



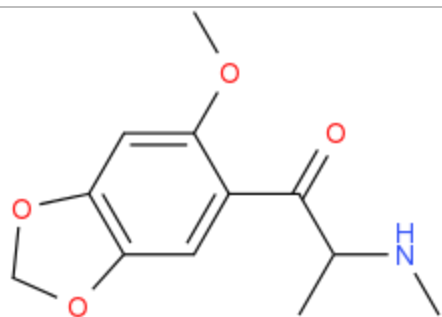
## ANALYTICAL REPORT

### N-Me-bk-MMDA-2, (C<sub>12</sub>H<sub>15</sub>N<sub>04</sub>)

#### 1-(6-methoxy-1,3-benzodioxol-5-yl)-2-(methylamino)propan-1-one

Remark – other NPS detected: none

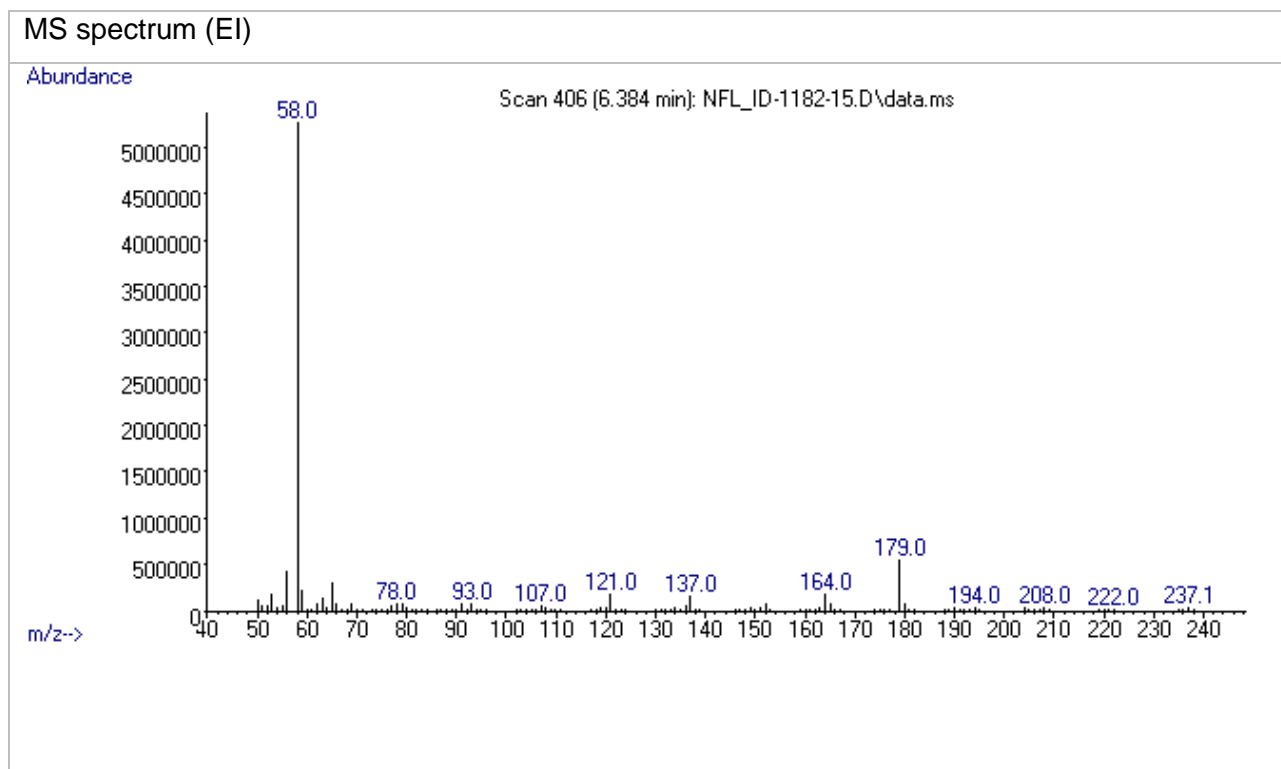
Sample ID:	1182-15
Sample description:	powder - light brown
Sample type:	P- purchased
Date of entry:	7/13/2015

