Design, Synthesis, Antiproliferative and CDK2-Cyclin A Inhibitory Activity of Novel Flavopiridol Analogues

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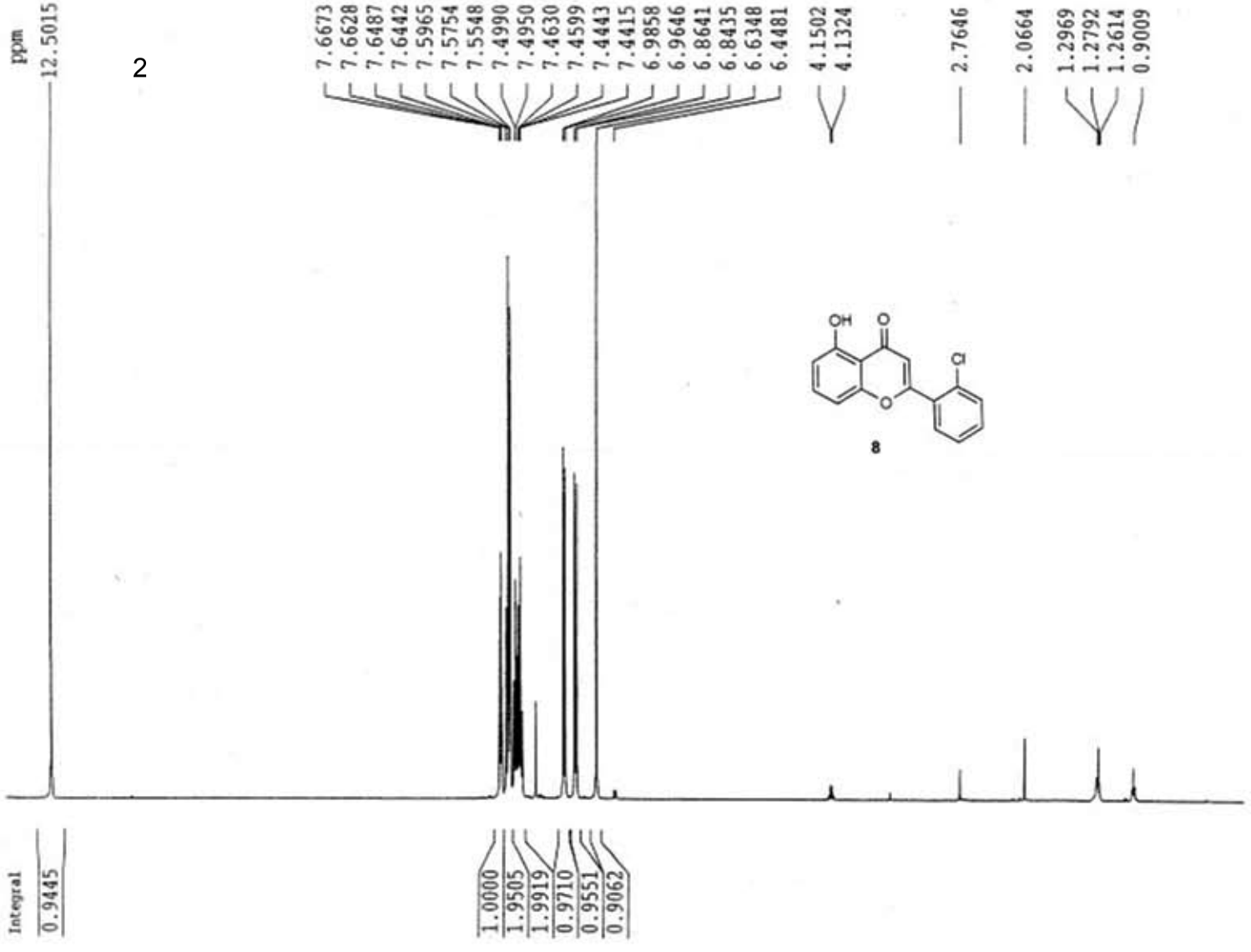
Content:



Current Data Parameters

NAME	YA-ii-95-1H
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20001010
Time	13.11
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	6410.256 Hz
FIDRES	0.195625 Hz
AQ	2.5559540 sec
RG	228.1
DW	78.000 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

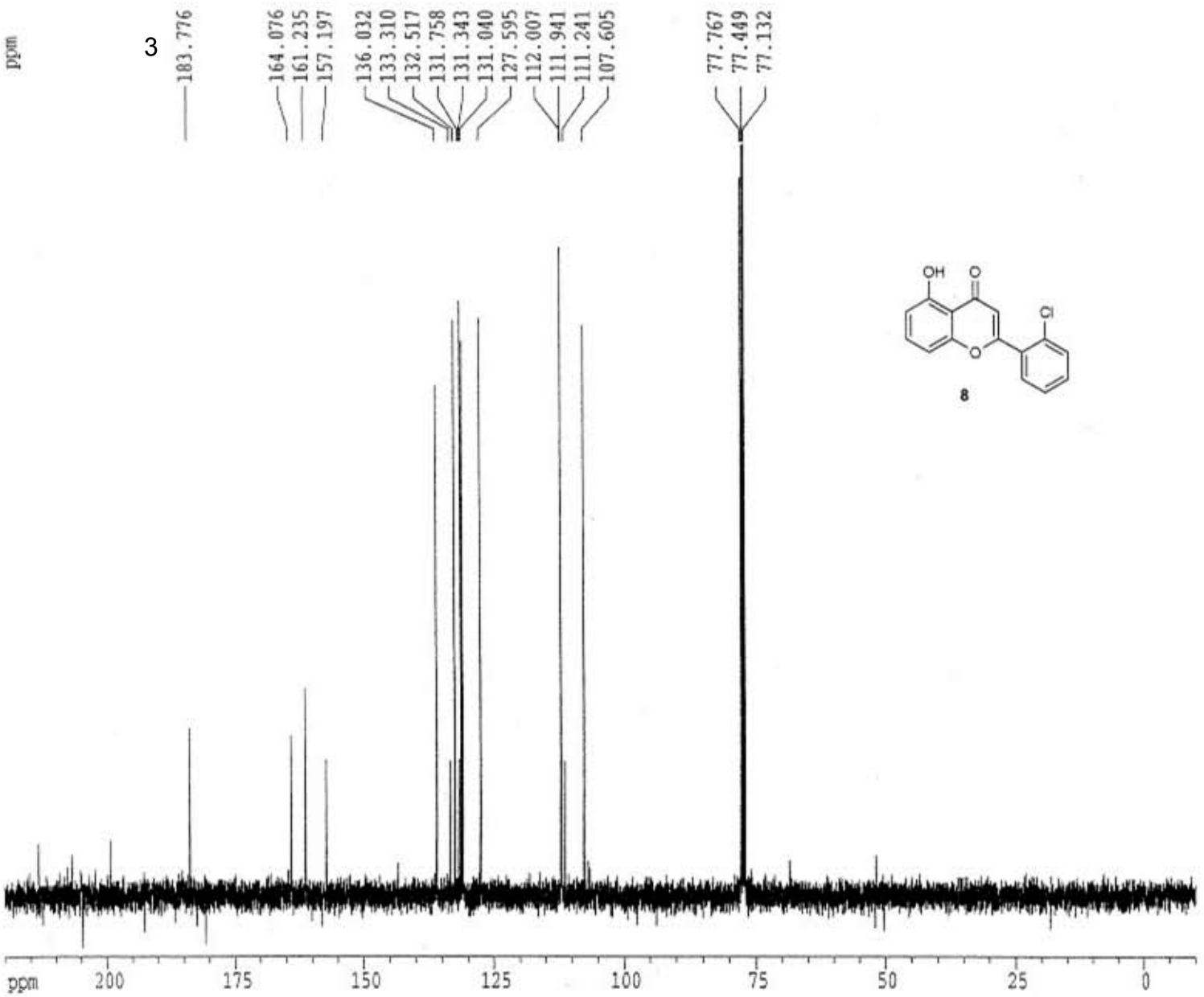
NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-ii-95-1C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20001010
Time	12.54
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	468
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	2896.3
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
D1	0.05000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	12.30 usec
PL1	2.00 dB
SFO1	100.6232933 MHz

========== CHANNEL f2 ==========

CPDPRG2	waltz16
NUC2	1H
PCPD2	100.00 usec
PL2	0.00 dB
PL12	18.00 dB
PL13	18.00 dB
SFO2	400.1316005 MHz

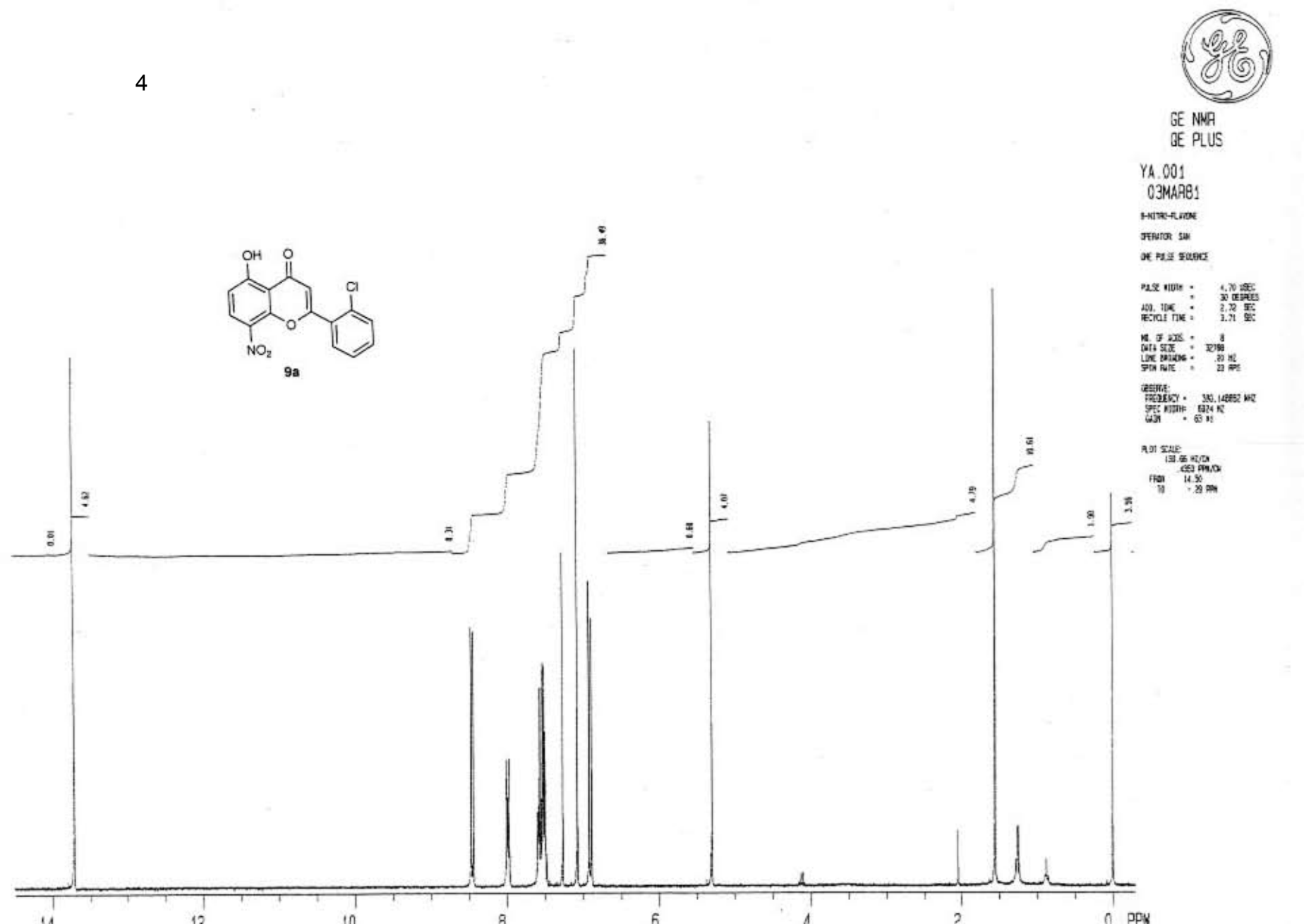
F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

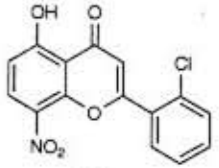
1D NMR plot parameters

CX	20.00 cm
F1P	220.036 ppm
F1	22138.42 Hz
F2P	-10.036 ppm
F2	-1009.73 Hz
PPMCM	11.50359 ppm/cm
HZCM	1157.40747 Hz/cm

4


GE NMR
GE PLUS
YA.001
03MAR81
6-NITRO-FLAVONE
OPERATOR SAH
ONE PULSE SEQUENCE
PULSE WIDTH = 4.70 USEC
30 DEGREES
ACQ. TIME = 2.72 SEC
RECYCLE TIME = 3.71 SEC
NO. OF ACQS. = 8
DATA SIZE = 32768
LINE BROADNG = .00 HZ
SPIN RATE = 23 RPS
OBSERVE:
FREQUENCY = 360.148852 MHZ
SPEC WIDTH: 6024 HZ
GAIN = 60 DB
PLOT SCALE:
16.66 HZ/CM
.053 PPM/CM
FROM 14.50
TO -.39 PPM
OH
O
Cl
O
NO2
9a
14
12
10
8
6
4
2
0 PPM

5



9a

GE NMR
QE PLUS

YA.002
03MAR81

6-NITRO-FLAVONE

OPERATOR: SAN

ONE PULSE SEQUENCE

PULSE WIDTH = 5.00 USEC
= 30 DEGREES
ACQ. TIME = 815.20 MSEC
RECYCLE TIME = 1.00 SEC

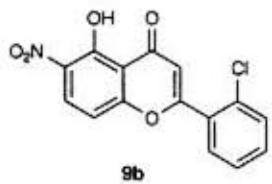
NO. OF ACQS = 35132
DATA SIZE = 32768
LINE BROADING = 1.00 HZ
SPIN RATE = 22 RPS

OBSERVE:
FREQUENCY = 75.480008 MHZ
SPEC WIDTH = 20060 HZ
GAIN = 55 DB

DECOUPLER: STANDARD-WB MODULATION
FREQUENCY = 4.500 PPM
POWER = 2750

PLOT SCALE:
499.51 HZ/CM
6.6170 PPM/CM
FROM 229.00
TO -4.98 PPM

6



9b

GE NMR
GE PLUS

YA.001
11APR80

6-NITROFLAVONE

OPERATOR SAM

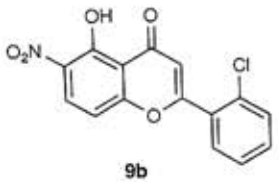
ONE PULSE SEQUENCE

PULSE WIDTH = 4.70 USEC
= 30 DEGREES
ACQ. TIME = 2.72 SEC
RECYCLE TIME = 3.72 SEC

NO. OF ACQS. = 8
DATA SIZE = 32768
LINE BROADENG = .28 HZ
SPIN RATE = 15 RPS

OBSERVE:
FREQUENCY = 300.148852 MHZ
SPEC WIDTH= 6024 HZ
GAIN = 39 DB

PLOT SCALE:
530.54 HZ/CM
4362 PPM/CM
FROM 14.53
TO -.28 PPM



9b

GE NMR
GE PLUS

YA.002
11APR80

6-NITROFLAVONE

OPERATOR SJH

ONE PULSE SEQUENCE

PULSE WIDTH	=	5.83 USEC
	=	30 DEGREES
ACQ. TIME	=	819.20 MSEC
RECYCLE TIME	=	1.00 SEC
NO. OF ACQS.	=	17568
DATA SIZE	=	32768
LINE BROADNG	=	1.60 HZ
SPIN RATE	=	15 RPS

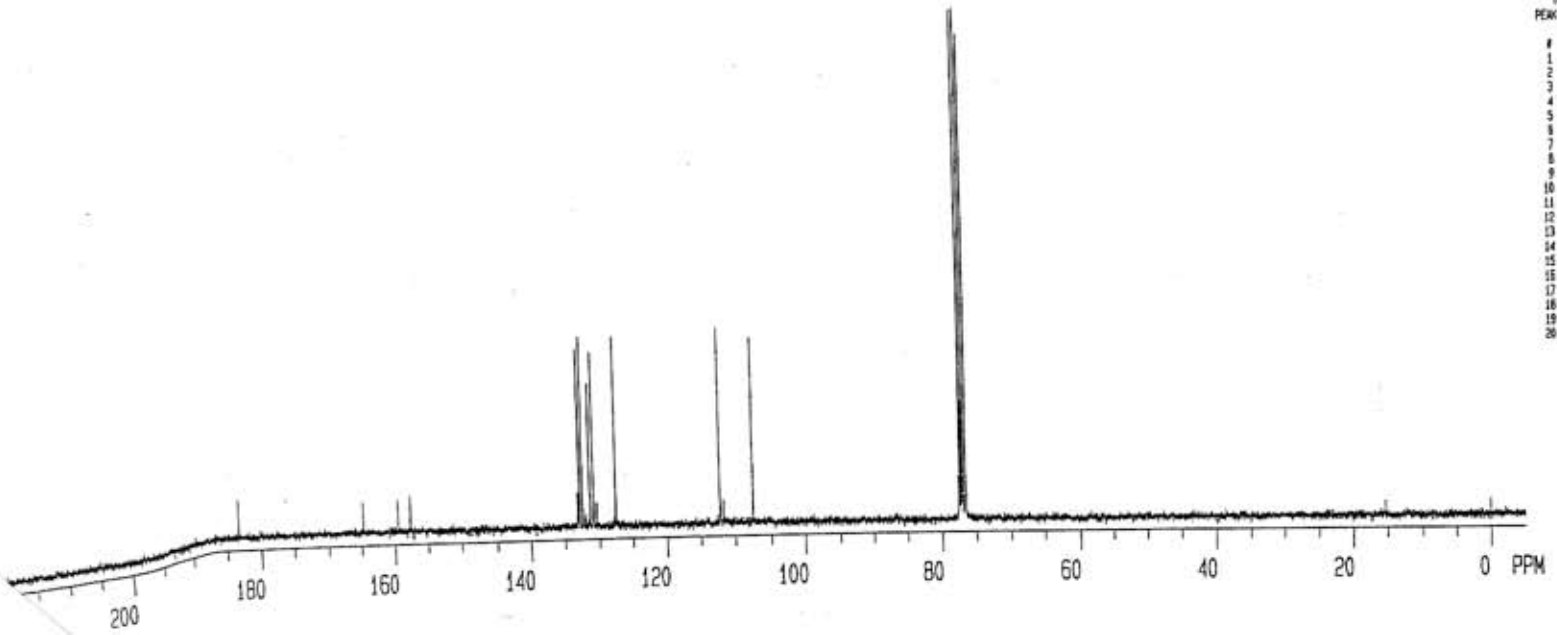
OBSERVE:
FREQUENCY = 75.480068 MHZ
SPEC WIDTH= 20000 HZ
GAIN = 55 DB

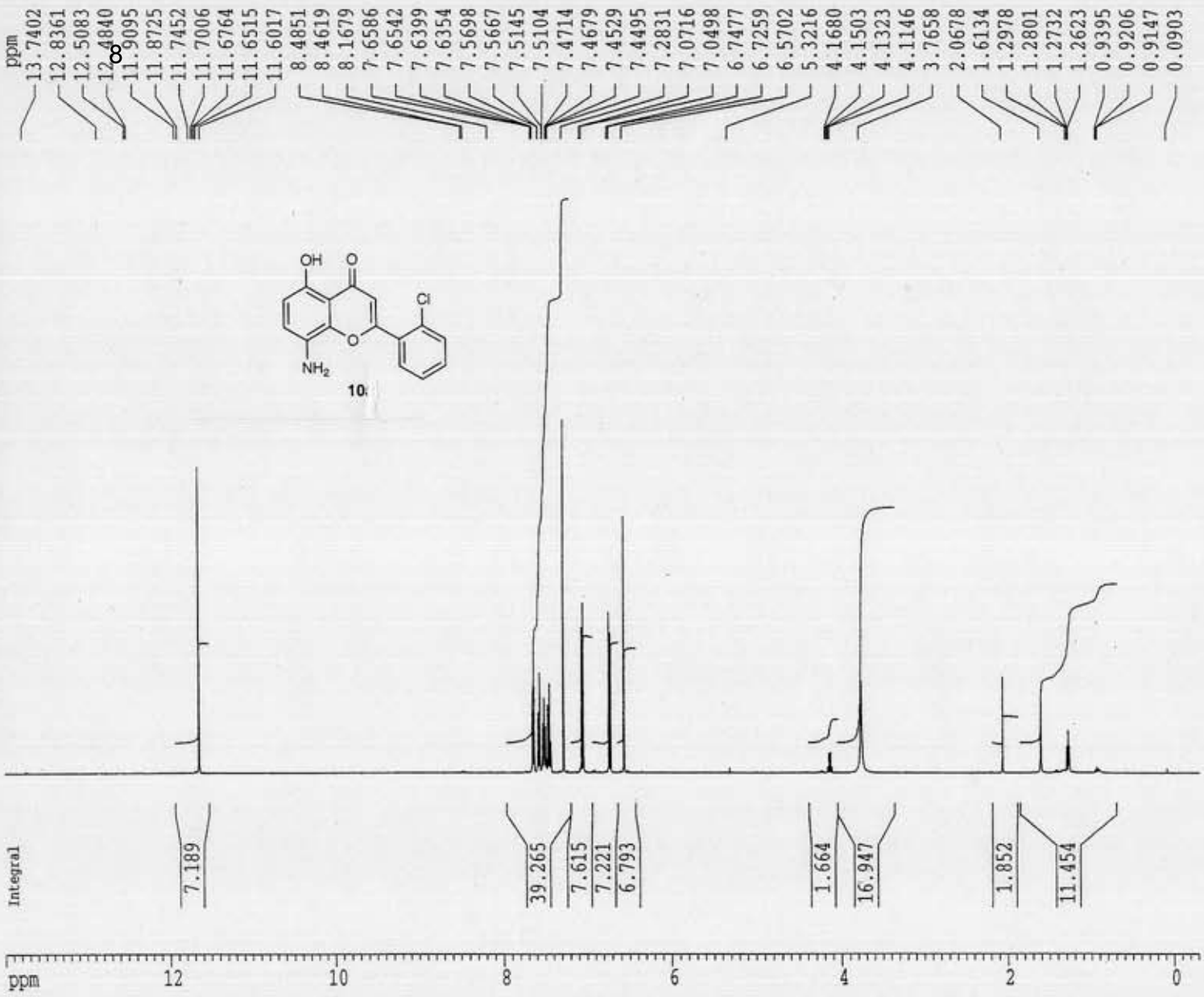
DECOUPLER STANDARD-16 MODULATION
FREQUENCY = 4.000 PPM
POWER = 2750

PLOT SCALE:
510.61 HZ/CM
6.7648 PPM/CM
FROM 225.00
TO -4.98 PPM

PEAK LISTING

#	HT	PPM
1	3	.04
2	102	76.64
3	3	76.82
4	106	77.06
5	25	77.26
6	107	77.49
7	39	107.47
8	4	111.68
9	41	112.21
10	40	127.46
11	4	130.30
12	35	130.71
13	30	131.23
14	48	132.36
15	37	132.86
16	7	133.10
17	7	157.57
18	6	159.45
19	6	164.63
20	8	183.31





Current Data Parameters

NAME	YA-ii-119-1
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20001128
Time	15.04
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	362
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

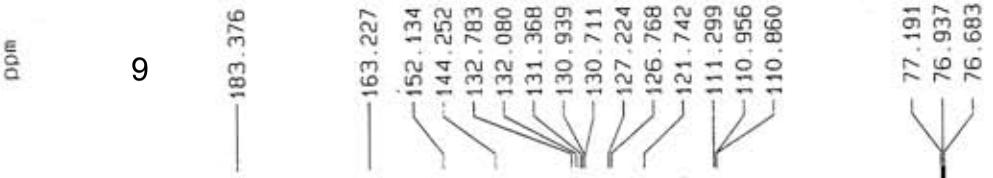
NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

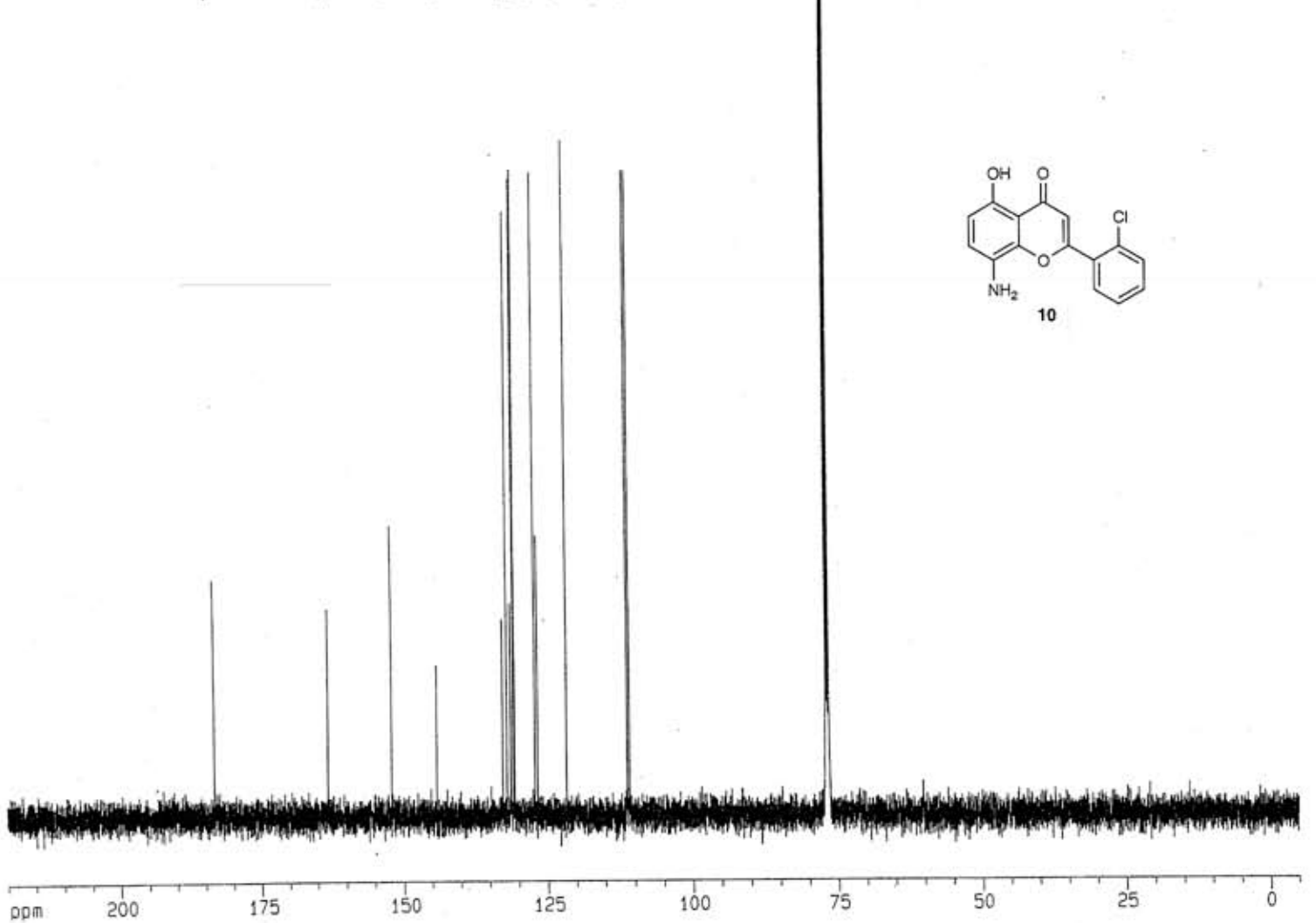
F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	14.000 ppm
F1	5601.82 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.71500 ppm/cm
HZCM	286.09296 Hz/cm





10

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Current Data Parameters
NAME          YA-1-119-1C
EXPNO                   1
PROCNO                  1

