Synthesis, molecular modeling and anti-inflammatory activity of new benzo[*a*]pyrano[2,3-*c*]phenazine compounds

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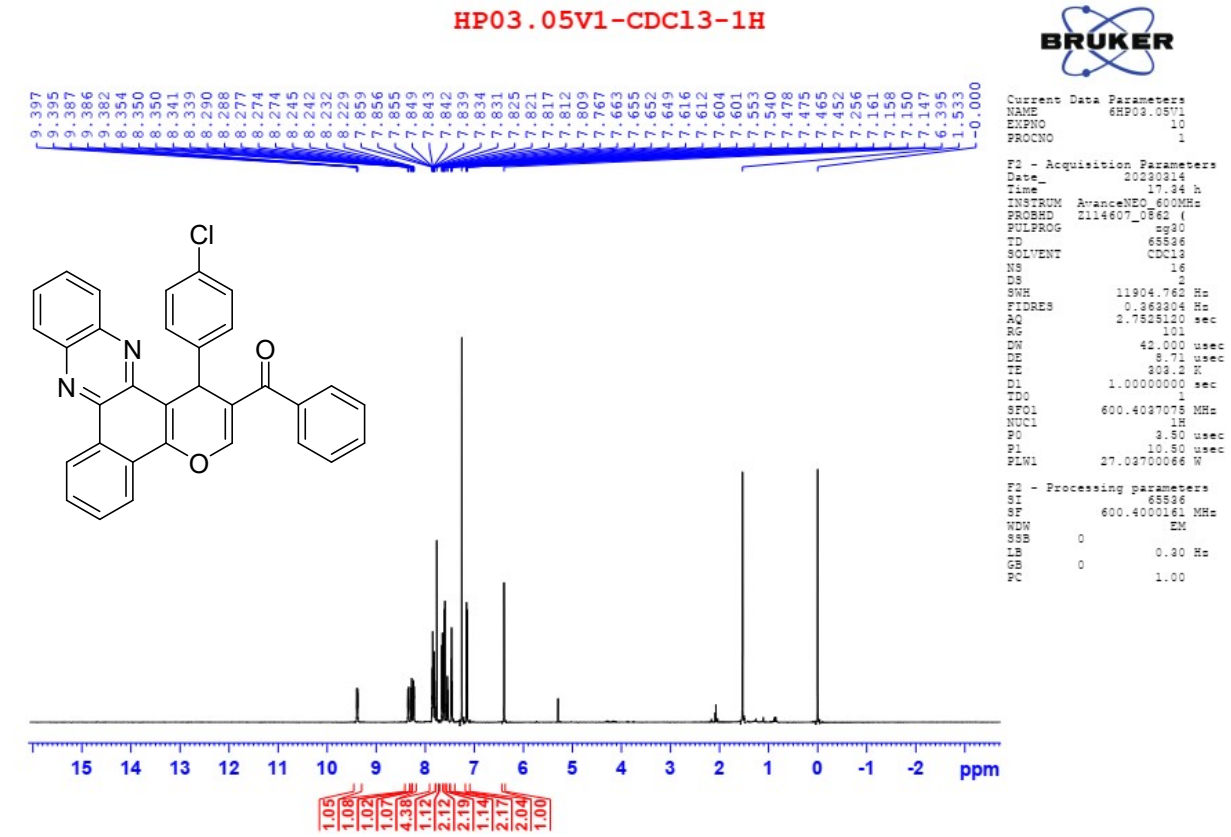
LIST OF CONTENT

(1-(4-Chlorophenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)(phenyl)methanone (7a).

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PROCNO                 1

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TD                 65536
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NS                    16
DS                     2
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FIDRES         0.363304 Hz
AQ             2.7525120 sec
RG                   101
DW                42.000 usec
DE                 8.71 usec
TE                303.2 K
D1            1.00000000 sec
TD0                    1
SFO1         600.4037075 MHz
NUC1                  1H
P0                 3.50 usec
P1                10.50 usec
PLW1         27.03700066 W

F2 - Processing parameters
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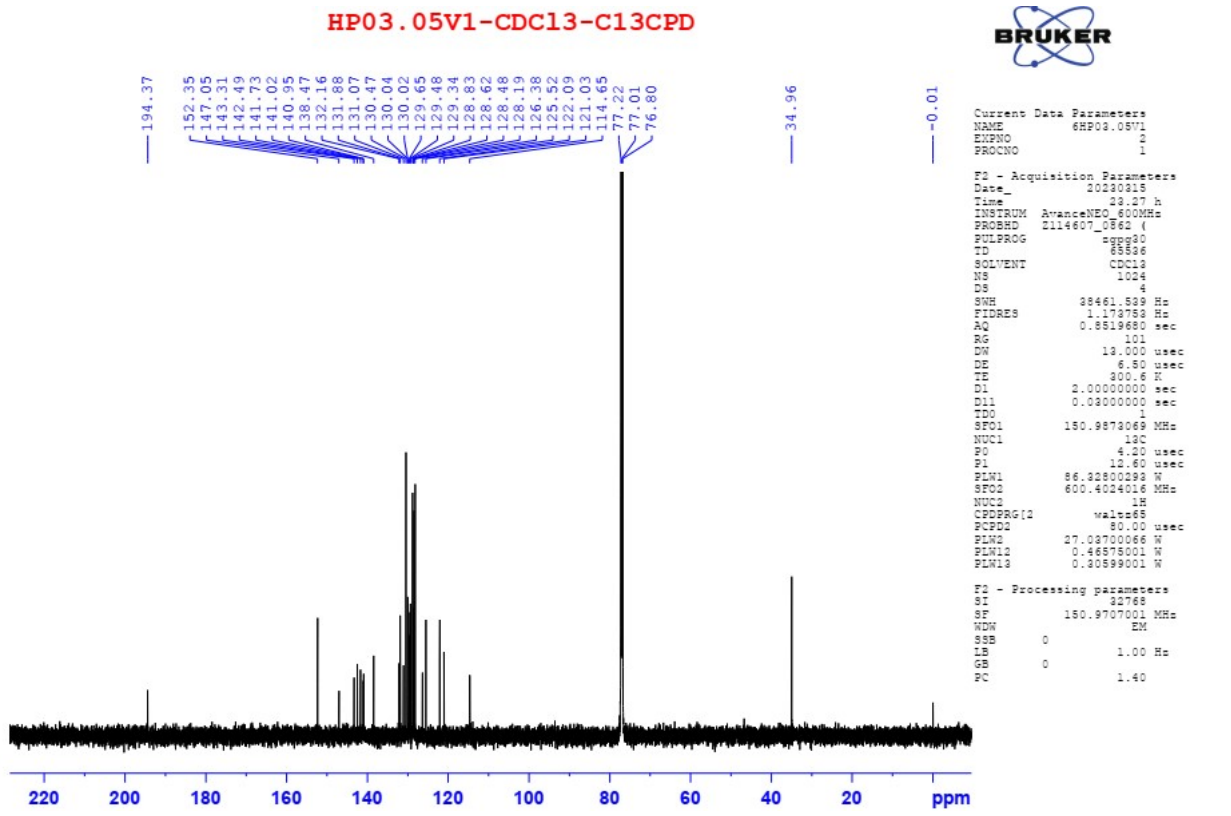


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TD                 65536
SOLVENT            CDCl3
NS                  1024
DS                     4
SWH           38461.539 Hz
FIDRES         1.173758 Hz
AQ             0.8519680 sec
RG                   101
DW                13.000 usec
DE                 6.50 usec
TE                300.6 K
D1            2.00000000 sec
D11           0.03000000 sec
TD0                    1
SFO1         150.9873069 MHz
NUC1                  13C
P0                 4.20 usec
P1                12.60 usec
PLW1         86.32800293 W
SFO2         600.4024016 MHz
NUC2                  1H
CPDPRG[2          waltz65
PCPD2             80.00 usec
PLW2         27.03700066 W
PLW12         0.46575001 W
PLW13         0.30599001 W

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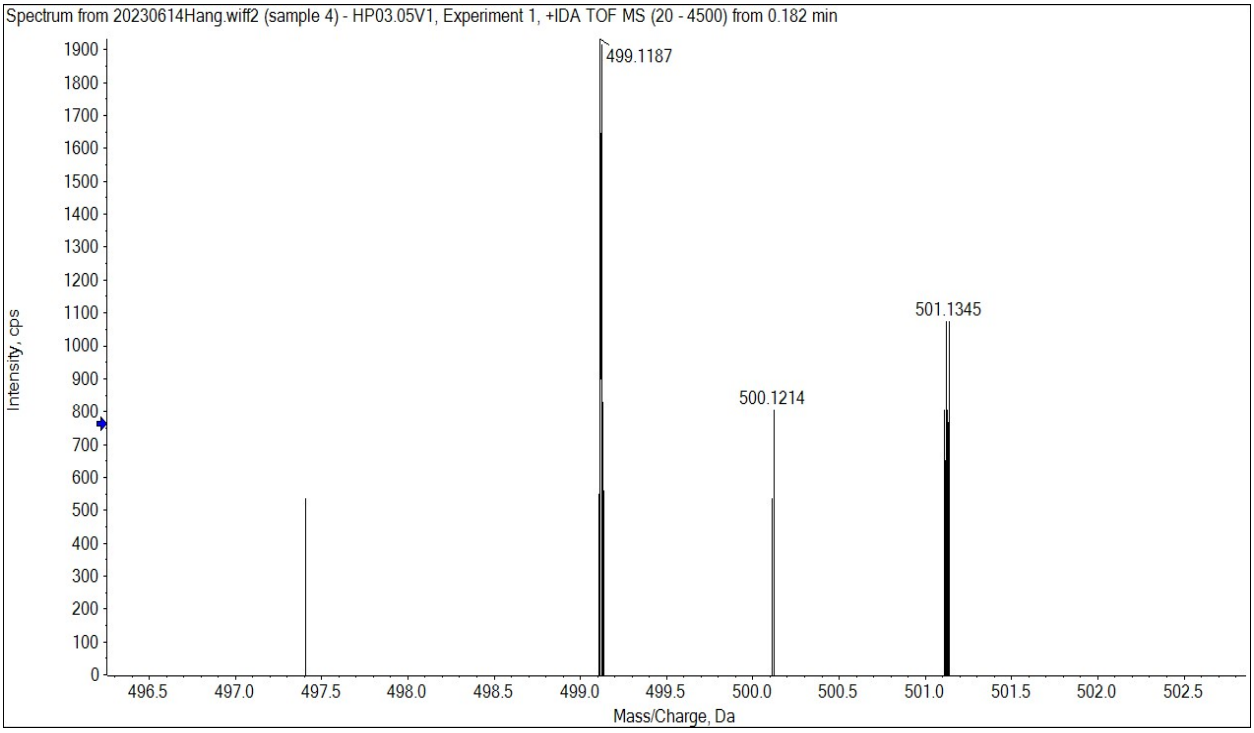
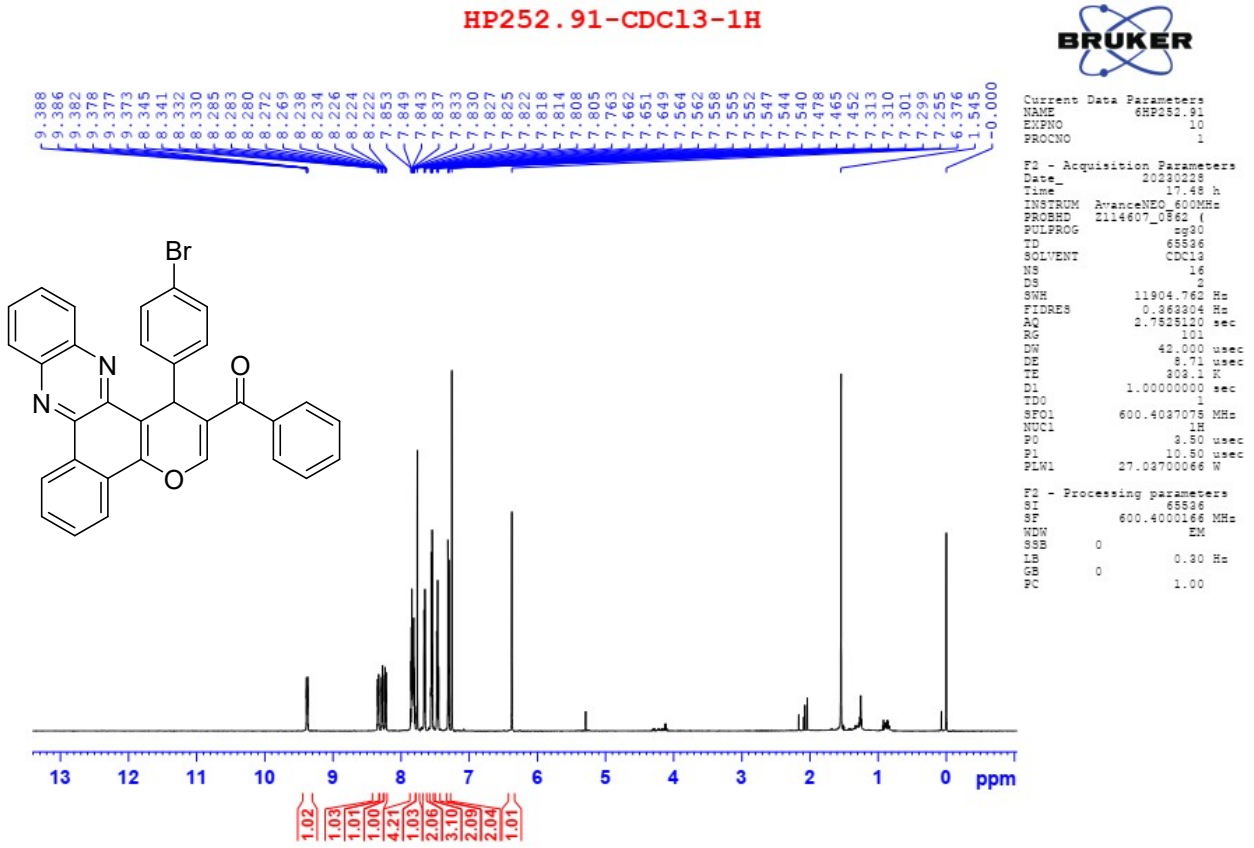
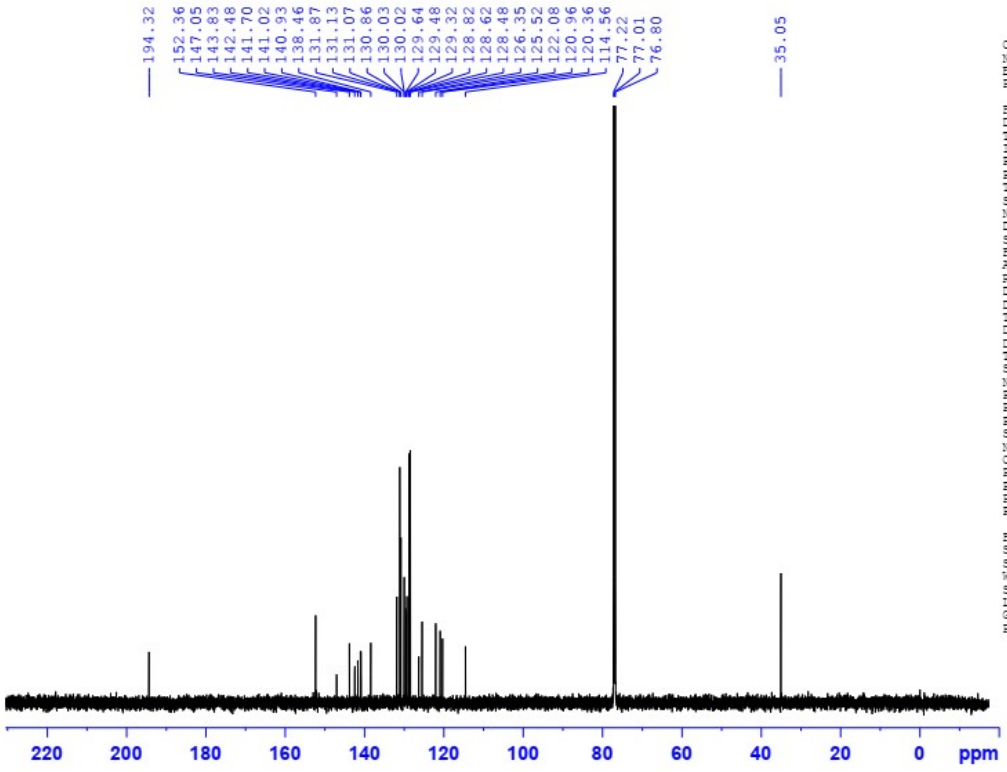


(1-(4-Bromophenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)(phenyl)methanone (7b).