Substance identified-structure <sup>i</sup> (base form)	
Systematic name	1-(6-methoxy-1,3-benzodioxol-5-yl)-2-(methylamino)propan-1-one
Other names	
Formula (per base form)	C <sub>12</sub> H <sub>15</sub> N <sub>04</sub>
M <sub>w</sub> (g/mol)	237,25
Salt form	HCl
Smiles	<chem>COC=1C(=CC2=C(OCO2)C1)C(C(C)NC)=O</chem>
Compound Class	Cathinones
Other NPS detected	none
Add.info (purity..)	pure

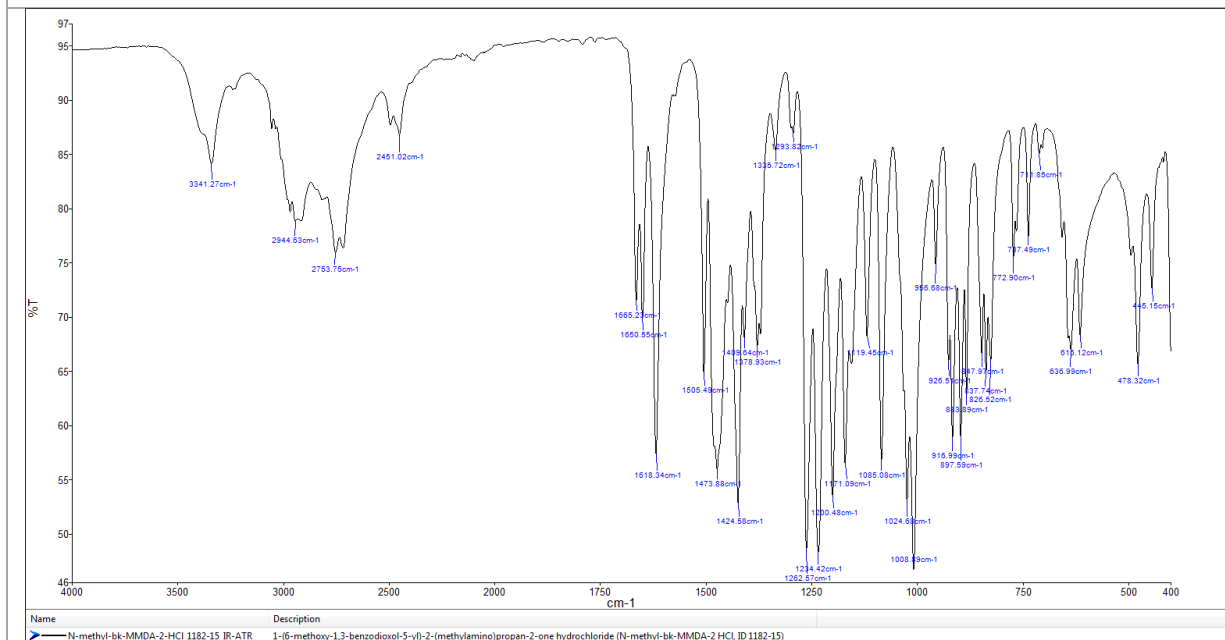
This report has been produced with the financial support of the Prevention of and fight against crime Programme of the European Union (grant agreement number JUST/2013/ISEC/DRUGS/AG/6413). The contents of this report are the sole responsibility of the National Forensic Laboratory and can in no way be taken to reflect the views of the European Commission.

## Supporting information

Analytical technique:	applied	remarks
GC-MS (EI ionization)	+	BP(1): 58; BP(2): 179,BP(3) :164,
FTIR-ATR	+	HCl
FTIR (condensed phase)	/	
HPLC-TOF	+	Exact mass: 237,1001, measured/ $\Delta$ ppm:-1,48; formula:C <sub>12</sub> H <sub>15</sub> NO <sub>4</sub>
NMR-confirmed	+	
validation		
other		NFL-RT:6.384