F2 - Acquisition Parameters
Date_              20001120
Time                  15.12
INSTRUM               spect
PROBHD     5 mm BBO BB-
PULPROG             zgpg30
TD                   65536
SOLVENT              CDCl3
NS                    2893
DS                       4
SWH              31446.541 Hz
FIDRES           0.479836 Hz
AQ               1.0420724 sec
RG                  5792.6
DW                  15.900 usec
DE                   6.00 usec
TE                  300.0 K
D1               0.10000000 sec
D11              0.03000000 sec
D12              0.00002000 sec

============ CHANNEL f1 =============
NUC1                  13C
P1                   6.50 usec
PL1                  5.00 dB
SFO1          125.7719472 MHz

============ CHANNEL f2 =============
CPDPRG2             waltz16
NUC2                    1H
PCPD2                95.00 usec
PL2                  17.50 dB
PL12                 19.00 dB
PL13                 30.00 dB
SFO2          500.1325000 MHz

F1 - Acquisition parameters
ND0                     2
TD                    256
SFO1           500.1325 MHz
FIDRES        23.475060 Hz
SW                12.016 ppm

F2 - Processing parameters
SI                   65536
SF            125.7578008 MHz
WDW                     EM
SSB                      0
LB                    1.00 Hz
GB                       0
PC                    1.40

F1 - Processing parameters
SI                    1024
MC2                     QF
SF            500.1300000 MHz
WDW                     no
SSB                      0
LB                    0.30 Hz
GB                       0

1D NMR plot parameters
CX                   20.00 cm
F1P                220.000 ppm
F1                27666.71 Hz
F2P                 -5.000 ppm
F2                 -628.79 Hz
PPMCM             11.25000 ppm/cm
HZCM              1414.77527 Hz/cm
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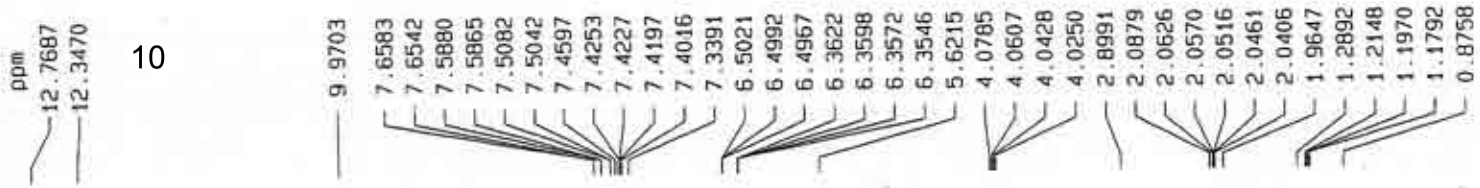
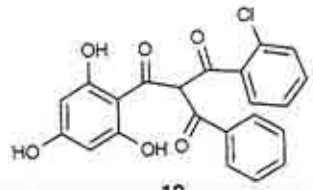
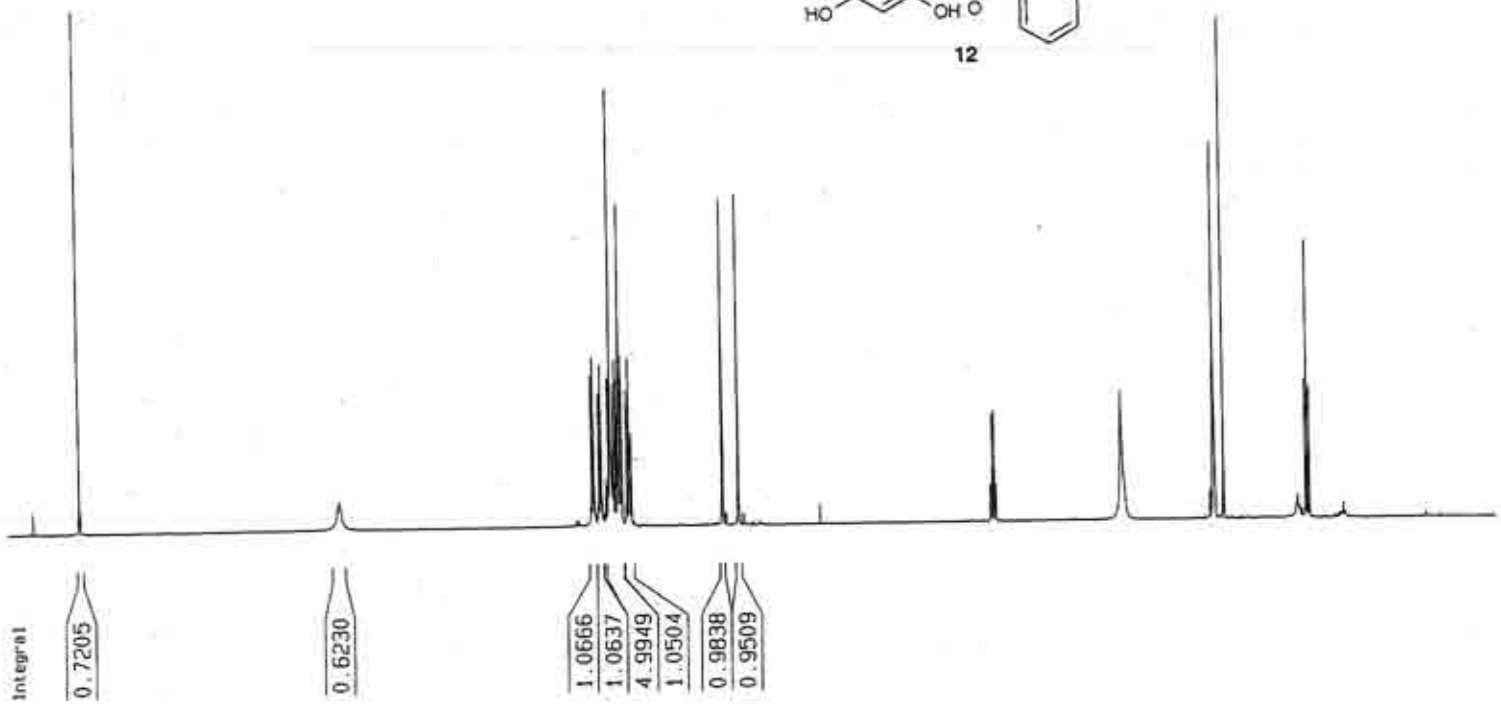
10





12



Current Data Parameters

NAME	DBU-slow
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20020909
Time	13.40
INSTRUM	spect
PROBHD	5 mm QNP 1H/15
PULPROG	zg30
TD	65536
SOLVENT	Acetone
NS	32
DS	2
SWH	8278.146 Hz
FIDRES	0.126314 Hz
AQ	3.9584243 sec
RG	362
DW	60.400 usec
DE	6.00 usec
TE	300.0 K
D1	1.00000000 sec

======== CHANNEL f1 ========

NUC1	1H
P1	8.70 usec
PL1	-4.00 dB
SFO1	400.1324710 MHz

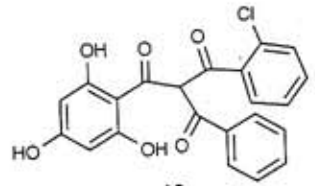
F2 - Processing parameters

SI	32768
SF	400.1300058 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
CY	7.01 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.500 ppm
F2	-200.06 Hz
PPMCM	0.67500 ppm/cm
HZCM	270.08777 Hz/cm

11



12

GE NMR
GE PLUS

LN.002
12APR80

SIDEPRO

OPERATOR: SAM

ONE PULSE SEQUENCE

PULSE WIDTH = 5.83 USEC
= 30 DEGREES
ACQ. TIME = 819.20 MSEC
RECYCLE TIME = 1.00 SEC

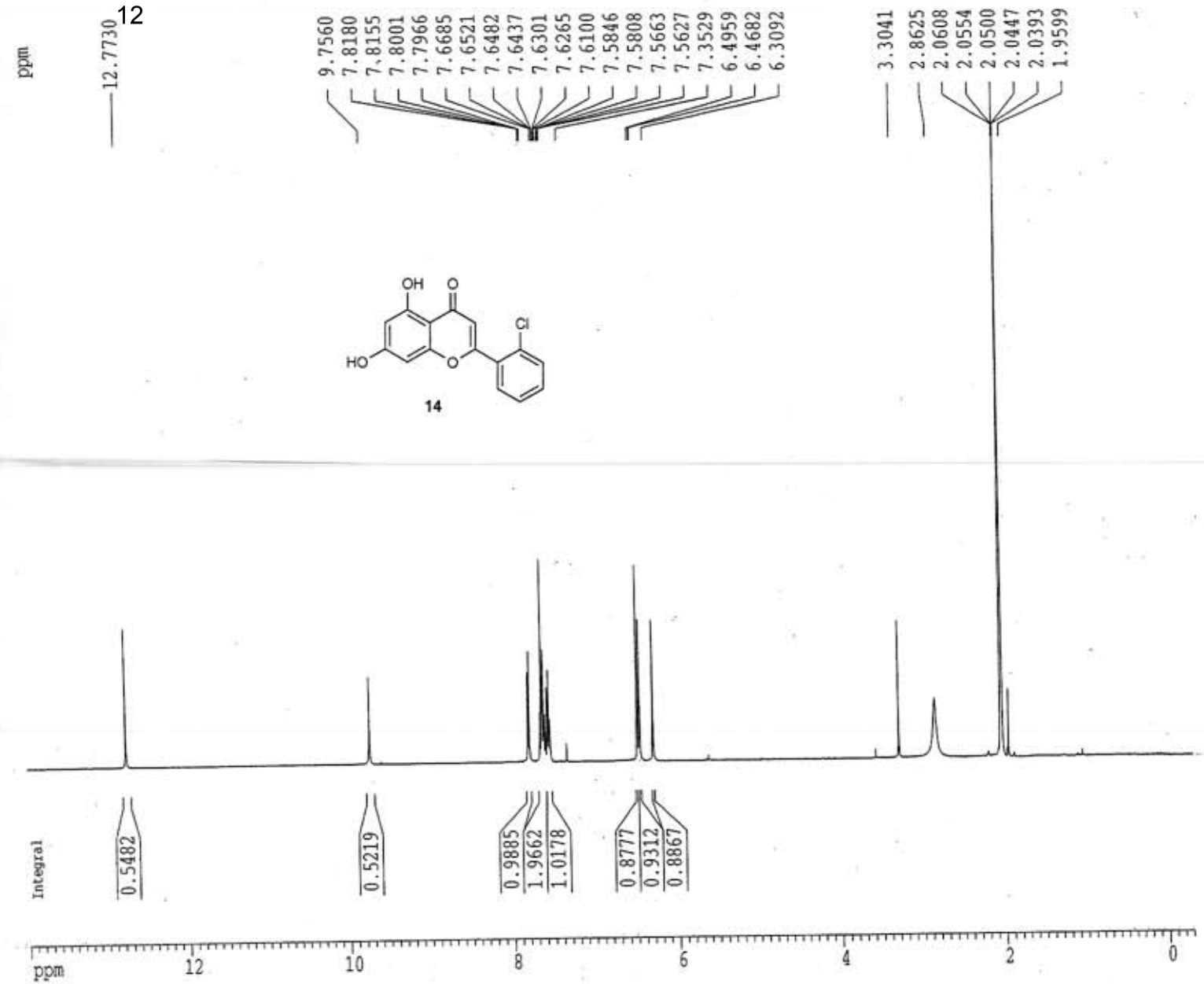
NO. OF ACQS. = 78848
DATA SIZE = 32768
LINE BROADING = 1.00 HZ
SPIN RATE = 16 RPS

OBSERVE:
FREQUENCY = 75.480068 MHZ
SPEC WIDTH= 25000 HZ
GAIN = 55 NB

DECOUPLER: STANDARD-16 MODULATION
FREQUENCY = 4,000 PPM
POWER = 2756

PLOT SCALE:
459.51 HZ/CM
6.6178 PPM/CM
FROM 220.00
TO -4.98 PPM

220 200 180 160 140 120 100 80 60 40 20 0 PPM



Current Data Parameters

NAME	YA-iii-93-1H
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20020326
Time	21.04
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	Aceton
NS	32
DS	2
SWH	11990.407 Hz
FIDRES	0.365918 Hz
AQ	1.3664756 sec
RG	256
DW	41.700 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

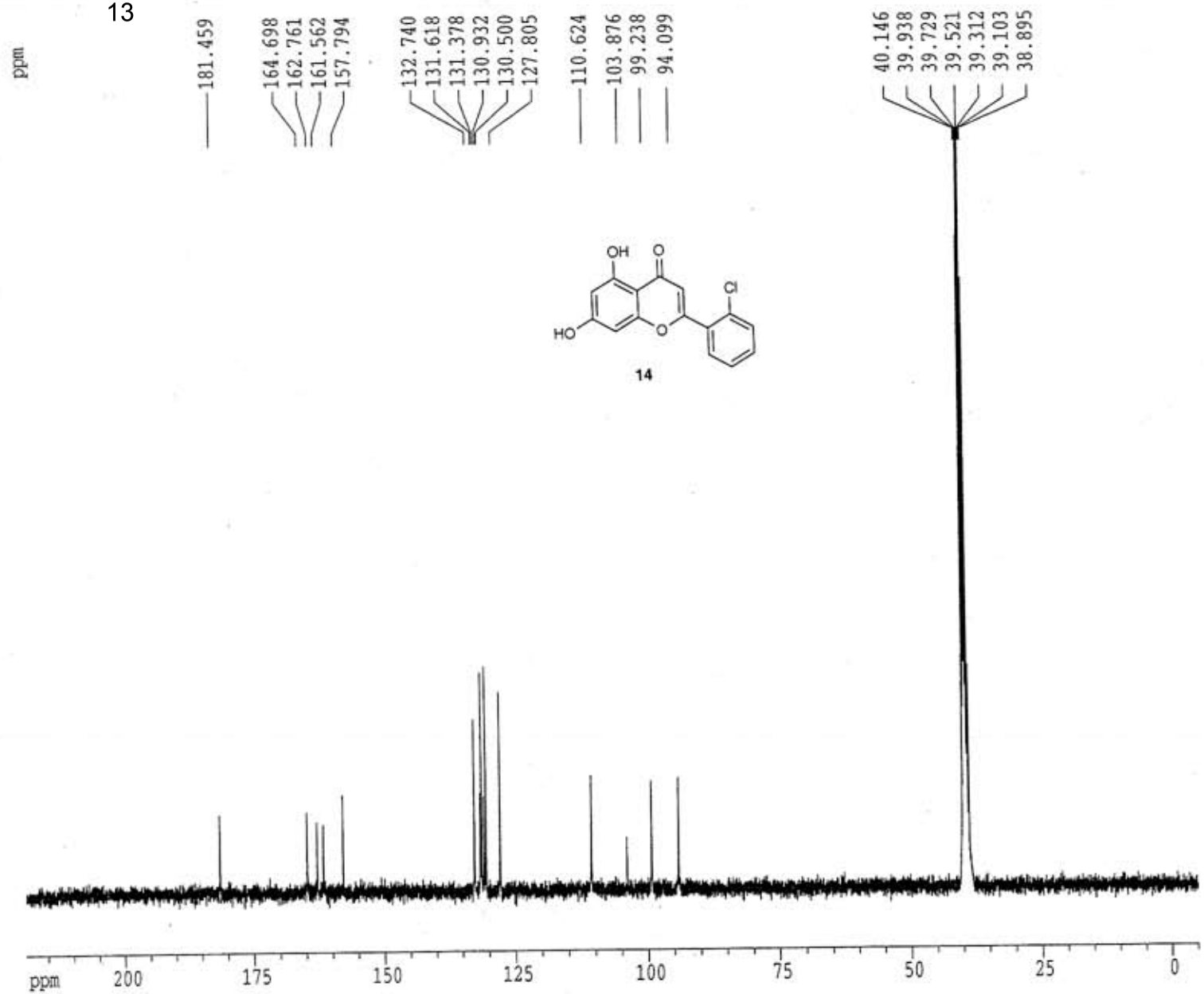
F2 - Processing parameters

SI	16384
SF	400.1300065 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	14.000 ppm
F1	5601.82 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.71500 ppm/cm
HZCM	286.09296 Hz/cm

13



Current Data Parameters

NAME	YA-iii-93-1C-1
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20020422
Time	22.04
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	~~CDCl3~~ DMSO
NS	1727
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	4096
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
D1	0.05000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	12.30 usec
PL1	2.00 dB
SFO1	100.6232933 MHz

========== CHANNEL f2 ==========

CPDPRG2	waltz16
NUC2	1H
PCPD2	100.00 usec
PL2	0.00 dB
PL12	18.00 dB
PL13	18.00 dB
SFO2	400.1316005 MHz

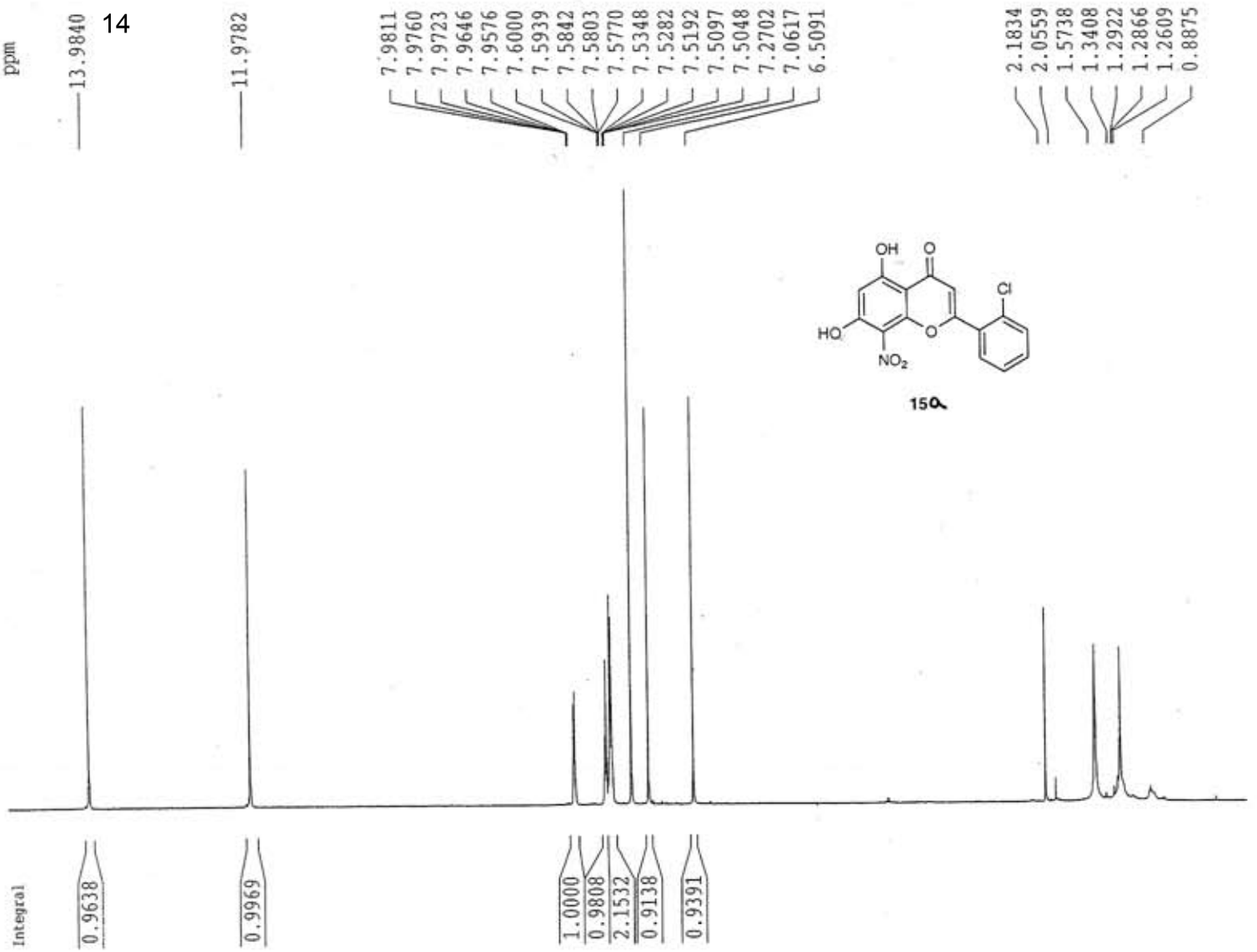
F2 - Processing parameters

SI	32768
SF	100.6128127 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	220.000 ppm
F1	22134.82 Hz
F2P	-5.000 ppm
F2	-503.07 Hz
PPMCM	11.25000 ppm/cm
HZCM	1131.89417 Hz/cm

14



15a

Current Data Parameters

NAME	YA-iii-96-1H
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20020323
Time	16.48
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	32
DS	2
SWH	11990.407 Hz
FIDRES	0.365918 Hz
AQ	1.3664756 sec
RG	256
DW	41.700 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

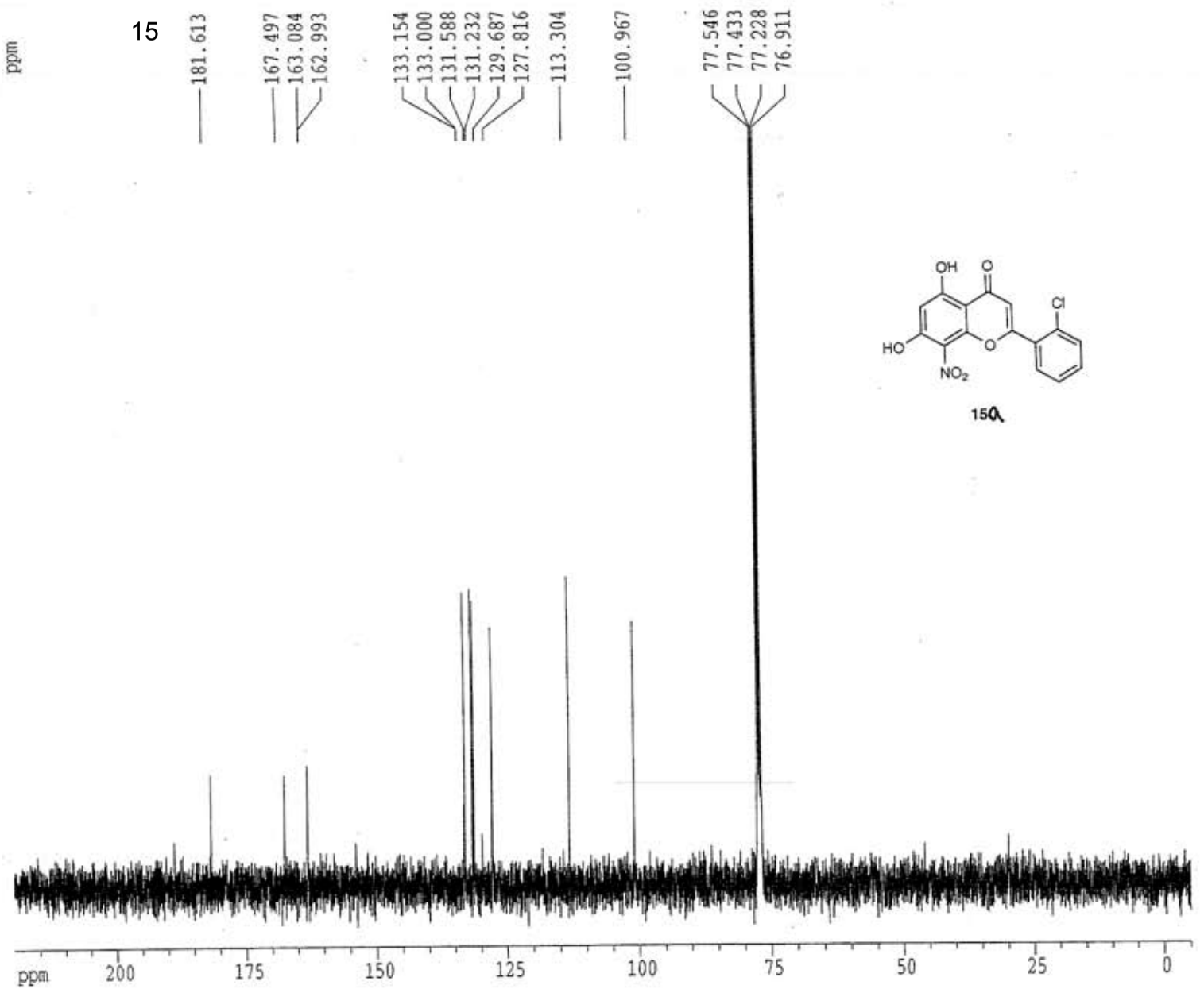
F2 - Processing parameters

SI	16384
SF	400.1300050 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	15.000 ppm
F1	6001.95 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.76500 ppm/cm
HZCM	306.09943 Hz/cm

15



150

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Current Data Parameters
NAME          YA-iii-96-1C
EXPNO                    1
PROCNO                   1

F2 - Acquisition Parameters
Date_             20020323
Time                 16.52
INSTRUM              drx400
PROBHD     5 mm Multinu
PULPROG           zgpg30
TD                  65536
SOLVENT             CDCl3
NS                   2048
DS                      2
SWH              23148.148 Hz
FIDRES               0.353213 Hz
AQ                1.4156276 sec
RG                   3649.1
DW                  21.600 usec
DE                   4.50 usec
TE                  300.0 K
D1              0.05000000 sec
d11             0.03000000 sec
d12             0.00002000 sec

============ CHANNEL f1 =============
NUC1                   13C
P1                  12.30 usec
PL1                  2.00 dB
SFO1           100.6232933 MHz

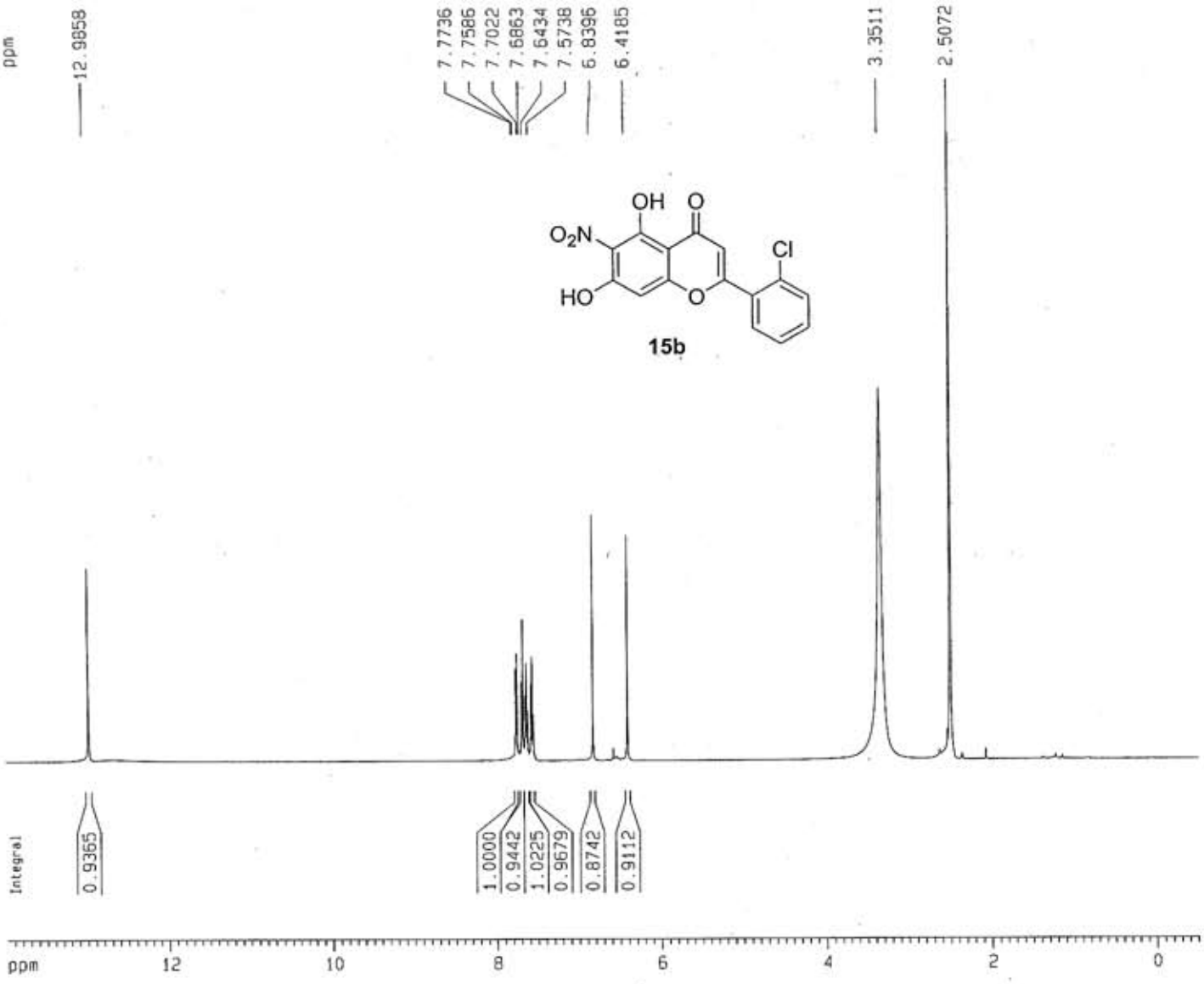
============ CHANNEL f2 =============
CPDPRG2          waltz16
NUC2                   1H
PCPD2              100.00 usec
PL2                  0.00 dB
PL12                18.00 dB
PL13                18.00 dB
SFO2           400.1316005 MHz

