

500 Chipeta Way, Salt Lake City, Utah 84108-1221

phone: 801-583-2787, toll free: 800-522-2787

Jonathan R. Genzen, MD, PhD, Chief Medical Officer

Patient Age/Sex: 26 years Male

Specimen Collected: 05-Sep-23 12:43

Tgt drug prof, MassSpec/EMIT, UR, |Received: 05-Sep-23 12:43 Report/Verified: 05-Sep-23 13:31  
Interp

Procedure	Result	Units	Reference Interval
Creatinine,Urine	100.0	mg/dL	[20.0-400.0]

Tgt drug prof, MassSpec/EMIT, UR, |Received: 05-Sep-23 12:43 Report/Verified: 05-Sep-23 13:32  
Interp

Procedure	Result	Units	Reference Interval
Targeted Drug Profile Interpretation	See Note <sup>i1</sup>		
Targeted Drug Profile Comment	See Note <sup>i2</sup>		
EER Targeted Drug Profile,U	See Note <sup>f1</sup>		
Barbiturates Screen,U	Negative <sup>f2 i3</sup>		
THC (Cannabinoids) Screen,U	Negative <sup>f2 i4</sup>		
Cocaine Screen,U	Negative <sup>f2 i5</sup>		
Carisoprodol Screen,U	Negative <sup>f2 i6</sup>		
Ethyl Glucuronide Screen,U	Negative <sup>f2 i7</sup>		
Methadone Screen,U	Negative <sup>f2 i8</sup>		
Phencyclidine Screen,U	Negative <sup>f2 i9</sup>		
Tramadol Screen,U	Negative <sup>f2 i10</sup>		

Tgt drug prof, MassSpec/EMIT, UR, |Received: 05-Sep-23 12:43 Report/Verified: 05-Sep-23 13:35  
Interp

Procedure	Result	Units	Reference Interval
6-acetylmorphine,U	Not Detected <sup>i11</sup>		
7-Aminoclonazepam,U	Not Detected <sup>i12</sup>		
Alpha-OH-Alprazolam,U	Not Detected <sup>i13</sup>		
Alpha-OH-Midazolam,U	Not Detected <sup>i14</sup>		
Alprazolam,U	Not Detected <sup>i15</sup>		
Amphetamine,U	Not Detected <sup>i16</sup>		
Buprenorphine,U	Not Detected <sup>i17</sup>		
Clonazepam,U	Not Detected <sup>i18</sup>		
Codeine,U	Not Detected <sup>i19</sup>		
Diazepam,U	Not Detected <sup>i20</sup>		
Fentanyl,U	Not Detected <sup>i21</sup>		
Gabapentin,U	Not Detected <sup>i22</sup>		
Hydrocodone,U	Not Detected <sup>i23</sup>		
Hydromorphone,U	Not Detected <sup>i24</sup>		
Lorazepam,U	Not Detected <sup>i25</sup>		
MDA,U	Not Detected <sup>i26</sup>		
MDEA,U	Not Detected <sup>i27</sup>		
MDMA,U	Not Detected <sup>i28</sup>		
Meperidine metabolite,U	Not Detected <sup>i29</sup>		
Methamphetamine,U	Not Detected <sup>i30</sup>		
Methylphenidate,U	Not Detected <sup>i31</sup>		

\* = Abnormal, # = Corrected, C = Critical, f = Result Footnote, H = High, i = Test Information, L = Low, t = Interpretive Text, @ = Performing lab

Unless otherwise indicated, testing performed at:

## ARUP Laboratories

500 Chipeta Way, Salt Lake City, UT 84108

Laboratory Director: Jonathan R. Genzen, MD, PhD

ARUP Accession: 23-248-900128

Report Request ID: 18462415

Printed: 05-Sep-23 13:43

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Tgt drug prof, MassSpec/EMIT, UR, |Received: 05-Sep-23 12:43