## FTIR - ATR



Created by OPSIN free tool: <http://opsin.ch.cam.ac.uk/> DOI: 10.1021/ci100384d

# Target Compound Screening Report

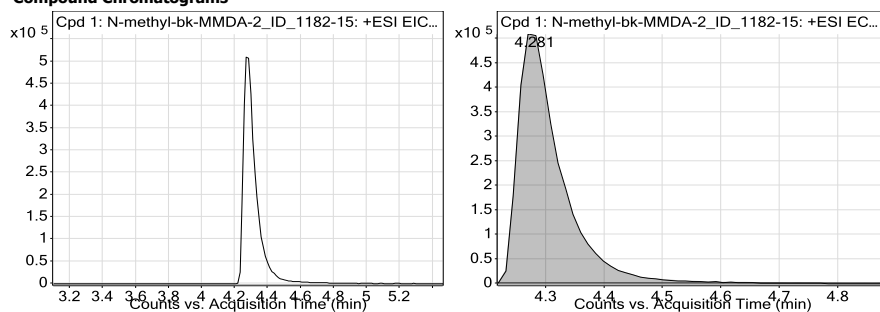
<b>Data File</b>	N-methyl-bk-MMDA-2_1182-15_TOF.d	<b>Sample Name</b>	ID 1182
<b>Sample Type</b>	Sample	<b>Position</b>	P1-E3
<b>Instrument Name</b>	SG13170002	<b>User Name</b>	
<b>Acq Method</b>	droge general-13-5-2015-XDB-C18-ESI-poz.m	<b>Acquired Time</b>	6/8/2015 10:12:10 AM
<b>IRM Calibration Status</b>	Success	<b>DA Method</b>	Droge_Default.m
<b>Comment</b>	extract in MeOH		

## Compound Table

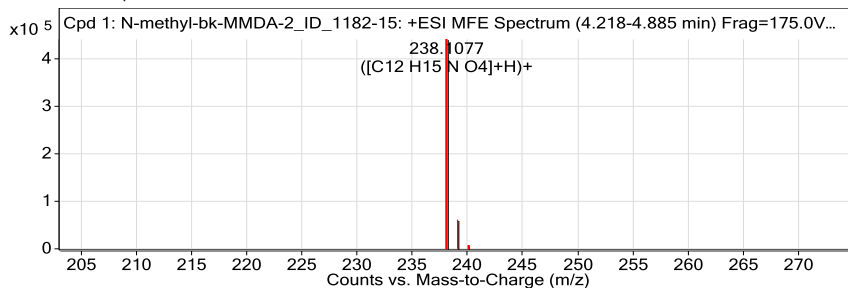
Label	Tgt Name	MFG Formula	Tgt Formula	Obs. RT	Obs. Mass
Cpd 1: N-methyl-bk-MMDA-2_ID_1182-15	N-methyl-bk-MMDA-2_ID_1182-15	C12 H15 N O4	C12 H15 N O4	4.281	237.1005

Name	Obs. m/z	Obs. RT	Obs. Mass	DB RT	DB Formula	DB Mass	DB Mass Error	Tgt Formula	Find Cpd's Algorithm
N-methyl-bk-MMDA-2_ID_1182-15	238.1077	4.281	237.1005	4.281	C12 H15 N O4	237.1001	-1.48	C12 H15 N O4	Find by Molecular Feature

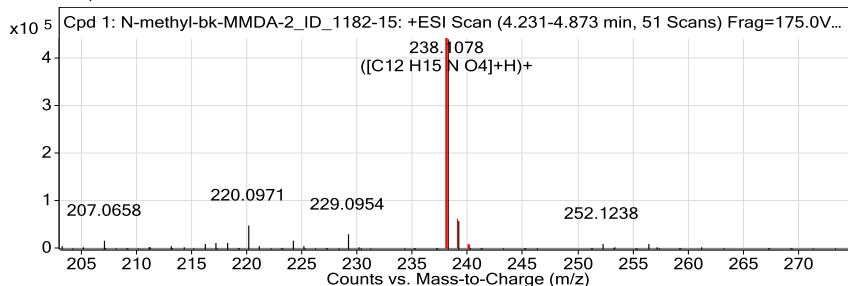
## Compound Chromatograms



## MFE MS Zoomed Spectrum



## MS Zoomed Spectrum



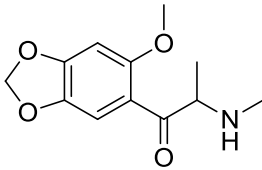
## MS Spectrum Peak List

Obs. m/z	Charge	Abund	Formula	Ion/Isotope
238.1077	1	440723.03	C12 H15 N O4	(M+H)+
239.111	1	61797.47	C12 H15 N O4	(M+H)+
240.1129	1	7538.72	C12 H15 N O4	(M+H)+