F2 - Processing parameters
SI                    32768
SF             100.6127489 MHz
WDW                      EM
SSB                       0
LB                     1.00 Hz
GB                        0
PC                     1.40

1D NMR plot parameters
CX                    20.00 cm
F1P                  220.000 ppm
F1                 22134.80 Hz
F2P                   -5.000 ppm
F2                  -503.07 Hz
PPMCM                11.25000 ppm/cm
HZCM               1131.89343 Hz/cm
```

16

PROTON DMSO u yahn 6



Current Data Parameters

NAME	Yu_Mi_4_19_05
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20050419
Time	14.10
INSTRUM	spect
PROBHD	5 mm CPDUL 13C
PULPROG	zg30
TD	65536
SOLVENT	DMSO
NS	16
DS	2
SWH	10330.578 Hz
FIDRES	0.157632 Hz
AQ	3.1719923 sec
RG	64
DW	48.400 usec
DE	6.00 usec
TE	298.0 K
D1	1.00000000 sec
MCREST	0.00000000 sec
MCWRK	0.01500000 sec

======== CHANNEL f1 ========

NUC1	1H
P1	15.00 usec
PL1	-5.00 dB
SFO1	500.1330885 MHz

F2 - Processing parameters

SI	32768
SF	500.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

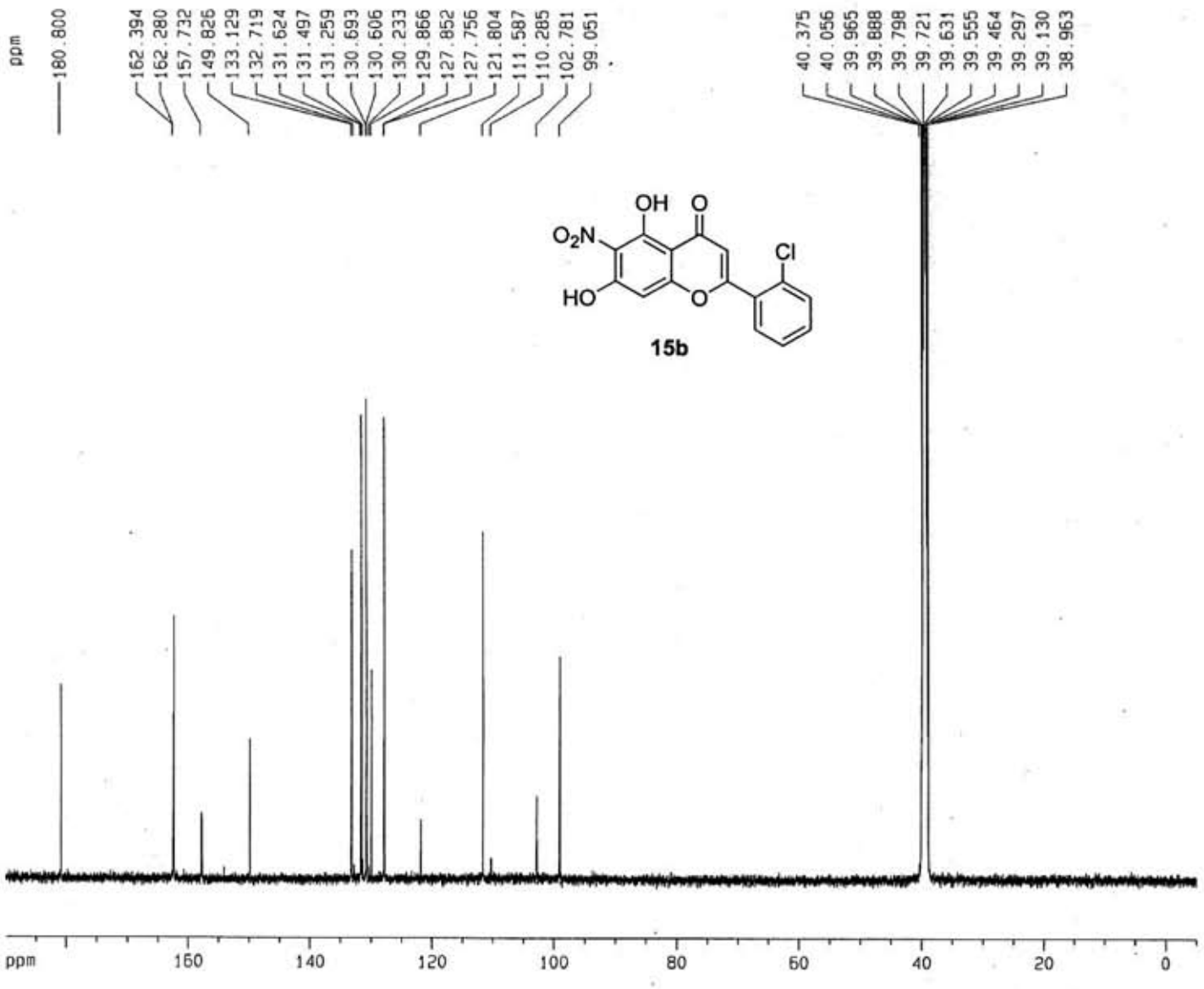
F1 - Processing parameters

SI	1024
MC2	QF
SF	500.1300000 MHz
WDW	QSINE
SSB	0
LB	0.30 Hz
GB	0

1D NMR plot parameters

CX	20.00 cm
CY	0.00 cm
F1P	14.000 ppm
F1	7001.82 Hz
F2P	-0.500 ppm
F2	-250.06 Hz
PPMCM	0.72500 ppm/cm
HZCM	362.59424 Hz/cm

AAC13CPD DMSO u yahn 6

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Current Data Parameters
NAME        Yu_Mi_4_19_05
EXPNO                  2
PROCNO                 1

F2 - Acquisition Parameters
Date_           20050419
Time               14.53
INSTRUM            spect
PROBHD   5 mm CPDUL 13C
PULPROG          zgpg30
TD                65536
SOLVENT            DMSO
NS                 2048
DS                    4
SWH          31446.541 Hz
FIDRES        0.479836 Hz
AQ            1.0420724 sec
RG                 8192
DW               15.900 usec
DE                6.00 usec
TE               298.0 K
D1            0.15000001 sec
D11           0.03000000 sec
DELTA         0.05000000 sec
MCREST        0.00000000 sec
MCWRK         0.01500000 sec

======== CHANNEL f1 ========
NUC1               13C
P1               10.00 usec
PL1              -4.90 dB
SFO1        125.7697360 MHz

======== CHANNEL f2 ========
CPDPRG2         waltz16
NUC2               1H
PCPD2            80.00 usec
PL2              -5.00 dB
PL12              9.54 dB
PL13             10.00 dB
SFO2        500.1325000 MHz

F2 - Processing parameters
SI                65536
SF          125.7578519 MHz
WDW                EM
SSB                0
LB              1.00 Hz
GB                 0
PC              1.40

1D NMR plot parameters
CX              20.00 cm
CY               0.00 cm
F1P            190.000 ppm
F1            23893.99 Hz
F2P            -5.000 ppm
F2             -628.79 Hz
PPMCM          9.75000 ppm/cm
HZCM        1226.13916 Hz/cm
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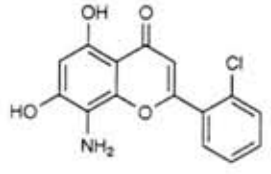
18



16

ppm

11.9133

7.8895 7.8859 7.8706 7.8670 7.6897 7.6719 7.6695 7.6299 7.6111 7.6076 7.5920 7.5874 7.5615 7.5585 7.5426 7.5398 6.5156 6.3184 4.0455 4.0280 4.0103 3.9923 3.3262 2.5020 2.4973 2.4936 2.4893 2.0771 2.0659 2.0606 2.0552 1.9805 1.1829 1.1650 1.1477

Integral

0.7617 1.0065 1.0428 1.0665 1.0316 1.0342 1.0653

ppm 12 10 8 6 4 2 0

```
Current Data Parameters
NAME          YA-iii-189-1
EXPNO                    2
PROCNO                   1

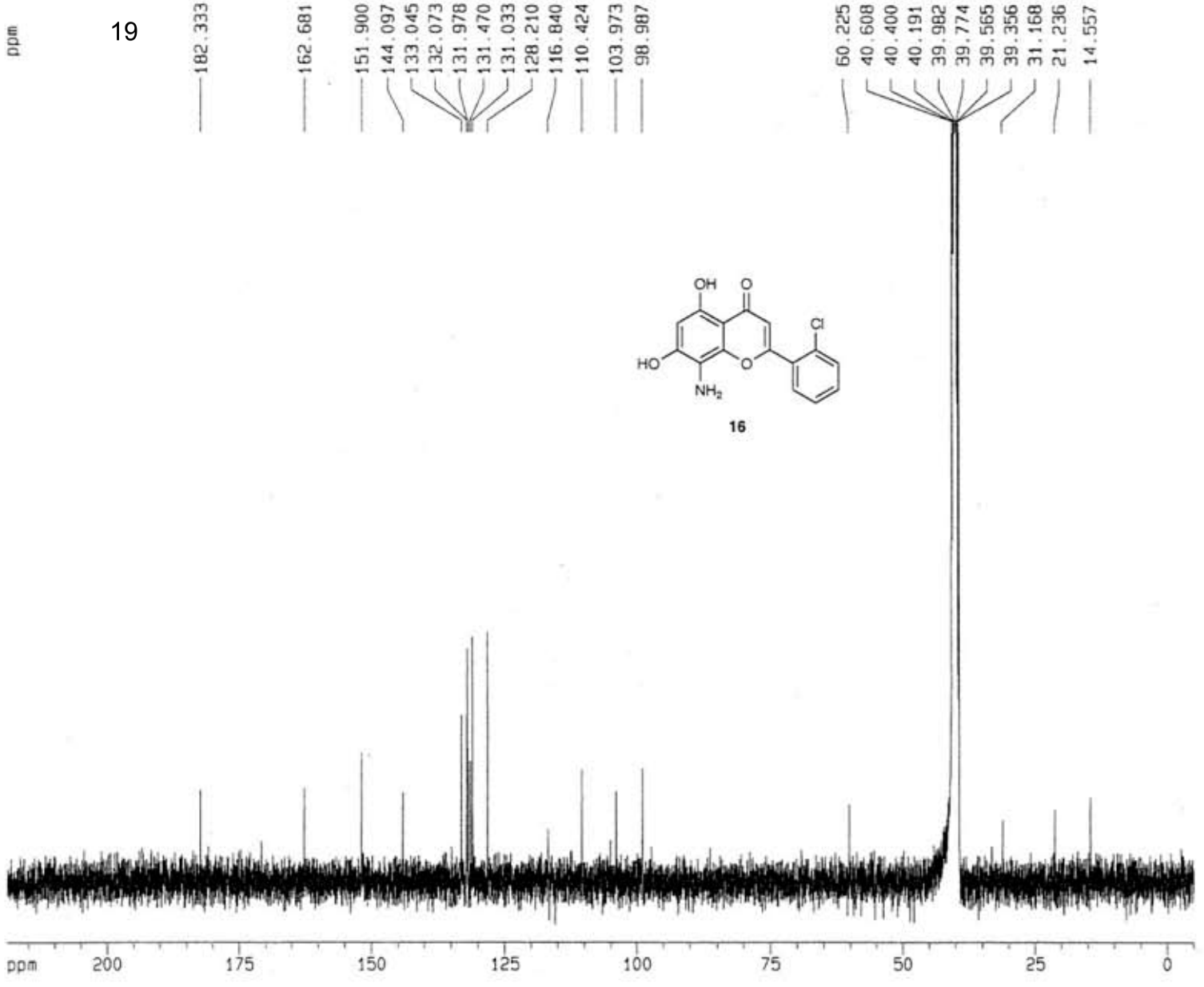
F2 - Acquisition Parameters
Date_             20021021
Time                 18.50
INSTRUM             drx400
PROBHD   5 mm Multinucl
PULPROG              zg30
TD                  32768
SOLVENT              DMSO
NS                     32
DS                      2
SWH           11185.683 Hz
FIDRES         0.341360 Hz
AQ             1.4647796 sec
RG                 228.1
DW                44.700 usec
DE                 4.50 usec
TE                300.0 K
D1            1.00000000 sec

======== CHANNEL f1 ========
NUC1                   1H
P1                   7.70 usec
PL1                 -6.00 dB
SFO1         400.1320007 MHz

F2 - Processing parameters
SI                 16384
SF           400.1300052 MHz
WDW                   EM
SSB                    0
LB                  0.30 Hz
GB                     0
PC                  1.00