Report/Verified: 05-Sep-23 13:35

**Interp**

Procedure	Result	Units	Reference Interval
Midazolam,U	Not Detected <sup>i32</sup>		
Morphine,U	Not Detected <sup>i33</sup>		
Naloxone,U	Not Detected <sup>i34</sup>		
Norbuprenorphine,U	Not Detected <sup>i35</sup>		
Nordiazepam,U	Not Detected <sup>i36</sup>		
Norfentanyl,U	Not Detected <sup>i37</sup>		
Norhydrocodone,U	Not Detected <sup>i38</sup>		
Noroxycodone,U	Not Detected <sup>i39</sup>		
Noroxymorphone,U	Not Detected <sup>i40</sup>		
Oxazepam,U	Not Detected <sup>i41</sup>		
Oxycodone,U	Not Detected <sup>i42</sup>		
Oxymorphone,U	Not Detected <sup>i43</sup>		
Phentermine,U	Not Detected <sup>i44</sup>		
Pregabalin,U	Not Detected <sup>i45</sup>		
Tapentadol,U	Not Detected <sup>i46</sup>		
Tapentadol-o-Sulf,U	Not Detected <sup>i47</sup>		
Temazepam,U	Not Detected <sup>i48</sup>		
Zolpidem,U	Not Detected <sup>i49</sup>		
Zolpidem Metabolite,U	Not Detected <sup>i50</sup>		

**Result Footnote**

f1: EER Targeted Drug Profile, U  
Authorized individuals can access the ARUP  
Enhanced Report using the following link:

f2: Barbiturates Screen, U, Carisoprodol Screen, U, Cocaine Screen, U, Ethyl Glucuronide Screen, U, Methadone  
Screen, U, Phencyclidine Screen, U, THC (Cannabinoids) Screen, U, Tramadol Screen, U

Presumptive negative by immunoassay. Testing by mass spectrometry is available on request.

**Test Information**

i1: Targeted Drug Profile Interpretation  
INTERPRETIVE INFORMATION: Targeted drug profile Interp

Interpretation depends on accuracy and completeness of patient medication  
information submitted by client.

i2: Targeted Drug Profile Comment  
Methodology: Qualitative Enzyme Immunoassay and Qualitative Liquid  
Chromatography-Tandem Mass Spectrometry, Quantitative Spectrophotometry

The absence of expected drug(s) and/or drug metabolite(s) may indicate  
non-compliance, inappropriate timing of specimen collection relative to drug  
administration, poor drug absorption, diluted/adulterated urine, or limitations of  
testing. The concentration must be greater than or equal to the cutoff to be

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**Test Information**

i2: Targeted Drug Profile Comment  
reported as present. If specific drug concentrations are required, contact the laboratory within two weeks of specimen collection to request quantification by a second analytical technique. Interpretive questions should be directed to the laboratory.

Results based on immunoassay detection that do not match clinical expectations should be interpreted with caution. Confirmatory testing by mass spectrometry for immunoassay-based results is available, if ordered within two weeks of specimen collection. Additional charges apply.

For medical purposes only; not valid for forensic use.

This test was developed and its performance characteristics determined by ARUP Laboratories. It has not been cleared or approved by the US Food and Drug Administration. This test was performed in a CLIA certified laboratory and is intended for clinical purposes.

i3: Barbiturates Screen, U  
INTERPRETIVE INFORMATION: Barbiturates Screen, U

Positive Cutoff: 200 ng/mL

Methodology: Immunoassay

i4: THC (Cannabinoids) Screen, U  
INTERPRETIVE INFORMATION: THC (Cannabinoids) Screen, U

Positive Cutoff: 50 ng/mL

Methodology: Immunoassay

i5: Cocaine Screen, U  
INTERPRETIVE INFORMATION: Cocaine Screen, U

Positive Cutoff: 150 ng/mL

Methodology: Immunoassay

i6: Carisoprodol Screen, U  
INTERPRETIVE INFORMATION: Carisoprodol Screen, U

Positive Cutoff: 100 ng/mL

Methodology: Immunoassay

The carisoprodol immunoassay has cross-reactivity to carisoprodol and meprobamate.

