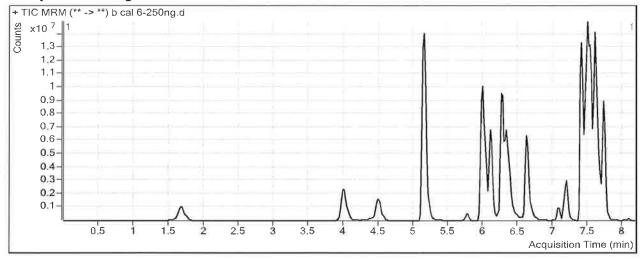
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**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

**Position** P1-F1 **Sample Info** 

Inj Vol -1 Comment AM 28

#### Sample Chromatogram



Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	Final Conc
Oxymorphone	Oxymorphone-D3	1.668	5363260	671624	7.9855	258.9387
Dihydrocodeine	Dihydrocodeine-D6	4.011	5430357	998037	5.4410	264.4210
Noroxycodone	Noroxycodone-D3	4.488	7366880	852001	8.6466	260.8947
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	51080239	10116354	5.0493	246.8478
Benzoylecgonine	Benzoylecgonine-d8	5.751	643796	96418	6.6771	351.0317
Ketamine	Ketamine-D4	6.002	28433320	4767534	5.9639	257.0534
Norfentanyl	Norfentanyi-D5	6.044	2535520	4901012	0.5173	23.4962
Cocaine	Cocaine-d3	6.252	10248545	5172589	1.9813	246.6777
alpha-PVP	alpha-PVP-d8	6.348	15175890	2911308	5.2127	262.9380
Mirtazapine	alpha-PVP-d8	6.625	14615404	2911308	5.0202	262.7813
Norbuprenorphine	Norbuprenorphine-D3	6.994	15826	30651	0.5163	24.8711

7.078

7.156

**EDDP** EDDP-D3 7.189 3445773 595484 5.7865 225.2030 Quetiapine Quetiapine-D8 7.399 31492385 1294828 24.3217 246,7317 Cyclobenzaprine Cyclobenzaprine-D3 7.472 8075718 1227866 6.5770 249.4295 Methadone Methadone-D9 7.482 28600008 4290778 6.6655 267,2615 Fluoxetine Fluoxetine-D6 7.541 21941209 3773885 5.8140 268.7785 Oxazepam Oxazepam-D5 7.568 1519895 343133 4.4295 230.8921

897684

4399544

2132226

595484

0.4210

7.3882

Samples Report MDQ1\_005\_b cal 6-250ng.xlsx

Fentanyl-D5

EDDP-D3

Printed at: 2:04 PM on: 9/20/2018

24.7920

258.9844





# **ISP FORENSICS - Pocatello Instrument # 59740**

Compound	<b>ISTD Compound</b>	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Buprenorphine	Buprenorphine-D4	7.576	409462	418161	0.9792	25.7571
Sertraline	Sertraline-D3	7.603	8449059	1578785	5.3516	255.1985
Temazepam	Temazepam-D5	7.626	17732771	3414500	5.1934	256.2973
Nordiazepam	Nordiazepam-D5	7.675	558 <b>8985</b>	528900	10.5672	258.0315
Diazepam	Diazepam-D5	7.731	11115871	1685503	6.5950	249.3764

Samples Report MDQ1\_005\_b cal 6-250ng.xlsx





Batch Data Path C:\MassHunter\Data\2018\MD Quant\091318 MDQ SP\QuantResults\P1b.batch.bin

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 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:04 PM
 Reporter Name
 ISPUser

 Last Calib Update
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 Batch State
 Processed

**Analysis Info** 

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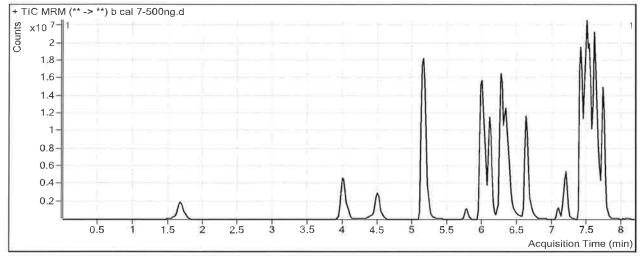
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 Calibration
 Sample Name
 b cal 7-500ng

**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

**Position** P1-G1 **Sample Info** 

Inj Vol -1 Comment AM 28

#### Sample Chromatogram



Results						
Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Oxymorphone	Oxymorphone-D3	1.668	10620051	629939	16.8588	544.9089
Dihydrocodeine	Dihydrocodeine-D6	4.011	10420645	1000219	10.4184	504.5396
Noroxycodone	Noroxycodone-D3	4.488	13861406	770130	17.9988	541.4067
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.160	80057195	9662827	8.2851	404.6463
Benzoylecgonine	Benzoylecgonine-d8	5.751	1485761	97318	15.2670	801.6474
Ketamine	Ketamine-D4	5.982	55128420	4646654	11.8641	510.5059
Norfentanyl	Norfentanyl-D5	6.044	4948514	4416902	1.1204	49.6726
Cocaine	Cocaine-d3	6.252	19528080	4871606	4.0086	496.9987
alpha-PVP	alpha-PVP-d8	6.348	29289402	2530917	11.5726	581.9680
Mirtazapine	alpha-PVP-d8	6.625	26834148	2530917	10.6025	552.2612
Norbuprenorphine	Norbuprenorphine-D3	6.994	25710	31152	0.8253	38.2814
Fentanyl	Fentanyl-D5	7.078	1643579	1717452	0.9570	55.8185
Mitragynine	EDDP-D3	7.156	7552709	497735	15.1742	530.0062
EDDP	EDDP-D3	7.189	6750847	497735	13.5631	518.0668
Quetiapine	Quetiapine-D8	7.399	47943744	1125264	42.6066	431.5641
Cyclobenzaprine	Cyclobenzaprine-D3	7.472	13430981	973240	13.8003	520.6968
Methadone	Methadone-D9	7.482	41549318	3359980	12.3659	494.9222
Fluoxetine	Fluoxetine-D6	7.541	33375214	3008346	11.0942	512.6509
Oxazepam	Oxazepam-D5	7.568	2951874	301075	9.8045	505.2068