1D NMR plot parameters
CX                 20.00 cm
CY                 13.22 cm
F1P                14.000 ppm
F1               5601.82 Hz
F2P                -0.300 ppm
F2               -120.04 Hz
PPMCM              0.71500 ppm/cm
HZCM             286.09296 Hz/cm
```

19



Current Data Parameters
NAME YA-iii-189-1C
EXPNO 1
PROCNO 1

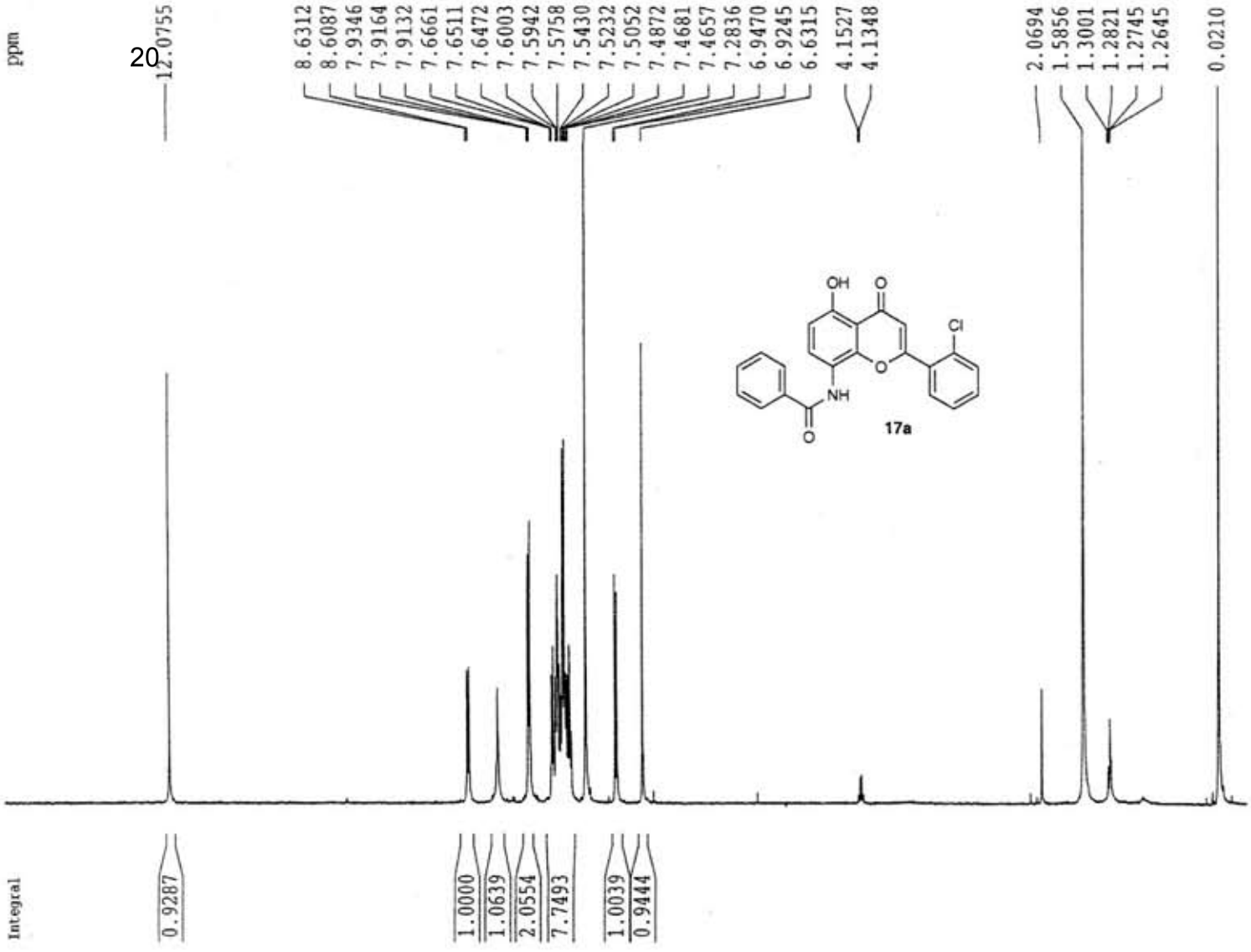
F2 - Acquisition Parameters
Date_ 20021022
Time 18.05
INSTRUM spect
PROBHD 5 mm QNP 1H/15
PULPROG zgpg30
TD 65536
SOLVENT CDCl3
NS 16384
DS 4
SWH 23980.814 Hz
FIDRES 0.365918 Hz
AQ 1.3664756 sec
RG 7298.2
DW 20.850 usec
DE 6.00 usec
TE 300.0 K
D1 2.00000000 sec
d11 0.03000000 sec
d12 0.00002000 sec

******** CHANNEL f1 ********
NUC1 13C
P1 7.80 usec
PL1 -2.00 dB
SFO1 100.6228298 MHz

******** CHANNEL f2 ********
CPDPRG2 waltz16
NUC2 1H
PCPD2 80.00 usec
PL2 -2.00 dB
PL12 18.22 dB
PL13 15.00 dB
SFO2 400.1316005 MHz

F2 - Processing parameters
SI 32768
SF 100.6127690 MHz
WDW EM
SSB 0
LB 1.00 Hz
GB 0
PC 1.40

1D NMR plot parameters
CX 20.00 cm
CY 0.00 cm
F1P 220.000 ppm
F1 22134.81 Hz
F2P -5.000 ppm
F2 -503.07 Hz
PPMCM 11.25000 ppm/cm
HZCM 1131.89368 Hz/cm



Current Data Parameters

NAME	Hari-II-44
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20010118
Time	18.12
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	32
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	1149.4
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

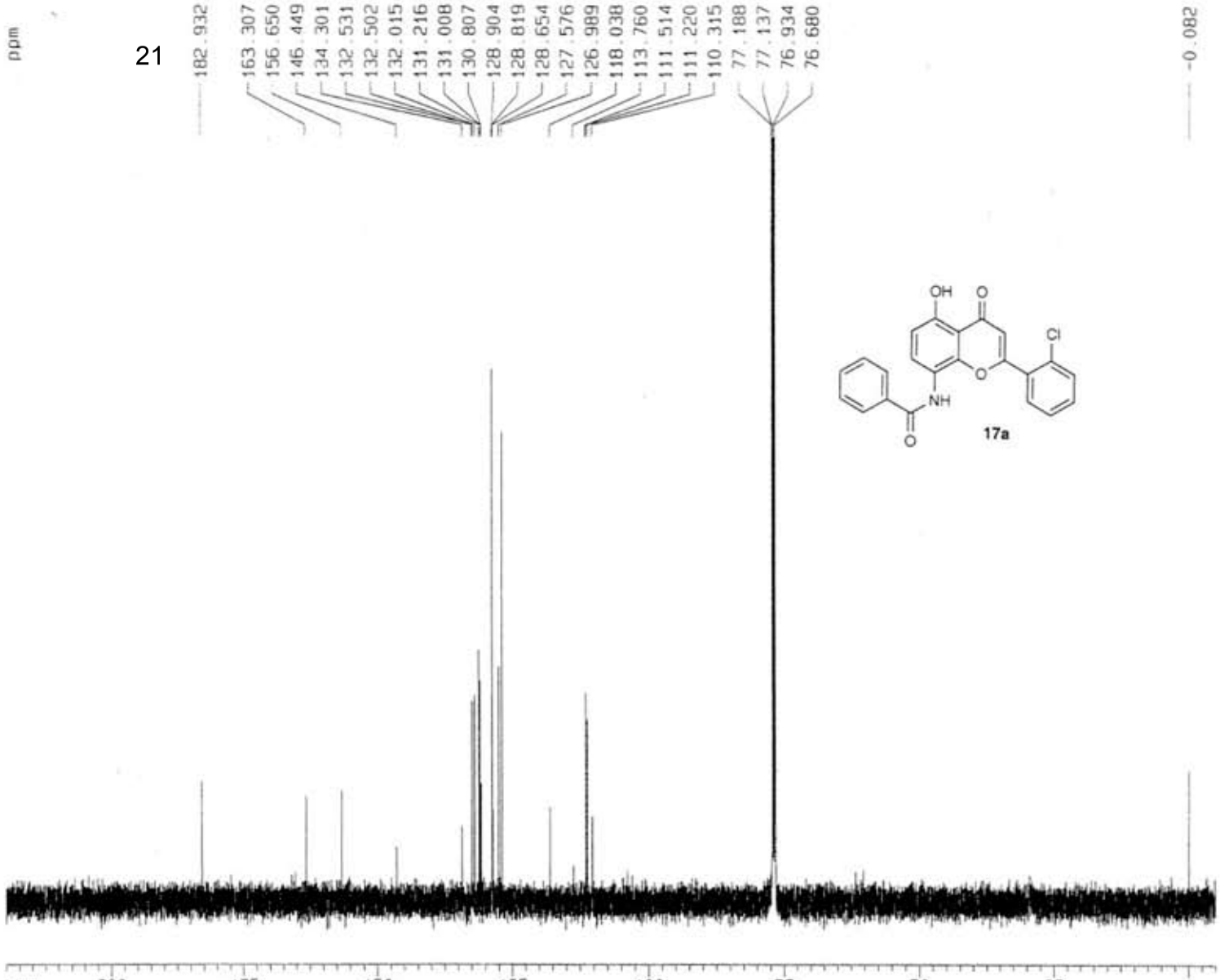
F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	14.000 ppm
F1	5601.82 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.71500 ppm/cm
HZCM	286.09296 Hz/cm

21



Current Data Parameters
NAME Hari-II-44-1C
EXPNO 1
PROCNO 1

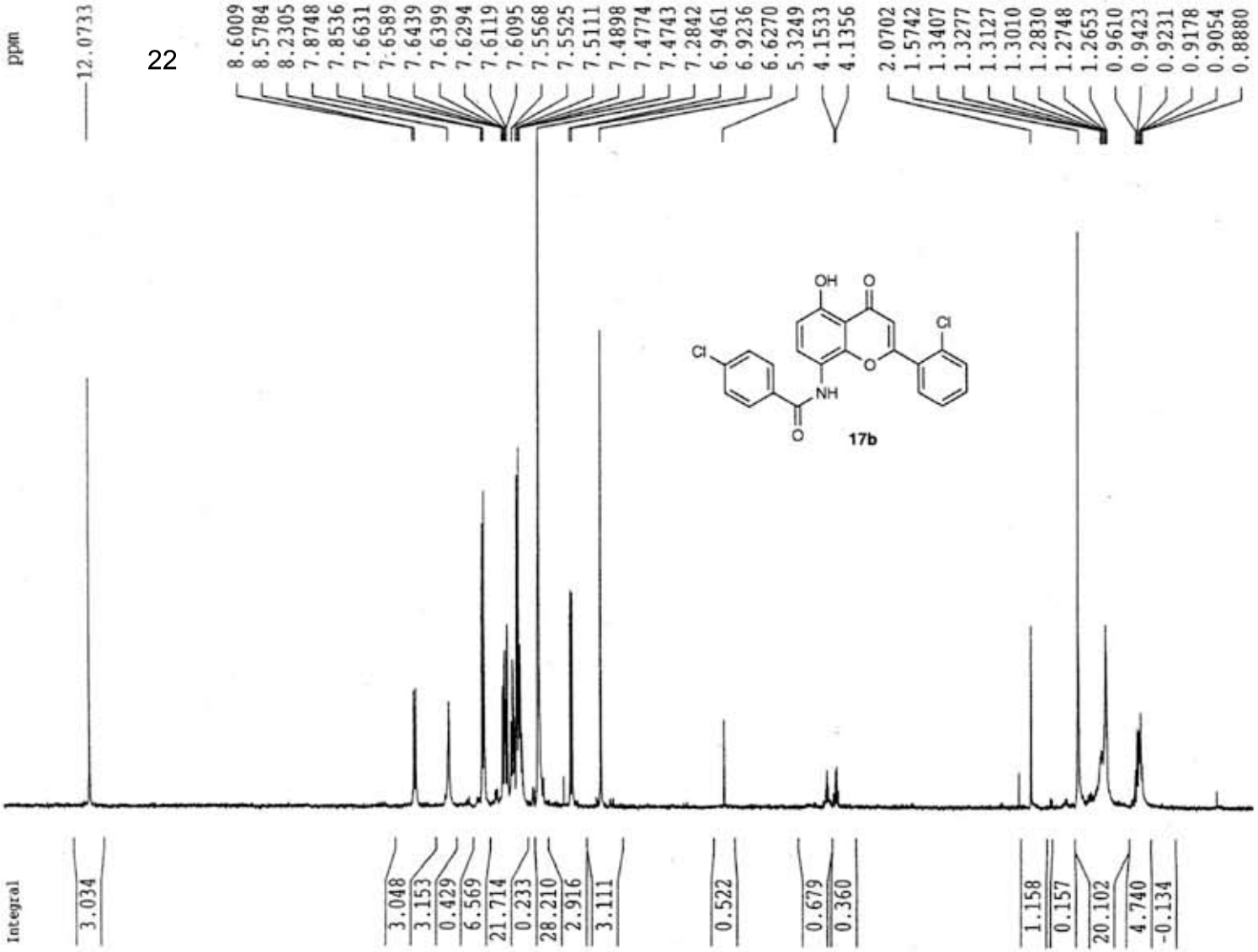
F2 - Acquisition Parameters
Date_ 20010122
Time 19.04
INSTRUM spect
PROBHD 5 mm BBO BB-
PULPROG zgpg30
TD 65536
SOLVENT CDCl3
NS 9123
DS 4
SWH 31446.541 Hz
FIDRES 0.479836 Hz
AQ 1.0420724 sec
RG 7298.2
DW 15.900 usec
DE 6.00 usec
TE 300.0 K
D1 0.10000000 sec
D11 0.03000000 sec
D12 0.00002000 sec

********** CHANNEL f1 **********
NUC1 13C
P1 6.50 usec
PL1 5.00 dB
SFO1 125.7719472 MHz

********** CHANNEL f2 **********
CPDPRG2 waltz16
NUC2 1H
PCPD2 95.00 usec
PL2 17.50 dB
PL12 19.00 dB
PL13 30.00 dB
SFO2 500.1325000 MHz

F2 - Processing parameters
SI 65536
SF 125.7578008 MHz
WDW EM
SSB 0
LB 0.30 Hz
GB 0
PC 1.40

1D NMR plot parameters
CX 20.00 cm
F1P 220.000 ppm
F1 27666.71 Hz
F2P -5.000 ppm
F2 -628.79 Hz
PPMCM 11.25000 ppm/cm
HZCM 1414.77527 Hz/cm



Current Data Parameters

NAME	YA-ii-143-1
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20010123
Time	14.00
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	1024
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

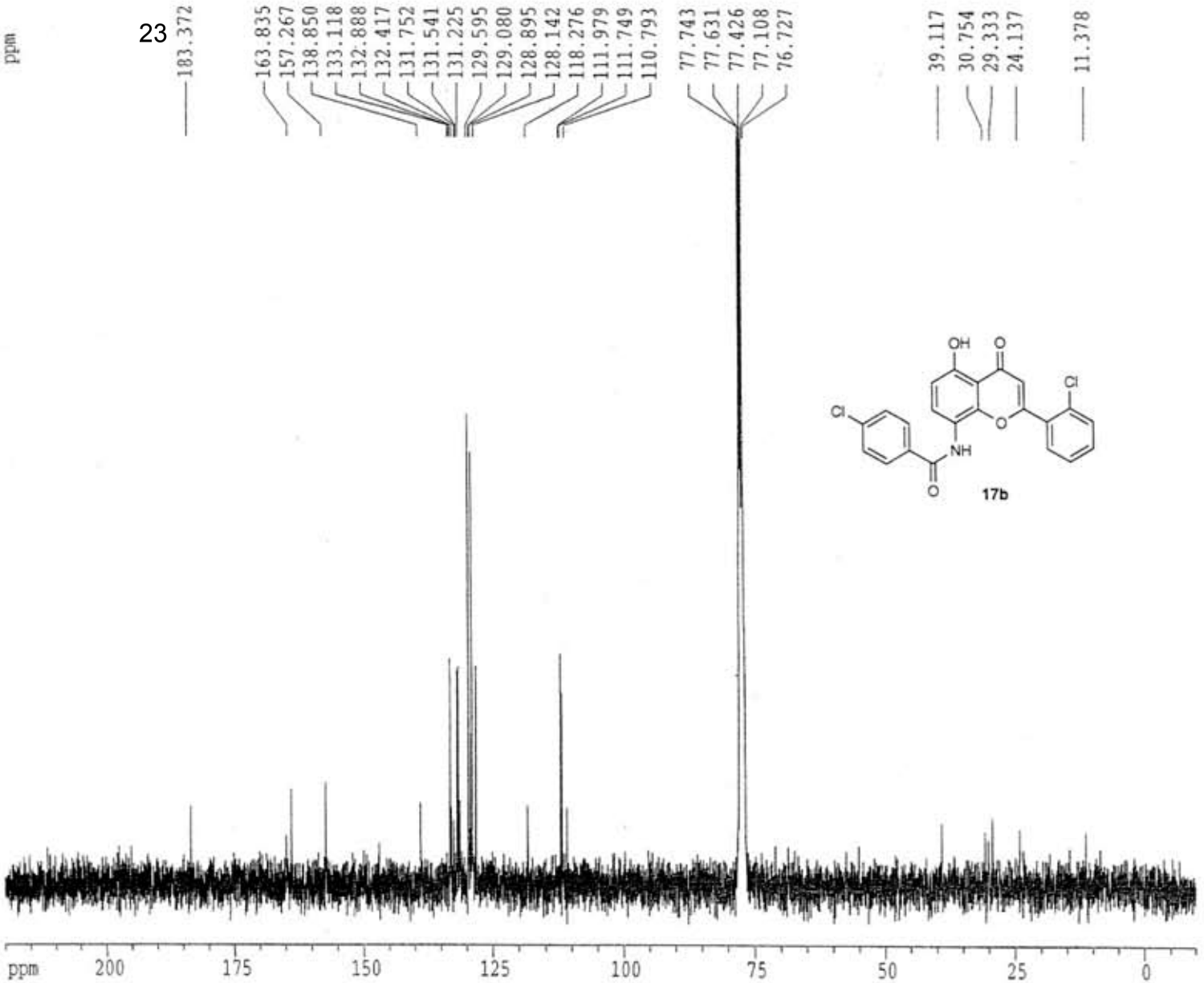
NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-ii-143-1C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20010124
Time	20.15
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	30023
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	2048
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
D1	0.05000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	12.30 usec
PL1	2.00 dB
SFO1	100.6232933 MHz

========== CHANNEL f2 ==========

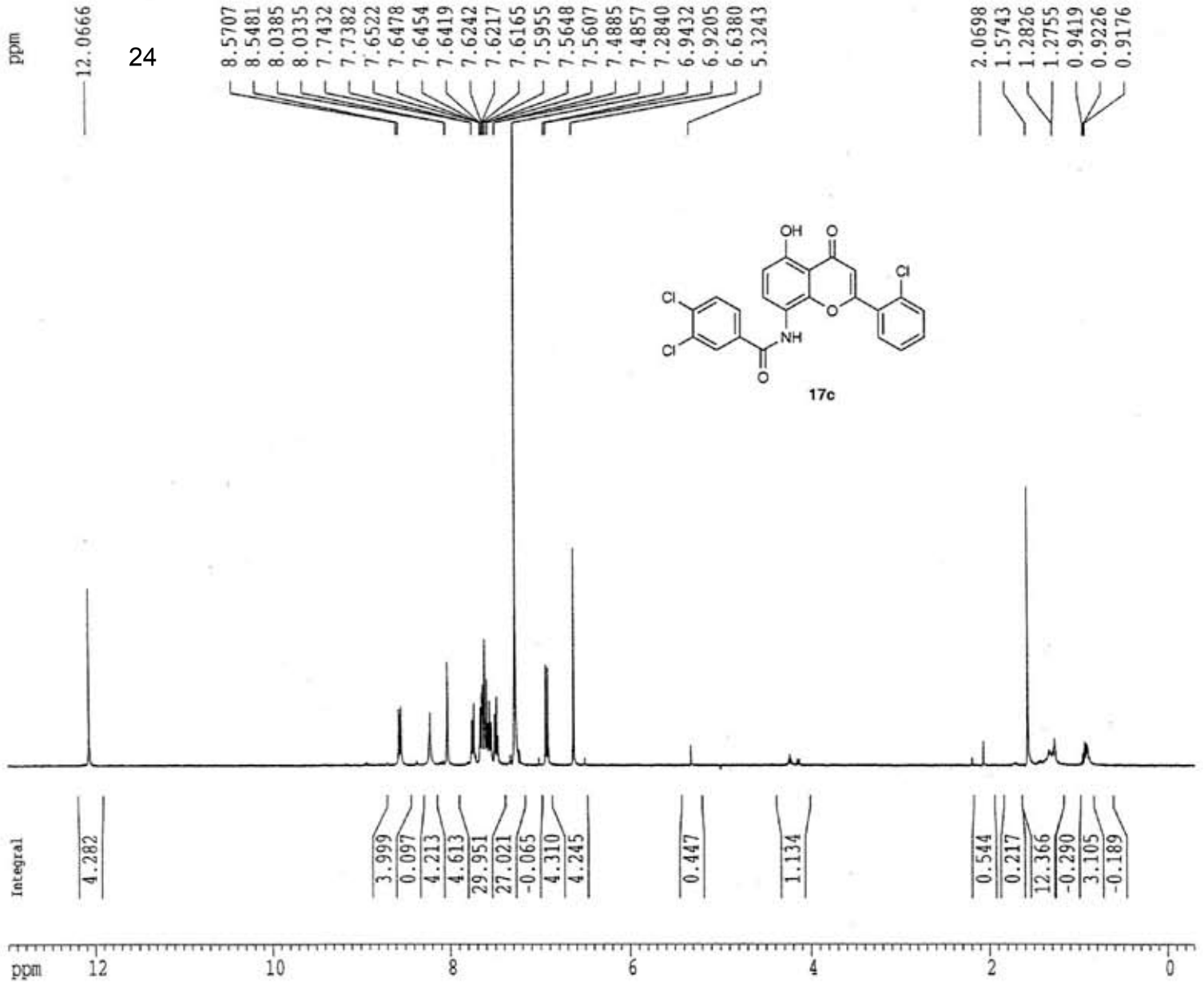
CPDPRG2	waltz16
NUC2	1H
PCPD2	100.00 usec
PL2	0.00 dB
PL12	18.00 dB
PL13	18.00 dB
SFO2	400.1316005 MHz

F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	220.036 ppm
F1	22138.42 Hz
F2P	-10.036 ppm
F2	-1009.73 Hz
PPMCM	11.50359 ppm/cm
HZCM	1157.40747 Hz/cm



Current Data Parameters

NAME	YA-ii-144-1
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20010124
Time	16.37
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	1024
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

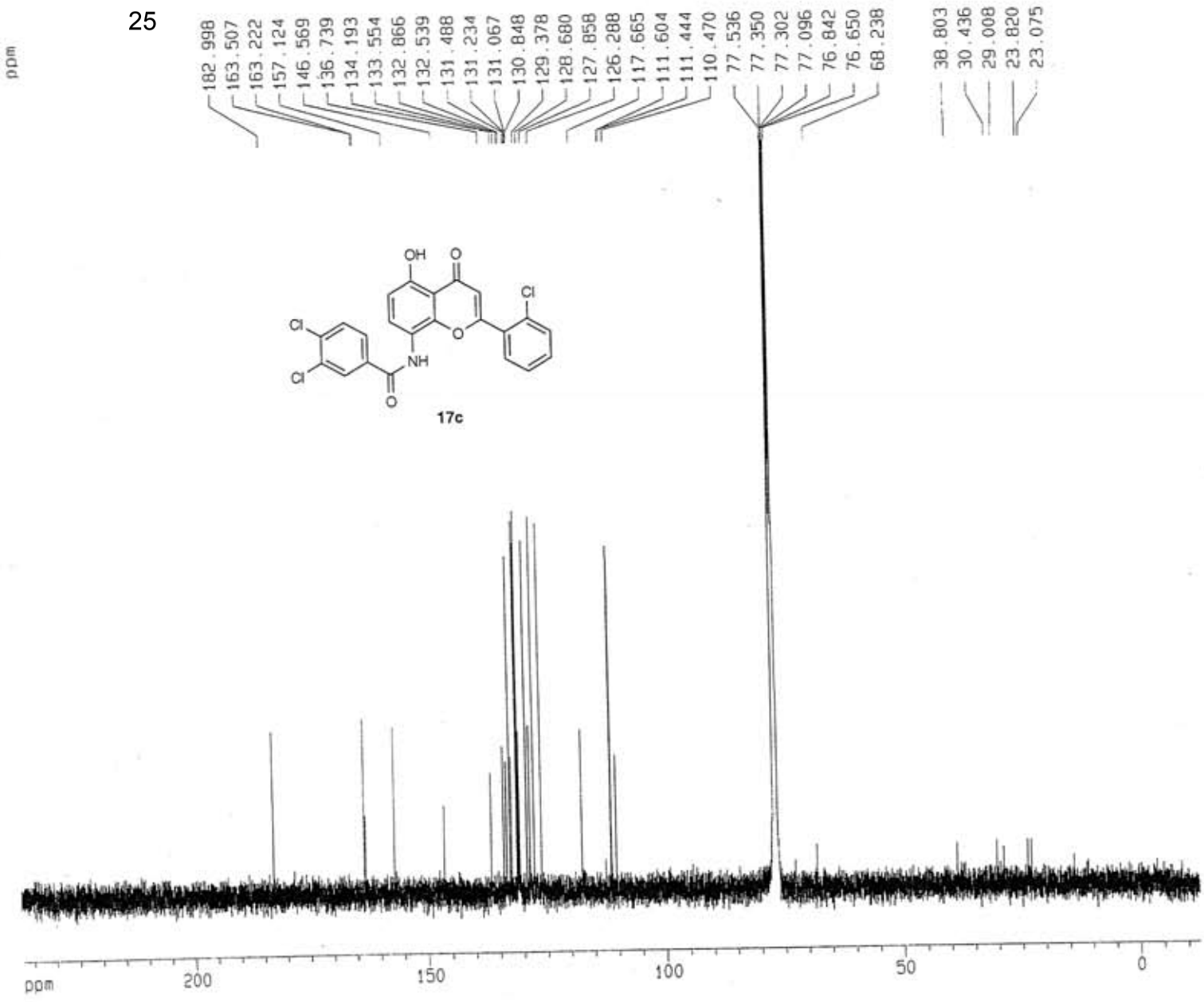
NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-ii-144-1C
EXPNO	2
PROCNO	1

F2 - Acquisition Parameters

Date_	20010130
Time	17.20
INSTRUM	spect
PROBHD	5 mm BBO BB-
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	45012
DS	4
SWH	31446.541 Hz
FIDRES	0.479836 Hz
AQ	1.0420724 sec
RG	13004
DW	15.900 usec
DE	6.00 usec
TE	300.0 K
D1	0.10000000 sec
D11	0.03000000 sec
D12	0.00002000 sec

********** CHANNEL f1 **********

NUC1	13C
P1	6.50 usec
PL1	5.00 dB
SFO1	125.7719472 MHz

********** CHANNEL f2 **********

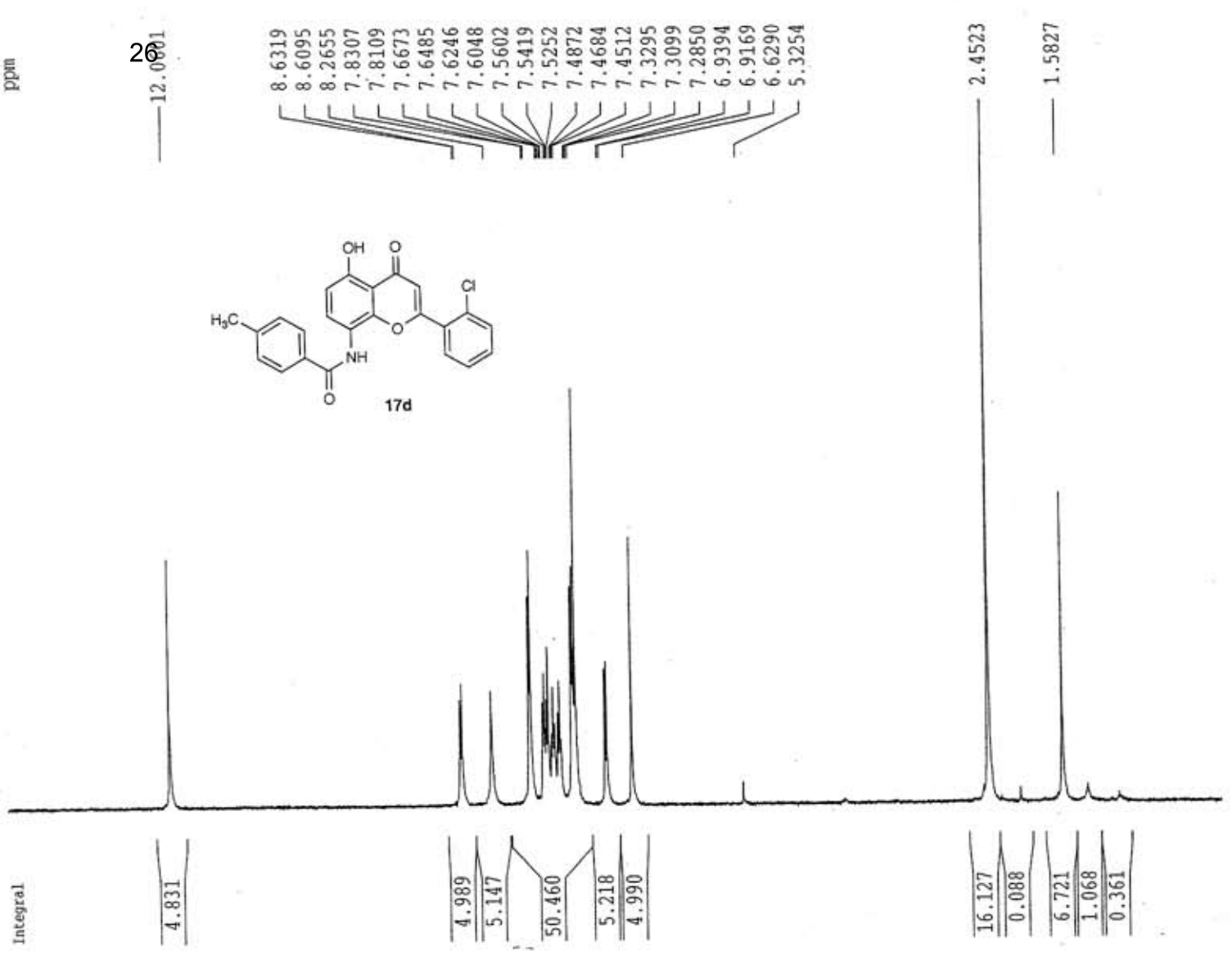
CPDPRG2	waltz16
NUC2	1H
PCPD2	95.00 usec
PL2	17.50 dB
PL12	19.00 dB
PL13	30.00 dB
SFO2	500.1325000 MHz

F2 - Processing parameters

SI	65536
SF	125.7577802 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	237.682 ppm
F1	29890.31 Hz
F2P	-12.375 ppm
F2	-1556.23 Hz
PPMCM	12.50282 ppm/cm
HZCM	1572.32703 Hz/cm



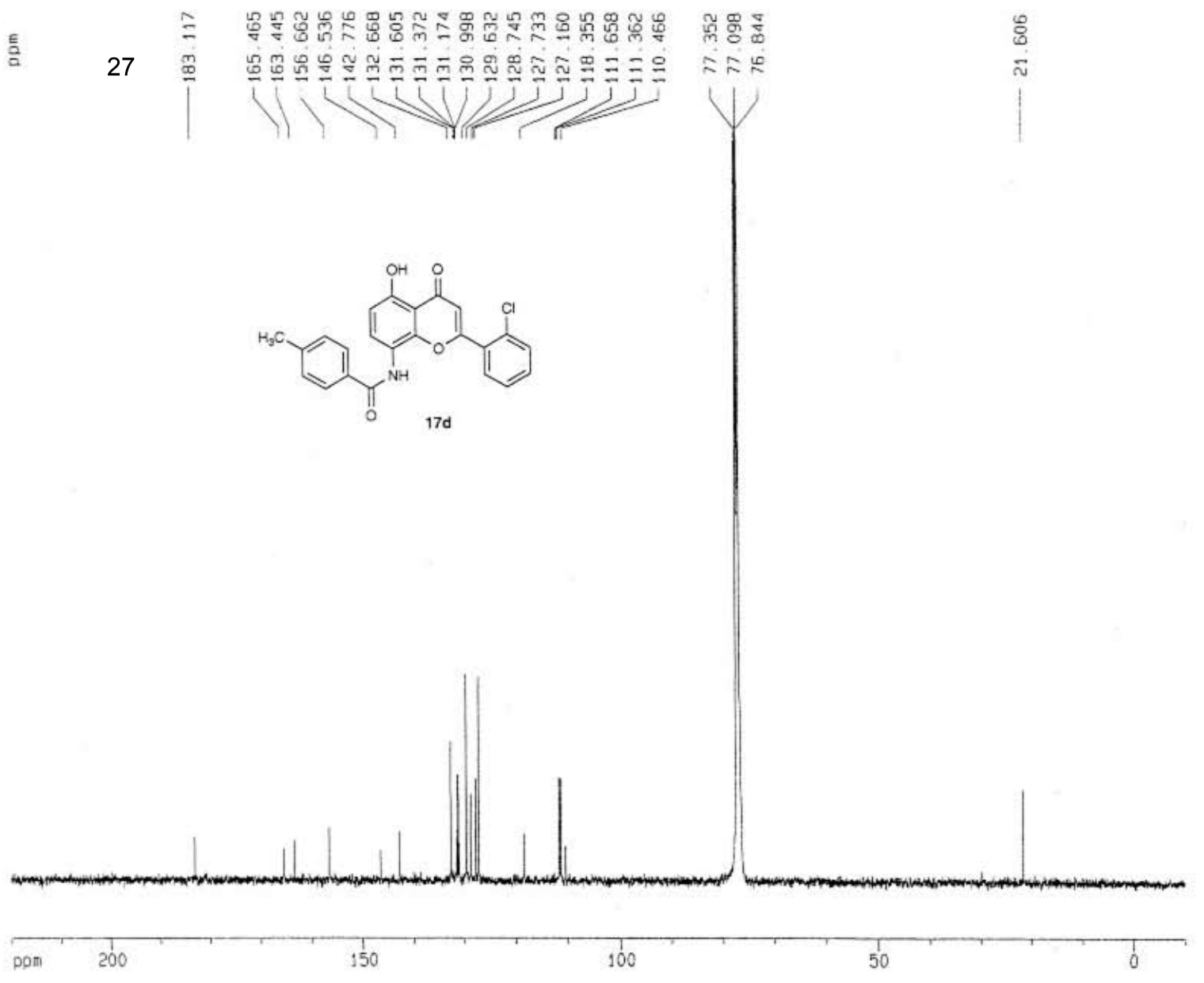

```
Current Data Parameters
NAME          YA-ii-154-1
EXPNO                   1
PROCNO                  1

F2 - Acquisition Parameters
Date_          20010207
Time              14.28
INSTRUM          drx400
PROBHD     5 mm Multinu
PULPROG          zg30
TD               32768
SOLVENT          CDCl3
NS                  16
DS                   2
SWH           8012.820 Hz
FIDRES           0.244532 Hz
AQ            2.0447731 sec
RG                1024
DW              62.400 usec
DE               4.50 usec
TE              300.0 K
D1            1.00000000 sec

============ CHANNEL f1 ============
NUC1                1H
P1               7.70 usec
PL1              -6.00 dB
SFO1        400.1320007 MHz

F2 - Processing parameters
SI                 16384
SF          400.1300000 MHz
WDW                EM
SSB                 0
LB               0.30 Hz
GB                  0
PC                1.00

1D NMR plot parameters
CX               20.00 cm
F1P              14.000 ppm
F1              5601.82 Hz
F2P              -0.300 ppm
F2              -120.04 Hz
PPMCM           0.71500 ppm/cm
HZCM          286.09296 Hz/cm
```



Current Data Parameters

NAME	YA-ii-154-C
EXPNO	2
PROCNO	1

F2 - Acquisition Parameters

Date_	20010207
Time	16.36
INSTRUM	spect
PROBHD	5 mm BBO BB-
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	50000
DS	4
SWH	31446.541 Hz
FIDRES	0.479836 Hz
AQ	1.0420724 sec
RG	6502
DW	15.900 usec
DE	6.00 usec
TE	300.0 K
D1	0.10000000 sec
D11	0.03000000 sec
D12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	8.50 usec
PL1	5.00 dB
SFO1	125.7719472 MHz

========== CHANNEL f2 ==========

CPDPRG2	waltz16
NUC2	1H
PCPD2	95.00 usec
PL2	17.50 dB
PL12	19.00 dB
PL13	30.00 dB
SFO2	500.1325000 MHz

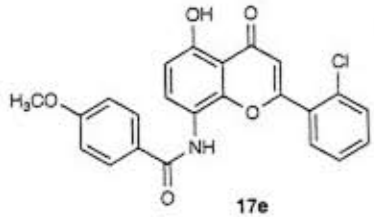
F2 - Processing parameters

SI	65536
SF	125.7577802 MHz
WDW	EM
SSB	0
LB	3.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	220.000 ppm
F1	27666.71 Hz
F2P	-10.000 ppm
F2	-1257.58 Hz
PPMCM	11.50000 ppm/cm
HZCM	1446.21448 Hz/cm

28



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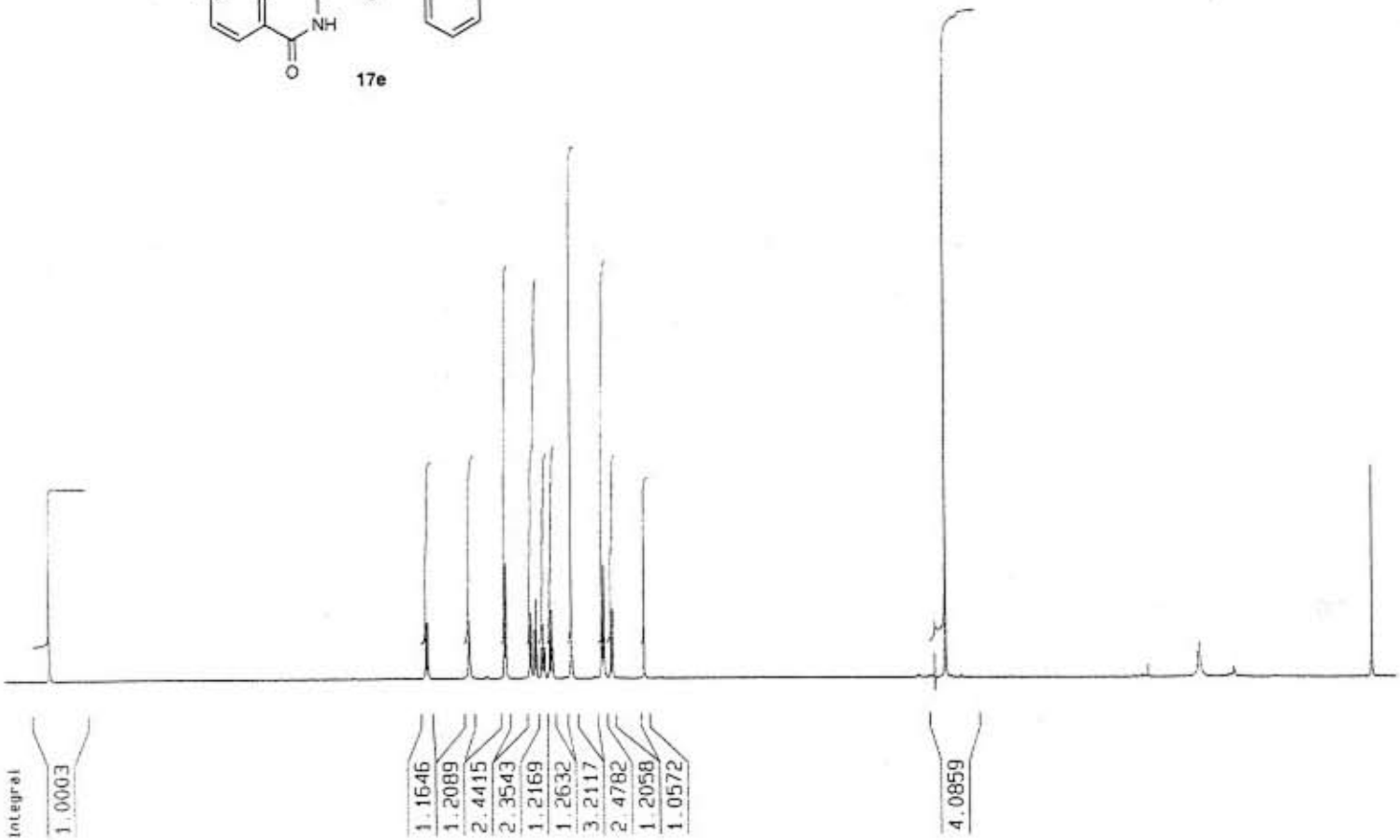



```
Current Data Parameters
NAME                  II-HKR-46
EXPNO                         1
PROCNO                        1

F2 - Acquisition Parameters
Date_              20010124
Time                       9.02
INSTRUM                    spect
PROBHD     5 mm BBO BB-
PULPROG                    zg30
TD                        32768
SOLVENT                   CDCl3
NS                           16
DS                            2
SWH                15015.015 Hz
FIDRES             0.458222 Hz
AQ                 1.0912244 sec
RG                          512
DW                   33.300 usec
DE                    6.00 usec
TE                   300.0 K
D1                 0.03000000 sec

============ CHANNEL f1 ============
NUC1                        1H
P1                        7.70 usec
PL1                      -4.00 dB
SFO1              500.1320005 MHz

F1 - Acquisition parameters
ND0                           2
TD                          256
SFO1               500.1325 MHz
FIDRES             23.475050 Hz
SW                 12.016 ppm

F2 - Processing parameters
SI                        32768
SF                 500.1300123 MHz
WDW                          EM
SSB                           0
LB                         0.30 Hz
GB                            0
PC                         1.00

F1 - Processing parameters
SI                         1024
MC2                          QF
SF                 500.1300000 MHz
WDW                          no
SSB                           0
LB                         0.30 Hz
GB                            0