HP252.91-CDCl3-C13CPD

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EXPNO                         2
PROCNO                        1

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PULPROG                 zgpg30
TD                       65536
SOLVENT                  CDCl3
NS                         512
DS                           4
SWH                  38461.539 Hz
FIDRES                1.173753 Hz
AQ                   0.8519680 sec
RG                         101
DW                      13.000 usec
DE                       6.50 usec
TE                      303.1 K
D1                   2.00000000 sec
D11                  0.03000000 sec
TD0                          1
SFO1               150.9873069 MHz
NUC1                       13C
P0                        4.20 usec
P1                       12.60 usec
PLW1               86.32800293 W
SFO2               600.4024016 MHz
NUC2                       1H
CPDPRG[2                waltz65
PCPD2                    80.00 usec
PLW2               27.03700066 W
PLW12               0.46575001 W
PLW13               0.30599001 W

F2 - Processing parameters
SI                       32768
SF                 150.9707001 MHz
WDW                         EM
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LB                        1.00 Hz
GB           0
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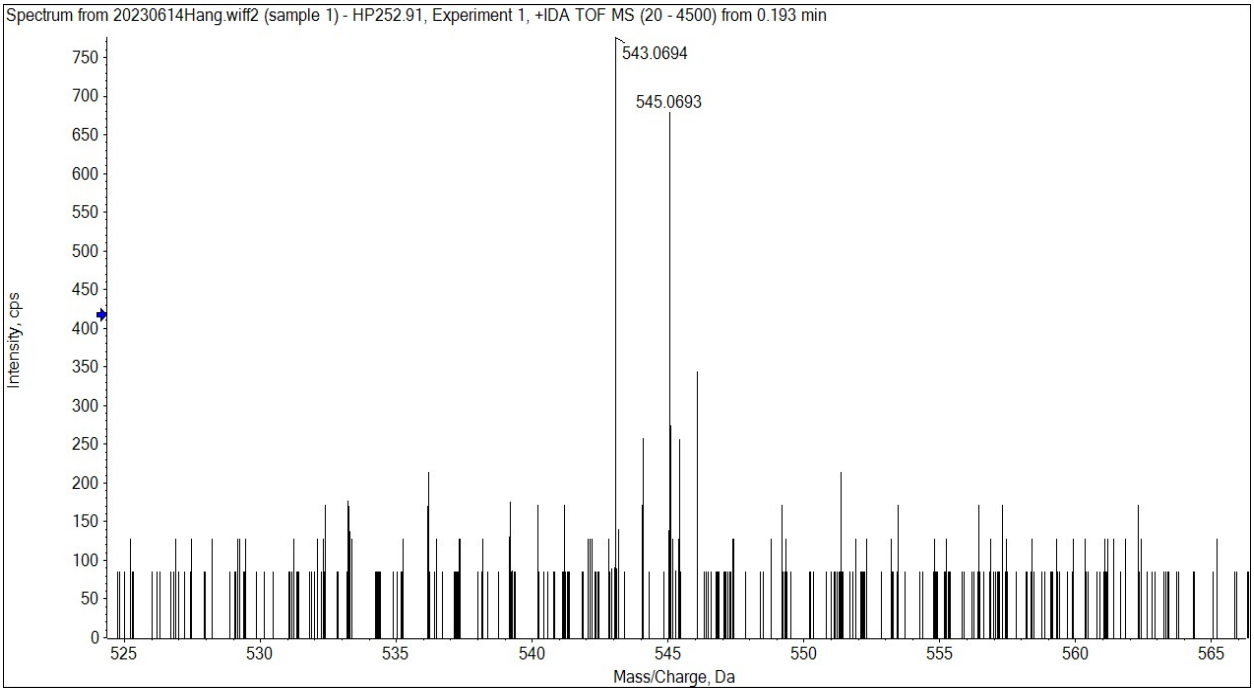
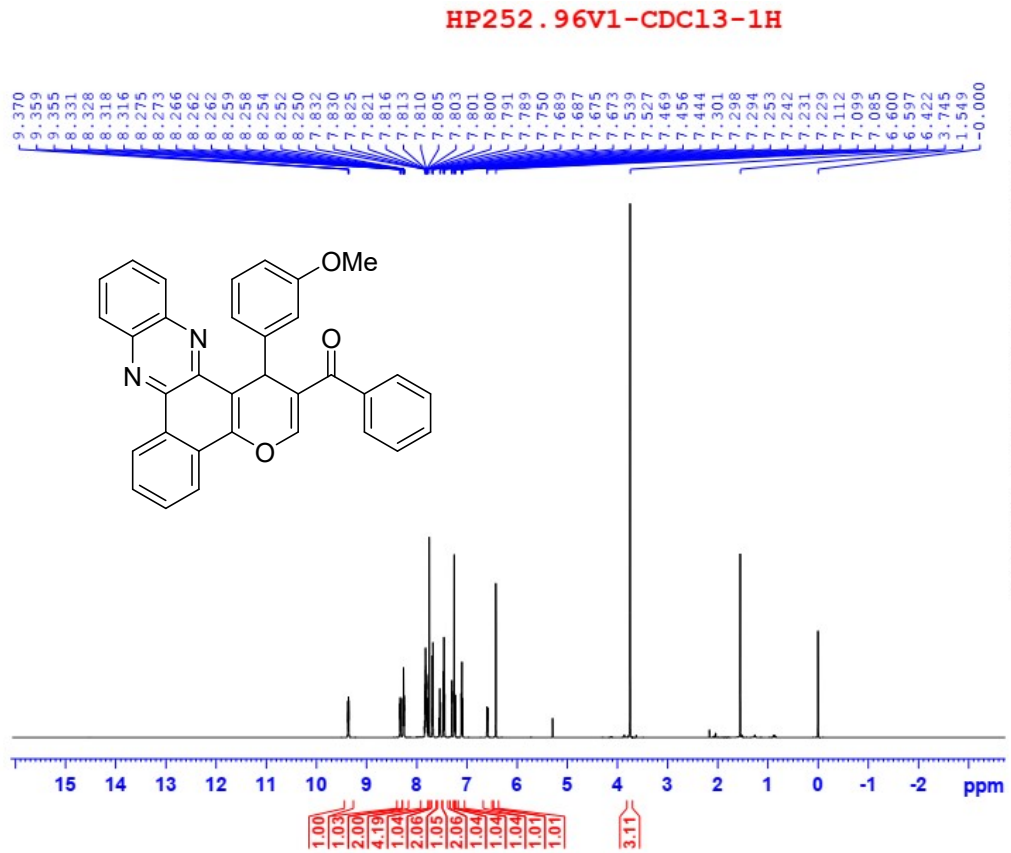


(1-(3-Methoxyphenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)(phenyl)methanone (7c).

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PULPROG              zg30
TD                  65536
SOLVENT             CDCl3
NS                     16
DS                      2
SWH            11904.762 Hz
FIDRES          0.363304 Hz
AQ              2.7525120 sec
RG                    101
DW                 42.000 usec
DE                  8.71 usec
TE                308.1 K
D1             1.00000000 sec
TD0                     1
SFO1          600.4037075 MHz
NUC1                   1H
P0                  3.50 usec
P1                 10.50 usec
PLW1          27.03700066 W

F2 - Processing parameters
SI                  65536
SF            600.4000179 MHz
WDW                    EM
SSB       0
LB                  0.30 Hz
GB        0
PC                  1.00
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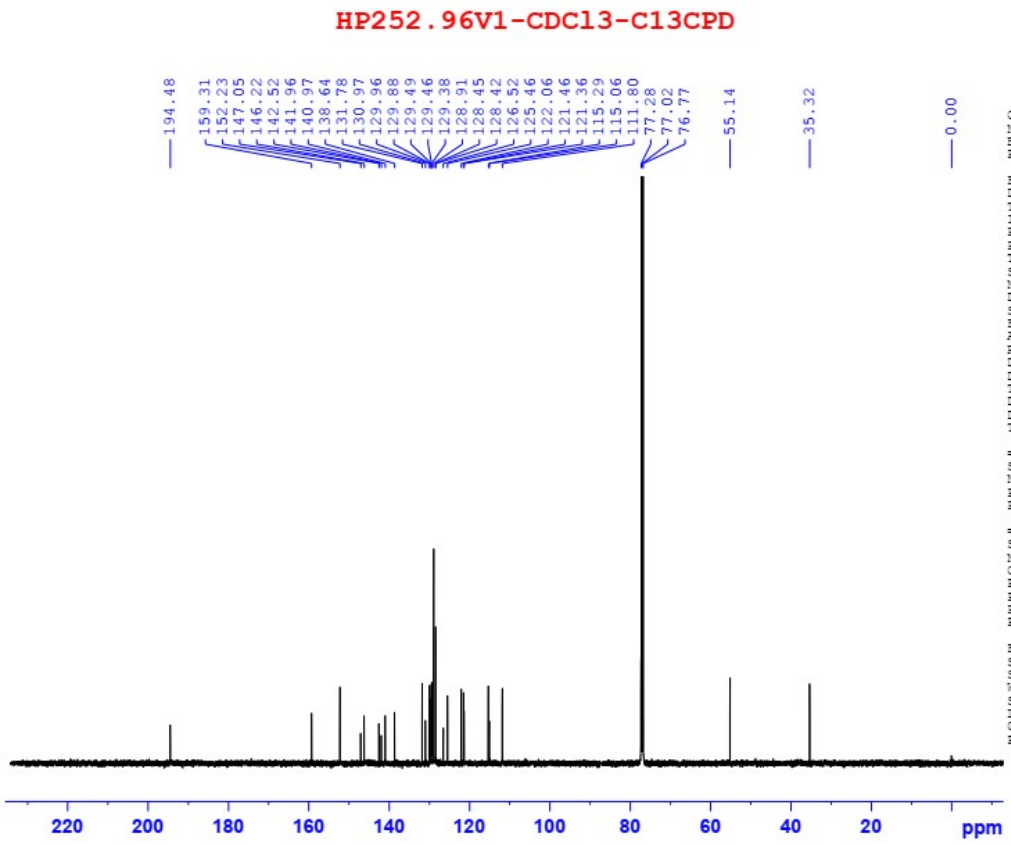


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EXPNO                   2
PROCNO                  1

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PROBHD   5 mm PABBO BB/
PULPROG          zgpg30
TD                  65536
SOLVENT             CDCl3
NS                   1024
DS                      4
SWH            31250.000 Hz
FIDRES          0.476837 Hz
AQ              1.0485760 sec
RG                 198.57
DW                 16.000 usec
DE                  6.50 usec
TE                300.4 K
D1             2.00000000 sec
D11            0.03000000 sec
TD0                     1

======== CHANNEL f1 ========
SFO1          125.7990330 MHz
NUC1                   13C
P1                 10.00 usec
PLW1          88.00000000 W

======== CHANNEL f2 ========
SFO2          500.2410010 MHz
NUC2                   1H
CPDPRG[2          waltz16
PCPD2              80.00 usec
PLW2          22.00000000 W
PLW12          0.35764000 W
PLW13          0.17989001 W

F2 - Processing parameters
SI                  32768
SF            125.7851966 MHz
WDW                    EM
SSB       0
LB                  1.00 Hz
GB        0
PC                  1.40
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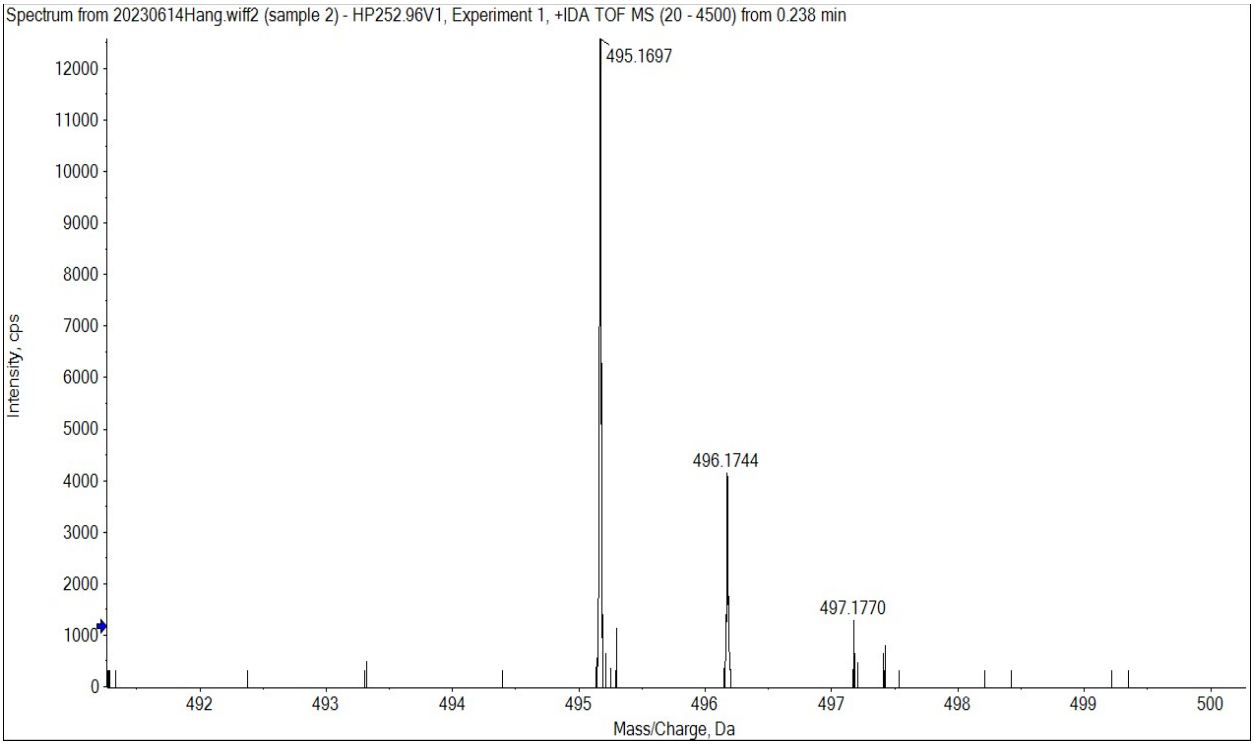
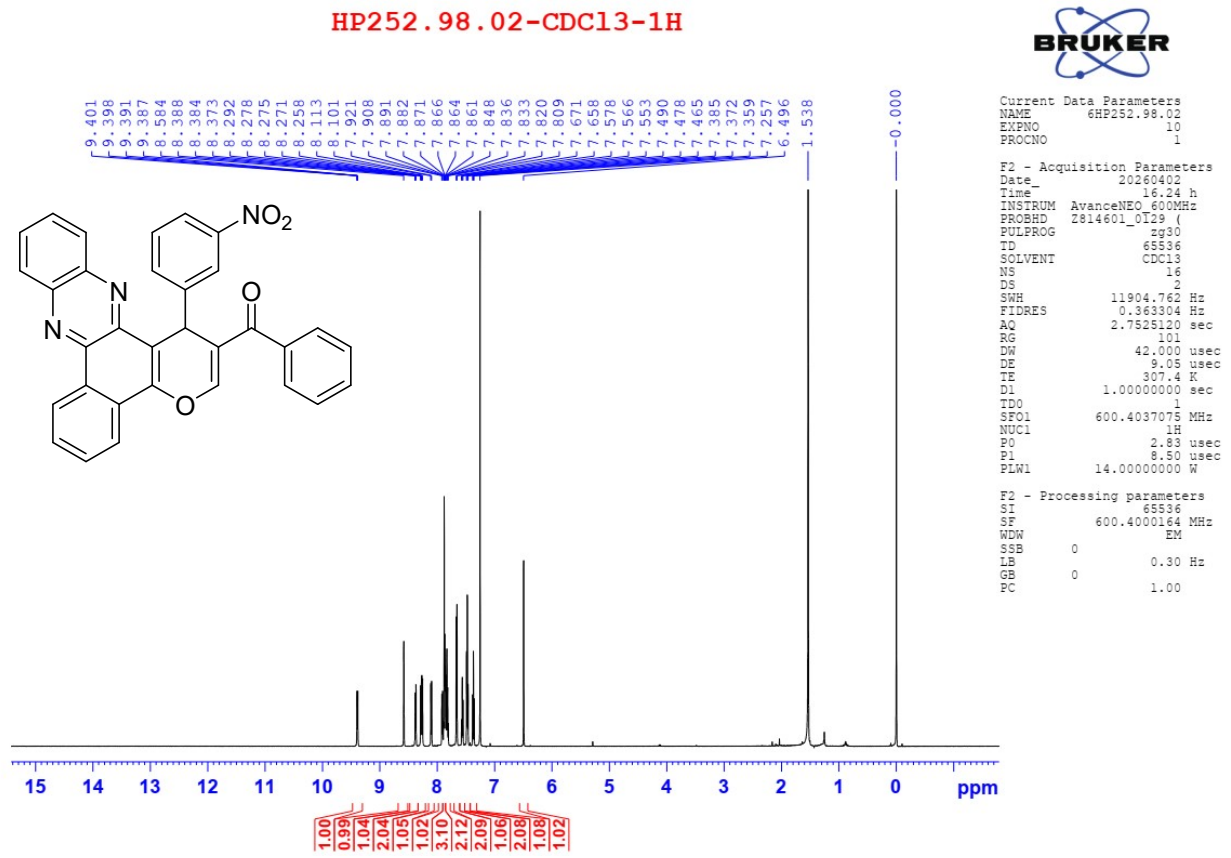


(1-(3-Nitrophenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)(phenyl)methanone (7d).

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EXPNO                 10
PROCNO                 1

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PROBHD   Z814601_0I29 (
PULPROG             zg30
TD                 65536
SOLVENT            CDCl3
NS                    16
DS                     2
SWH           11904.762 Hz
FIDRES         0.363304 Hz
AQ             2.7525120 sec
RG                   101
DW                42.000 usec
DE                 9.05 usec
TE                307.4 K
D1           1.00000000 sec
TD0                    1
SFO1        600.4037075 MHz
NUC1                  1H
P0                 2.83 usec
P1                 8.50 usec
PLW1        14.00000000 W

F2 - Processing parameters
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SF          600.4000164 MHz
WDW                   EM
SSB       0
LB                 0.30 Hz
GB        0
PC                 1.00
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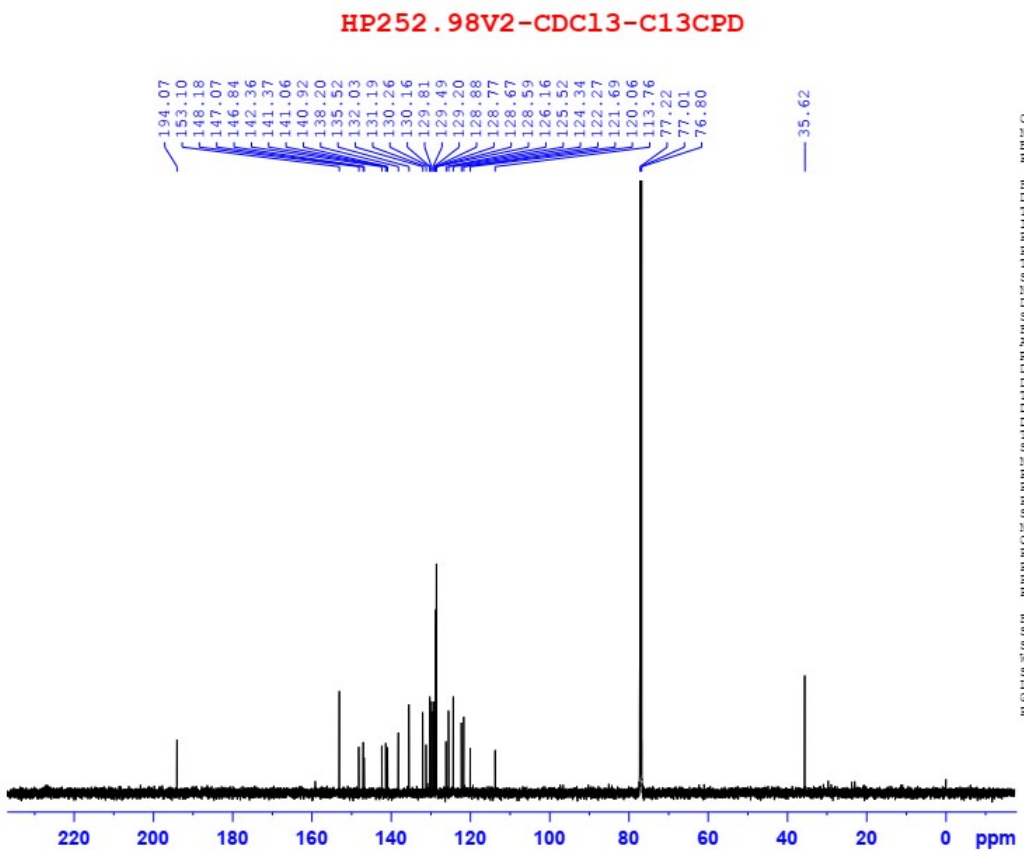


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EXPNO                    2
PROCNO                   1