i7: Ethyl Glucuronide Screen, U  
INTERPRETIVE INFORMATION: Ethyl Glucuronide Screen, U

Positive Cutoff: 500 ng/mL

Methodology: Immunoassay

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**Test Information**

- i8: Methadone Screen, U  
INTERPRETIVE INFORMATION: Methadone Screen, U  
  
Positive Cutoff: 150 ng/mL  
Methodology: Immunoassay
- i9: Phencyclidine Screen, U  
INTERPRETIVE INFORMATION: Phencyclidine Screen, U  
  
Positive Cutoff: 25 ng/mL  
Methodology: Immunoassay
- i10: Tramadol Screen, U  
INTERPRETIVE INFORMATION: Tramadol Screen, U  
  
Positive Cutoff: 100 ng/mL  
Methodology: Immunoassay
- i11: 6-acetylmorphine, U  
INTERPRETIVE INFORMATION: 6-acetylmorphine, U  
  
Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry
- i12: 7-Aminoclonazepam, U  
INTERPRETIVE INFORMATION: 7-Aminoclonazepam, U  
  
Positive Cutoff: 40 ng/mL  
Methodology: Mass Spectrometry
- i13: Alpha-OH-Alprazolam, U  
INTERPRETIVE INFORMATION: Alpha-OH-Alprazolam, U  
  
Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry
- i14: Alpha-OH-Midazolam, U  
INTERPRETIVE INFORMATION: Alpha-OH-Midazolam, U  
  
Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry
- i15: Alprazolam, U  
INTERPRETIVE INFORMATION: Alprazolam, U  
  
Positive Cutoff: 40 ng/mL  
Methodology: Mass Spectrometry
- i16: Amphetamine, U  
INTERPRETIVE INFORMATION: Amphetamine, U  
  
Positive Cutoff: 50 ng/mL  
Methodology: Mass Spectrometry

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**Test Information**

i17: Buprenorphine, U  
INTERPRETIVE INFORMATION: Buprenorphine, U

Positive Cutoff: 5 ng/mL  
Methodology: Mass Spectrometry

i18: Clonazepam, U  
INTERPRETIVE INFORMATION: Clonazepam, U

Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry

i19: Codeine, U  
INTERPRETIVE INFORMATION: Codeine, U

Positive Cutoff: 40 ng/mL  
Methodology: Mass Spectrometry

i20: Diazepam, U  
INTERPRETIVE INFORMATION: Diazepam, U

Positive Cutoff: 50 ng/mL  
Methodology: Mass Spectrometry

i21: Fentanyl, U  
INTERPRETIVE INFORMATION: Fentanyl, U

Positive Cutoff: 2 ng/mL  
Methodology: Mass Spectrometry

i22: Gabapentin, U  
INTERPRETIVE INFORMATION: Gabapentin, U

Positive Cutoff: 3,000 ng/mL  
Methodology: Mass Spectrometry

i23: Hydrocodone, U  
INTERPRETIVE INFORMATION: Hydrocodone, U

Positive Cutoff: 40 ng/mL  
Methodology: Mass Spectrometry

i24: Hydromorphone, U  
INTERPRETIVE INFORMATION: Hydromorphone, U

Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry

i25: Lorazepam, U  
INTERPRETIVE INFORMATION: Lorazepam, U

Positive Cutoff: 60 ng/mL  
Methodology: Mass Spectrometry

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**Test Information**

i26: MDA, U  
INTERPRETIVE INFORMATION:MDA, U

Positive Cutoff: 200 ng/mL  
Methodology: Mass Spectrometry

i27: MDEA, U  
INTERPRETIVE INFORMATION:MDEA, U

Positive Cutoff: 200 ng/mL  
Methodology: Mass Spectrometry

i28: MDMA, U  
INTERPRETIVE INFORMATION:MDMA, U

Positive Cutoff: 200 ng/mL  
Methodology: Mass Spectrometry

i29: Meperidine metabolite, U  
INTERPRETIVE INFORMATION:Meperidine metabolite, U