1D NMR plot parameters
CX                        20.00 cm
F1P                      12.442 ppm
F1                     6222.46 Hz
F2P                      -0.228 ppm
F2                      -113.88 Hz
PPMCM                  0.63247 ppm/cm
HZCM                 316.81680 Hz/cm
```

Current Data Parameters
NAME 11-HDR-05
EXPNO 2
PROCNO 1

F2 - Acquisition Parameters
Date_ 20010124
Time 9.56
INSTRUM spect
PROBHD 5 mm BBO BB-
PULPROG zgpg30
TD 65536
SOLVENT CDCl3
NS 6912
DS 4
SWH 31446.541 Hz
FIDRES 0.479838 Hz
AQ 1.0420724 sec
RG 5120.6
DW 15.900 usec
DE 6.00 usec
TE 300.0 K
D1 0.10000000 sec
D11 0.03000000 sec
D12 0.00002000 sec

********** CHANNEL f1 **********
NUC1 13C
P1 6.50 usec
PL1 5.00 dB
SFO1 125.7719472 MHz

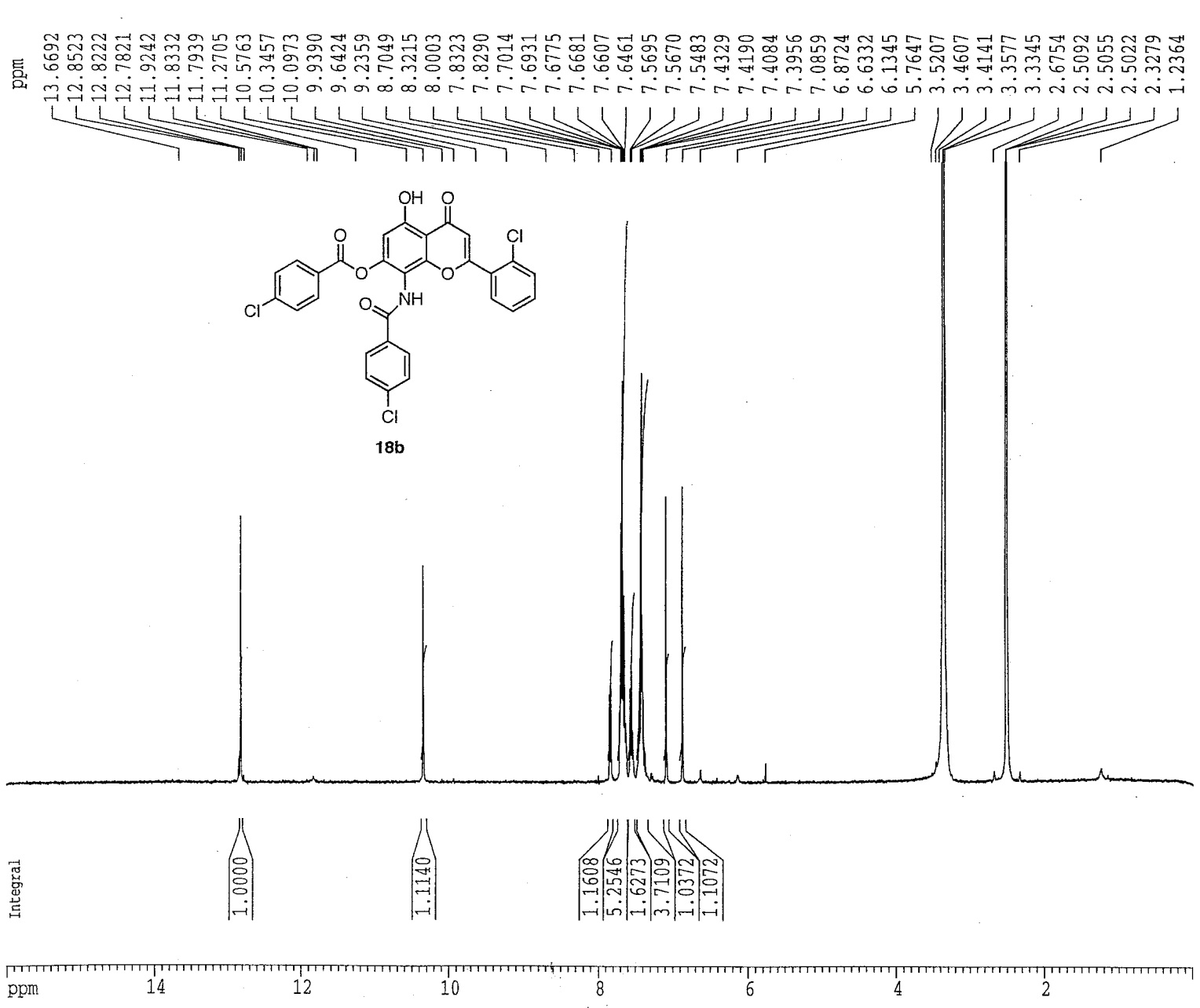
********** CHANNEL f2 **********
CPDPRG2 waltz16
NUC2 1H
PCPD2 55.00 usec
PL2 17.50 dB
PL12 18.00 dB
PL13 30.00 dB
SFO2 500.1325000 MHz

F1 - Acquisition parameters
NDO 2
TD 256
SFO1 500.1325 MHz
FIDRES 23.475060 Hz
SW 12.016 ppm

F2 - Processing parameters
SI 32768
SF 125.7577962 MHz
WDW EM
SSB 0
LB 3.00 Hz
GB 0
PC 1.40

F1 - Processing parameters
SI 1024
MC2 GF
SF 500.1300000 MHz
WDW no
SSB 0
LB 0.30 Hz
GB 0

10 mm plot parameters
CX 20.00 cm
F1P 185.670 ppm
F1 23369.43 Hz
F2P -2.123 ppm
F2 -266.92 Hz
PPMCM 5.36582 ppm/cm
HZCM 1180.61775 Hz/cm



Current Data Parameters

NAME	lc060
EXPNO	2
PROCNO	1

F2 - Acquisition Parameters

Date_	20011212
Time	10.04
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	DMSO
NS	16
DS	2
SWH	6410.256 Hz
FIDRES	0.195625 Hz
AQ	2.5559540 sec
RG	64
DW	78.000 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

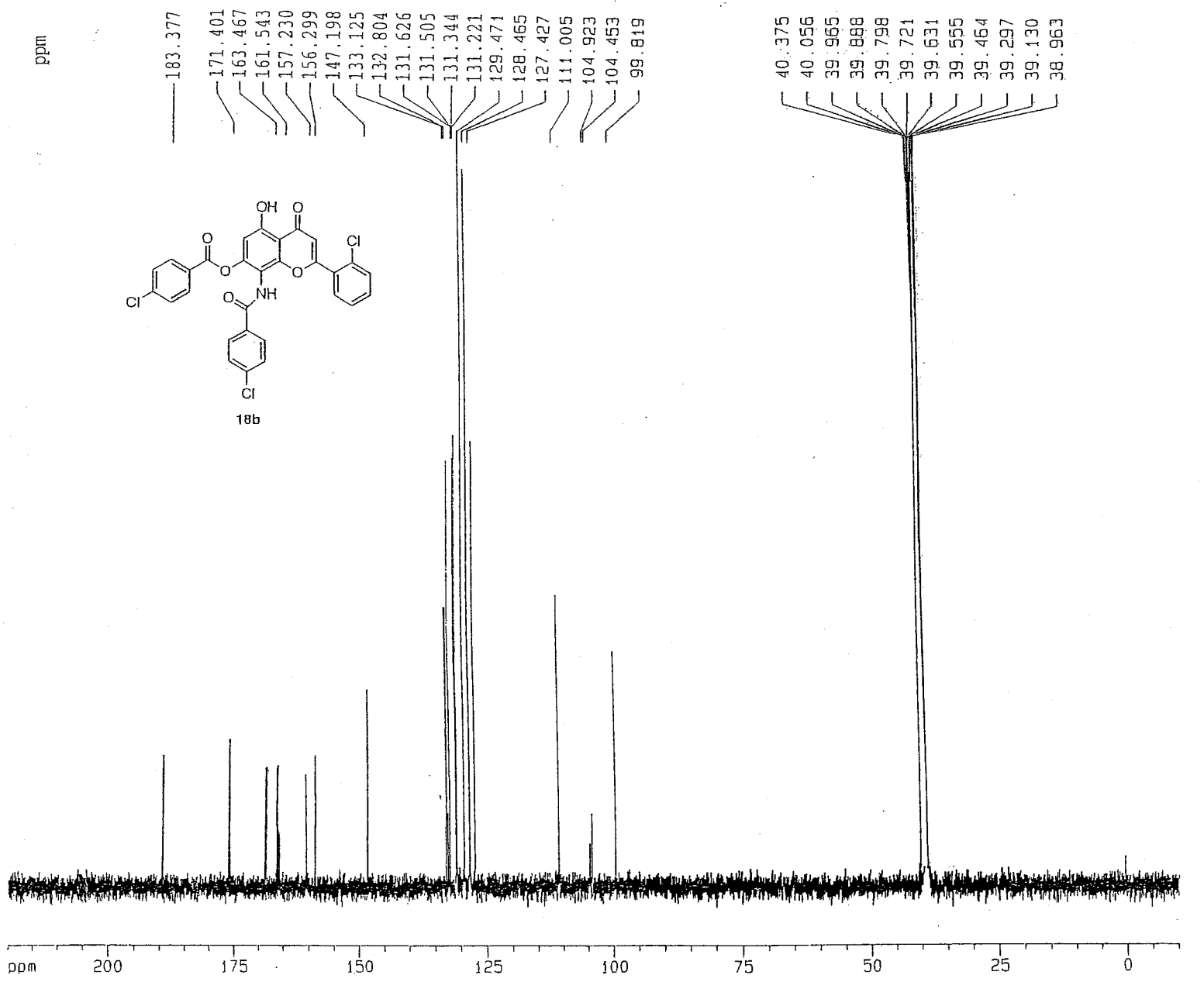
NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1332010 MHz

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	16.010 ppm
F1	6406.17 Hz
F2P	-0.010 ppm
F2	-4.09 Hz
PPMCM	0.80102 ppm/cm
HZCM	320.51282 Hz/cm



Current Data Parameters

NAME	1c060
EXPNO	2
PROCNO	1

F2 - Acquisition Parameters

Date_	20011212
Time	10.04
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	DMSO
NS	500
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	32768
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
D1	0.05000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	12.30 usec
PL1	2.00 dB
SFO1	100.6232933 MHz

========== CHANNEL f2 ==========

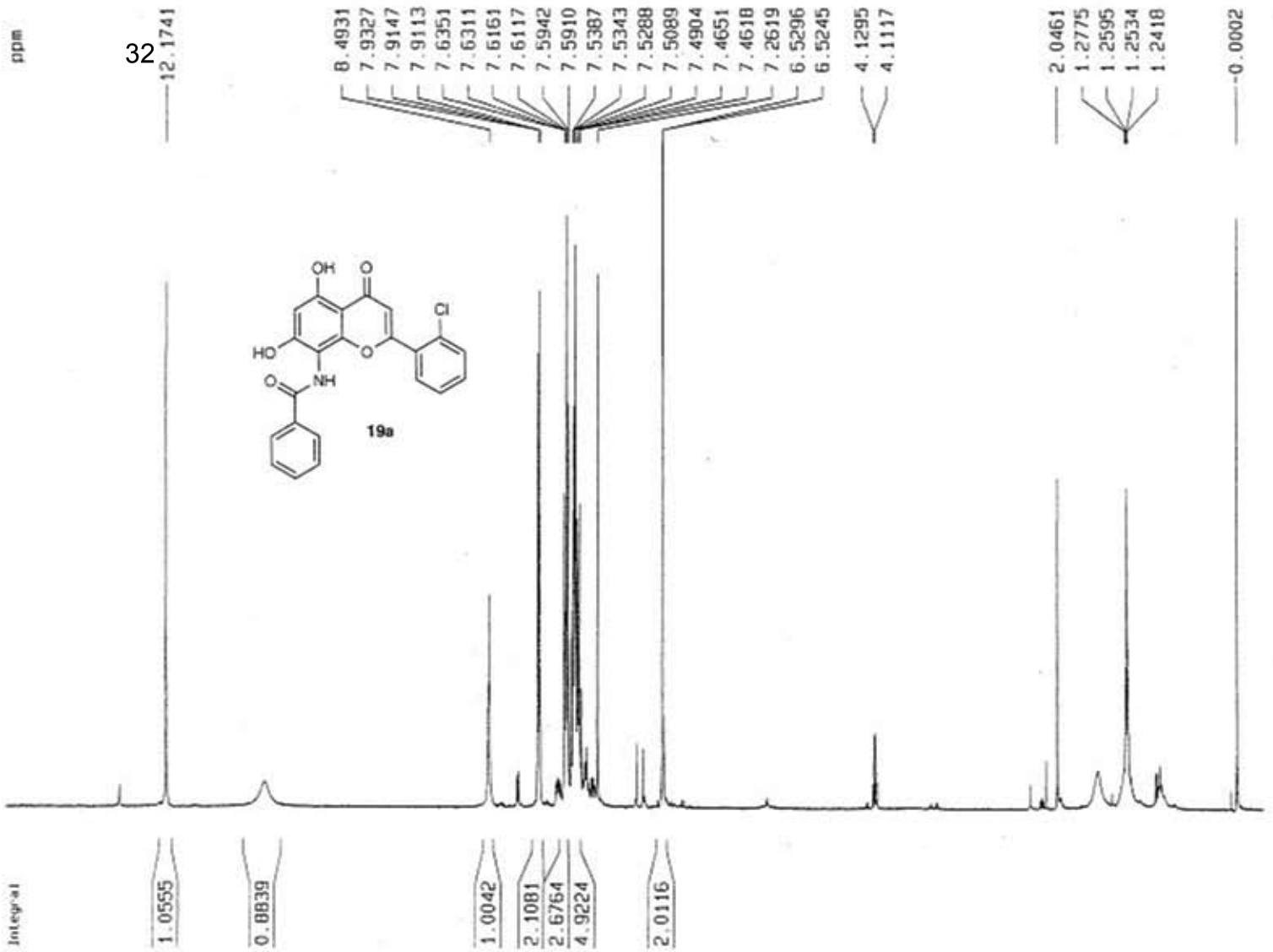
CPDPRG2	waltz16
NUC2	1H
PCPD2	100.00 usec
PL2	0.00 dB
PL12	18.00 dB
PL13	18.00 dB
SFO2	400.1316005 MHz

F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	215.000 ppm
F1	21631.74 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	11.00000 ppm/cm
HZCM	1106.73999 Hz/cm



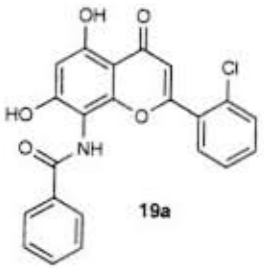

```
Current Data Parameters
NAME          YA-iii-192-1
EXPNO                    1
PROCNO                   1

F2 - Acquisition Parameters
Date_              20021031
Time                 10.49
INSTRUM              spect
PROBHD  5 mm DNP 1H/15
PULPROG              zg30
TD                  32768
SOLVENT              CDCl3
NS                      16
DS                       2
SWH              8012.820 Hz
FIDRES           0.244532 Hz
AQ               2.0447731 sec
RG                   406.4
DW                52.400 usec
DE                 6.00 usec
TE                 300.0 K
D1              1.00000000 sec

======== CHANNEL f1 ========
NUC1                    1H
P1                   8.70 usec
PL1                 -4.00 dB
SFO1          400.1320007 MHz

F2 - Processing parameters
SI                   32768
SF            400.1300087 MHz
WDW                     EM
SSB                      0
LB                    0.30 Hz
GB                       0
PC                    1.00

1D NMR plot parameters
CX                   20.00 cm
CY                    0.00 cm
F1P                  14.000 ppm
F1                 5601.82 Hz
F2P                 -0.300 ppm
F2                 -120.04 Hz
PPMCM                0.71500 ppm/cm
HZCM               286.09296 Hz/cm
```



19a

GE NMR
GE PLUS

YA.192
30OCT80

UH-1H,-ONE

OPERATOR: DVI

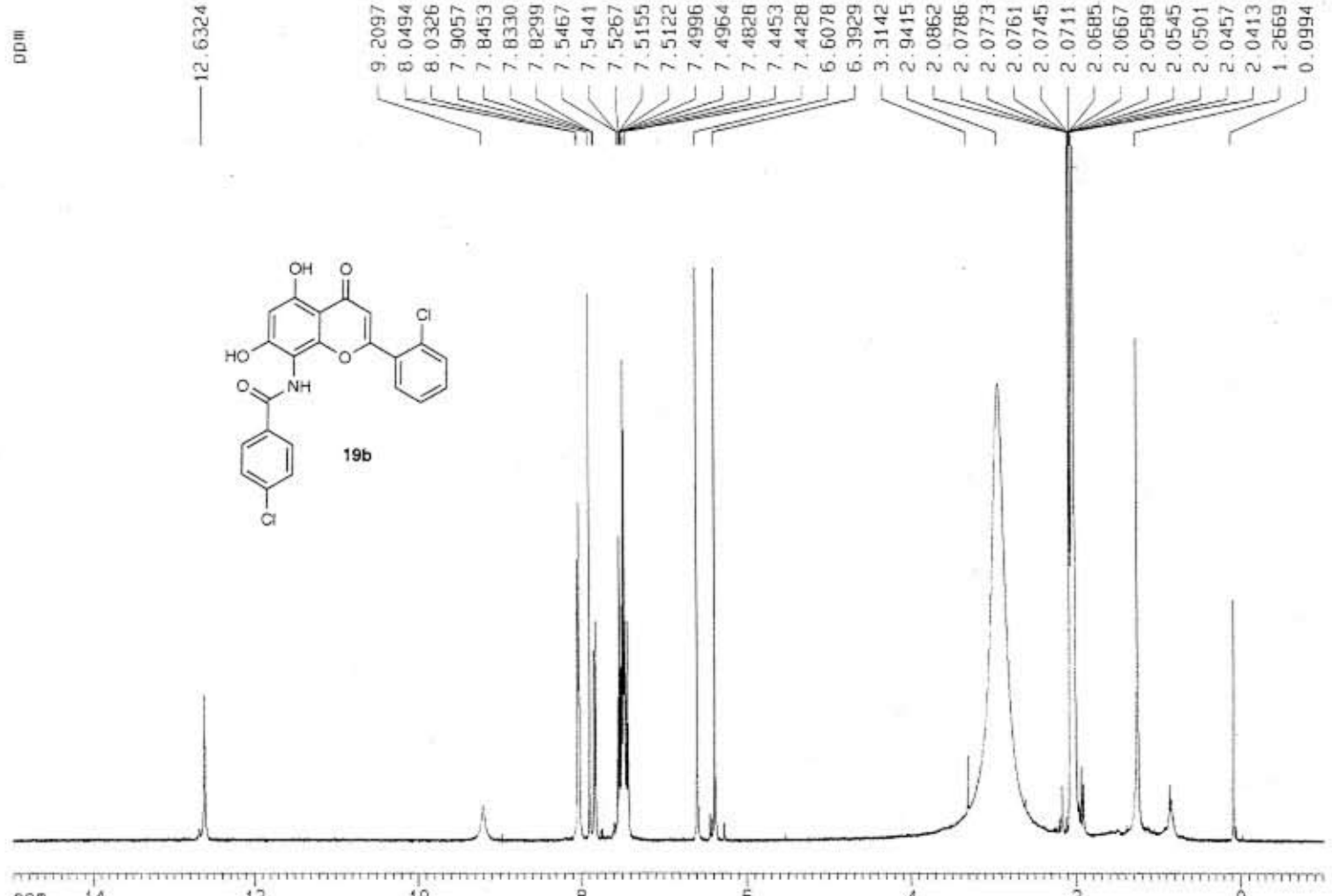
ONE PULSE SEQUENCE

PULSE WIDTH = 4.70 USEC
= 30 DEGREES
ACQ. TIME = 2.72 SEC
RECYCLE TIME = 3.71 SEC

NO. OF ACQS = 8
DATA SIZE = 32768
LINE BROADENG = .00 HZ
SPIN RATE = 11 RPS

OBSERVE:
FREQUENCY = 300.148852 MHZ
SPEC WIDTH= 6024 HZ
GAIN = 45 N1

PLOT SCALE:
109.54 HZ/CM
.3649 PPM/CM
FROM 12.45
TO .04 PPM




```
Current Data Parameters
NAME                  cl_i_149
EXPNO                        1
PROCNO                       1

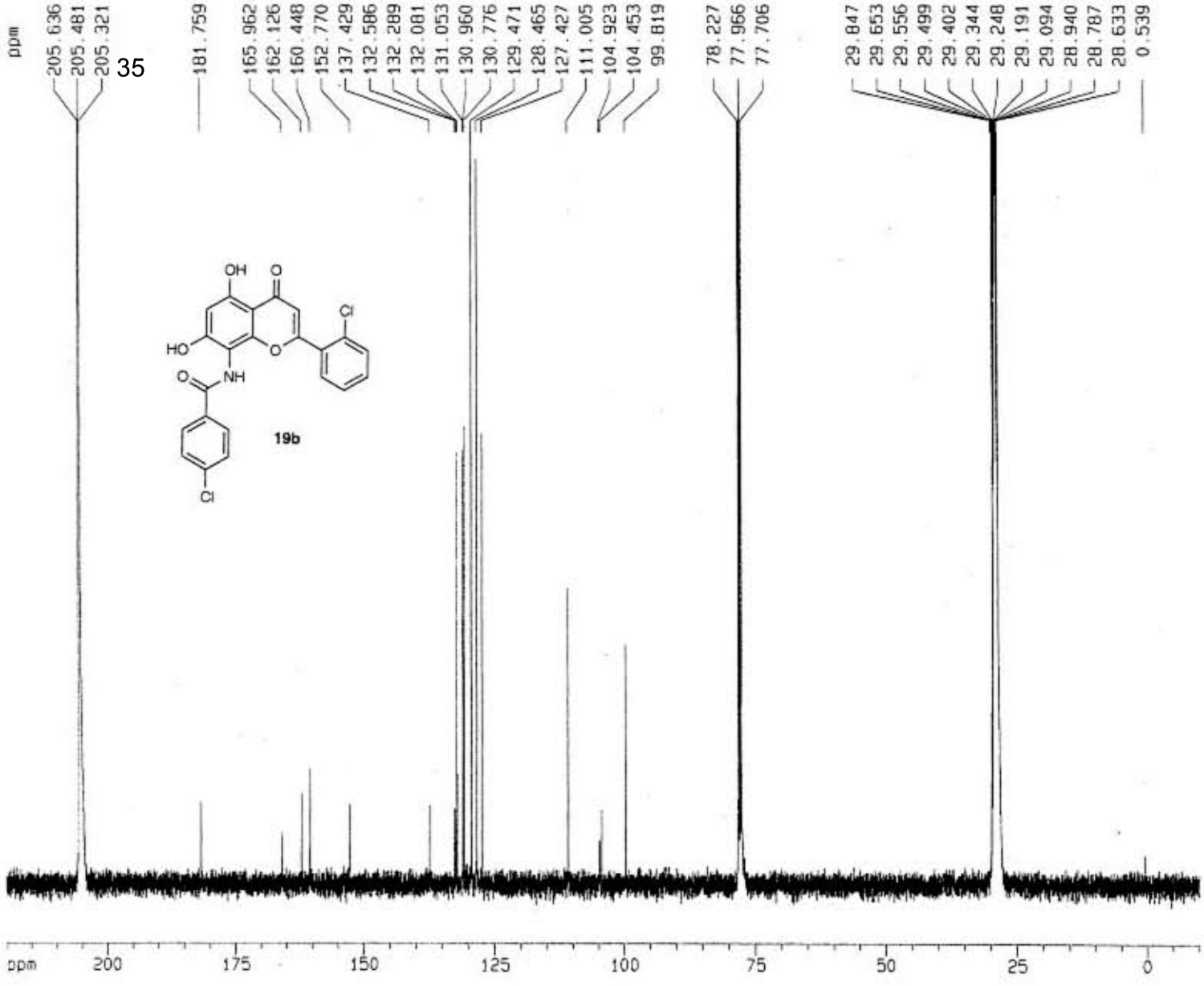
F2 - Acquisition Parameters
Date_               20030515
Time                   17.49
INSTRUM                spect
PROBHD    5 mm BBO BB-1H
PULPROG                 zg30
TD                     32768
SOLVENT                Aceton
NS                         32
DS                          2
SWH                10000.000 Hz
FIDRES                0.305176 Hz
AQ                 1.6385000 sec
RG                        362
DW                    50.000 usec
DE                     6.00 usec
TE                     300.0 K
D1                 0.03000000 sec

======== CHANNEL f1 ========
NUC1                       1H
P1                       7.70 usec
PL1                     -4.00 dB
SFO1               500.1345012 MHz

F2 - Processing parameters
SI                         32768
SF                 500.1300102 MHz
WDW                        EM
SSB                         0
LB                       0.30 Hz
GB                          0
PC                       1.00

F1 - Processing parameters
SI                          1024
MC2                           QF
SF                 500.1300000 MHz
WDW                       QSINE
SSB                         0
LB                       0.30 Hz
GB                          0