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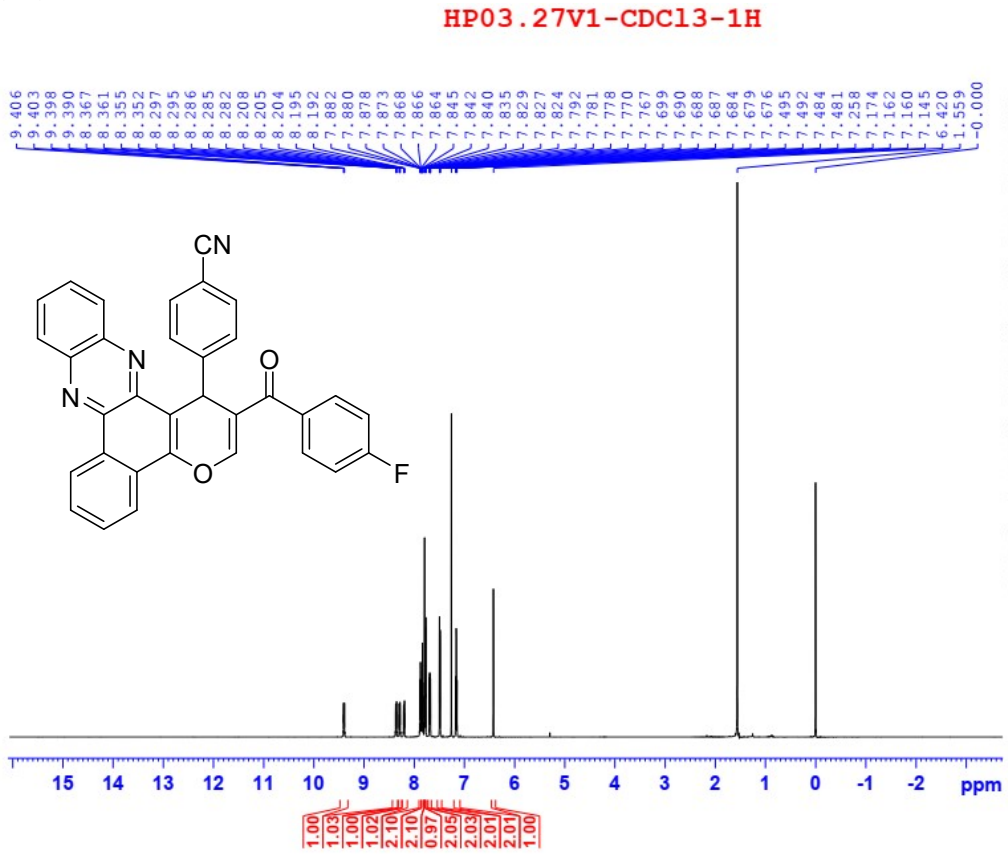
PULPROG          zgpg30
TD                65536
SOLVENT           CDCl3
NS                  512
DS                    4
SWH           38461.539 Hz
FIDRES         1.173753 Hz
AQ             0.8519680 sec
RG                  101
DW               13.000 usec
DE                6.50 usec
TE                303.1 K
D1           2.00000000 sec
D11          0.03000000 sec
TD0                   1
SFO1        150.9873069 MHz
NUC1                13C
P0                 4.20 usec
P1                12.60 usec
PLW1        86.32800293 W
SFO2        600.4024016 MHz
NUC2                1H
CPDPRG[2         waltz65
PCPD2             80.00 usec
PLW2        27.03700066 W
PLW12        0.46575001 W
PLW13        0.30599001 W

F2 - Processing parameters
SI                32768
SF          150.9707001 MHz
WDW                  EM
SSB       0
LB                1.00 Hz
GB        0
PC                1.40
```

4-(2-(4-Fluorobenzoyl)-1H-benzo[a]pyrano[2,3-c]phenazin-1-yl)benzonitrilee (7e).

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EXPNO                   10
PROCNO                   1

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PULPROG             zg30
TD                65536
SOLVENT           CDCl3
NS                   16
DS                    2
SWH           11904.762 Hz
FIDRES         0.363304 Hz
AQ             2.7525120 sec
RG                  101
DW               42.000 usec
DE                8.71 usec
TE                303.2 K
D1           1.00000000 sec
TD0                   1
SFO1        600.4037075 MHz
NUC1                1H
P0                3.50 usec
P1               10.50 usec
PLW1        27.03700066 W

F2 - Processing parameters
SI                65536
SF          600.4000150 MHz
WDW                  EM
SSB       0
LB                0.30 Hz
GB        0
PC                1.00
```
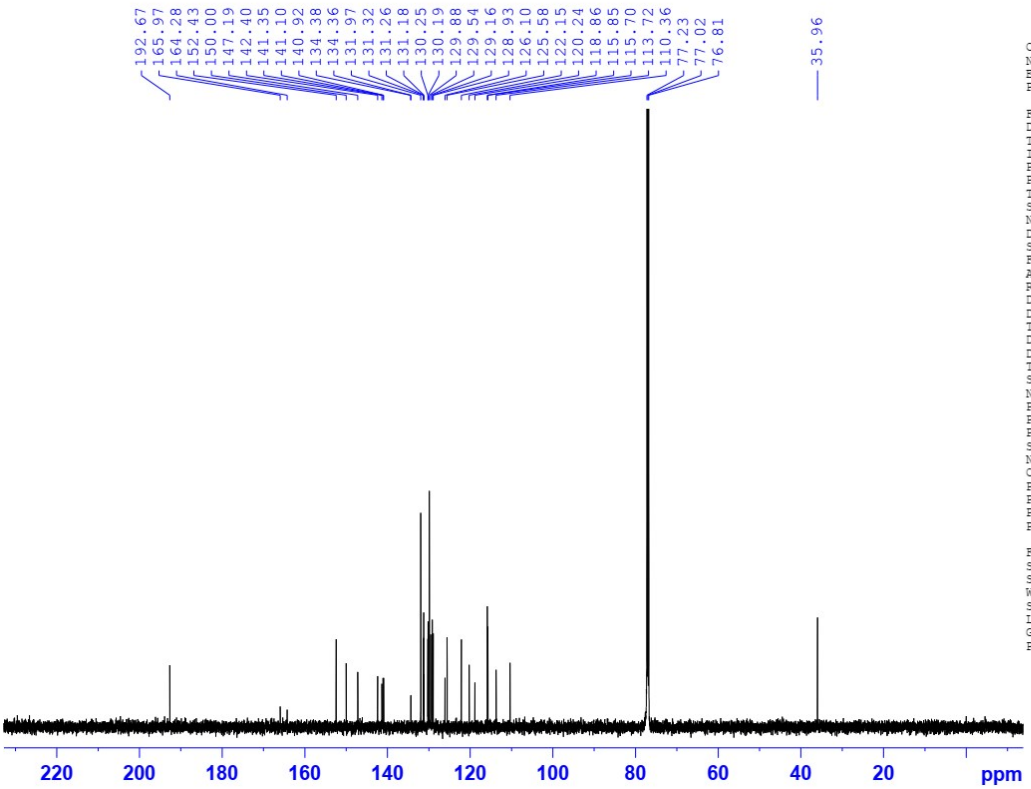

HP03.27V1-CDCl3-C13CPD

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EXPNO                  2
PROCNO                 1

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Time              20.06 h
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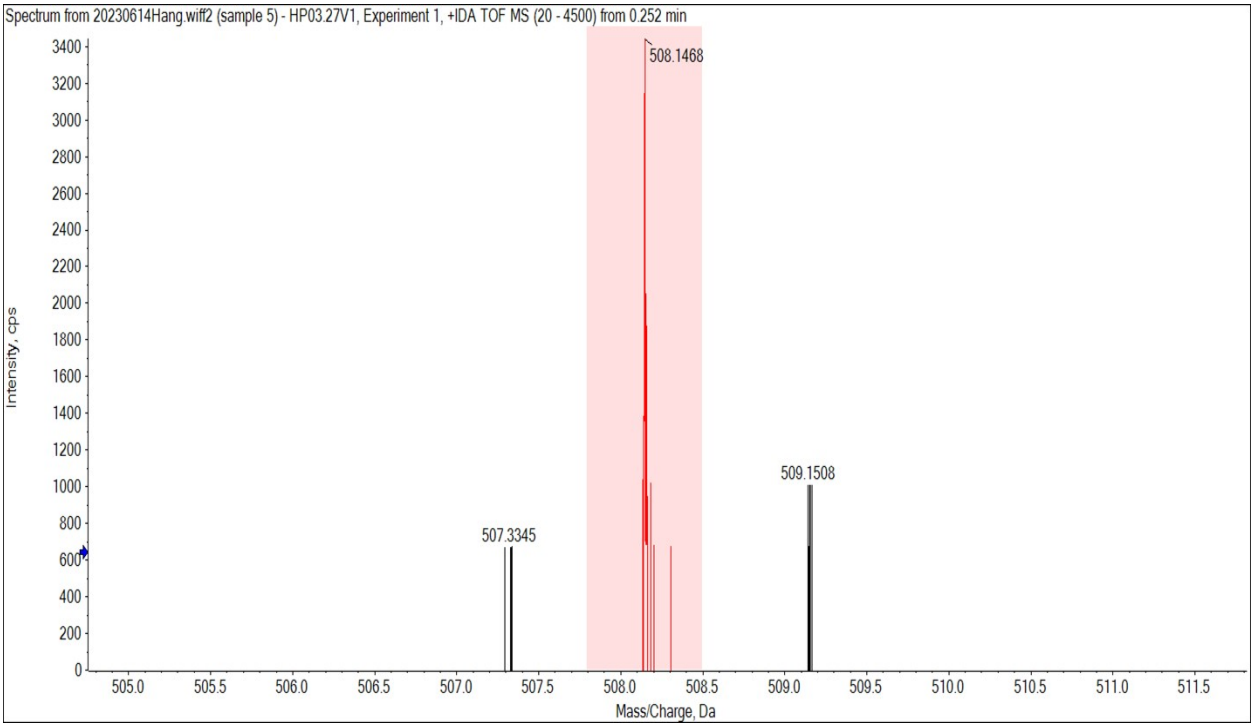
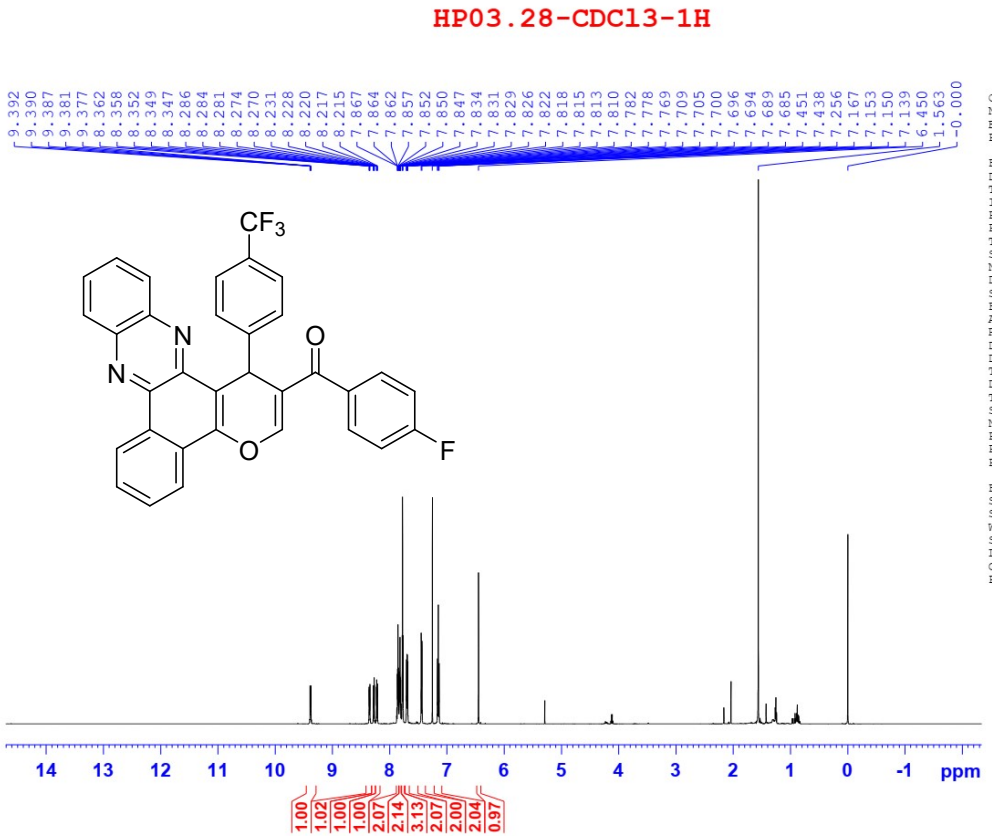
PROBHD   Z114607_0562 (
PULPROG          zgpg30
TD                65536
SOLVENT           CDCl3
NS                 1024
DS                    4
SWH           38461.539 Hz
FIDRES         1.173753 Hz
AQ            0.8519680 sec
RG                  101
DW               13.000 usec
DE                6.50 usec
TE               300.2 K
D1            2.00000000 sec
D11           0.03000000 sec
TD0                   1
SFO1        150.9873069 MHz
NUC1                13C
P0                4.20 usec
P1               12.60 usec
PLW1        86.32800293 W
SFO2        600.4024016 MHz
NUC2                1H
CPDPRG[2         waltz65
PCPD2             80.00 usec
PLW2        27.03700066 W
PLW12        0.46575001 W
PLW13        0.30599001 W