Positive Cutoff: 50 ng/mL  
Methodology: Mass Spectrometry

i30: Methamphetamine, U  
INTERPRETIVE INFORMATION:Methamphetamine, U

Positive Cutoff: 200 ng/mL  
Methodology: Mass Spectrometry

i31: Methylphenidate, U  
INTERPRETIVE INFORMATION:Methylphenidate, U

Positive Cutoff: 100 ng/mL  
Methodology: Mass Spectrometry

i32: Midazolam, U  
INTERPRETIVE INFORMATION:Midazolam, U

Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry

i33: Morphine, U  
INTERPRETIVE INFORMATION:Morphine, U

Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry

i34: Naloxone, U  
INTERPRETIVE INFORMATION:Naloxone, U

Positive Cutoff: 100 ng/mL  
Methodology: Mass Spectrometry

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**Test Information**

i35: Norbuprenorphine, U  
INTERPRETIVE INFORMATION:Norbuprenorphine, U

Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry

i36: Nordiazepam, U  
INTERPRETIVE INFORMATION:Nordiazepam, U

Positive Cutoff: 50 ng/mL  
Methodology: Mass Spectrometry

i37: Norfentanyl, U  
INTERPRETIVE INFORMATION:Norfentanyl, U

Positive Cutoff: 2 ng/mL  
Methodology: Mass Spectrometry

i38: Norhydrocodone, U  
INTERPRETIVE INFORMATION:Norhydrocodone, U

Positive Cutoff: 100 ng/mL  
Methodology: Mass Spectrometry

i39: Noroxycodone, U  
INTERPRETIVE INFORMATION:Noroxycodone, U

Positive Cutoff: 100 ng/mL  
Methodology: Mass Spectrometry

i40: Noroxymorphone, U  
INTERPRETIVE INFORMATION:Noroxymorphone, U

Positive Cutoff: 100 ng/mL  
Methodology: Mass Spectrometry

i41: Oxazepam, U  
INTERPRETIVE INFORMATION:Oxazepam, U

Positive Cutoff: 50 ng/mL  
Methodology: Mass Spectrometry

i42: Oxycodone, U  
INTERPRETIVE INFORMATION:Oxycodone, U

Positive Cutoff: 40 ng/mL  
Methodology: Mass Spectrometry

i43: Oxymorphone, U  
INTERPRETIVE INFORMATION:Oxymorphone, U

Positive Cutoff: 40 ng/mL  
Methodology: Mass Spectrometry

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**Test Information**

i44: Phentermine, U  
INTERPRETIVE INFORMATION: Phentermine, U

Positive Cutoff: 100 ng/mL  
Methodology: Mass Spectrometry

i45: Pregabalin, U  
INTERPRETIVE INFORMATION: Pregabalin, U

Positive Cutoff: 3,000 ng/mL  
Methodology: Mass Spectrometry

i46: Tapentadol, U  
INTERPRETIVE INFORMATION: Tapentadol, U

Positive Cutoff: 100 ng/mL  
Methodology: Mass Spectrometry

i47: Tapentadol-o-Sulf, U  
INTERPRETIVE INFORMATION: Tapentadol-o-Sulf, U

Positive Cutoff: 200 ng/mL  
Methodology: Mass Spectrometry

i48: Temazepam, U  
INTERPRETIVE INFORMATION: Temazepam, U

Positive Cutoff: 50 ng/mL  
Methodology: Mass Spectrometry

i49: Zolpidem, U  
INTERPRETIVE INFORMATION: Zolpidem, U

Positive Cutoff: 20 ng/mL  
Methodology: Mass Spectrometry

i50: Zolpidem Metabolite, U  
INTERPRETIVE INFORMATION: Zolpidem Metabolite, U

Positive Cutoff: 100 ng/mL  
Methodology: Mass Spectrometry

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