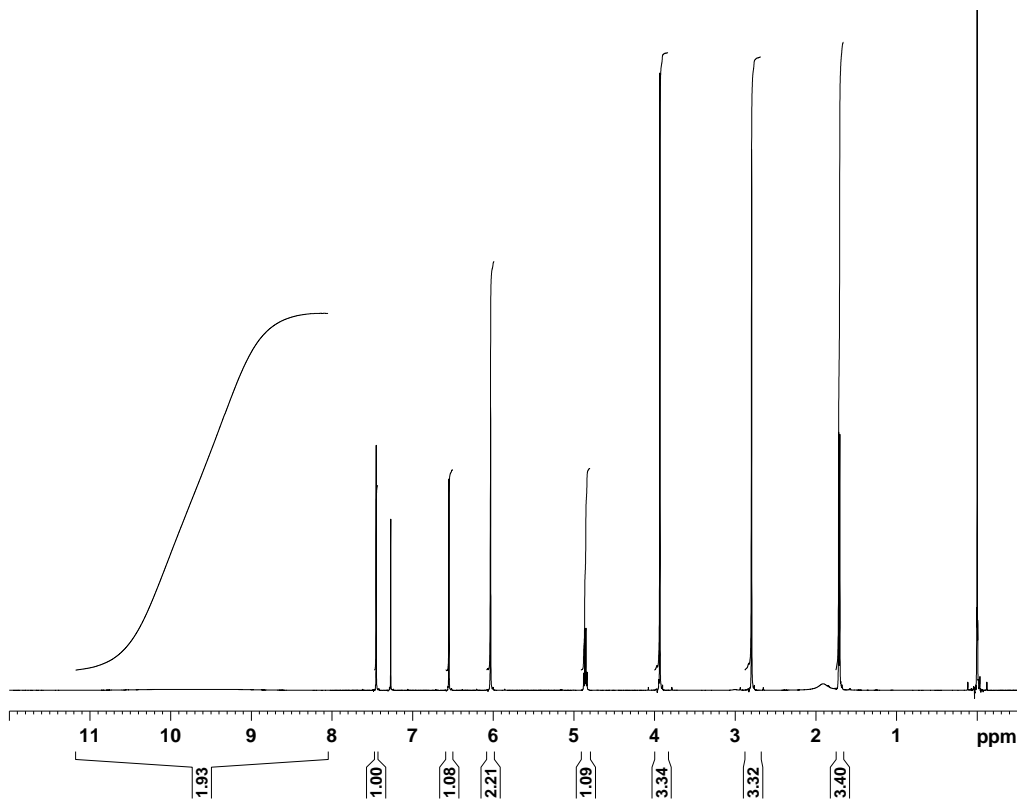
--- End Of Report ---



## REPORT

Sample ID:	<b>1182-15</b>
Our notebook code:	P-1182-15
NMR sample preparation:	15 mg dissolved in 0.7 mL CDCl <sub>3</sub>
NMR experiments:	<sup>1</sup> H, <sup>13</sup> C, <sup>1</sup> H- <sup>1</sup> H <i>gs</i> -COSY, <sup>1</sup> H- <sup>13</sup> C <i>gs</i> -HSQC, <sup>1</sup> H- <sup>13</sup> C <i>gs</i> -HMBC, <sup>1</sup> H- <sup>15</sup> N <i>gs</i> -HMBC.
Proposed structure with chemical name:	 <p style="text-align: right;">HCl</p> <p>1-(6-methoxybenzo[d][1,3]dioxol-5-yl)-2-(methylamino)propan-1-one hydrochloride</p>
Comments:	<ul style="list-style-type: none"> <li>- Structure elucidation based on 1D and 2D NMR spectra</li> <li>- Compound is pure by NMR</li> </ul>
Supporting information:	Copies of <sup>1</sup> H and <sup>13</sup> C NMR spectra
Author:	Prof. Dr. Janez Košmrlj
Date of report:	July 11, 2015