F2 - Processing parameters
SI                32768
SF          150.9707001 MHz
WDW                EM
SSB       0
LB                1.00 Hz
GB        0
PC                1.40
```



(4-Fluorophenyl)(1-(4-(trifluoromethyl)phenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7f).



BRUKER

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PROCNO                   1

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PROBHD   Z114607_0862 (
PULPROG             zg30
TD                 65536
SOLVENT            CDCl3
NS                    16
DS                     2
SWH           11904.762 Hz
FIDRES         0.363304 Hz
AQ             2.7525120 sec
RG                   101
DW                42.000 usec
DE                 8.71 usec
TE                303.1 K
D1            1.00000000 sec
TD0                    1
SFO1        600.4037075 MHz
NUC1                1H
P0                3.50 usec
P1               10.50 usec
PLW1        27.03700066 W

F2 - Processing parameters
SI                 65536
SF          600.4000160 MHz
WDW                   EM
SSB       0
LB                 0.30 Hz
GB        0
PC                 1.00
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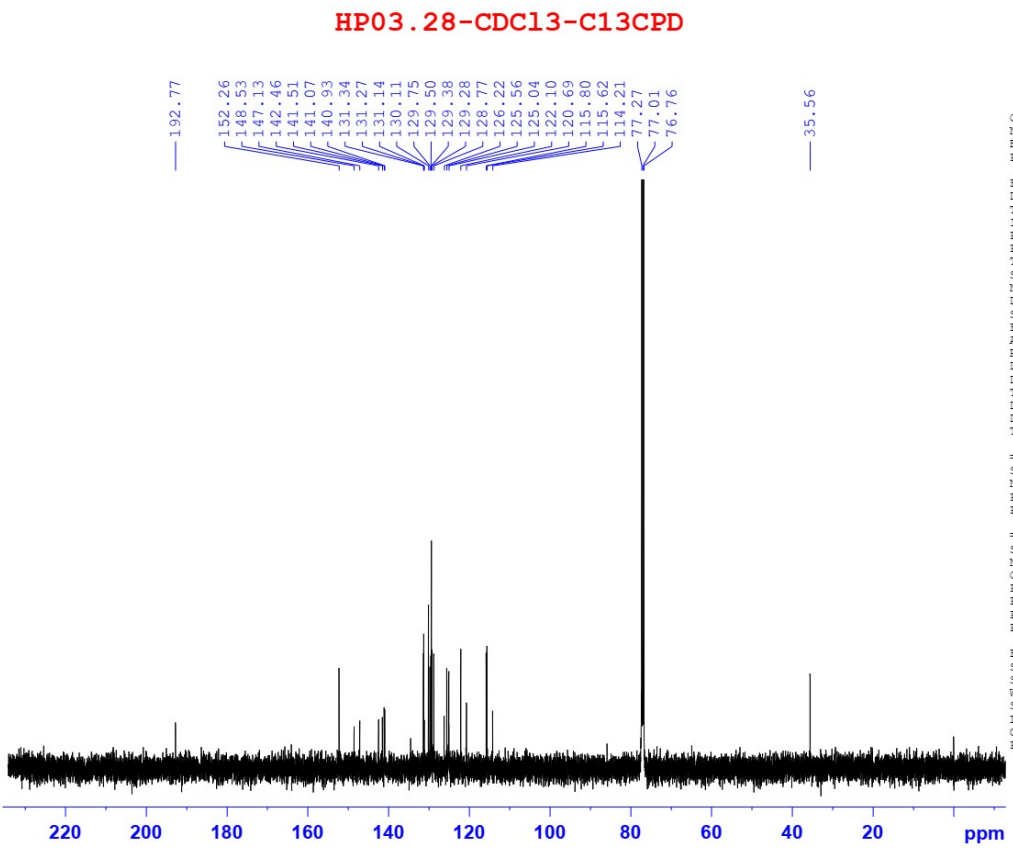

BRUKER

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Current Data Parameters
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EXPNO                   2
PROCNO                  1

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PROBHD   5 mm PABBO BB/
PULPROG          zgpg30
TD                 65536
SOLVENT            CDCl3
NS                   256
DS                     4
SWH           31250.000 Hz
FIDRES         0.476837 Hz
AQ             1.0485760 sec
RG                198.57
DW                16.000 usec
DE                 6.50 usec
TE                301.9 K
D1            2.00000000 sec
D11           0.03000000 sec
TD0                    1

======== CHANNEL f1 ========
SFO1        125.7990330 MHz
NUC1                13C
P1                10.00 usec
PLW1        88.00000000 W

======== CHANNEL f2 ========
SFO2        500.2410010 MHz
NUC2                1H
CPDPRG[2        waltz16
PCPD2             80.00 usec
PLW2        22.00000000 W
PLW12        0.35764000 W
PLW13        0.17989001 W

F2 - Processing parameters
SI                 32768
SF          125.7851966 MHz
WDW                   EM
SSB       0
LB                 1.00 Hz
GB        0
PC                 1.40
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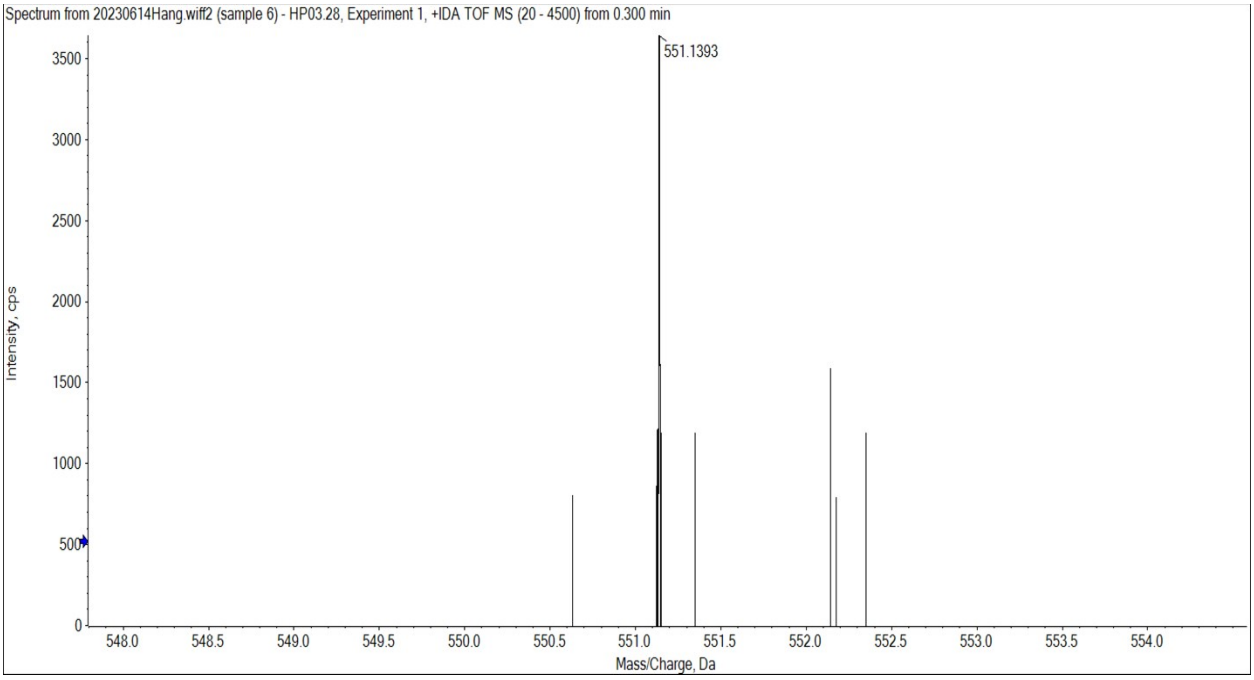
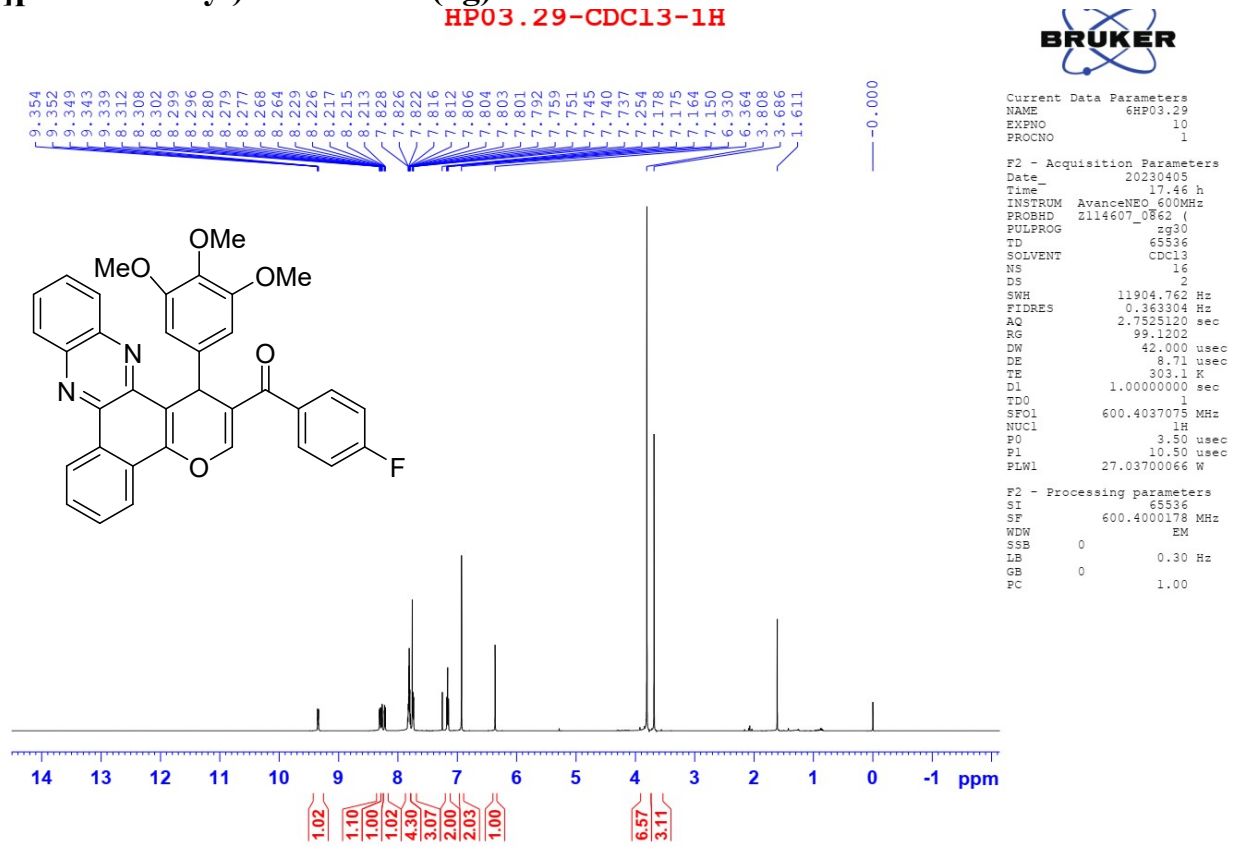


(4-Fluorophenyl)(1-(3,4,5-trimethoxyphenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7g).

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Current Data Parameters
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EXPNO                   10
PROCNO                   1

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PROBHD   Z114607_0362 (
PULPROG             zg30
TD                 65536
SOLVENT            CDCl3
NS                    16
DS                     2
SWH           11904.762 Hz
FIDRES         0.363304 Hz
AQ            2.7525120 sec
RG              99.1202
DW               42.000 usec
DE                8.71 usec
TE               303.1 K
D1            1.00000000 sec
TD0                    1
SFO1        600.4037075 MHz
NUC1                  1H
P0                 3.50 usec
P1                10.50 usec
PLW1        27.03700066 W

F2 - Processing parameters
SI                 65536
SF          600.4000178 MHz
WDW                   EM
SSB       0
LB                 0.30 Hz
GB        0
PC                 1.00
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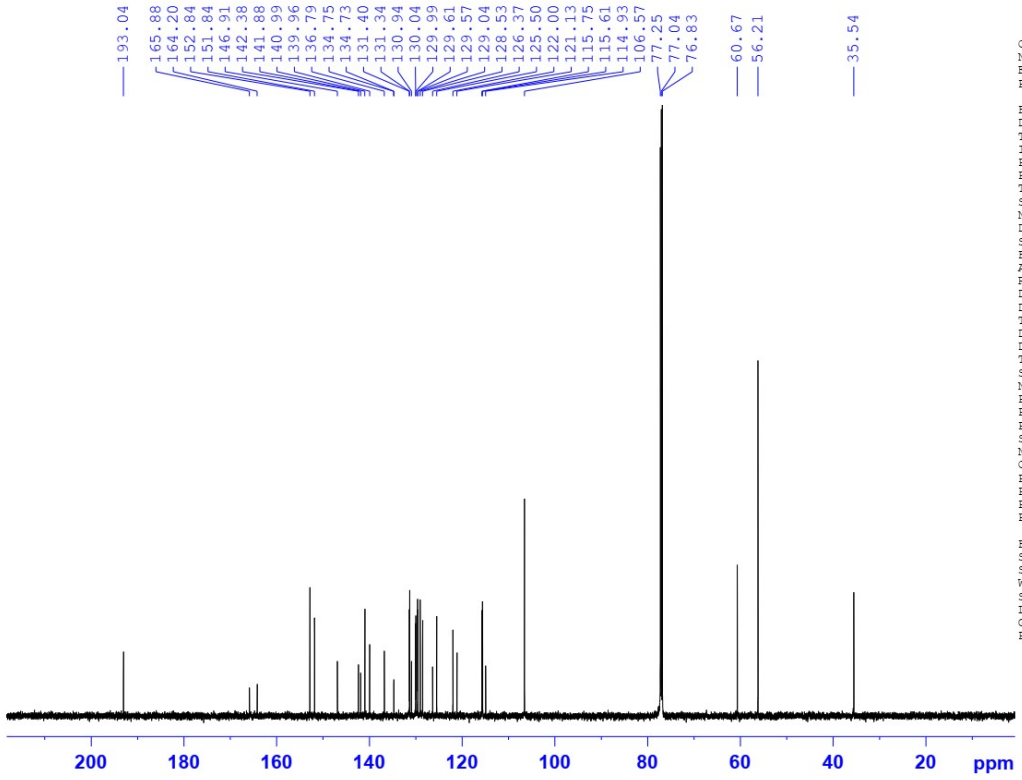
HP03.29-CDCl3-C13CPD

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PROCNO                       1

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Time                    18.08 h
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PULPROG                 zgpg30
TD                       65536
SOLVENT                  CDCl3
NS                         258
DS                           4
SWH                 38461.539 Hz
FIDRES               1.173753 Hz
AQ                   0.8519680 sec
RG                         101
DW                      13.000 usec
DE                       6.50 usec
TE                      300.1 K
D1                2.00000000 sec
D11               0.03000000 sec
TD0                          1
SFO1             150.9873069 MHz
NUC1                      13C
P0                       4.20 usec
P1                      12.60 usec
PLW1             86.32800293 W
SFO2             600.4024016 MHz
NUC2                      1H
CPDPRG[2              waltz65
PCPD2                   80.00 usec
PLW2             27.03700066 W
PLW12             0.46575001 W
PLW13             0.30599001 W

F2 - Processing parameters
SI                       32768
SF               150.9707001 MHz
WDW                         EM
SSB          0
LB                       1.00 Hz
GB           0
PC                       1.40
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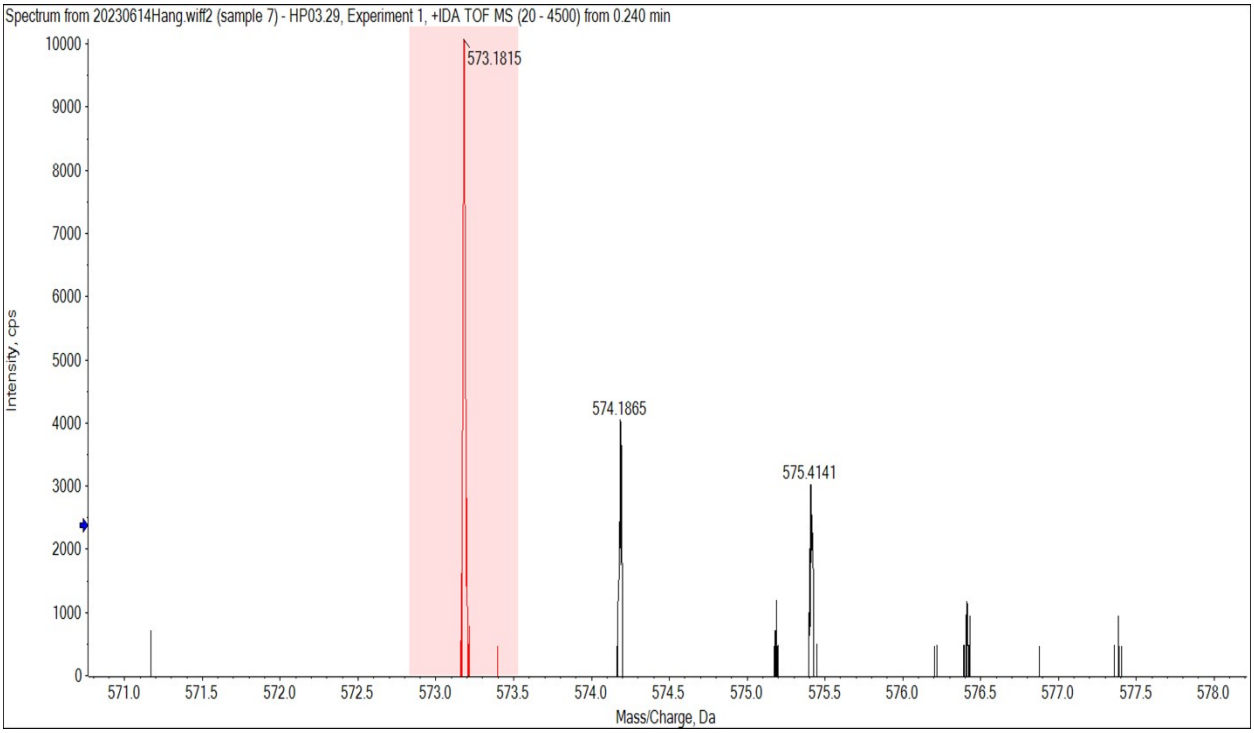
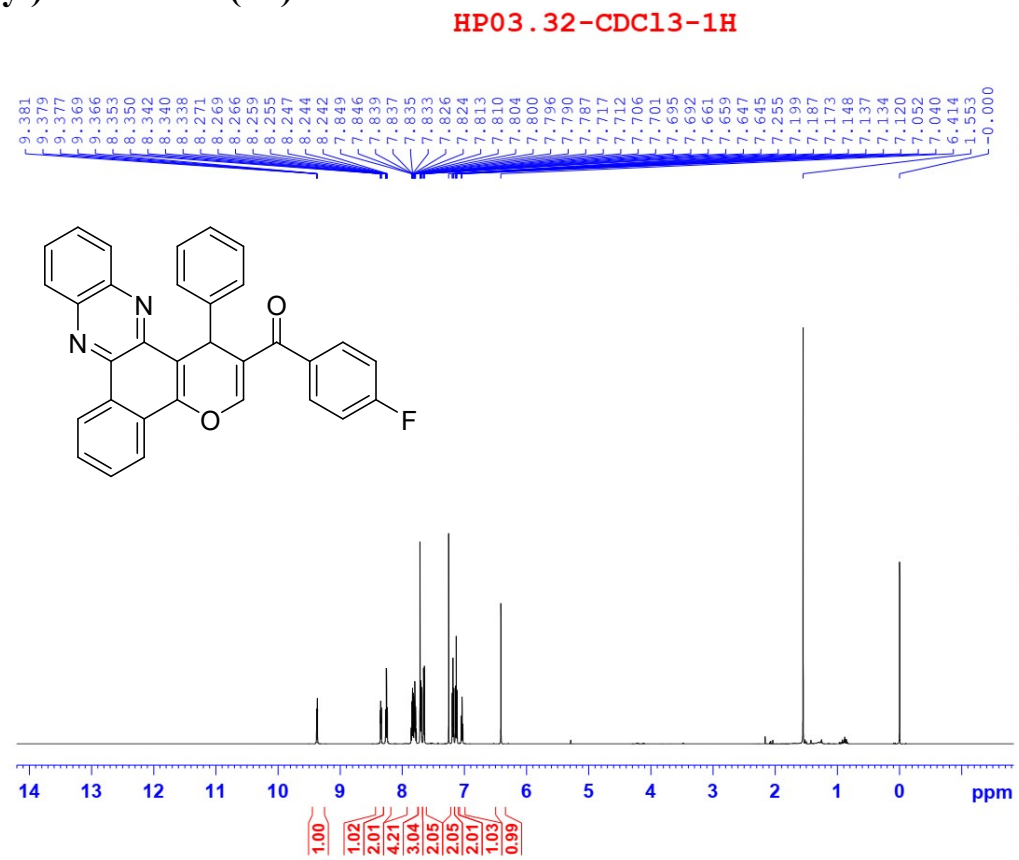


(4-Fluorophenyl)(1-phenyl-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7h).

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EXPNO                       10
PROCNO                       1

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Date_                 20230405
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PULPROG                   zg30
TD                       65536
SOLVENT                  CDCl3
NS                          16
DS                           2
SWH                  11904.762 Hz
FIDRES                0.363304 Hz
AQ                    2.7525120 sec
RG                         101
DW                      42.000 usec
DE                       8.71 usec
TE                      303.1 K
D1                   1.00000000 sec
TD0                          1
SFO1                600.4037075 MHz
NUC1                        1H
P0                       3.50 usec
P1                      10.50 usec
PLW1                27.03700066 W

F2 - Processing parameters
SI                       65536
SF                  600.4000168 MHz
WDW                         EM
SSB          0
LB                       0.30 Hz
GB           0
PC                       1.00
```
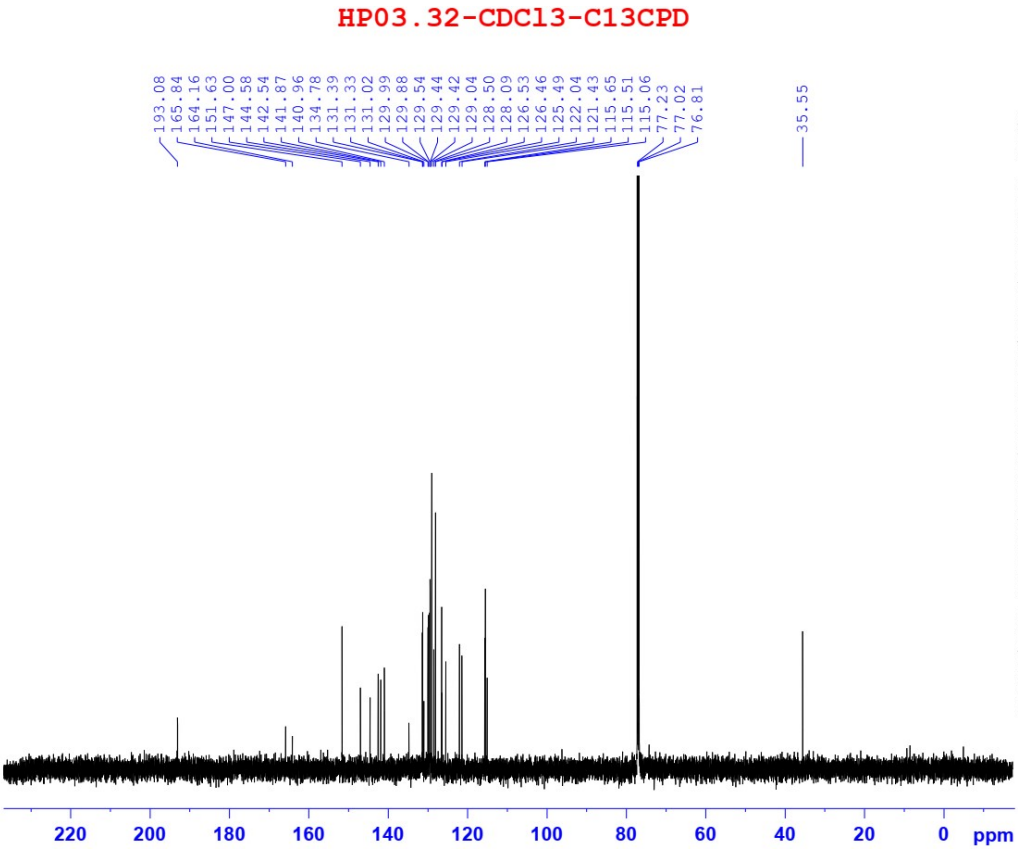
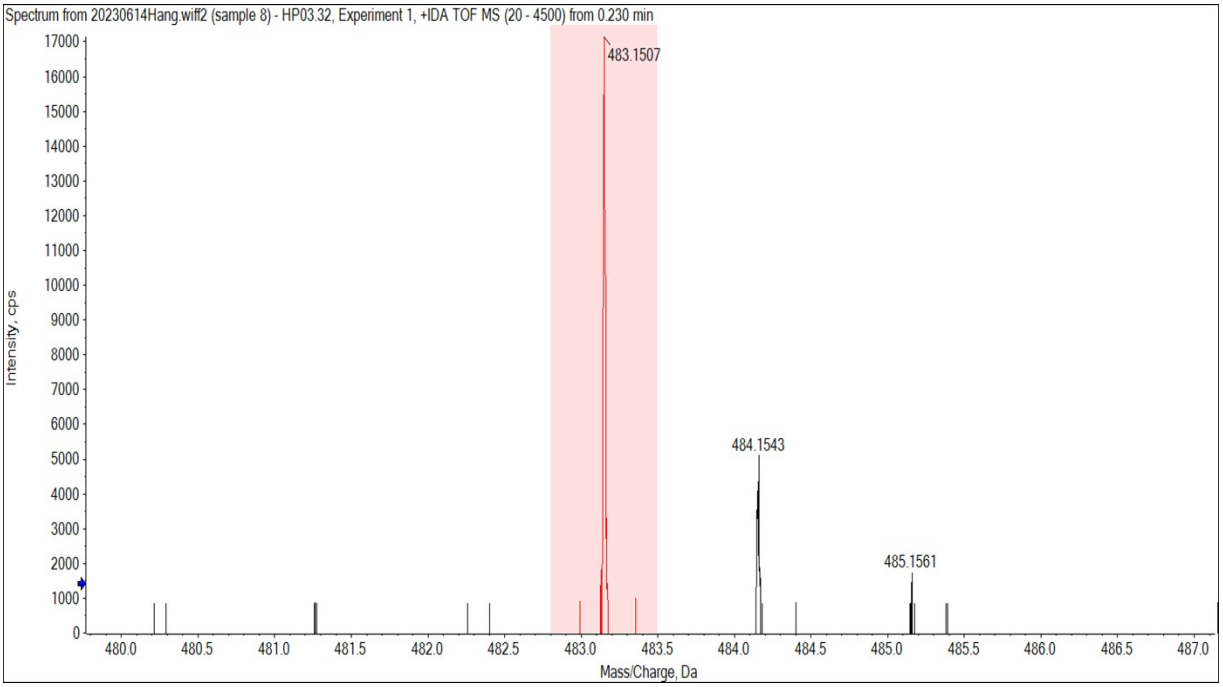
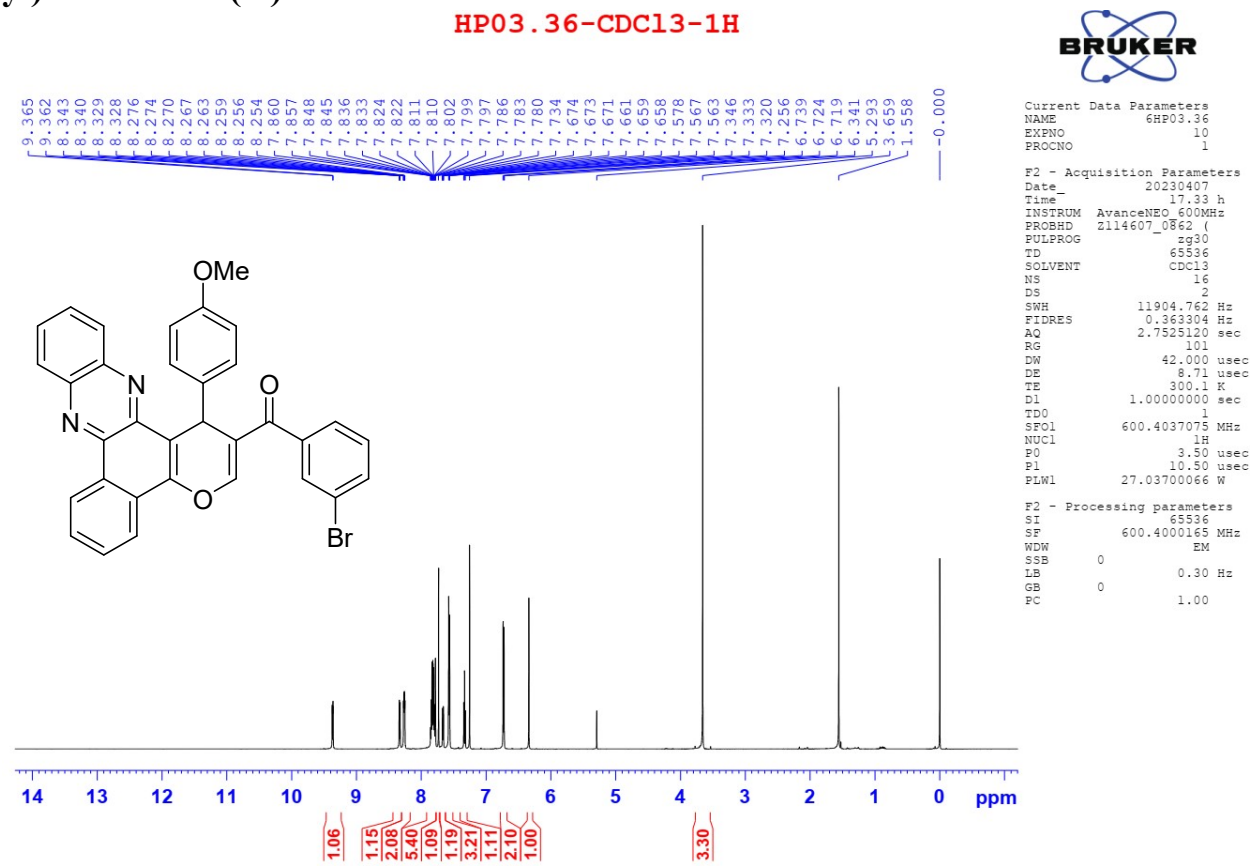
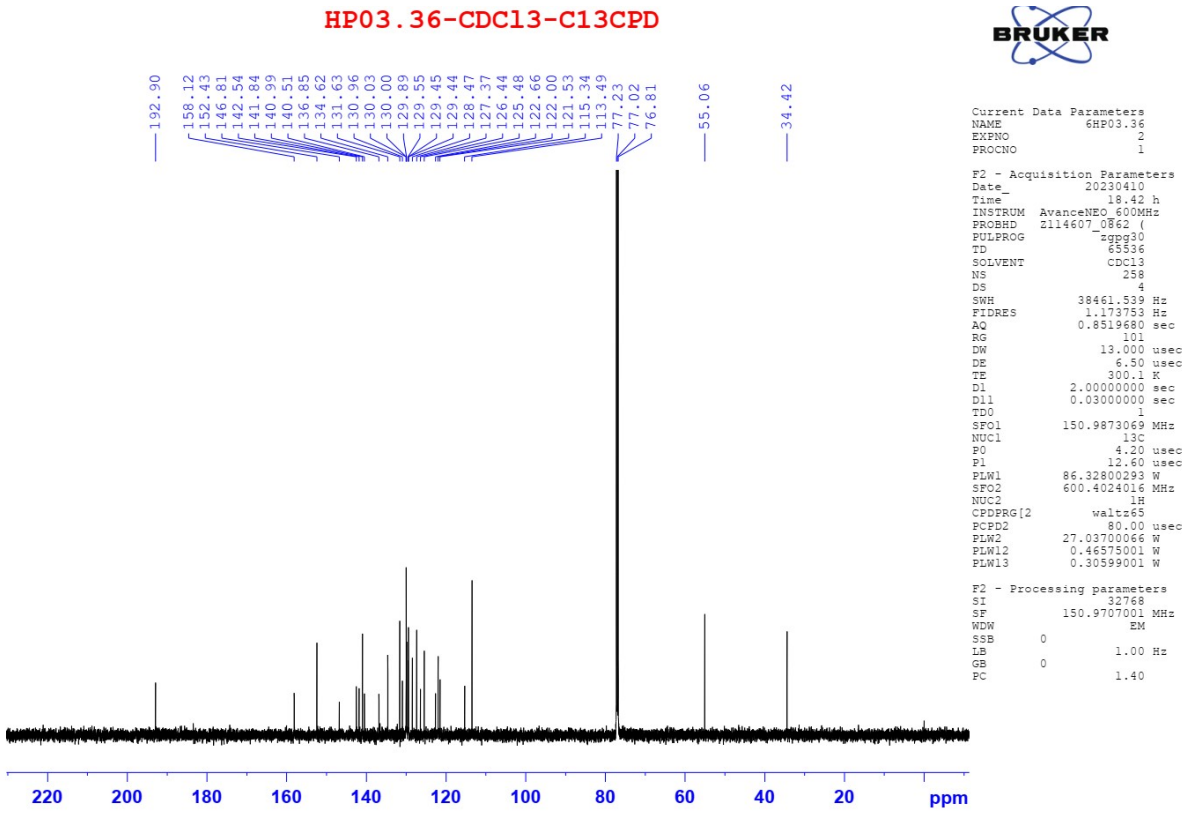




```
Current Data Parameters
NAME                  6HP03.32
EXPNO                       2
PROCNO                      1

F2 - Acquisition Parameters
Date_                 20230410
Time                     18.25 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z114607_0862 (
PULPROG                zgpg30
TD                       65536
SOLVENT                  CDCl3
NS                         258
DS                           4
SWH                 38461.539 Hz
FIDRES               1.173753 Hz
AQ                   0.8519680 sec
RG                         101
DW                      13.000 usec
DE                       6.50 usec
TE                      300.1 K
D1                   2.00000000 sec
D11                  0.03000000 sec
TD0                          1
SFO1                150.9873069 MHz
NUC1                        13C
P0                       4.20 usec
P1                      12.60 usec
PLW1                86.32800293 W
SFO2                600.4024016 MHz
NUC2                        1H
CPDPRG[2                waltz65
PCPD2                   80.00 usec
PLW2                27.03700066 W
PLW12                0.46575001 W
PLW13                0.30599001 W

F2 - Processing parameters
SI                       32768
SF                  150.9707001 MHz
WDW                         EM
SSB          0
LB                       1.00 Hz
GB           0
PC                       1.40
```