1D NMR plot parameters
CX                       20.00 cm
CY                        0.00 cm
F1P                      15.000 ppm
F1                     7501.95 Hz
F2P                     -1.018 ppm
F2                     -509.01 Hz
PPMCM                 0.80089 ppm/cm
HZCM                400.54816 Hz/cm
```



NAME cl_1_149
EXPNO 2
PROCNO 1

F2 - Acquisition Parameters
Date_ 20030513
Time 8.34
INSTRUM spect
PROBHD 5 mm BBO BB-1H
PULPROG zgpg30
TD 65536
SOLVENT Aceton
NS 46255
DS 4
SWH 31446.541 Hz
FIDRES 0.479836 Hz
AQ 1.0420683 sec
RG 2048
DW 15.900 usec
DE 6.00 usec
TE 300.0 K
D1 0.10000000 sec
d11 0.03000000 sec
d12 0.00002000 sec

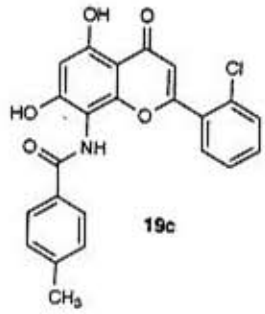
======== CHANNEL f1 ========
NUC1 13C
P1 10.00 usec
PL1 5.00 dB
SFO1 125.7719472 MHz

======== CHANNEL f2 ========
CPDPRG2 waltz16
NUC2 1H
PCPD2 95.00 usec
PL2 -4.00 dB
PL12 19.00 dB
PL13 30.00 dB
SFO2 500.1325000 MHz

F2 - Processing parameters
SI 65536
SF 125.7578008 MHz
WDW EM
SSB 0
LB 1.00 Hz
GB 0
PC 1.40

F1 - Processing parameters
SI 1024
MC2 QF
SF 500.1300000 MHz
WDW no
SSB 0
LB 0.30 Hz
GB 0

1D NMR plot parameters
CX 20.00 cm
CY 0.00 cm
F1P 220.000 ppm
F1 27665.71 Hz
F2P -10.000 ppm
F2 -1257.58 Hz
PPMCM 11.50000 ppm/cm
HZCM 1446.21472 Hz/cm



19c

GE NMR
QE PLUS

LN.001
05MAY80

TRIANTOE

OPERATOR: SAN

ONE PULSE SEQUENCE

PULSE WIDTH = 4.70 USEC
= 30 DEGREES
ACQ. TIME = 2.72 SEC
RECYCLE TIME = 3.71 SEC

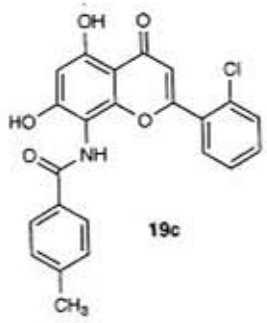
NO. OF ACQS. = 8
DATA SIZE = 32768
LINE BROADENG = .29 HZ
SPIN RATE = 16 RPS

OBSERVE:
FREQUENCY = 300.148852 MHZ
SPEC WIDTH = 6024 HZ
GAIN = 54 XI

PLOT SCALE:
186.24 HZ/CM
.4206 PPM/CM
FROM 14.00
TO -.28 PPM

0.81 0.91 0.45 0.46 3.45 1.19 0.82 1.43 1.97 1.39 0.88

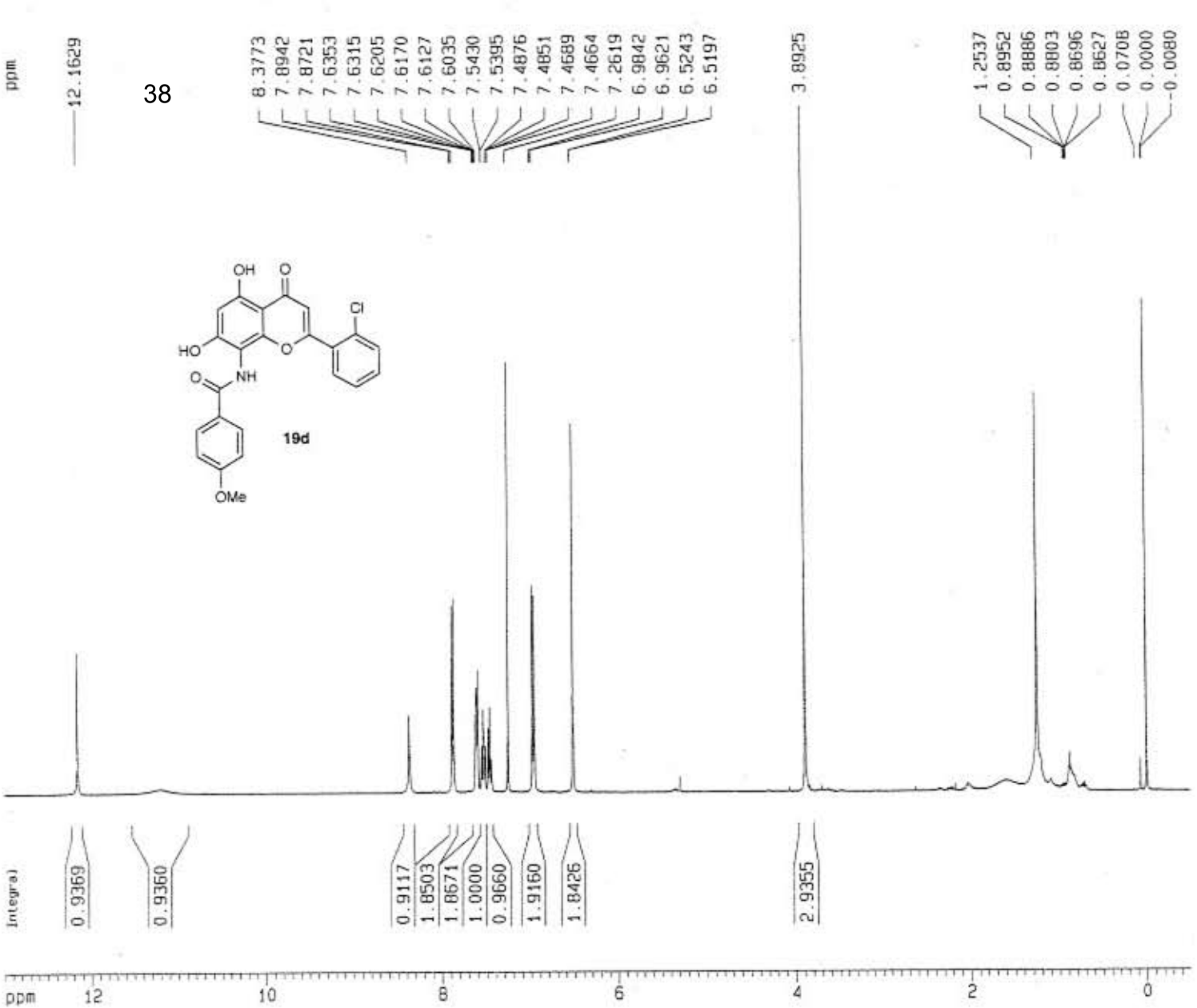
14 12 10 8 6 4 2 0 PPM



19c

GE NMR
QE PLUS

LN.002
02MAY80



Comment Data Parameters

NAME	Methoxy amide
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20021101
Time	19.00
INSTRUM	spect
PROBHD	5 mm QNP 1H/15
PULPROG	zg30
TD	65536
SOLVENT	CDCl3
NS	32
DS	2
SWH	8278.146 Hz
FIDRES	0.126314 Hz
AQ	3.9584243 sec
RG	456.1
DW	60.400 usec
DE	6.00 usec
TE	300.0 K
D1	1.00000000 sec

======== CHANNEL f1 ========

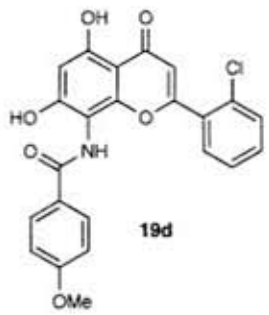
NUC1	1H
P1	8.70 usec
PL1	-4.00 dB
SFO1	400.1324710 MHz

F2 - Processing parameters

SI	32768
SF	400.1300085 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

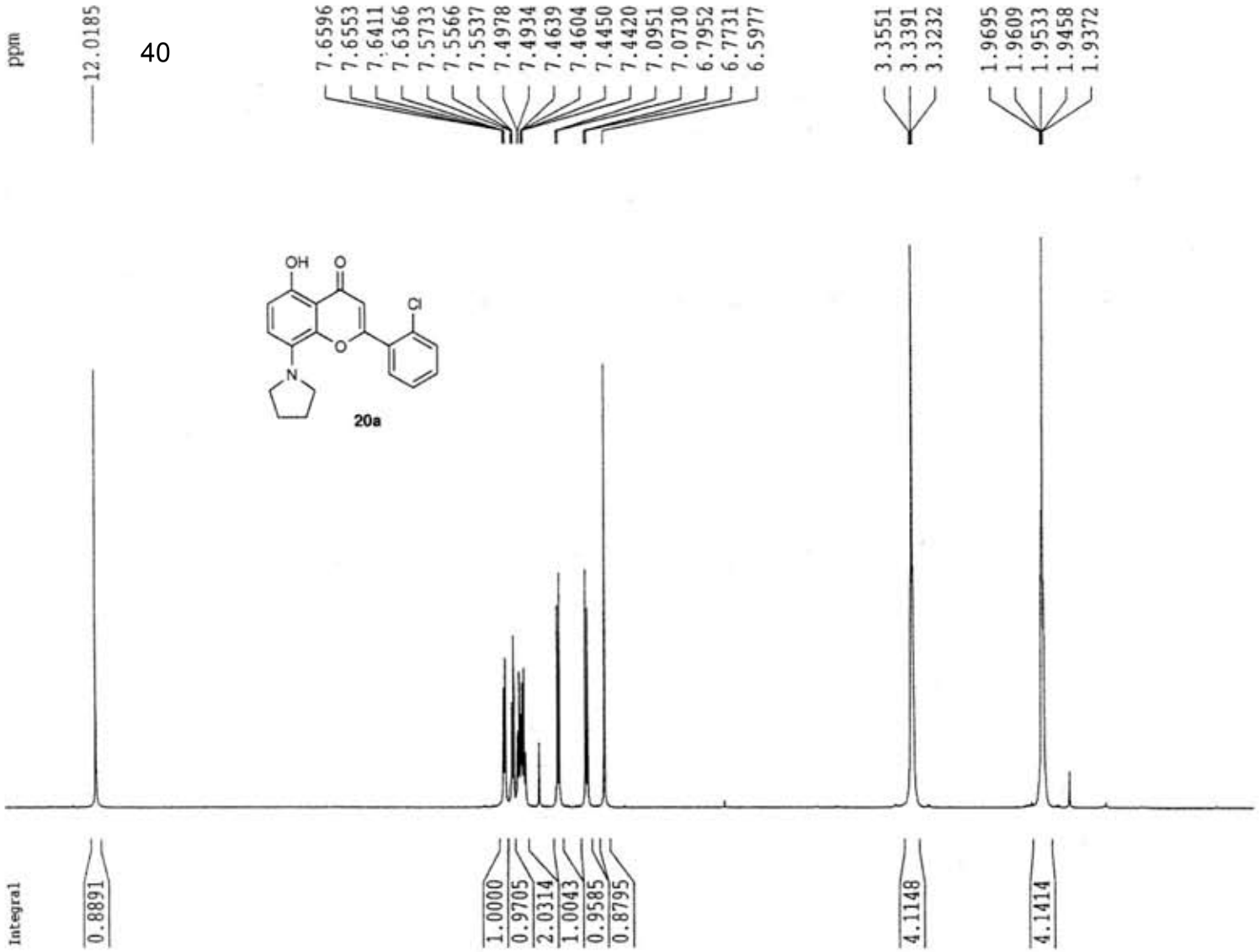
1D NMR plot parameters

CX	20.00 cm
CY	14.48 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.500 ppm
F2	-200.06 Hz
PPMCM	0.67500 ppm/cm
HZCM	270.08777 Hz/cm


OH
O
Cl
HO
O
NH
O
OMe

19d

GE NMR
QE PLUS
LN.002
09APR80
200
180
160
140
120
100
80
60
40
20
0
PPM



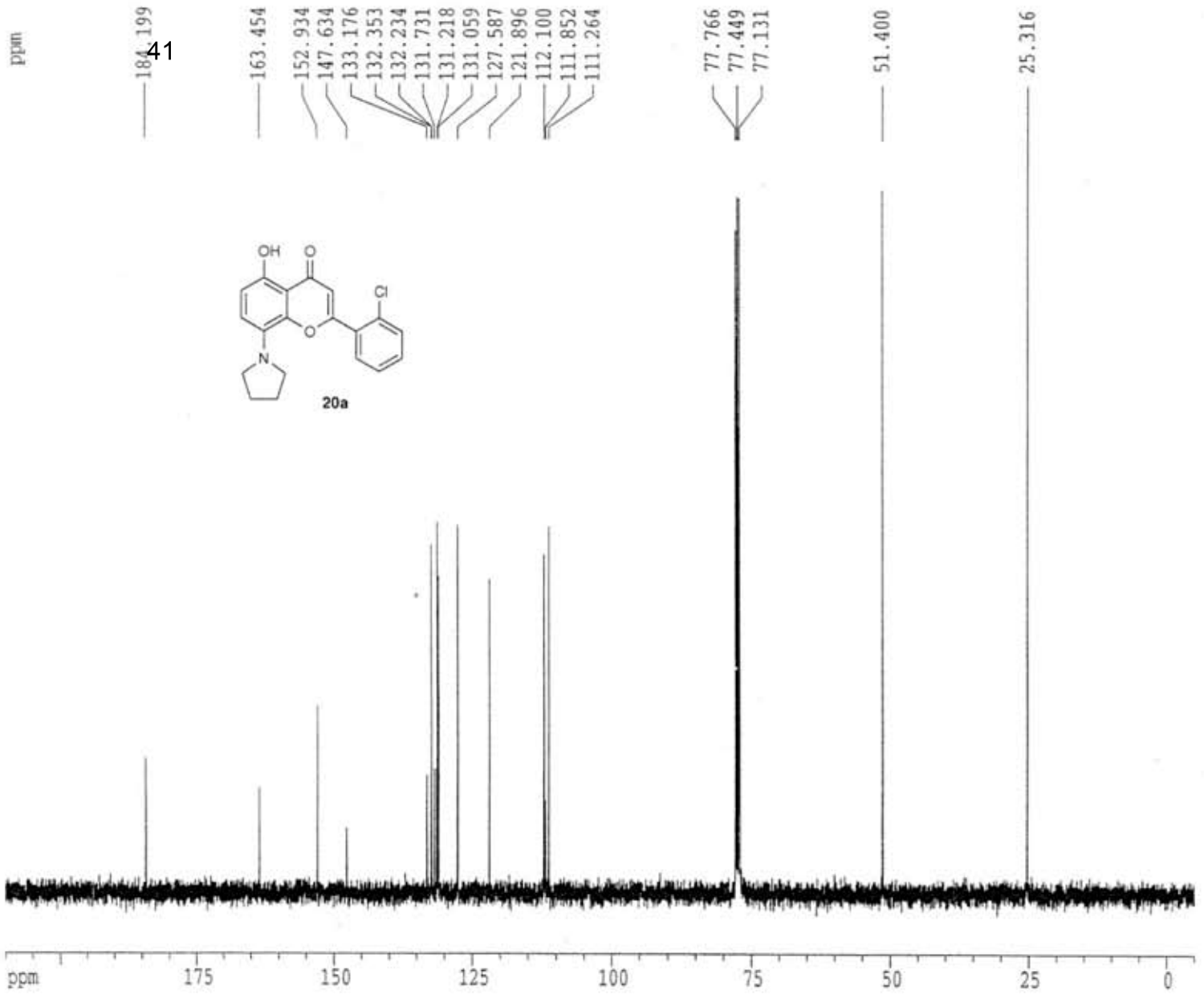

```
Current Data Parameters
NAME          YA-ii-179-1
EXPNO                   1
PROCNO                  1

F2 - Acquisition Parameters
Date_          20010307
Time              11.16
INSTRUM          drx400
PROBHD     5 mm Multinu
PULPROG           zg30
TD               32768
SOLVENT          CDCl3
NS                  16
DS                   2
SWH           8012.820 Hz
FIDRES        0.244532 Hz
AQ            2.0447731 sec
RG              228.1
DW             62.400 usec
DE              4.50 usec
TE              300.0 K
D1            1.00000000 sec

============ CHANNEL f1 ============
NUC1                1H
P1               7.70 usec
PL1             -6.00 dB
SFO1        400.1320007 MHz

F2 - Processing parameters
SI                 16384
SF          400.1300000 MHz
WDW                EM
SSB                 0
LB              0.30 Hz
GB                  0
PC               1.00

1D NMR plot parameters
CX              20.00 cm
F1P             13.000 ppm
F1             5201.69 Hz
F2P             -0.300 ppm
F2             -120.04 Hz
PPMCM          0.66500 ppm/cm
HZCM          266.08646 Hz/cm
```




```
Current Data Parameters
NAME        YA-ii-179-1C
EXPNO               1
PROCNO              1

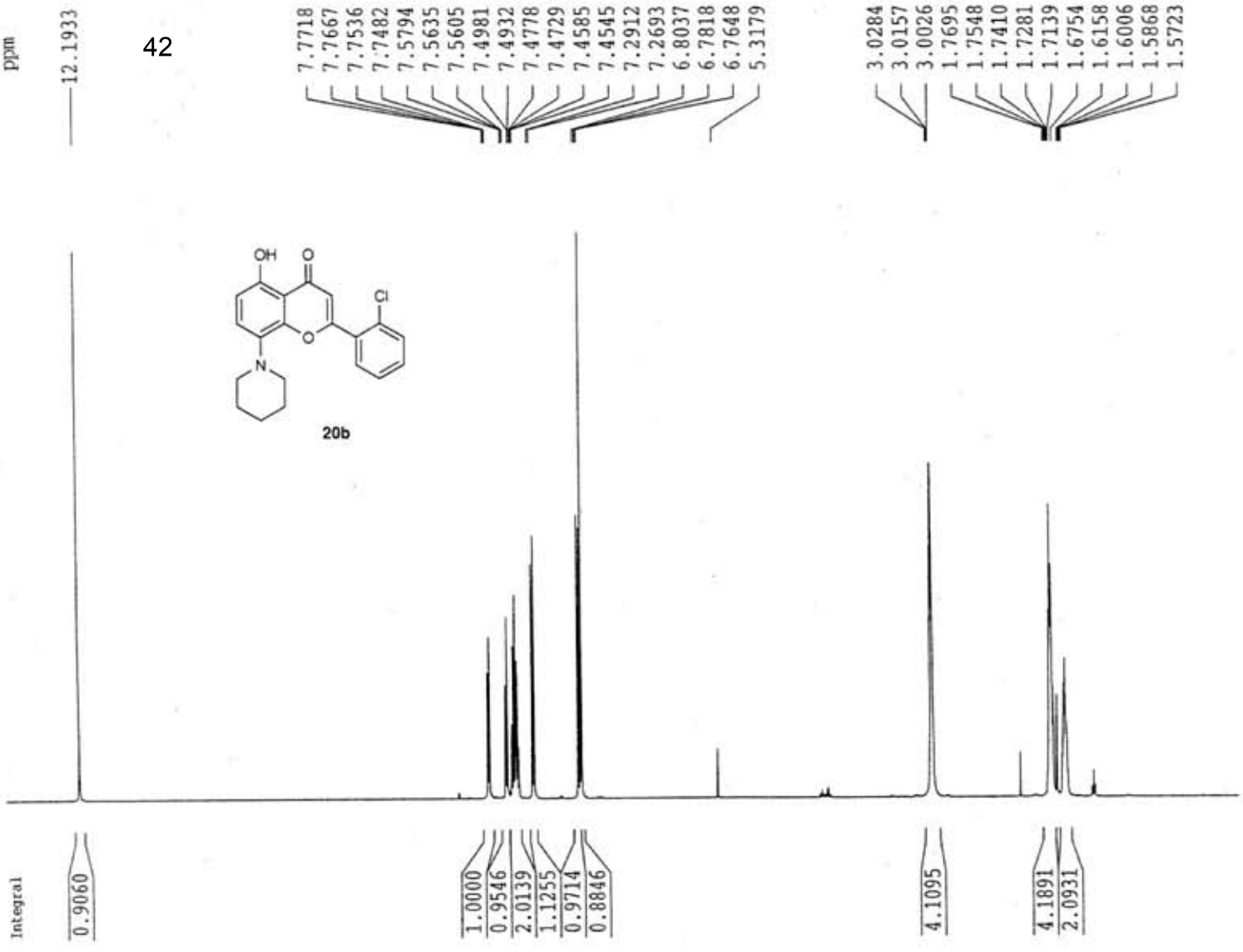
F2 - Acquisition Parameters
Date_          20010307
Time              11.19
INSTRUM          drx400
PROBHD     5 mm Multinu
PULPROG          zgpg30
TD                65536
SOLVENT           CDCl3
NS                  485
DS                    2
SWH           23148.148 Hz
FIDRES         0.353213 Hz
AQ             1.4156276 sec
RG                 1024
DW                21.600 usec
DE                 4.50 usec
TE                300.0 K
D1            0.05000000 sec
d11           0.03000000 sec
d12           0.00002000 sec

========== CHANNEL f1 ============
NUC1               13C
P1                12.30 usec
PL1                2.00 dB
SFO1         100.6232933 MHz

========== CHANNEL f2 ============
CPDPRG2         waltz16
NUC2                1H
PCPD2             100.00 usec
PL2                0.00 dB
PL12              18.00 dB
PL13              18.00 dB
SFO2         400.1316005 MHz

F2 - Processing parameters
SI                 32768
SF           100.6127290 MHz
WDW                EM
SSB                0
LB                 1.00 Hz
GB                 0
PC                 1.40

1D NMR plot parameters
CX                20.00 cm
F1P              210.000 ppm
F1             21128.67 Hz
F2P               -5.000 ppm
F2              -503.06 Hz
PPMCM           10.75000 ppm/cm
HZCM          1081.58691 Hz/cm
```



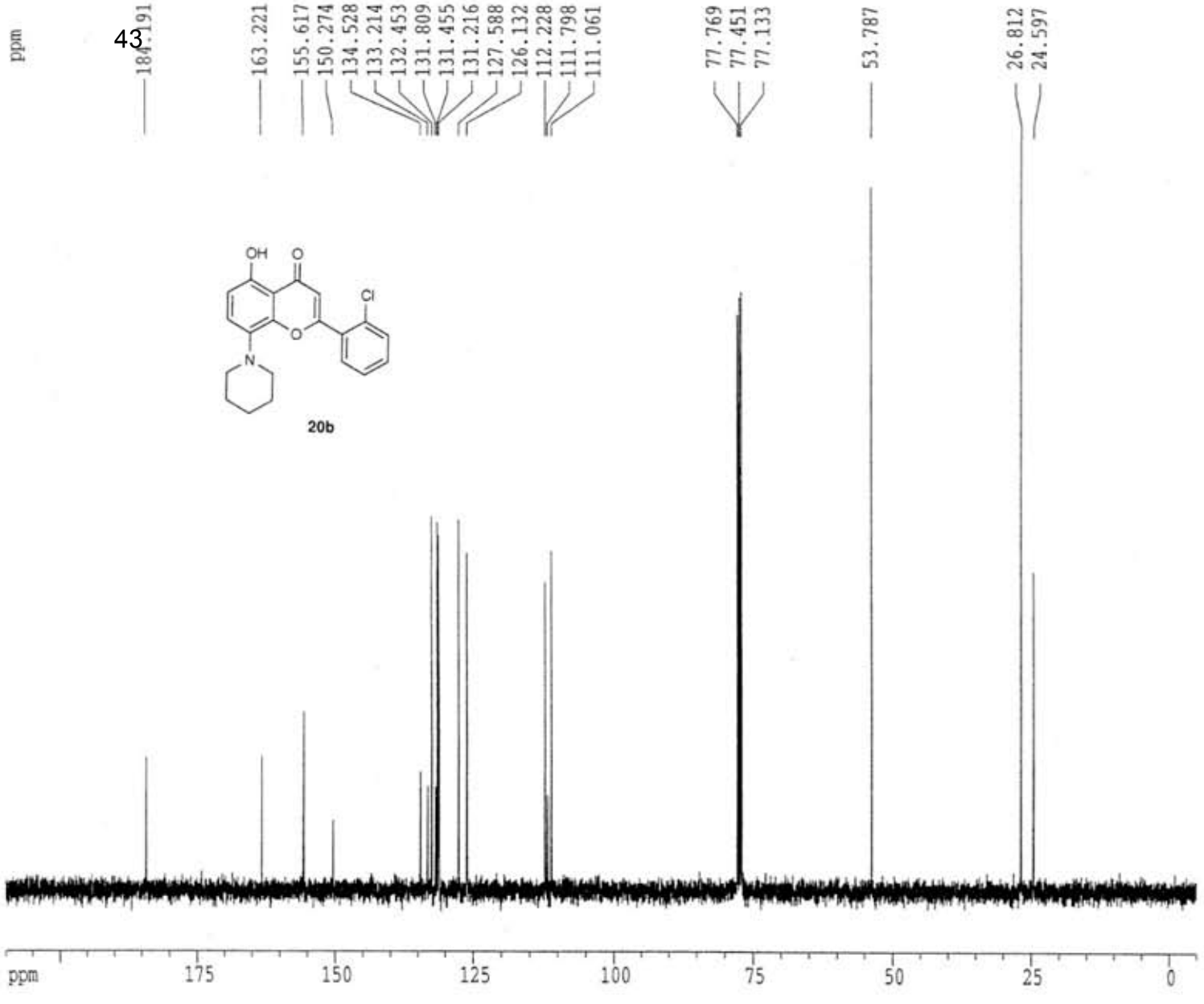

```
Current Data Parameters
NAME          YA-ii-180-1
EXPNO                   1
PROCNO                  1

F2 - Acquisition Parameters
Date_          20010307
Time              17.11
INSTRUM           drx400
PROBHD     5 mm Multinu
PULPROG             zg30
TD                 32768
SOLVENT            CDCl3
NS                    16
DS                     2
SWH            8012.820 Hz
FIDRES         0.244532 Hz
AQ             2.0447731 sec
RG                228.1
DW                62.400 usec
DE                 4.50 usec
TE                300.0 K
D1             1.00000000 sec

============ CHANNEL f1 ============
NUC1                   1H
P1                   7.70 usec
PL1                 -6.00 dB
SFO1          400.1320007 MHz

F2 - Processing parameters
SI                 16384
SF            400.1300000 MHz
WDW                   EM
SSB                    0
LB                  0.30 Hz
GB                     0
PC                  1.00