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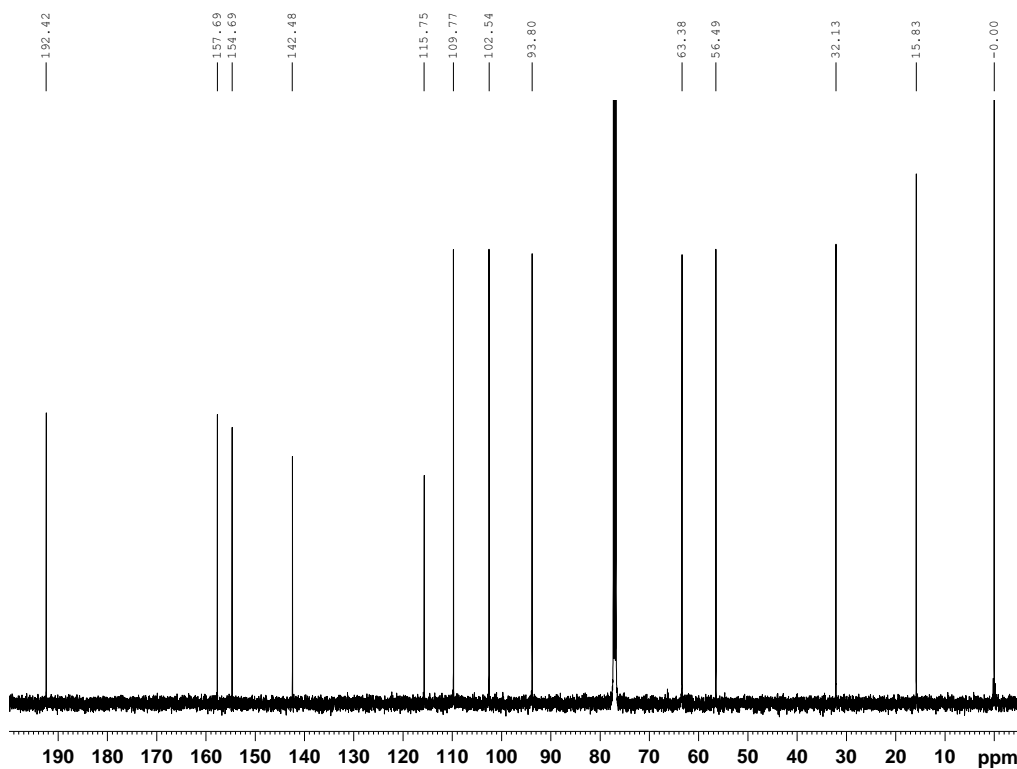
Current Data Parameters  
NAME 1182-15  
EXFNO 1  
PROCNO 1

F2 - Acquisition Parameters  
Date 20150706  
Time 18.24  
INSTRUM spect  
PROBHD 5 mm PABBO BB-  
PULPROG zg30  
TD 65536  
SOLVENT CDCl3  
NS 16  
DS 2  
SWH 10330.578 Hz  
FIDRES 0.157632 Hz  
AQ 3.1719223 sec  
RG 128  
DW 48.400 usec  
DE 6.50 usec  
TE 296.0 K  
D1 1.00000000 sec

===== CHANNEL f1 =====  
NUC1 1H  
P1 8.90 usec  
PLW1 26.00000000 W  
SFO1 500.1330885 MHz

F2 - Processing parameters  
SI 65536  
SF 500.1300074 MHz  
WDW EM  
SSB 0  
LB 0.30 Hz  
GB 0  
PC 1.00

P-1182-15



Current Data Parameters  
NAME 1182-15  
EXFNO 4  
PROCNO 1

F2 - Acquisition Parameters  
Date 20150706  
Time 20.55  
INSTRUM spect  
PROBHD 5 mm PABBO BB-  
PULPROG zgpg30  
TD 65536  
SOLVENT CDCl3  
NS 3072  
DS 4  
SWH 29761.904 Hz  
FIDRES 0.454131 Hz  
AQ 1.1010548 sec  
RG 2050  
DW 16.800 usec  
DE 6.50 usec  
TE 296.0 K  
D1 1.00000000 sec  
D11 0.03000000 sec

===== CHANNEL f1 =====  
NUC1 13C  
P1 9.00 usec  
PLW1 122.00000000 W  
SFO1 125.7703637 MHz

===== CHANNEL f2 =====  
CPDPRG2 waltz16  
NUC2 1H  
PCPD2 80.00 usec  
PLW2 26.00000000 W  
PLW12 0.32179001 W  
PLW13 0.20595001 W  
SFO2 500.1320005 MHz

F2 - Processing parameters  
SI 32768  
SF 125.7577893 MHz  
WDW EM  
SSB 0  
LB 1.00 Hz  
GB 0  
PC 1.40