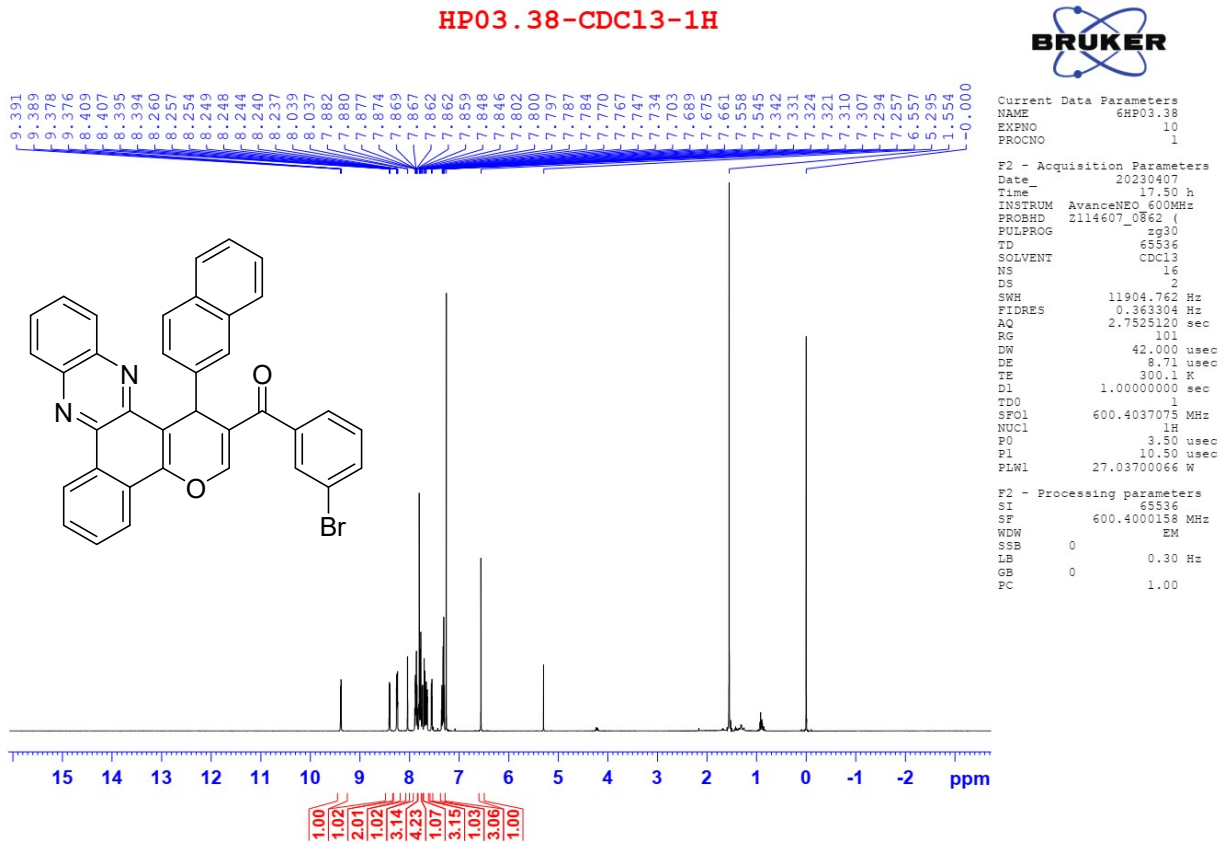


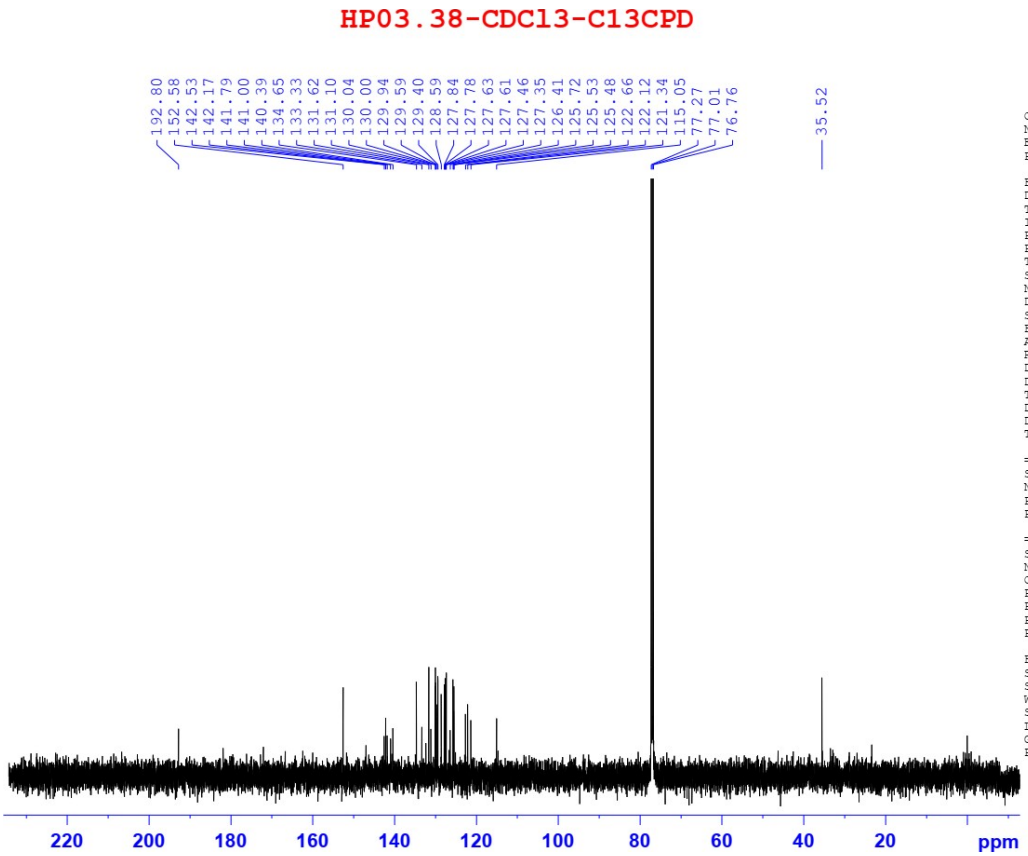
(3-Bromophenyl)(1-(4-methoxyphenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7i).





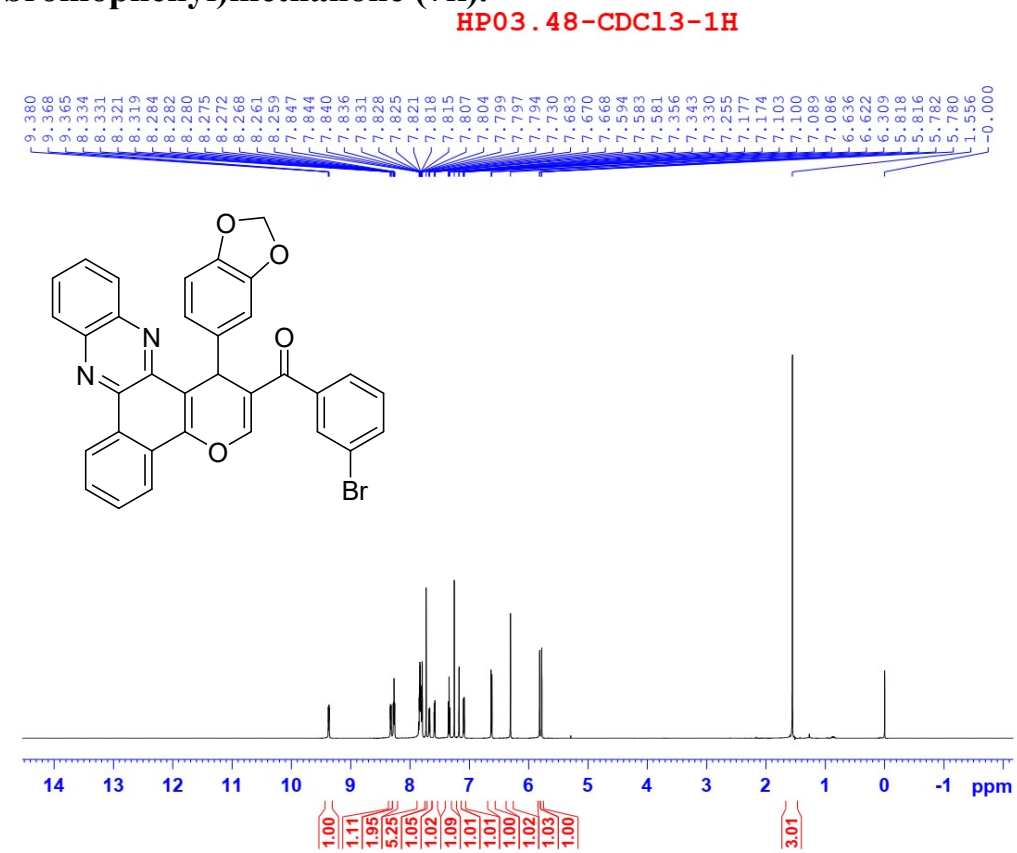
(3-Bromophenyl)(1-(naphthalen-2-yl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7j).