1D NMR plot parameters
CX                 20.00 cm
F1P                13.000 ppm
F1               5201.69 Hz
F2P                -0.300 ppm
F2               -120.04 Hz
PPMCM            0.66500 ppm/cm
HZCM           266.08646 Hz/cm
```



Current Data Parameters

NAME	YA-ii-180-1C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20010307
Time	17.14
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	289
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	4096
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
D1	0.05000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	12.30 usec
PL1	2.00 dB
SFO1	100.6232933 MHz

========== CHANNEL f2 ==========

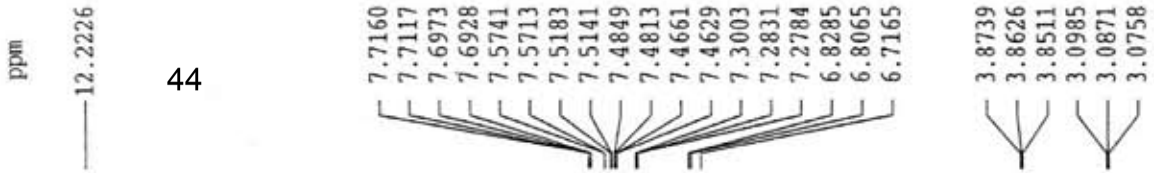
CPDPRG2	waltz16
NUC2	1H
PCPD2	100.00 usec
PL2	0.00 dB
PL12	18.00 dB
PL13	18.00 dB
SFO2	400.1316005 MHz

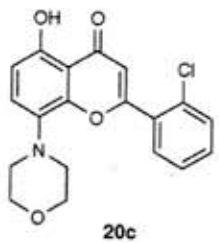
F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

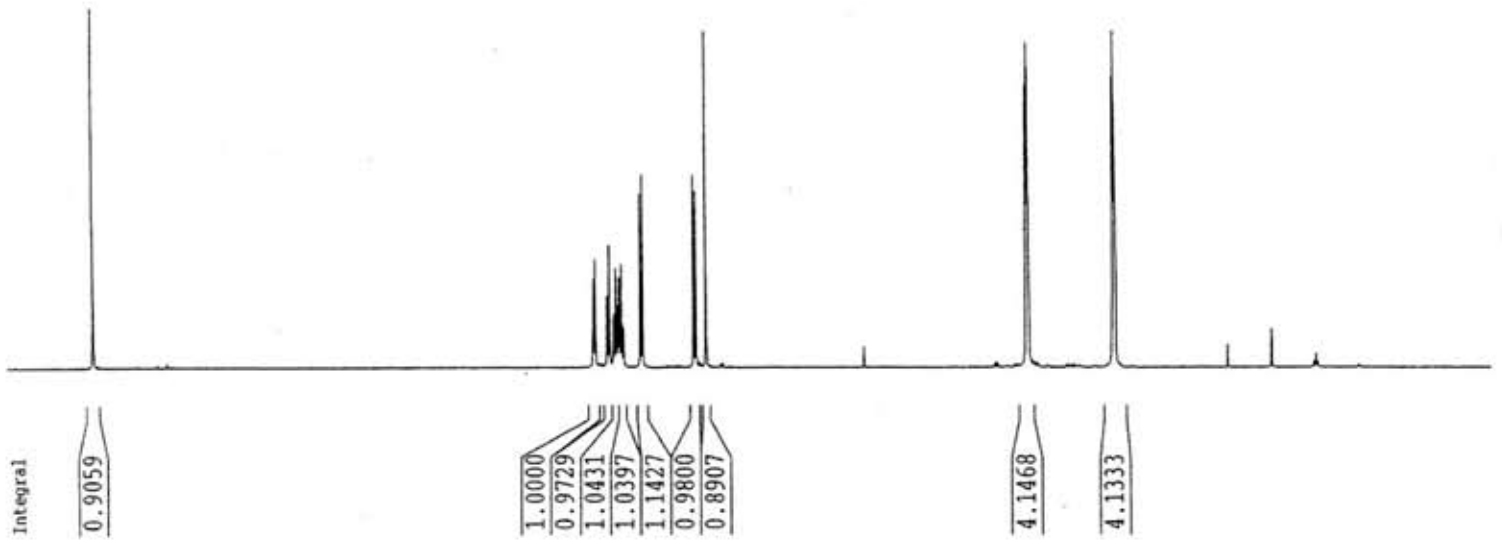
1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.67 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58691 Hz/cm





20c



Current Data Parameters
NAME YA-ii-~~176~~ 1
EXPNO ~~177~~ 1
PROCNO 1

F2 - Acquisition Parameters

Date_	20010305
Time	16.30
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	228.1
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

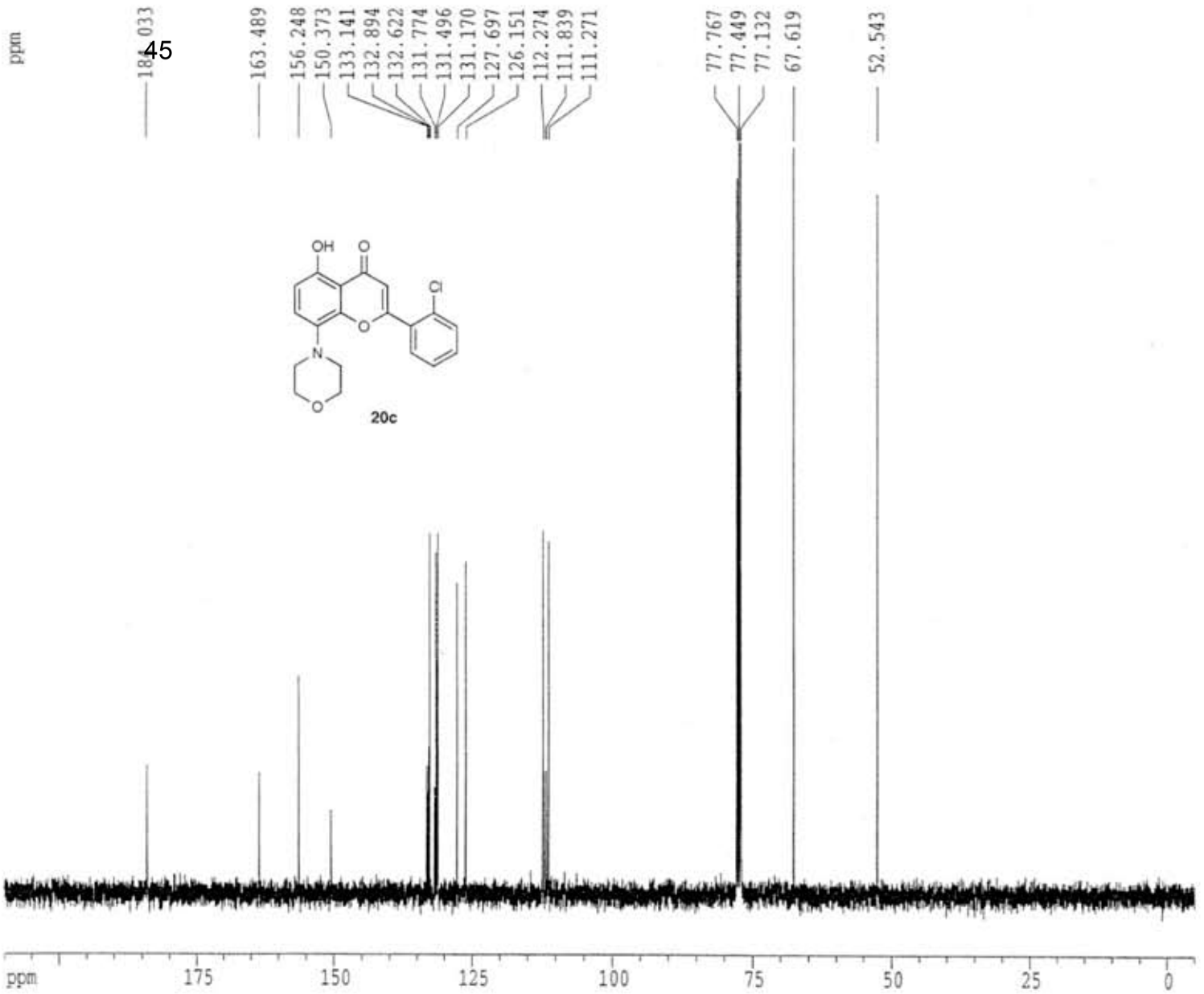
NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-ii-176-1C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20010305
Time	16.35
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	355
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	1024
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
D1	0.05000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	12.30 usec
PL1	2.00 dB
SFO1	100.6232933 MHz

========== CHANNEL f2 ==========

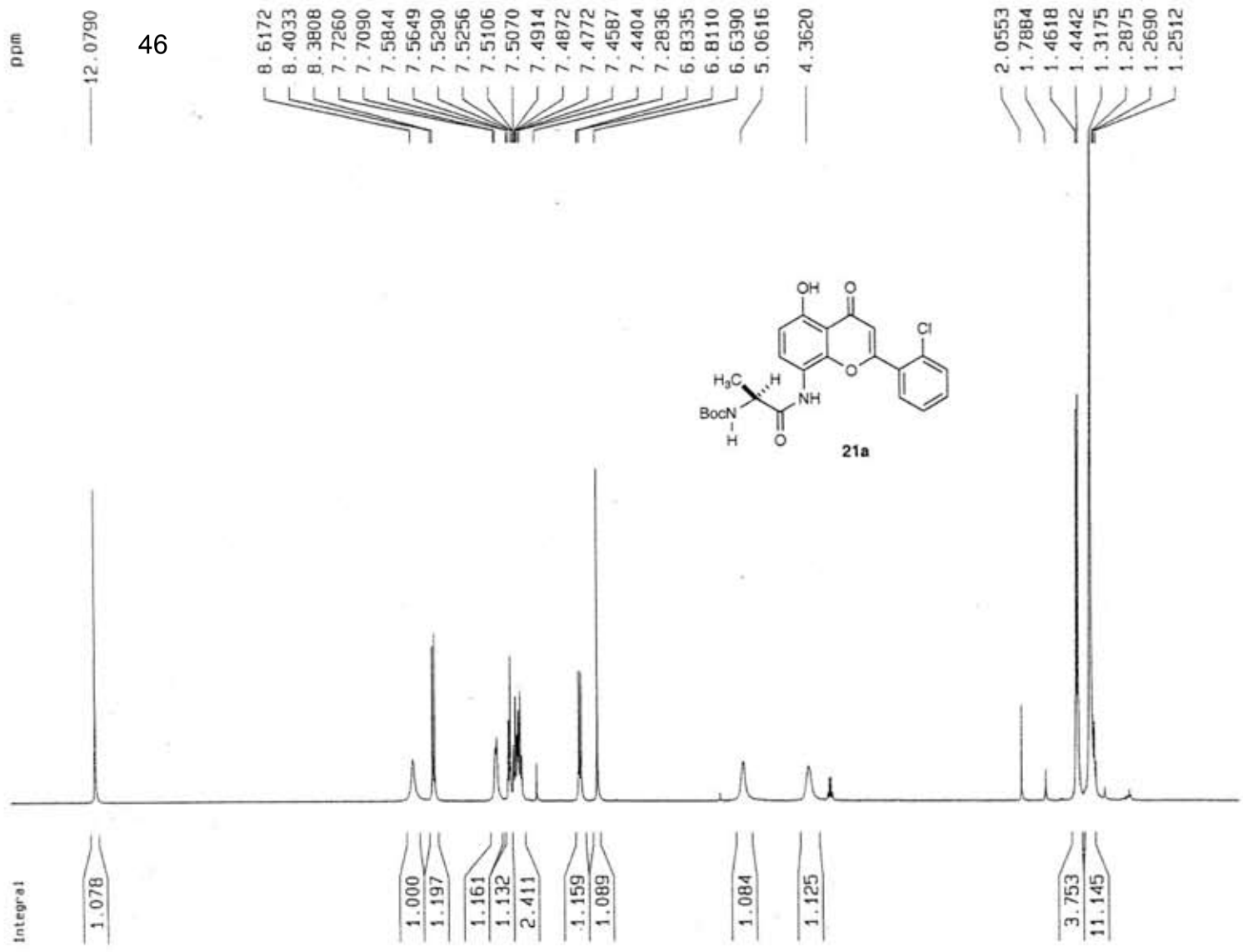
CPDPRG2	waltz16
NUC2	1H
PCPD2	100.00 usec
PL2	0.00 dB
PL12	18.00 dB
PL13	18.00 dB
SFO2	400.1316005 MHz

F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.67 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58691 Hz/cm



Current Data Parameters

NAME	YA-ii-171-1H
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

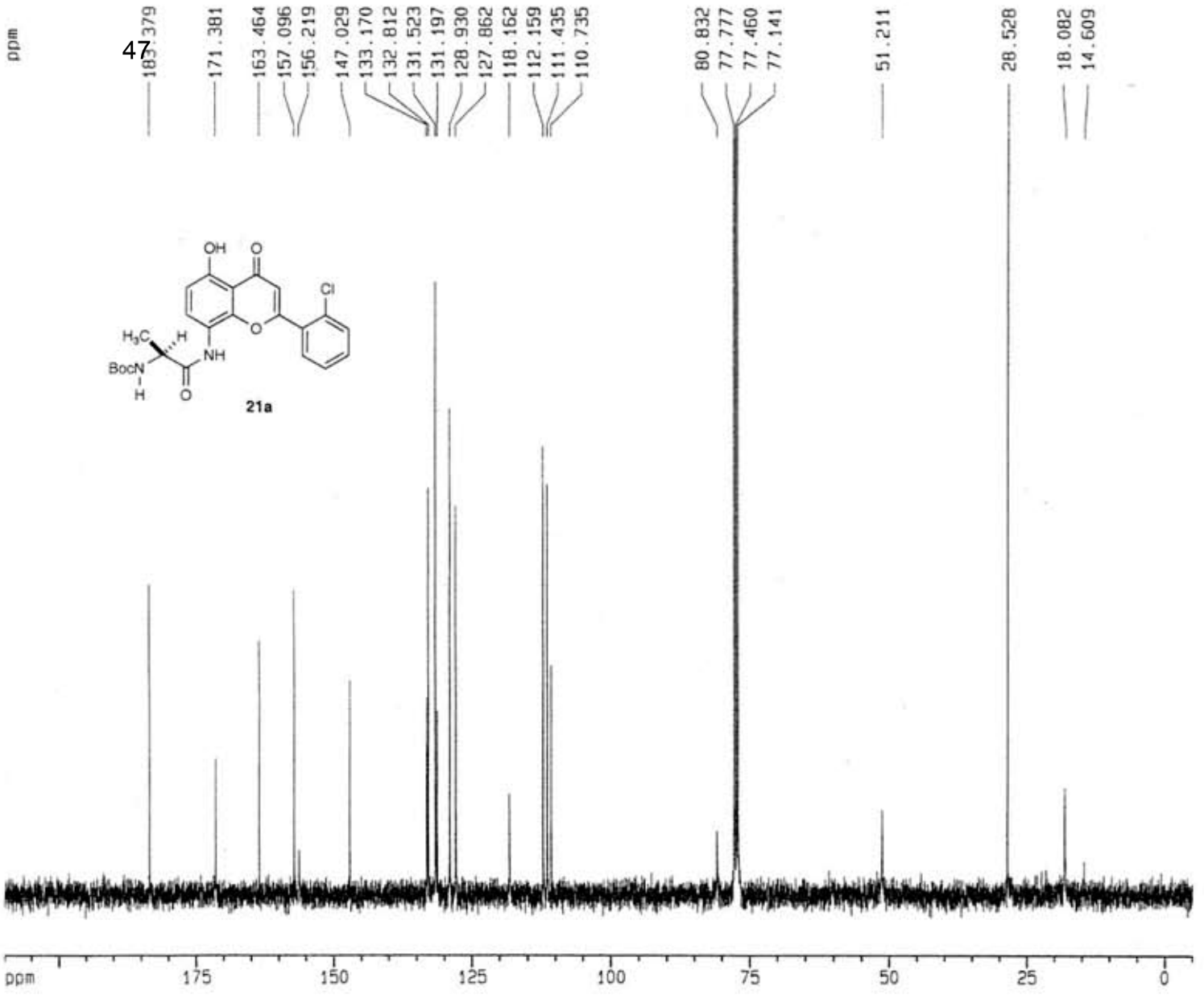
Date_	1010227
Time	15.27
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	6012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	161.3
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec
P1	7.70 usec
DE	4.50 usec
SFO1	400.1320007 MHz
NUC1	1H
PL1	-6.00 dB

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-ii-171-1C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

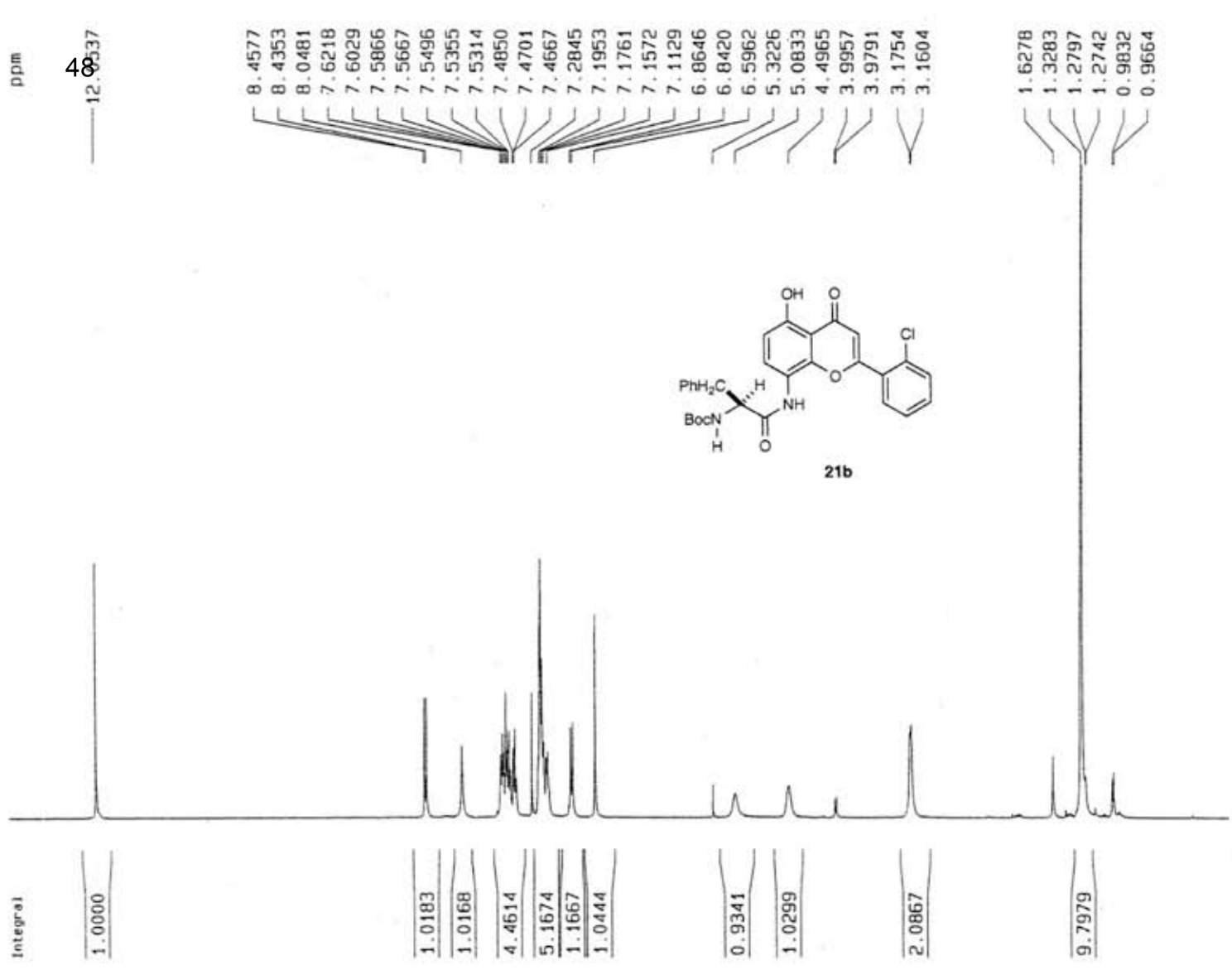
Date_	1010227
Time	15.32
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	854
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	1024
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
d11	0.0300000 sec
d12	0.0000200 sec
PL13	18.00 dB
D1	0.05000000 sec
CPDPRG2	waltz16
PCPD2	100.00 usec
SFO2	400.1316005 MHz
NUC2	1H
PL2	0.00 dB
PL12	18.00 dB
P1	12.30 usec
DE	4.50 usec
SFO1	100.6232933 MHz
NUC1	13C
PL1	2.00 dB

F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.67 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58691 Hz/cm



Current Data Parameters

NAME	YA-ii-164-1H
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

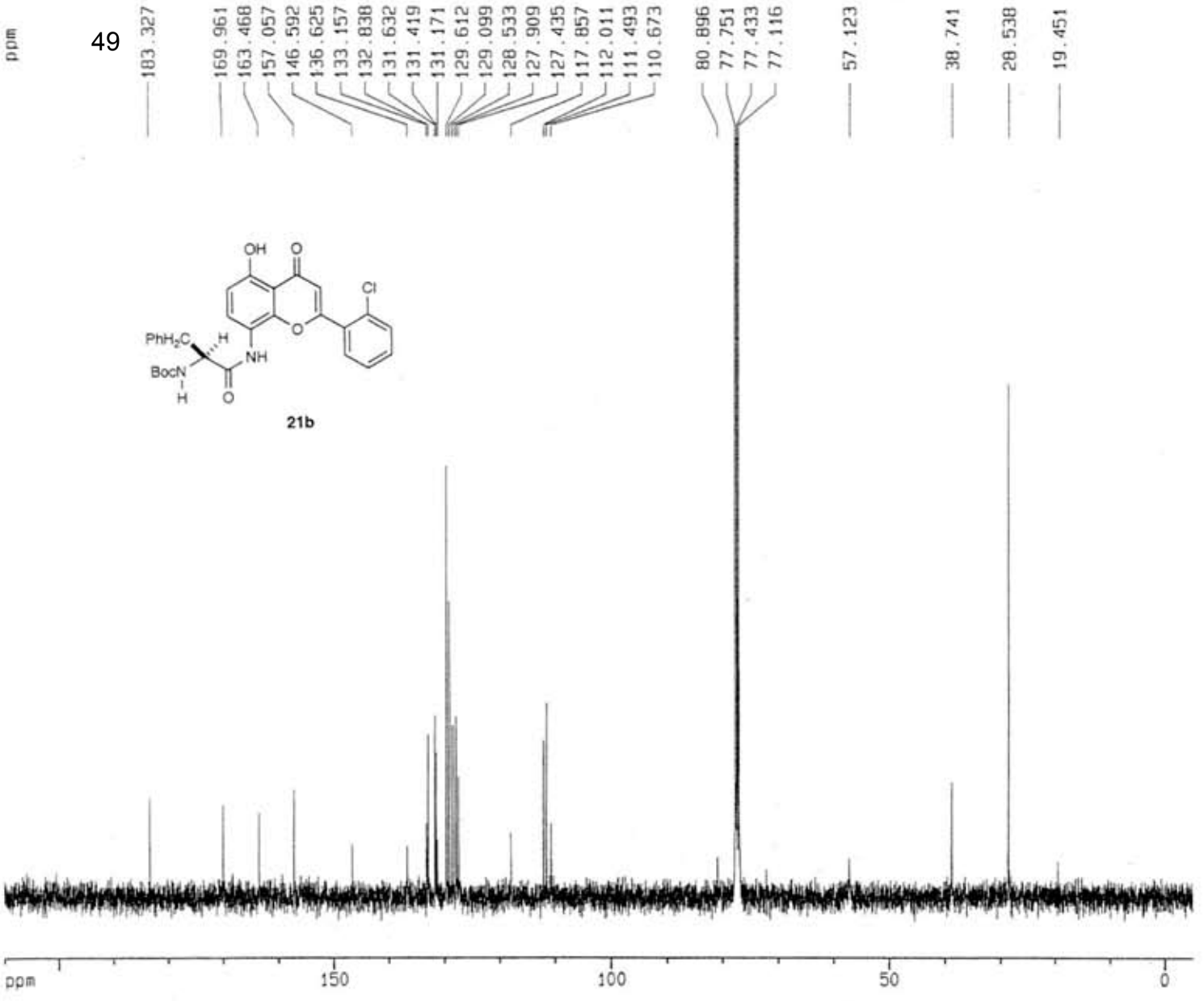
Date_	1010219
Time	17.59
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	456.1
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec
P1	7.70 usec
DE	4.50 usec
SFO1	400.1320007 MHz
NUC1	1H
PL1	-6.00 dB

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm




```
Current Data Parameters
NAME          YA-ii-164-1C
EXPNO                    1
PROCNO                   1

F2 - Acquisition Parameters
Date_              101021 9
Time                 18.03
INSTRUM            drx400
PROBHD     5 mm Multinu
PULPROG            zgpg30
TD                  65536
SOLVENT             CDCl3
NS                   1895
DS                      2
SWH           23148.148 Hz
FIDRES        0.353213 Hz
AQ            1.4156276 sec
RG                   1024
DW                21.600 usec
DE                 4.50 usec
TE                300.0 K
d11           0.0300000 sec
d12           0.0000200 sec
PL13              18.00 dB
D1            0.05000000 sec
CPDPRG2           waltz16
PCPD2             100.00 usec
SFO2          400.1316005 MHz
NUC2                 1H
PL2                0.00 dB
PL12              18.00 dB
P1                12.30 usec
DE                 4.50 usec
SFO1          100.6232933 MHz
NUC1                 13C
PL1                2.00 dB

F2 - Processing parameters
SI                   32768
SF            100.6127290 MHz
WDW                  EM
SSB                   0
LB                 1.00 Hz
GB                    0
PC                 1.40

1D NMR plot parameters
CX                20.00 cm
F1P              210.000 ppm
F1             21128.67 Hz
F2P               -5.000 ppm
F2              -503.06 Hz
PPMCM          10.75000 ppm/cm
HZCM           1081.58691 Hz/cm
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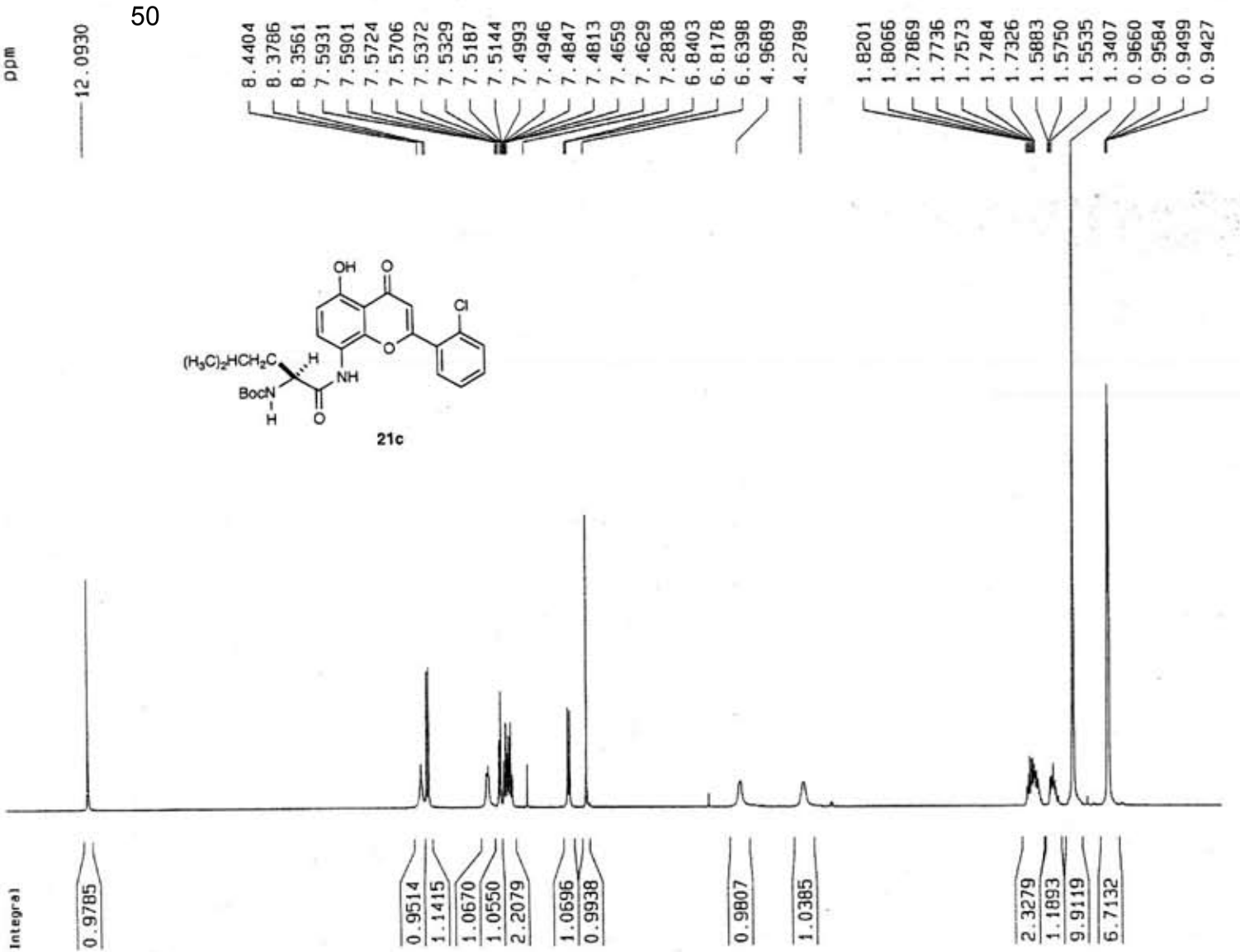


Current Data Parameters

NAME	YA-ii-165-1H
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

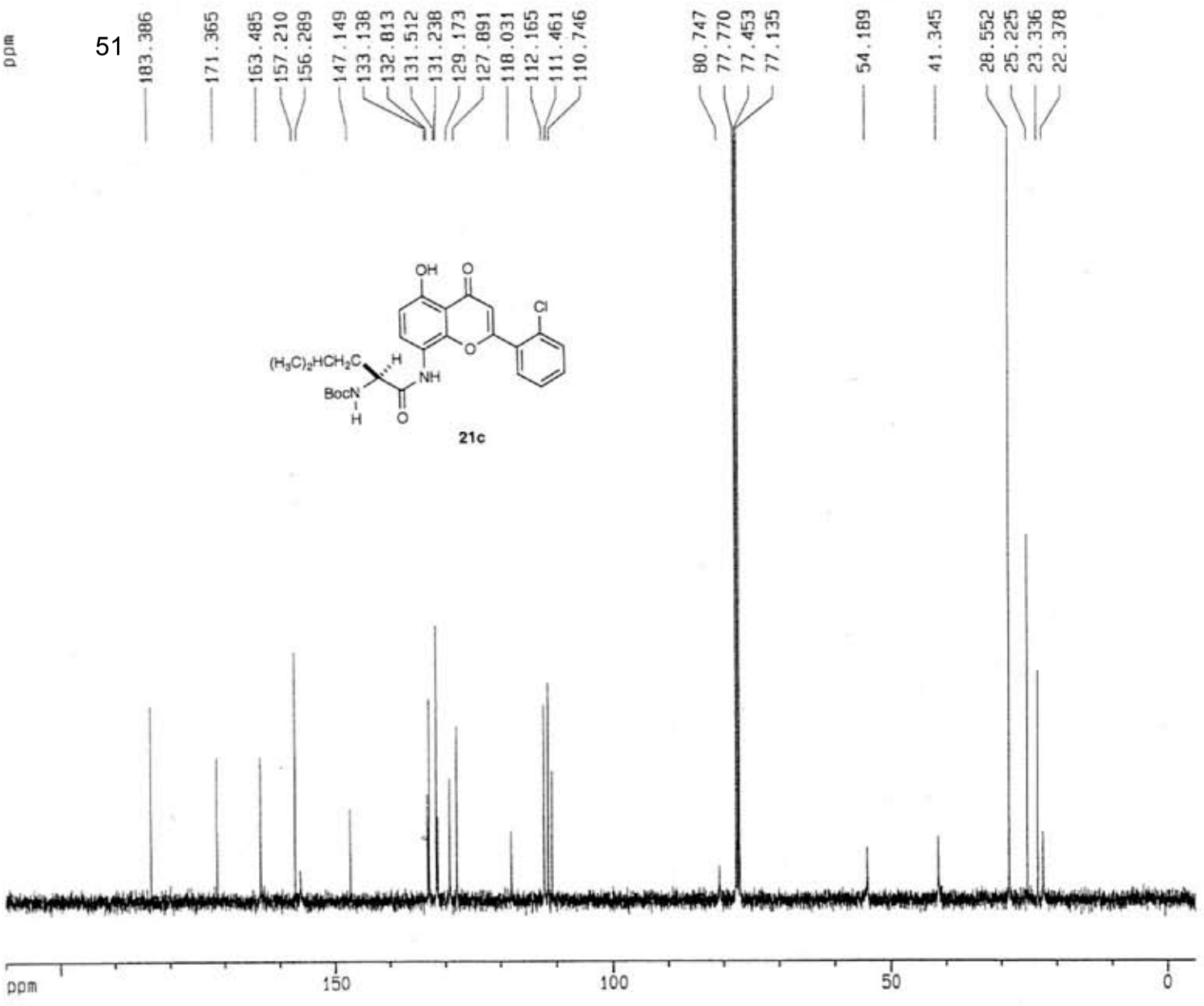
Date_	1010220
Time	11.17
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	114
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec
P1	7.70 usec
DE	4.50 usec
SFO1	400.1320007 MHz
NUC1	1H
PL1	-6.00 dB