Samples Report MDQ1\_006\_b cal 7-500ng.xlsx





#### FORENSICS - Pocatello Instrument # 59740 Multi-Drug Confirmatory Analysis Report 6 Cq 7 ISP FORENSICS - Pocatello Instrument # 59740

Compound	ISTD Compound	RT	Response	ISTD Resp	<b>Resp Ratio</b>	<b>Final Conc</b>
Buprenorphine	Buprenorphine-D4	7.576	605707	284707	2.1275	55.9106
Sertraline	Sertraline-D3	7.603	13406352	1222766	10.9640	521.3528
Temazepam	Temazepam-D5	7.626	27879019	2740216	10.1740	500.2619
Nordiazepam	Nordiazepam-D5	7.675	9135991	430076	21.2428	516.8572
Diazepam	Diazepam-D5	7.731	20068126	1500583	13.3736	503.4996

Samples Report MDQ1\_006\_b cal 7-500ng.xlsx





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 Analyst Name
 ISPUser

 Report Time
 9/20/2018 2:04 PM
 Reporter Name
 ISPUser

 Last Calib Update
 9/20/2018 2:01 PM
 Batch State
 Processed

**Analysis Info** 

Results
Compound

Cyclobenzaprine

Methadone

Fluoxetine

Oxazepam

Acq Time2018-09-13 18:24Data Fileb cal 8-1000ng.dSample TypeCalibrationSample Nameb cal 8-1000ng

**Dilution** 1 **Acq Method** MD Quant Panel 1b 7-11-18\_volume test.m

Position P1-H1 Sample Info

Inj Vol -1 Comment AM 28

**ISTD Compound** 

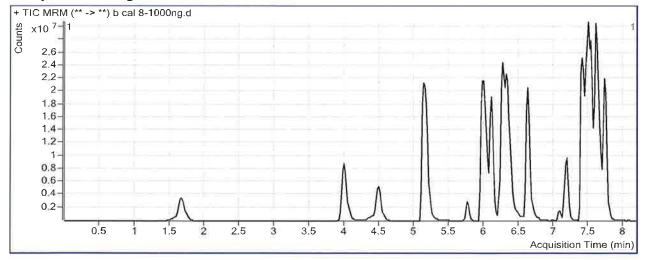
Cyclobenzaprine-D3

Methadone-D9

Fluoxetine-D6

Oxazepam-D5

#### Sample Chromatogram



RT

7.472

7.482

7.541

7.568

Oxymorphone	Oxymorphone-D3	1.668	20469126	591512	34.6048	1116.8251
Dihydrocodeine	Dihydrocodeine-D6	3.991	19991288	982310	20.3513	983.7287
Noroxycodone	Noroxycodone-D3	4.488	25416349	690765	36.7945	1105.1676
O-desmethyl-tramadol	O-desmethyl-tramadol-D6	5.140	108472618	9250774	11.7258	572.4382
Benzoylecgonine	Benzoylecgonine-d8	5.751	3668855	103445	35.4668	1861.3122
Ketamine	Ketamine-D4	5.982	79711205	4548364	17.5252	753.6905
Norfentanyl	Norfentanyl-D5	6.024	9391903	4034776	2.3277	102.0843
Cocaine	Cocaine-d3	6.252	36740067	4480519	8.2000	1014.5504
alpha-PVP	alpha-PVP-d8	6.348	52949595	2692117	19.6684	988.0722
Mirtazapine	alpha-PVP-d8	6.625	48138022	2692117	17.8811	929.7024
Norbuprenorphine	Norbuprenorphine-D3	6.994	49118	20601	2.3843	105.9442
Fentanyl	Fentanyl-D5	7.078	2659434	1376823	1.9316	112.2350
Mitragynine	EDDP-D3	7.156	13164941	488490	26.9503	939.9191
EDDP	EDDP-D3	7.189	13112163	488490	26.8422	1018.1489
Quetiapine	Quetiapine-D8	7.399	64250521	1028565	62.4662	632.3128

Response

21748697

57122279

43446419

5995614

**ISTD Resp** 

823789

2889859

2081357

301657

Samples Report MDQ1\_007\_b cal 8-1000ng.xlsx

Printed at: 2:04 PM on: 9/20/2018

993.9072

790.4770

964.3420

1019.1909

**Final Conc** 

**Resp Ratio** 

26.4008

19.7665

20.8741

19.8756





#### 



Compound	ISTD Compound	RT	Response	ISTD Resp	Resp Ratio	<b>Final Conc</b>
Buprenorphine	Buprenorphine-D4	7.576	868131	204202	4.2513	111.6829
Sertraline	Sertraline-D3	7.603	19444461	833582	23.3264	1107.6190
Temazepam	Temazepam-D5	7.626	45547432	2237844	20.3533	998.8665
Nordiazepam	Nordiazepam-D5	7.695	14927531	346787	43.0452	1045.4508
Diazepam	Diazepam-D5	7.731	33692606	1259593	26.7488	1004,9277