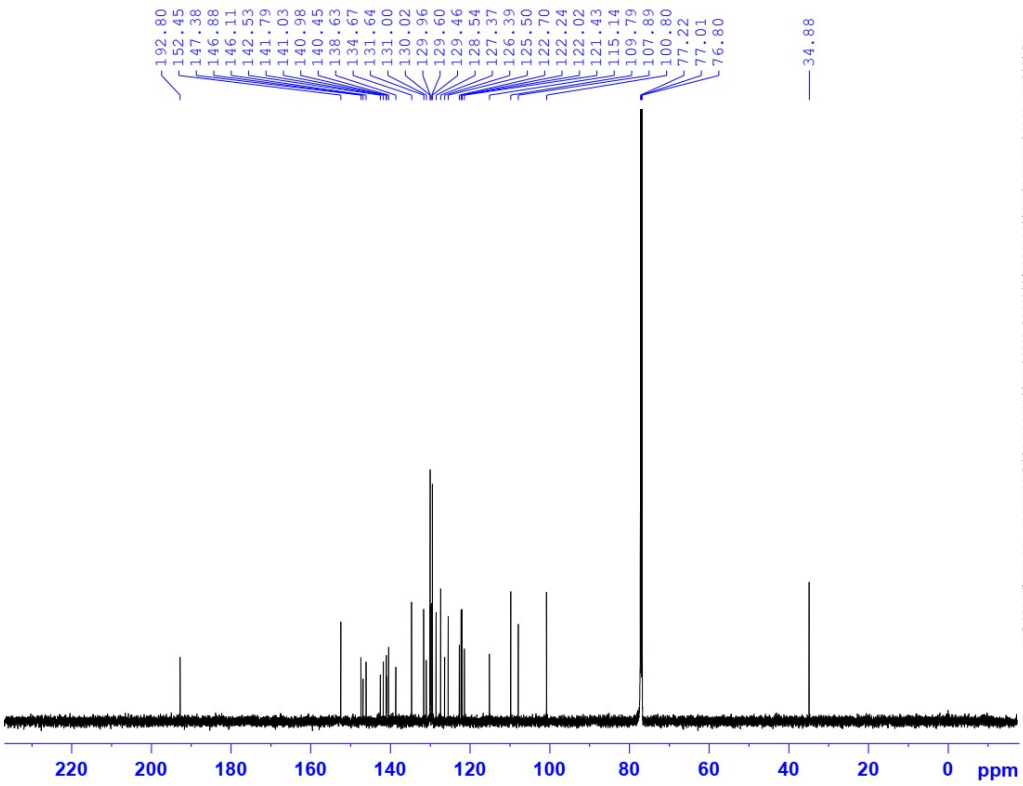

```
Current Data Parameters
NAME                  6HP03.38
EXPNO                        2
PROCNO                       1

F2 - Acquisition Parameters
Date_              20230410
Time_                17.29
INSTRUM              spect
PROBHD    5 mm PABBO BB/
PULPROG            zgpg30
TD                  65536
SOLVENT             CDCl3
NS                    256
DS                      4
SWH              31250.000 Hz
FIDRES            0.476837 Hz
AQ               1.0485760 sec
RG                 198.57
DW                 16.000 usec
DE                  6.50 usec
TE                 301.6 K
D1              2.00000000 sec
D11             0.03000000 sec
TD0                     1

======== CHANNEL f1 ========
SFO1           125.7990330 MHz
NUC1                  13C
P1                  10.00 usec
PLW1           88.00000000 W

======== CHANNEL f2 ========
SFO2           500.2410010 MHz
NUC2                  1H
CPDPRG[2           waltz16
PCPD2               80.00 usec
PLW2           22.00000000 W
PLW12           0.35764000 W
PLW13           0.17989001 W

F2 - Processing parameters
SI                   32768
SF              125.7851966 MHz
WDW                     EM
SSB       0
LB                   1.00 Hz
GB        0
PC                   1.40
```

(1-(Benzo[d][1,3]dioxol-5-yl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)(3-bromophenyl)methanone (7k).

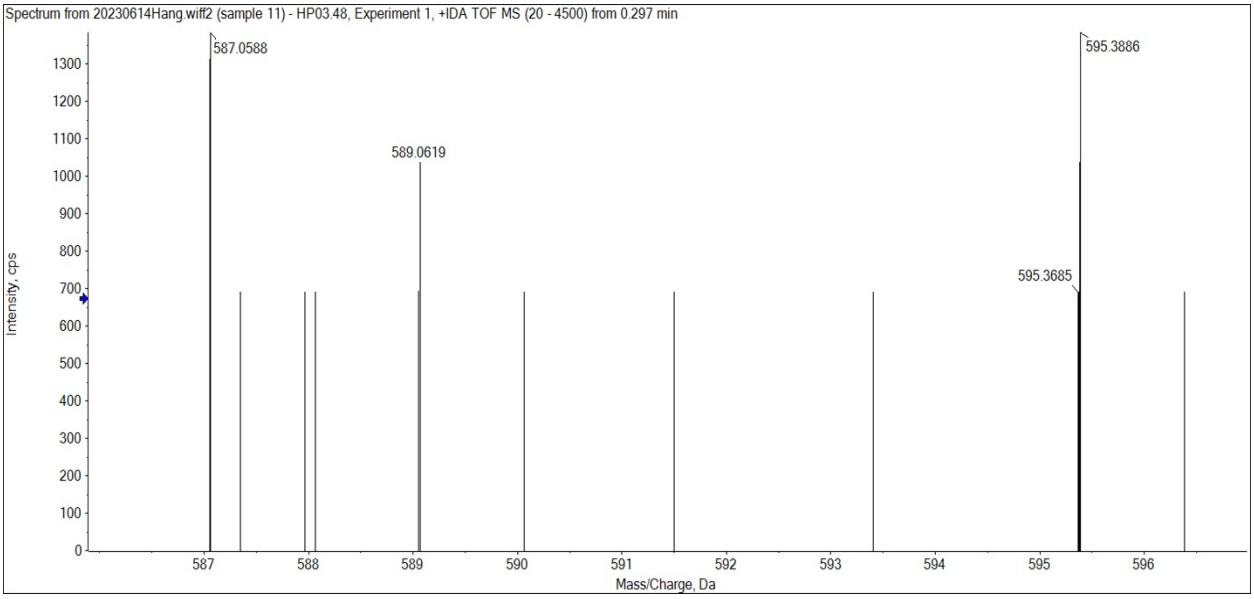



```
Current Data Parameters
NAME                  6HP03.48
EXPNO                       10
PROCNO                       1

F2 - Acquisition Parameters
Date_              20230417
Time_                17.30 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z114607_0862 (
PULPROG              zg30
TD                  65536
SOLVENT             CDCl3
NS                    16
DS                     2
SWH              11904.762 Hz
FIDRES            0.363304 Hz
AQ               2.7525120 sec
RG                   101
DW                 42.000 usec
DE                  8.71 usec
TE                 303.1 K
D1              1.00000000 sec
TD0                     1
SFO1           600.4037075 MHz
NUC1                  1H
P0                  3.50 usec
P1                 10.50 usec
PLW1           27.03700066 W

F2 - Processing parameters
SI                   65536
SF              600.4000171 MHz
WDW                     EM
SSB       0
LB                   0.30 Hz
GB        0
PC                   1.00
```

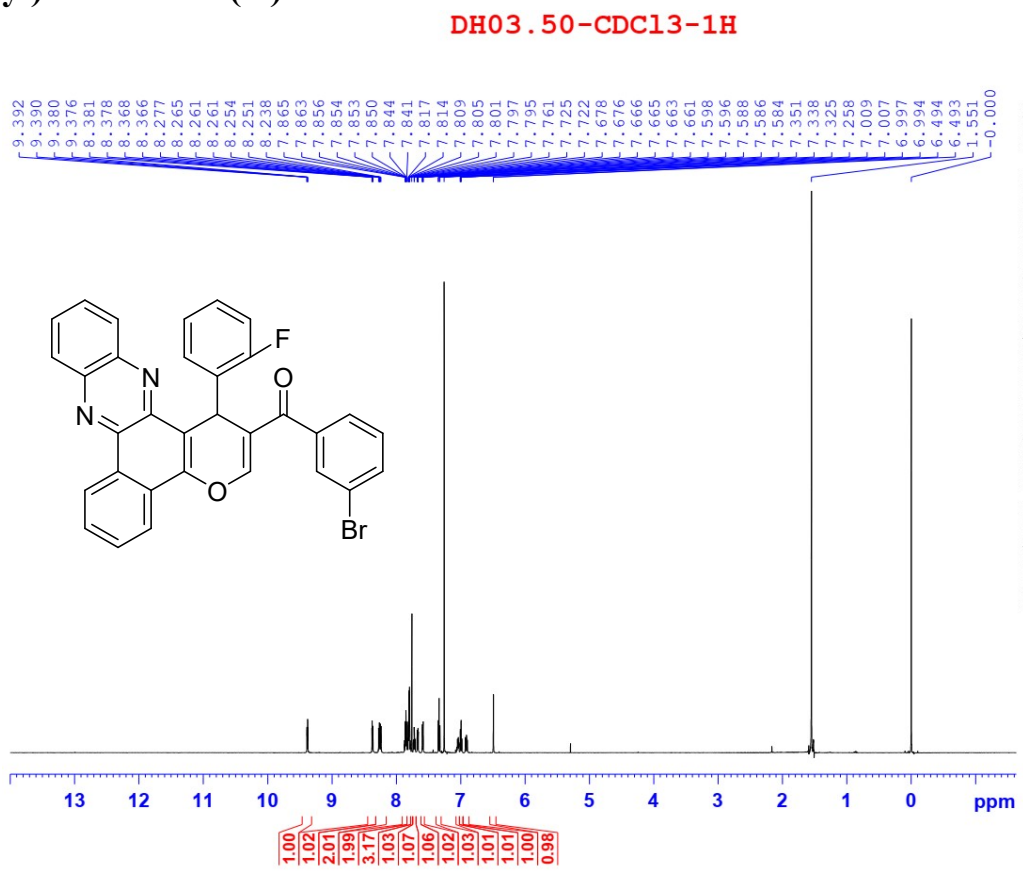
HP03.48-CDCl3-C13CPD



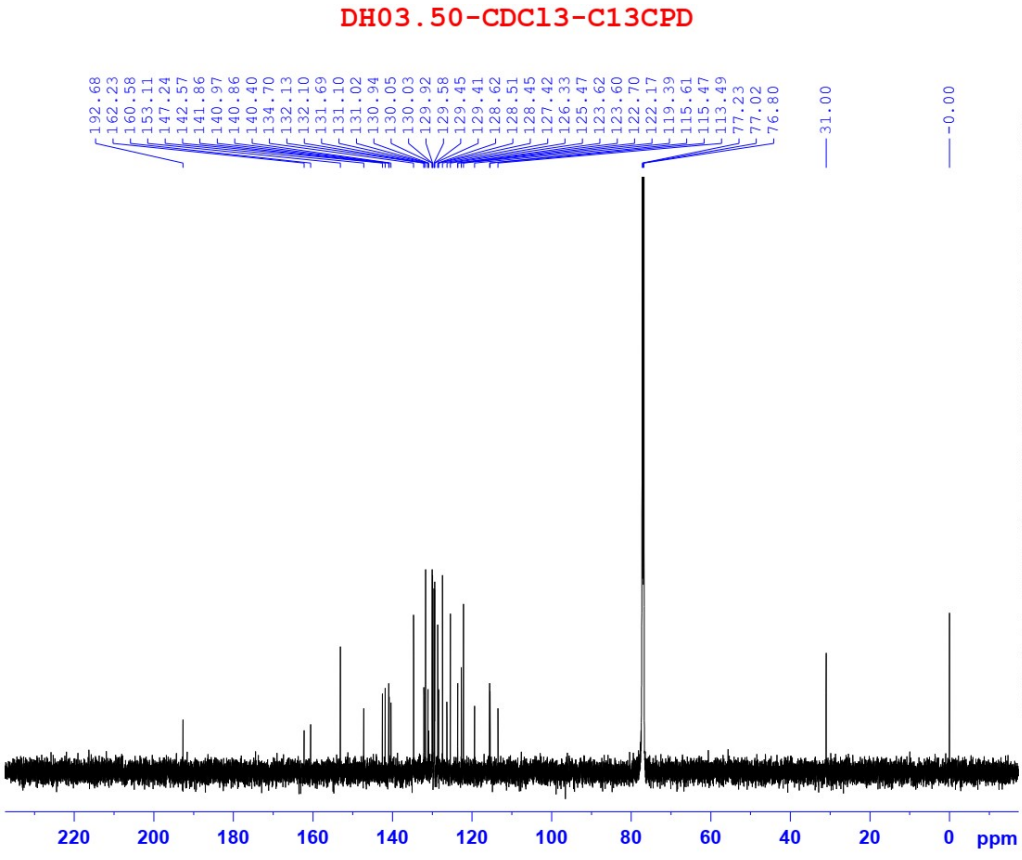

```
Current Data Parameters
NAME                  6HP03.48
EXPNO                        2
PROCNO                       1

F2 - Acquisition Parameters
Date_                 20230418
Time                     21.18 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z114607_0362 (
PULPROG                 zgpg30
TD                       65536
SOLVENT                  CDCl3
NS                        1024
DS                           4
SWH                 38461.539 Hz
FIDRES               1.173753 Hz
AQ                   0.8519680 sec
RG                         101
DW                      13.000 usec
DE                       6.50 usec
TE                      303.2 K
D1                   2.00000000 sec
D11                  0.03000000 sec
TD0                          1
SFO1               150.9873069 MHz
NUC1                        13C
P0                       4.20 usec
P1                      12.60 usec
PLW1               86.32800293 W
SFO2               600.4024016 MHz
NUC2                        1H
CPDPRG[2                waltz65
PCPD2                   80.00 usec
PLW2               27.03700066 W
PLW12               0.46575001 W
PLW13               0.30599001 W

F2 - Processing parameters
SI                       32768
SF                 150.9707001 MHz
WDW                         EM
SSB          0
LB                       1.00 Hz
GB           0
PC                       1.40
```



(3-Bromophenyl)(1-(2-fluorophenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7l).



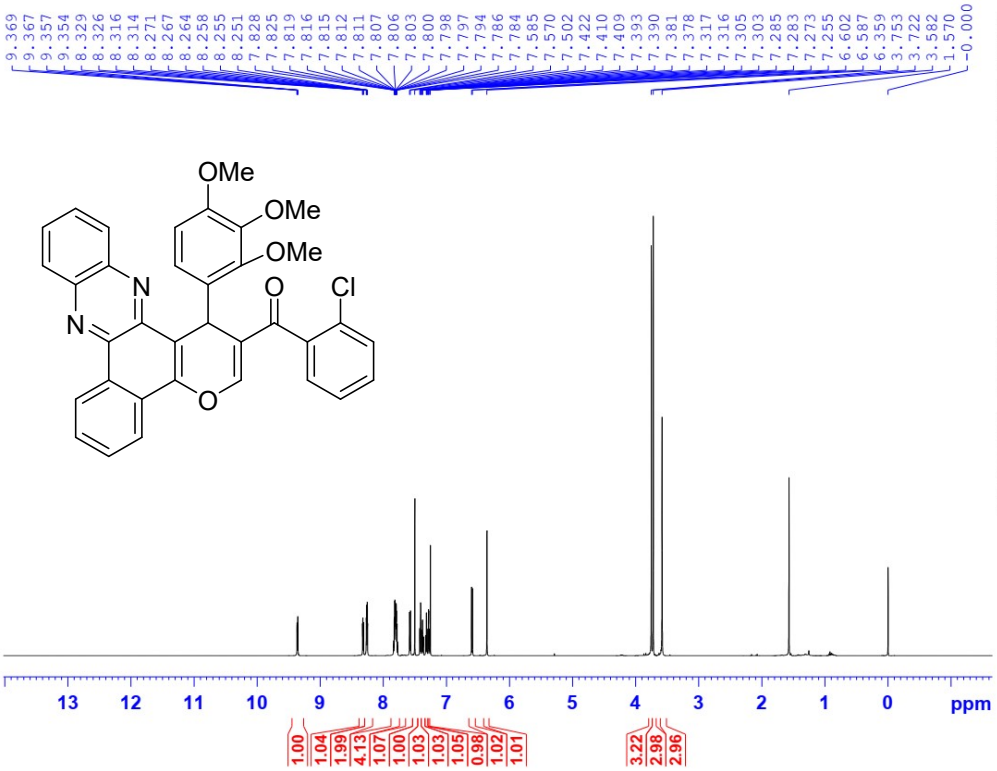

```
Current Data Parameters
NAME                  6DH03.50
EXPNO                       10
PROCNO                       1

F2 - Acquisition Parameters
Date_                 20230420
Time_                    17.53 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z114607_0862 (
PULPROG                   zg30
TD                       65536
SOLVENT                  CDCl3
NS                          16
DS                           2
SWH                  11904.762 Hz
FIDRES                0.363304 Hz
AQ                    2.7525120 sec
RG                         101
DW                      42.000 usec
DE                       8.71 usec
TE                      303.1 K
D1                    1.00000000 sec
TD0                          1
SFO1                600.4037075 MHz
NUC1                        1H
P0                       3.50 usec
P1                      10.50 usec
PLW1                27.03700066 W

F2 - Processing parameters
SI                       65536
SF                  600.4000149 MHz
WDW                         EM
SSB                  0
LB                       0.30 Hz
GB                   0
PC                       1.00
```




```
Current Data Parameters
NAME                  6DH03.50
EXPNO                       2
PROCNO                      1

F2 - Acquisition Parameters
Date_                 20230426
Time                     22.02 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z114607_0862 (
PULPROG                zgpg30
TD                       65536
SOLVENT                  CDCl3
NS                        3072
DS                           4
SWH                  38461.539 Hz
FIDRES                1.173753 Hz
AQ                    0.8519680 sec
RG                         101
DW                      13.000 usec
DE                       6.50 usec
TE                      303.1 K
D1                    2.00000000 sec
D11                   0.03000000 sec
TD0                          1
SFO1                150.9873069 MHz
NUC1                        13c
P0                       4.20 usec
P1                      12.60 usec
PLW1                86.32800293 W
SFO2                600.4024016 MHz
NUC2                        1H
CPDPRG[2                waltz65
PCPD2                   80.00 usec
PLW2                27.03700066 W
PLW12                0.46575001 W
PLW13                0.30599001 W

F2 - Processing parameters
SI                       32768
SF                  150.9706982 MHz
WDW                         EM
SSB                  0
LB                       1.00 Hz
GB                   0
PC                       1.40
```

(2-Chlorophenyl)(1-(2,3,4-trimethoxyphenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7m).

HP03.44-CDCl3-1H

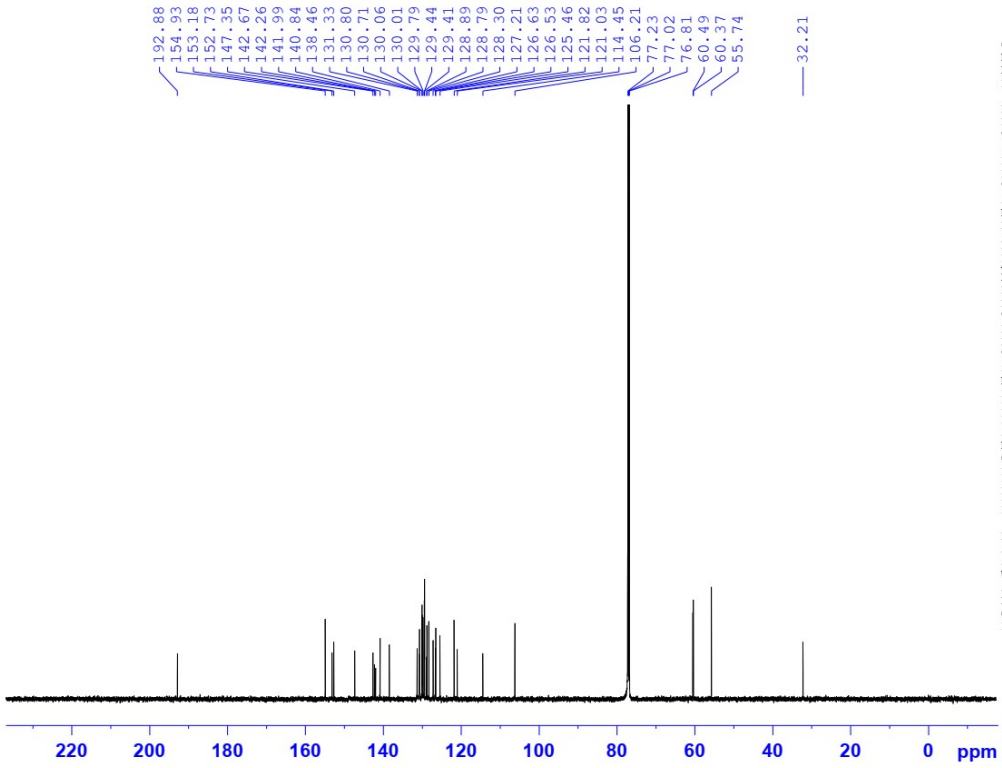


Current Data Parameters
NAME 6HP03.44
EXPNO 10
PROCNO 1

F2 - Acquisition Parameters
Date_ 20230412
Time 17.46 h
INSTRUM AvanceNEO_600MHz
PROBHD Z114607_0862 (
PULPROG zg30
TD 65536
SOLVENT CDCl3
NS 16
DS 2
SWH 11904.762 Hz
FIDRES 0.363304 Hz
AQ 2.7525120 sec
RG 101
DW 42.000 usec
DE 8.71 usec
TE 303.1 K
D1 1.00000000 sec
TD0 1
SFO1 600.4037075 MHz
NUC1 1H
P0 3.50 usec
P1 10.50 usec
PLW1 27.03700066 W

F2 - Processing parameters
SI 65536
SF 600.4000168 MHz
WDW EM
SSB 0
LB 0.30 Hz
GB 0
PC 1.00

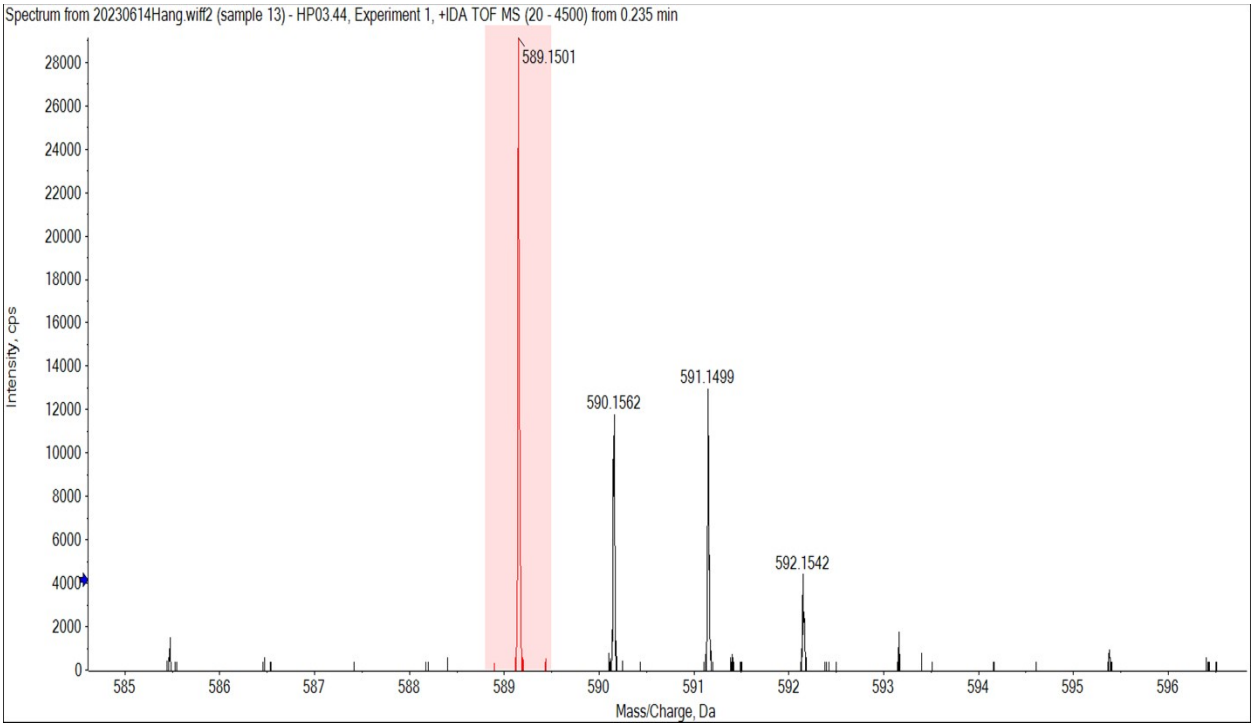
HP03.44-CDCl3-C13CPD



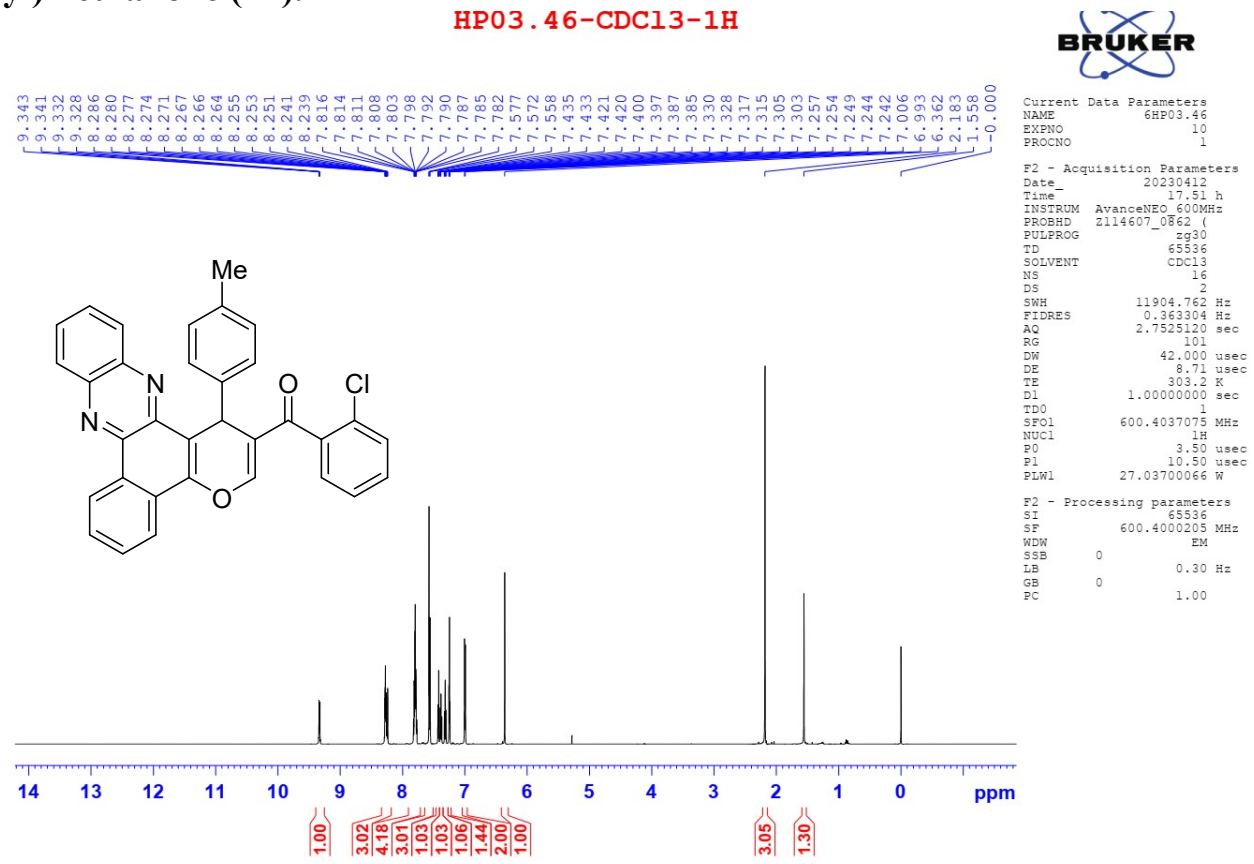
Current Data Parameters
NAME 6HP03.44
EXPNO 2
PROCNO 1

F2 - Acquisition Parameters
Date_ 20230418
Time 22.12 h
INSTRUM AvanceNEO_600MHz
PROBHD Z114607_0862 (
PULPROG zgpg30
TD 65536
SOLVENT CDCl3
NS 1024
DS 4
SWH 38461.539 Hz
FIDRES 1.173753 Hz
AQ 0.8519680 sec
RG 101
DW 13.000 usec
DE 6.50 usec
TE 303.2 K
D1 2.00000000 sec
D11 0.03000000 sec
TD0 1
SFO1 150.9873069 MHz
NUC1 13C
P0 4.20 usec
P1 12.60 usec
PLW1 86.32800293 W
SFO2 600.4024016 MHz
NUC2 1H
CPDPRG[2 waltz65
PCPD2 80.00 usec
PLW2 27.03700066 W
PLW12 0.46575001 W
PLW13 0.30599001 W

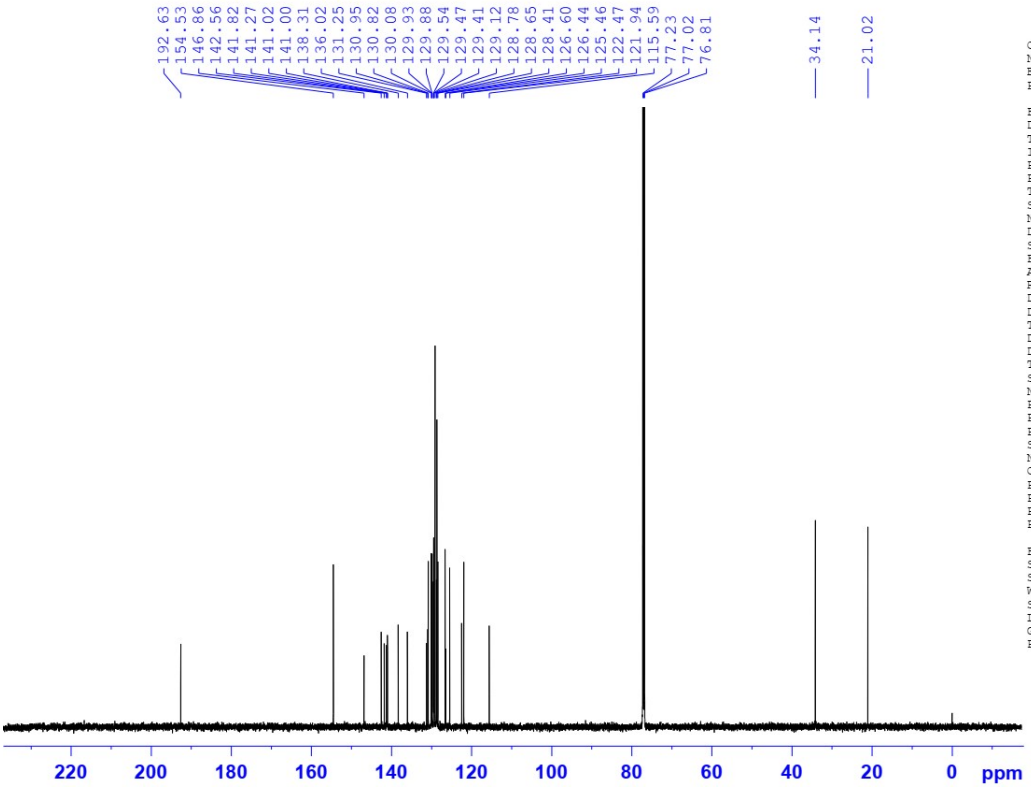
F2 - Processing parameters
SI 32768
SF 150.9707001 MHz
WDW EM
SSB 0
LB 1.00 Hz
GB 0
PC 1.40



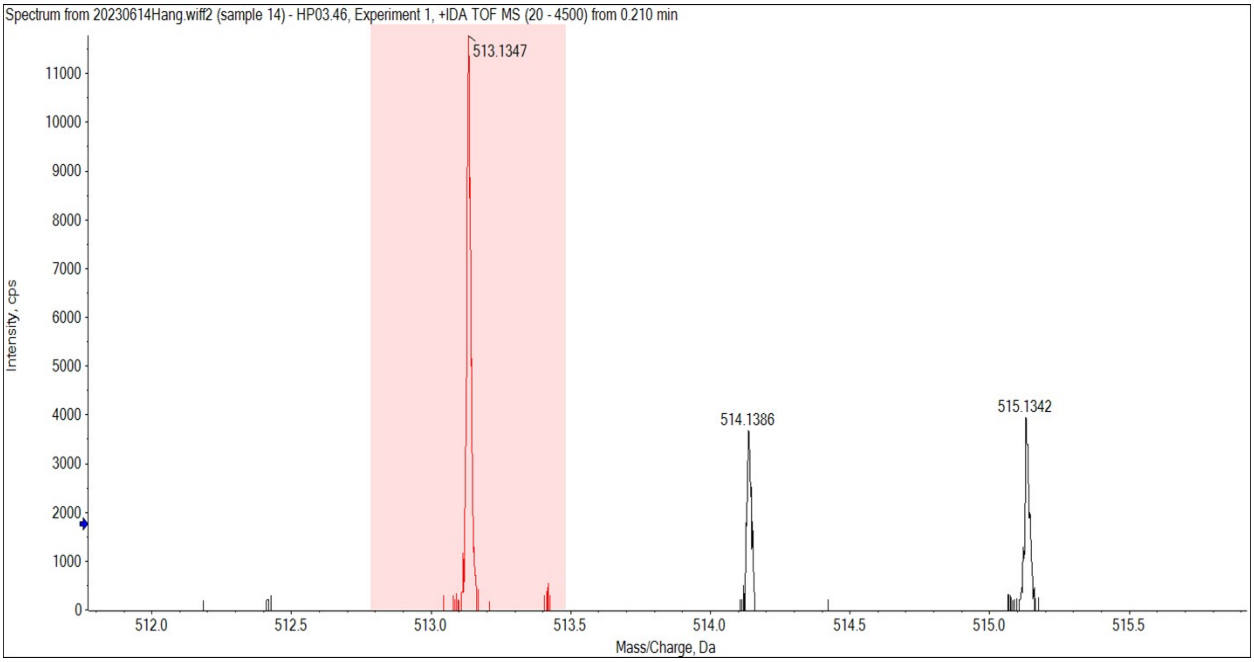
(2-Chlorophenyl)(1-(p-tolyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7n).



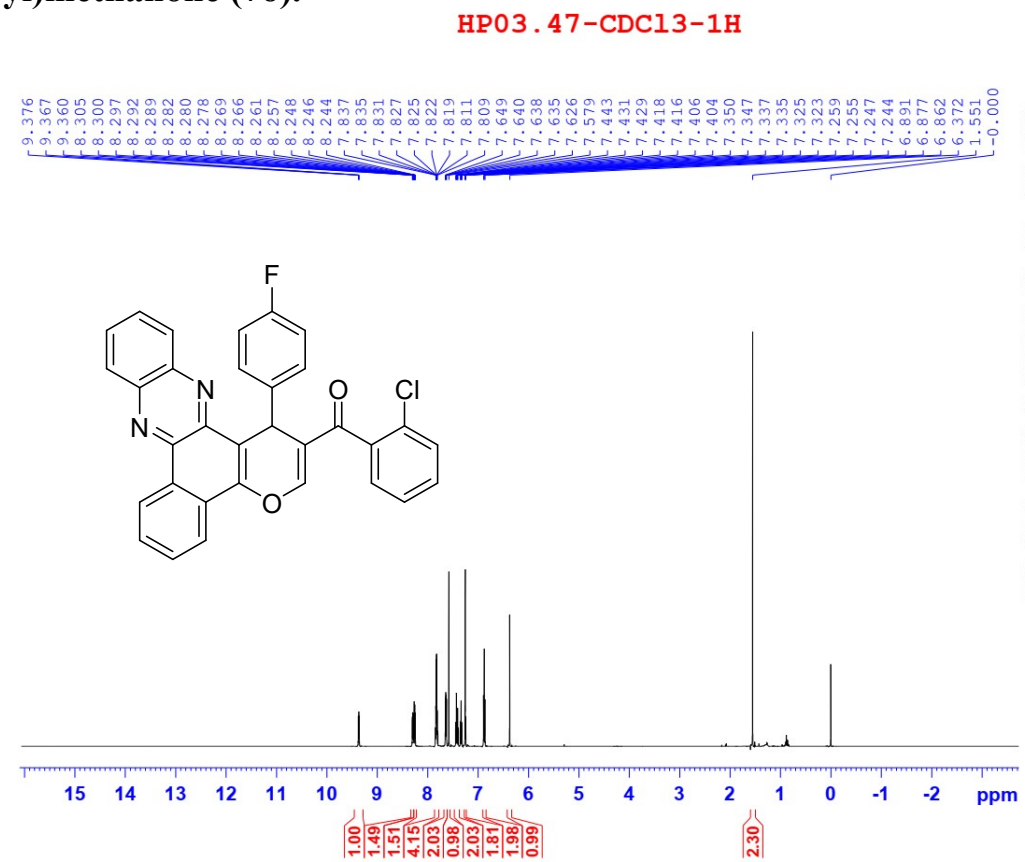
HP03.46-CDCl3-C13CPD

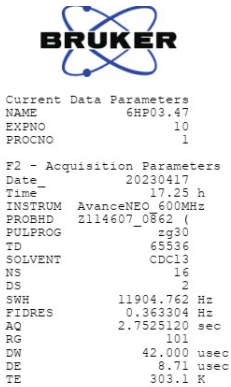



```
Current Data Parameters
NAME              6HP03.46
EXPNO                    2
PROCNO                   1

F2 - Acquisition Parameters
Date_              20230418
Time                23.08 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z114607_0862 (
PULPROG             zgpg30
TD                   65536
SOLVENT              CDCl3
NS                    1024
DS                       4
SWH             38461.539 Hz
FIDRES           1.173753 Hz
AQ              0.8519680 sec
RG                     101
DW                13.000 usec
DE                 6.50 usec
TE                 303.2 K
D1            2.00000000 sec
D11           0.03000000 sec
TD0                      1
SFO1          150.9873069 MHz
NUC1                  13C
P0                  4.20 usec
P1                 12.60 usec
PLW1          86.32800293 W
SFO2          600.4024016 MHz
NUC2                  1H
CPDPRG[2          waltz65
PCPD2              80.00 usec
PLW2          27.03700066 W
PLW12          0.46575001 W
PLW13          0.30599001 W

F2 - Processing parameters
SI                   32768
SF            150.9707001 MHz
WDW                     EM
SSB       0
LB                  1.00 Hz
GB        0
PC                  1.40
```

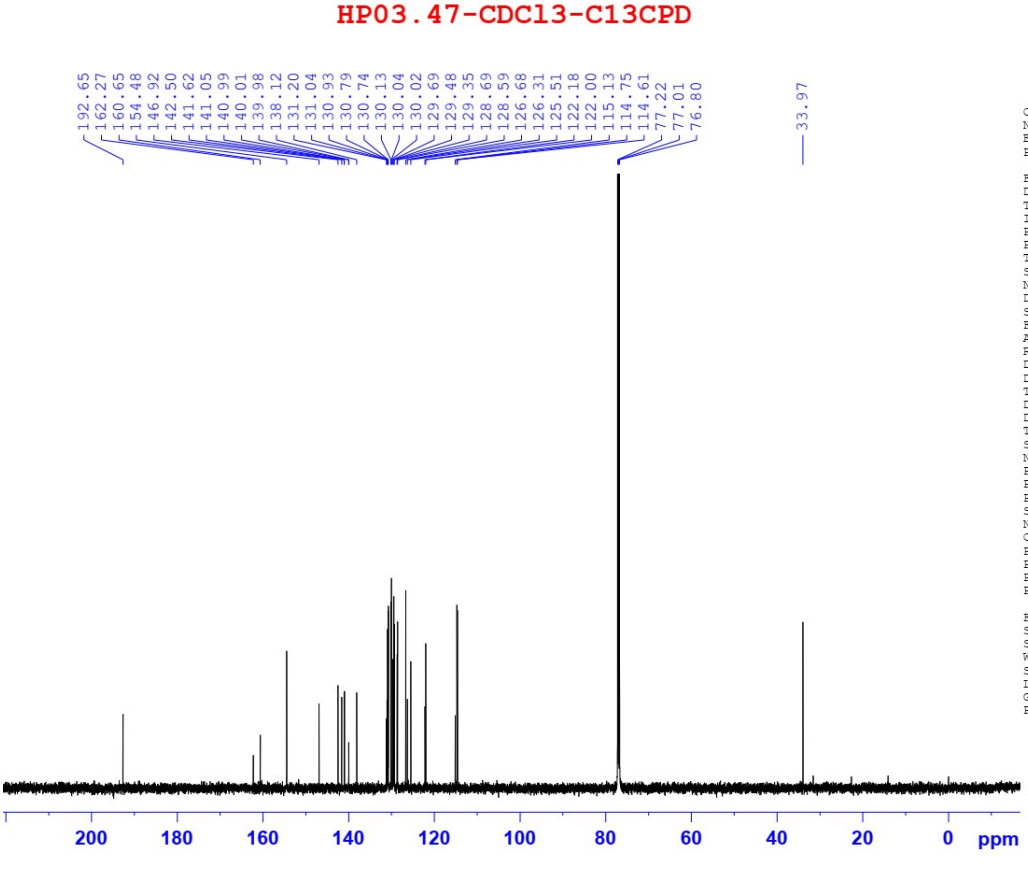


(2-Chlorophenyl)(1-(4-fluorophenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7o).

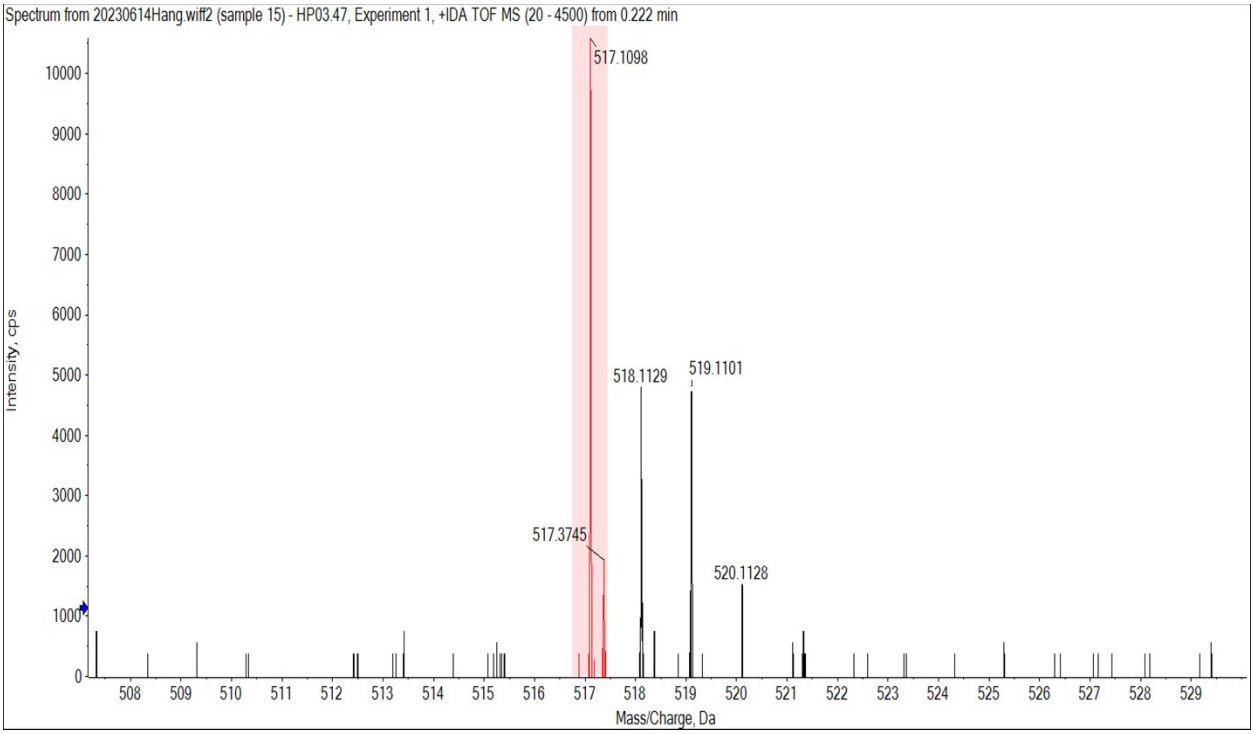




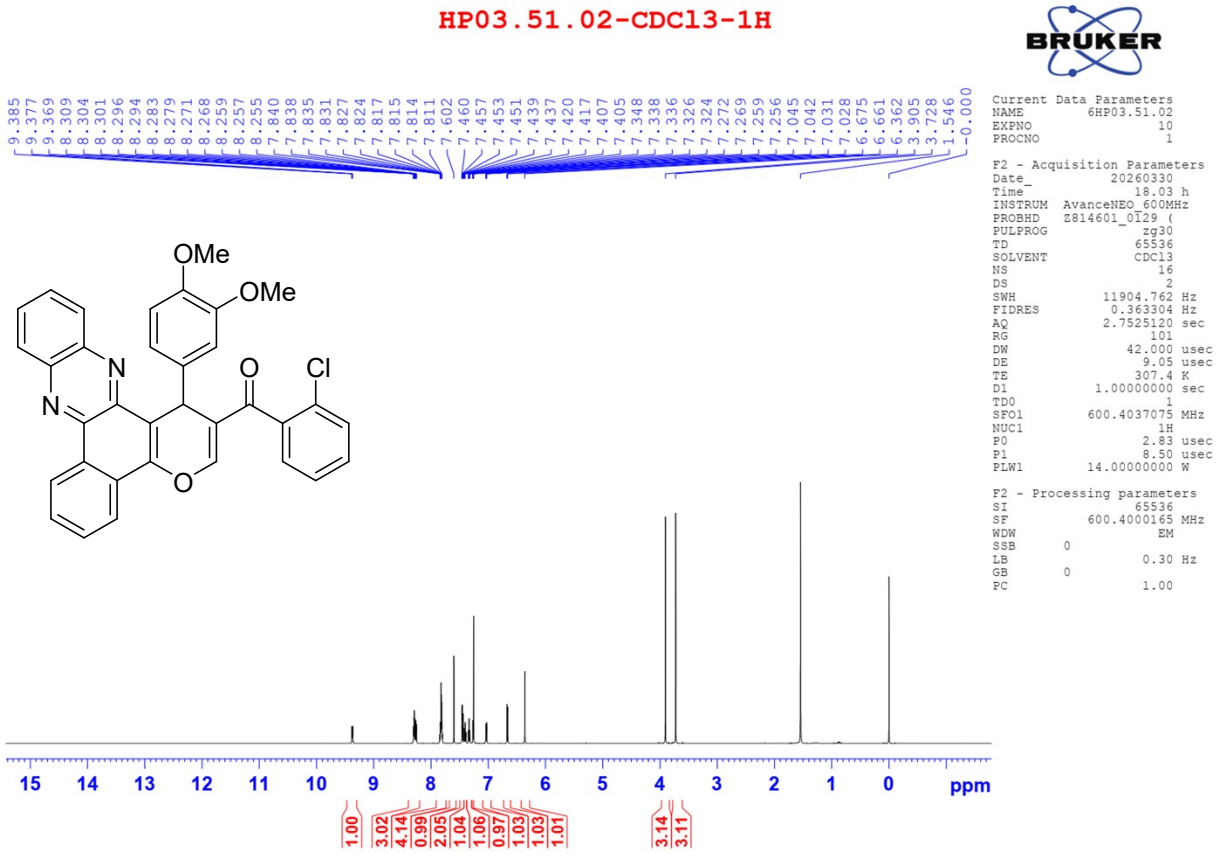

```
Current Data Parameters
NAME                  6HP03.47
EXPNO                       10
PROCNO                       1

F2 - Acquisition Parameters
Date_               20230417
Time                    17.25 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z114607_0862 (
PULPROG                  zg30
TD                      65536
SOLVENT                 CDCl3
NS                         16
DS                          2
SWH                 11904.762 Hz
FIDRES              0.363304 Hz
AQ                  2.7525120 sec
RG                        101
DW                     42.000 usec
DE                      8.71 usec
TE                     303.1 K
D1                  1.00000000 sec
TD0                         1
SFO1               600.4037075 MHz
NUC1                       1H
P0                      3.50 usec
P1                     10.50 usec
PLW1               27.03700066 W

F2 - Processing parameters
SI                      65536
SF                 600.4000168 MHz
WDW                        EM
SSB          0
LB                      0.30 Hz
GB           0
PC                      1.00
```



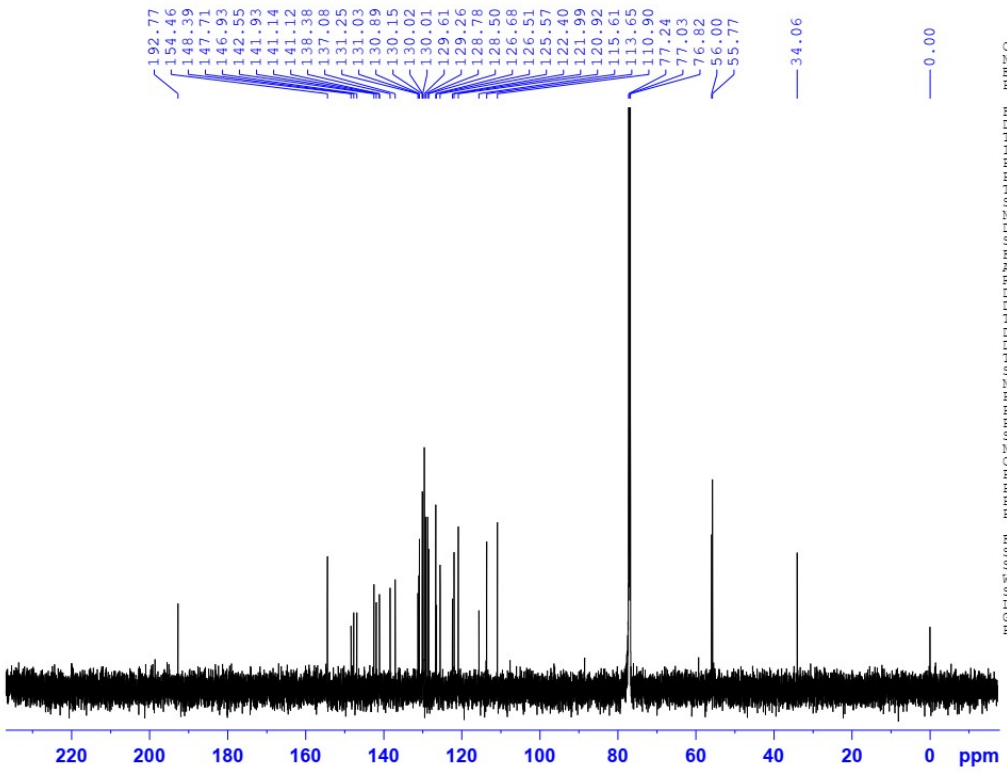

```
Current Data Parameters
NAME                  6HP03.47
EXPNO                       2
PROCNO                      1

F2 - Acquisition Parameters
Date_               20230419
Time                     0.02 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z114607_0862 (
PULPROG                zgpg30
TD                      65536
SOLVENT                 CDCl3
NS                       1024
DS                          4
SWH                 38461.539 Hz
FIDRES              1.173753 Hz
AQ                  0.8519680 sec
RG                        101
DW                     13.000 usec
DE                      6.50 usec
TE                     303.2 K
D1                  2.00000000 sec
D11                 0.03000000 sec
TD0                         1
SFO1               150.9873069 MHz
NUC1                       13C
P0                      4.20 usec
P1                     12.60 usec
PLW1               86.32800293 W
SFO2               600.4024016 MHz
NUC2                       1H
CPDPRG[2             waltz65
PCPD2                  80.00 usec
PLW2               27.03700066 W
PLW12               0.46575001 W
PLW13               0.30599001 W

F2 - Processing parameters
SI                      32768
SF                 150.9707001 MHz
WDW                        EM
SSB          0
LB                      1.00 Hz
GB           0
PC                      1.40
```



(2-chlorophenyl)(1-(3,4-dimethoxyphenyl)-1H-benzo[a]pyrano[2,3-c]phenazin-2-yl)methanone (7p).



HP03.51.02-CDCl3-C13CPD




```
Current Data Parameters
NAME          6HP03.51.02
EXPNO                    2
PROCNO                   1

F2 - Acquisition Parameters
Date_             20260331
Time                 8.12 h
INSTRUM  AvanceNEO_600MHz
PROBHD   Z814601_0T29 (
PULPROG             zgpg30
TD                   65536
SOLVENT              CDCl3
NS                    1024
DS                       4
SWH             38461.539 Hz
FIDRES           1.173753 Hz
AQ              0.8519680 sec
RG                     101
DW                13.000 usec
DE                 6.50 usec
TE                 308.3 K
D1            2.00000000 sec
D11           0.03000000 sec
TD0                      1
SFO1         150.9873069 MHz
NUC1                   13C
P0                  5.63 usec
P1                 16.90 usec
PLW1        126.55000305 W
SFO2         600.4024016 MHz
NUC2                   1H
CPDPRG[2           waltz65
PCPD2              70.00 usec
PLW2         14.00000000 W
PLW12         0.20643000 W
PLW13         0.10383000 W

F2 - Processing parameters
SI                   32768
SF          150.9706931 MHz
WDW                     EM
SSB       0
LB                  1.00 Hz
GB        0
PC                  1.40
```

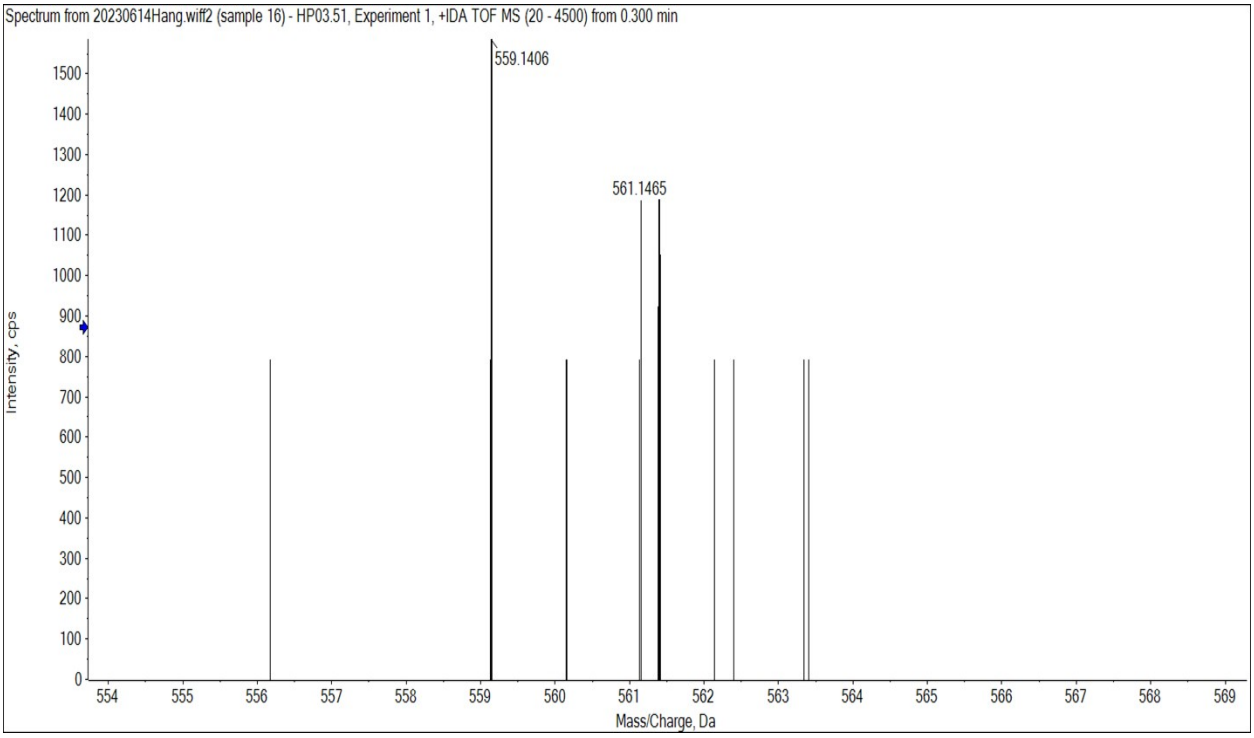


Table S1. Inhibitory effect of 7a-p on NO production in LPS-mediated macrophage RAW 264.7 cells and cell viability of RAW 264.7 cells

Entry	Compound	Concentration (µg/ml)	NO inhibition (%)	Cell viability (%)
1.	**7a**	64	80	96
		16	72	100
		4	64	100
		1	46	100
		0.25	35	100
		IC_{50}	**1.67±0.2**	
2.	**7b**	64	66	87
		16	60	92
		4	55	94
		1	42	95
		0.25	6	95
		IC_{50}	**2.85±0.32**	
3.	**7c**	64	81	85
		16	69	96
		4	58	100
		1	51	100
		0.25	31	100
		IC_{50}	**0.96±0.05**	
4.	**7d**	64	67	93
		16	61	100
		4	55	100
		1	54	100
		0.25	48	100
		IC_{50}	**0.5±0.05**	
5.	**7e**	64	72	78
		16	66	87
		4	62	88
		1	48	90
		0.25	41	93
		IC_{50}	**1.43±0.08**	
6.	**7f**	64	66	88
		16	52	96
		4	40	97
		1	21	100
		0.25	0	100
		IC_{50}	**14.00±1.20**	
7.	**7g**	64	85	81
		16	82	100

Entry	Compound	Concentration (µg/ml)	NO inhibition (%)	Cell viability (%)
		4	71	100
		1	55	100
		0.25	31	100
		IC_{50}	**0.84±0.07**	
8.	**7h**	64	64	74
		16	59	100
		4	53	100
		1	50	100
		0.25	36	100
		IC_{50}	**1.0±0.15**	
9.	**7i**	64	66	70
		16	57	72
		4	44	84
		1	6	91
		0.25	0	100
		IC_{50}	**9.54±0.5**	
10.	**7j**	64	70	80
		16	59	94
		4	20	100
		1	6	100
		0.25	0	100
		IC_{50}	**13.23±1.44**	
11.	**7k**	64	76	100
		16	60	100
		4	54	100
		1	22	100
		0.25	11	100
		IC_{50}	**3.63±0.15**	
12.	**7l**	64	82	70
		16	60	75
		4	59	85
		1	57	92
		0.25	12	93
		IC_{50}	**0.88±0.05**	
13.	**7m**	64	75	80
		16	71	84
		4	66	90
		1	24	91
		0.25	11	92
		IC_{50}	**2.86±0.19**	
14.	**7n**	64	65	67
		16	61	76
		4	30	94

Entry	Compound	Concentration (µg/ml)	NO inhibition (%)	Cell viability (%)
		1	9	96
		0.25	0	97
		IC_{50}	**11.74±0.85**	
15.	**7o**	64	70	89
		16	69	93
		4	37	99
		1	35	100
		0.25	29	100
		IC_{50}	**8.88±0.5**	
16.	**7p**	64	76	65
		16	65	87
		4	55	88
		1	43	90
		0.25	26	90
		IC_{50}	**2.75±0.31**	
	Reference: N^G-Methyl-L-arginine acetate (L-NMMA)	128	92	90
		32	85	99
		8	63	99
		2	29	100
		0.5	16	100
		IC_{50}	**5.71±0.5**	