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-ii-165-1C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

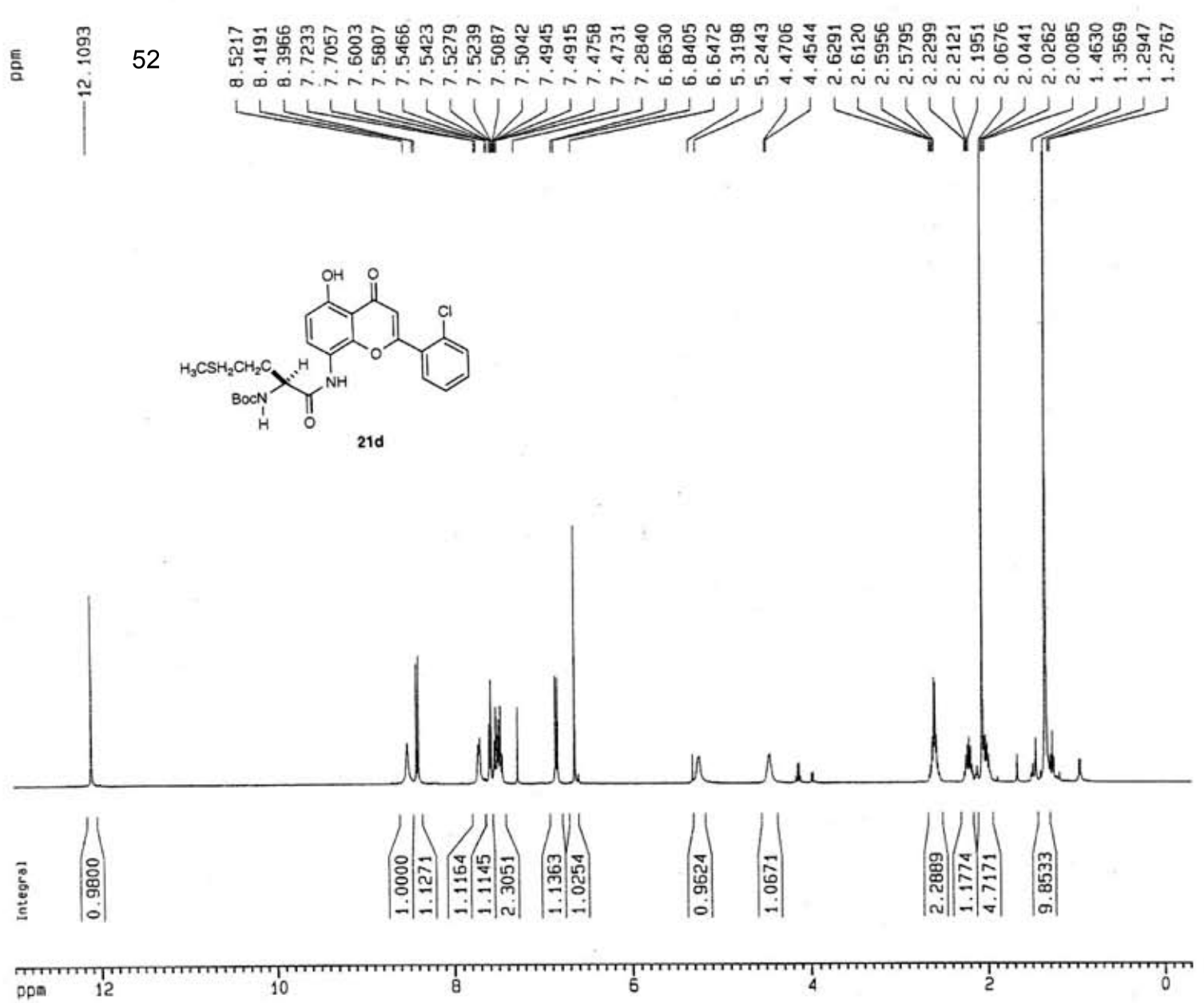
Date_	1010220
Time	11.22
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	877
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	1024
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
d11	0.0300000 sec
d12	0.0000200 sec
PL13	18.00 dB
D1	0.05000000 sec
CPDPRG2	waltz16
PCPD2	100.00 usec
SFO2	400.1316005 MHz
NUC2	1H
PL2	0.00 dB
PL12	18.00 dB
P1	12.30 usec
DE	4.50 usec
SFO1	100.6232933 MHz
NUC1	13C
PL1	2.00 dB

F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.67 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58691 Hz/cm



Current Data Parameters

NAME	YA-ii-188-2
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

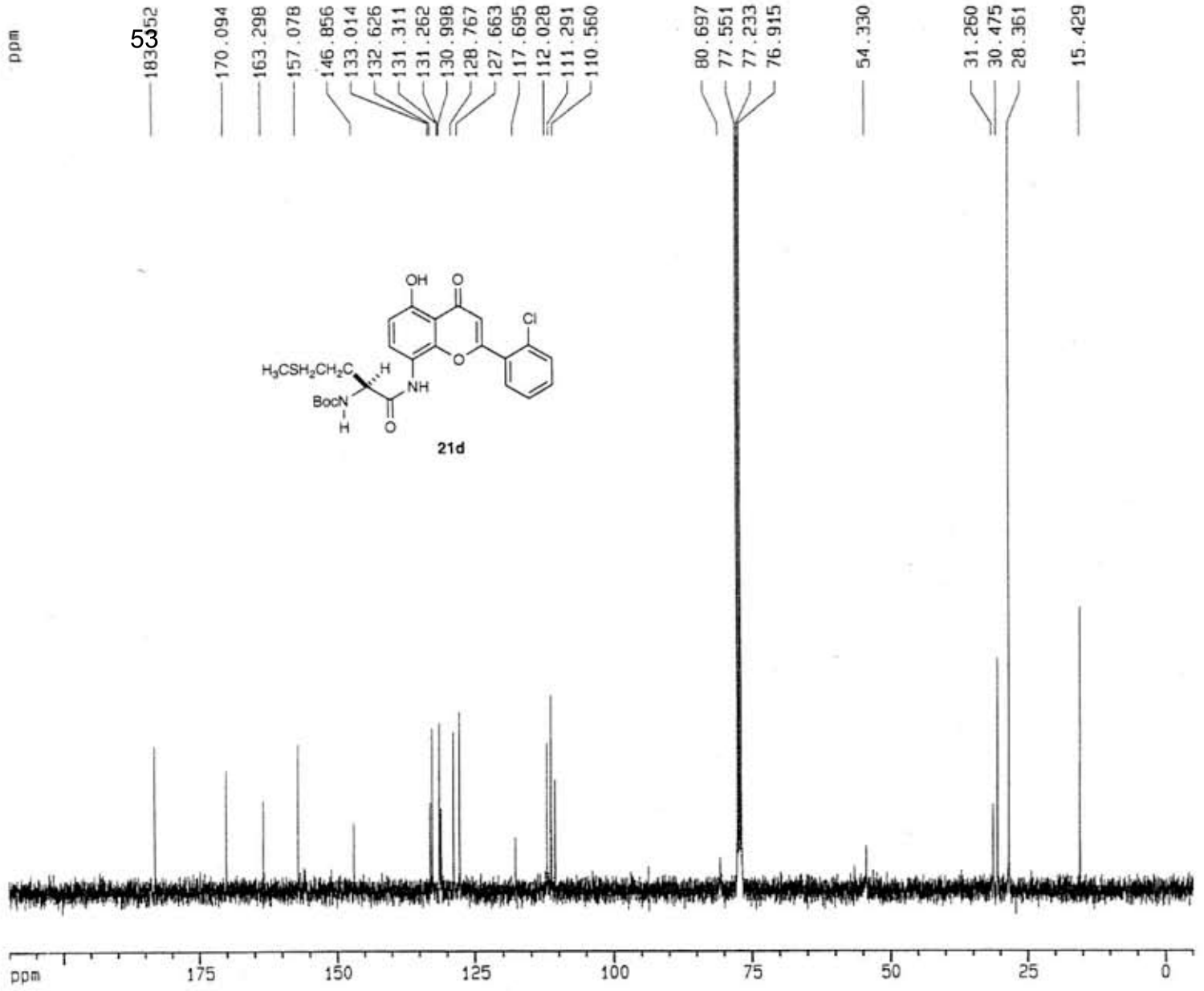
Date_	1010321
Time	18.15
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	322.5
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec
P1	7.70 usec
DE	4.50 usec
SFO1	400.1320007 MHz
NUC1	1H
PL1	-6.00 dB

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-ii-188-2C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

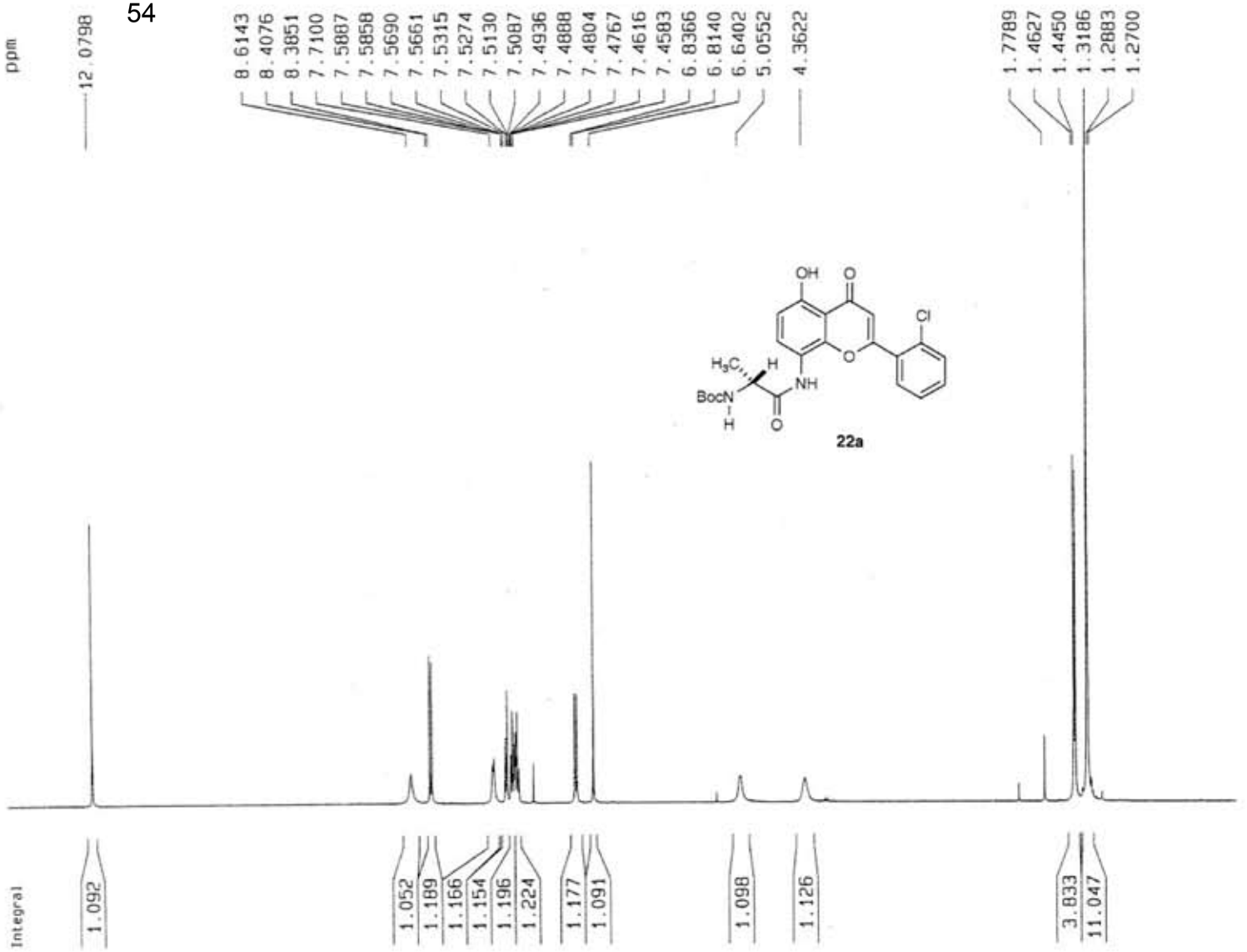
Date_	1010322
Time	10.13
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	1024
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	1290.2
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
d11	0.0300000 sec
d12	0.0000200 sec
PL13	18.00 dB
D1	0.05000000 sec
CPDPRG2	waltz16
PCPD2	100.00 usec
SFO2	400.1316005 MHz
NUC2	1H
PL2	0.00 dB
PL12	18.00 dB
P1	12.30 usec
DE	4.50 usec
SFO1	100.6232933 MHz
NUC1	13C
PL1	2.00 dB

F2 - Processing parameters

SI	32768
SF	100.6127503 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.68 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58704 Hz/cm



Current Data Parameters

NAME	YA-ii-170-1H
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

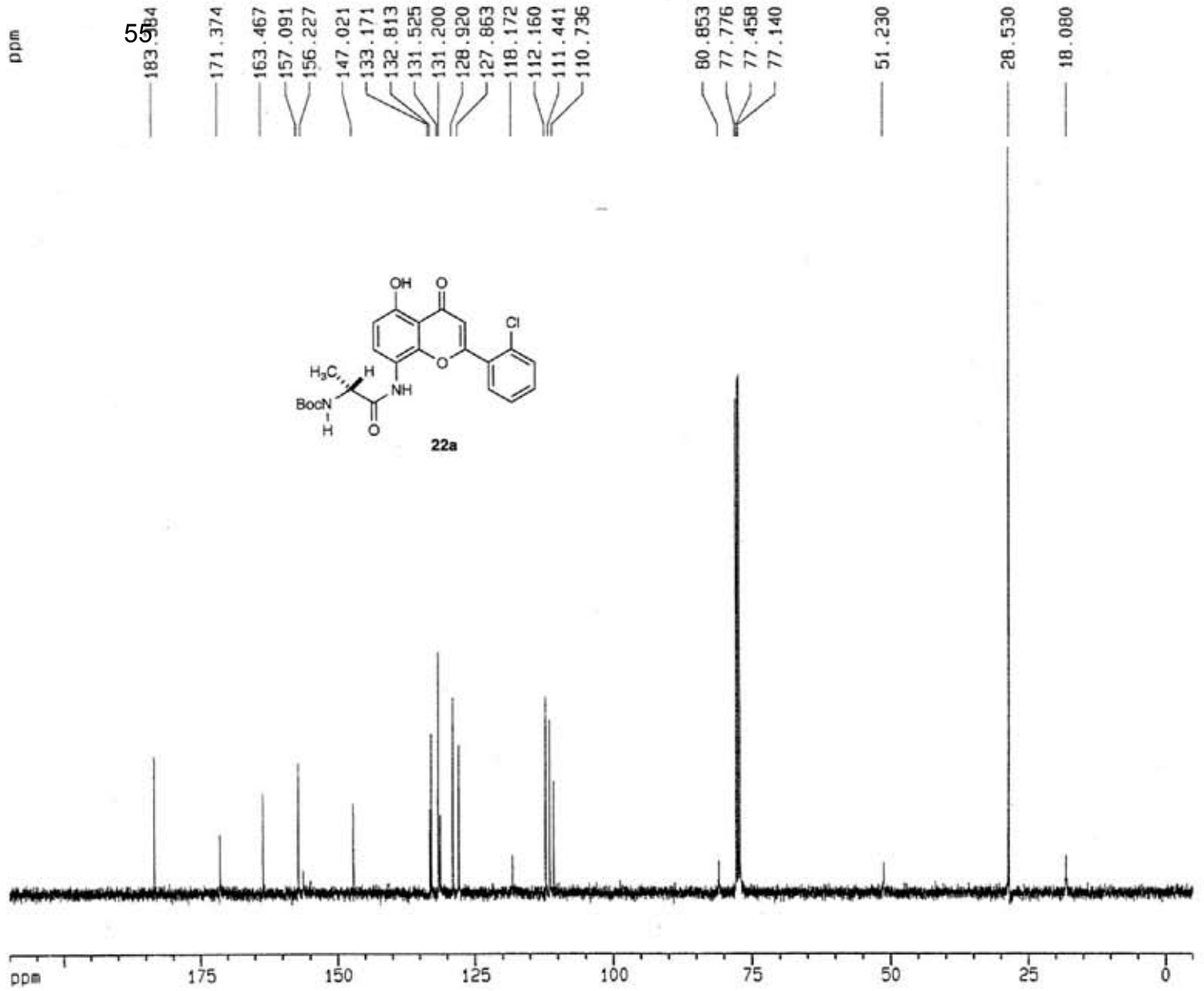
Date_	1010226
Time	18.06
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	161.3
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec
P1	7.70 usec
DE	4.50 usec
SFO1	400.1320007 MHz
NUC1	1H
PL1	-6.00 dB

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-ii-170-1C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

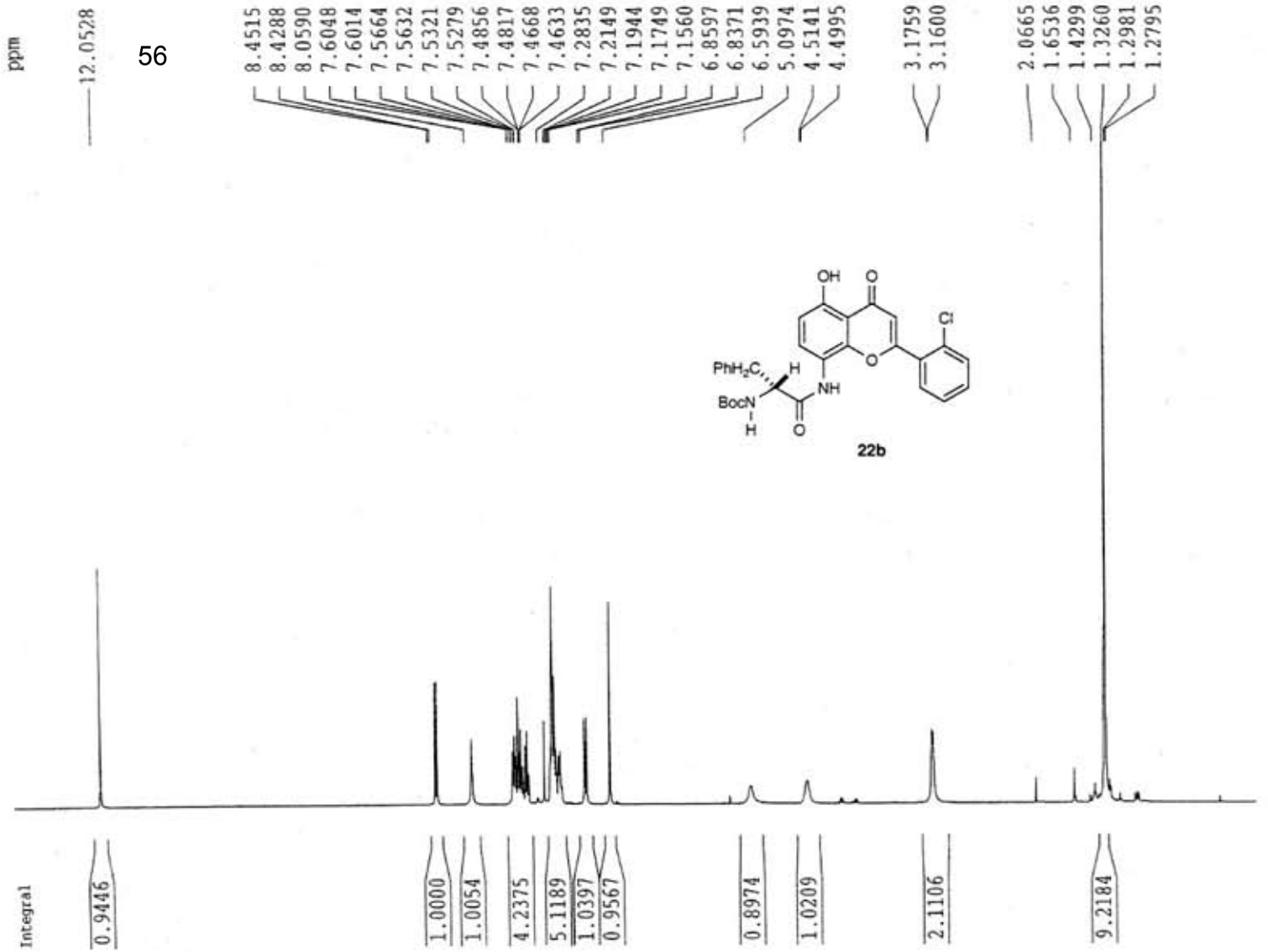
Date_	1010226
Time	18.09
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	705
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	4096
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
d11	0.0300000 sec
d12	0.0000200 sec
PL13	16.00 dB
D1	0.05000000 sec
CPDPRG2	waltz16
PCPD2	100.00 usec
SFO2	400.1316005 MHz
NUC2	1H
PL2	0.00 dB
PL12	16.00 dB
P1	12.30 usec
DE	4.50 usec
SFO1	100.6232933 MHz
NUC1	13C
PL1	2.00 dB

F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.67 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58691 Hz/cm



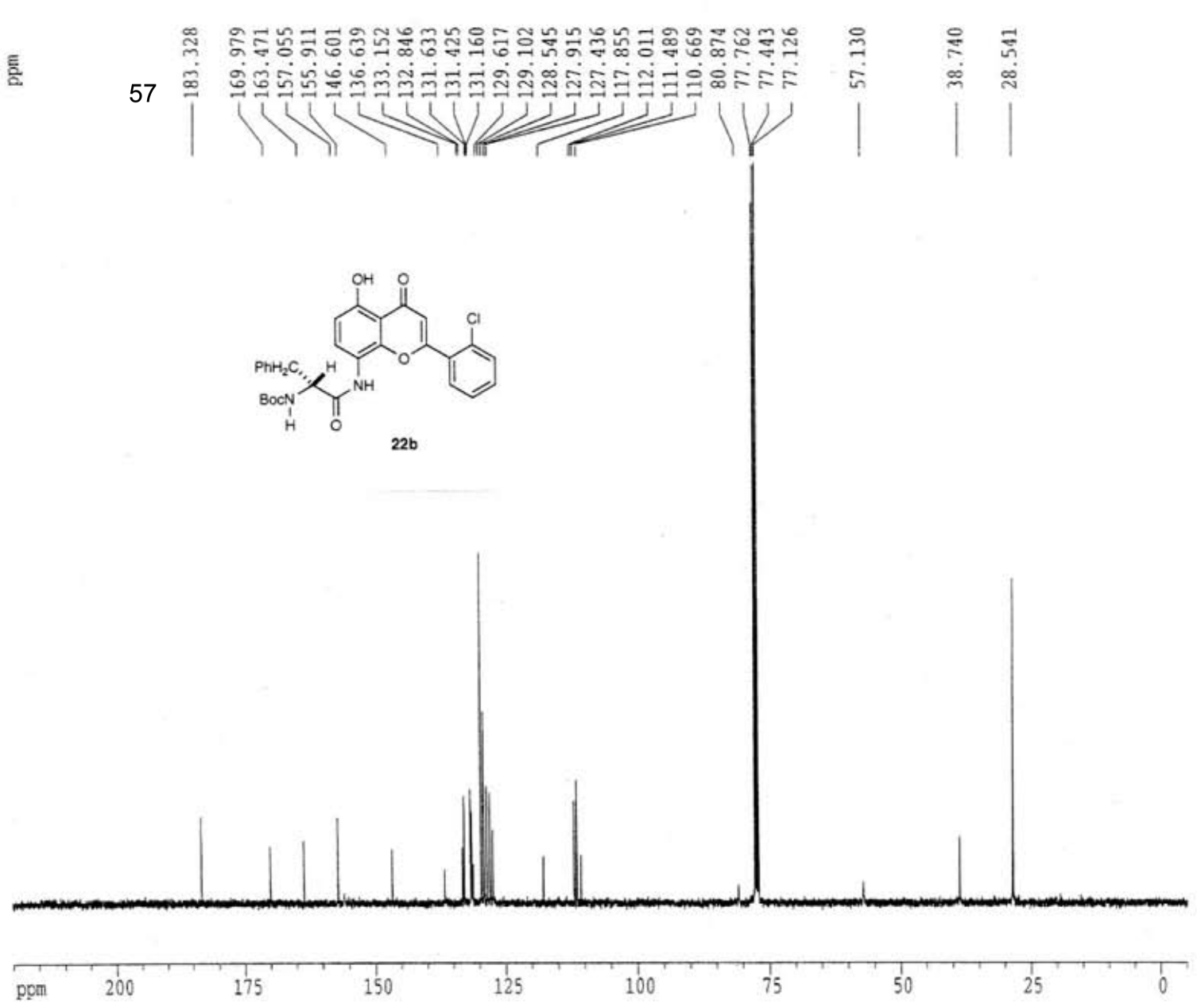

```
Current Data Parameters
NAME        YA-ii-160-1H
EXPNO                 1
PROCNO                1

F2 - Acquisition Parameters
Date_          20010214
Time              20.39
INSTRUM          drx400
PROBHD     5 mm Multinu
PULPROG           zg30
TD               32768
SOLVENT          CDCl3
NS                   16
DS                    2
SWH           8012.820 Hz
FIDRES        0.244532 Hz
AQ          2.0447731 sec
RG                  256
DW             62.400 usec
DE              4.50 usec
TE              300.0 K
D1          1.00000000 sec

============ CHANNEL f1 ============
NUC1                1H
P1              7.70 usec
PL1             -6.00 dB
SFO1       400.1320007 MHz

F2 - Processing parameters
SI                16384
SF        400.1300000 MHz
WDW                  EM
SSB                   0
LB              0.30 Hz
GB                    0
PC                 1.00

1D NMR plot parameters
CX              20.00 cm
F1P            13.000 ppm
F1           5201.69 Hz
F2P            -0.300 ppm
F2           -120.04 Hz
PPMCM         0.66500 ppm/cm
HZCM        266.08646 Hz/cm
```




```
NAME            YA-ii-160-1C
EXPNO                      1
PROCNO                     1

F2 - Acquisition Parameters
Date_           20010214
Time                 20.44
INSTRUM              drx400
PROBHD     5 mm Multinu
PULPROG              zgpg30
TD                    65536
SOLVENT               CDCl3
NS                     3185
DS                        2
SWH             23148.148 Hz
FIDRES              0.353213 Hz
AQ                1.4156276 sec
RG                     2048
DW                   21.600 usec
DE                    4.50 usec
TE                   300.0 K
D1              0.05000000 sec
d11             0.03000000 sec
d12             0.00002000 sec

========== CHANNEL f1 ============
NUC1                    13C
P1                    12.30 usec
PL1                    2.00 dB
SFO1           100.6232933 MHz

========== CHANNEL f2 ============
CPDPRG2              waltz16
NUC2                    1H
PCPD2                100.00 usec
PL2                    0.00 dB
PL12                  18.00 dB
PL13                  18.00 dB
SFO2           400.1316005 MHz

F2 - Processing parameters
SI                     32768
SF             100.6127290 MHz
WDW                       EM
SSB                        0
LB                      1.00 Hz
GB                         0
PC                      1.40

1D NMR plot parameters
CX                    20.00 cm
F1P                  220.000 ppm
F1                 22134.80 Hz
F2P                   -5.000 ppm
F2                  -503.07 Hz
PPMCM                11.25000 ppm/cm
HZCM               1131.89319 Hz/cm
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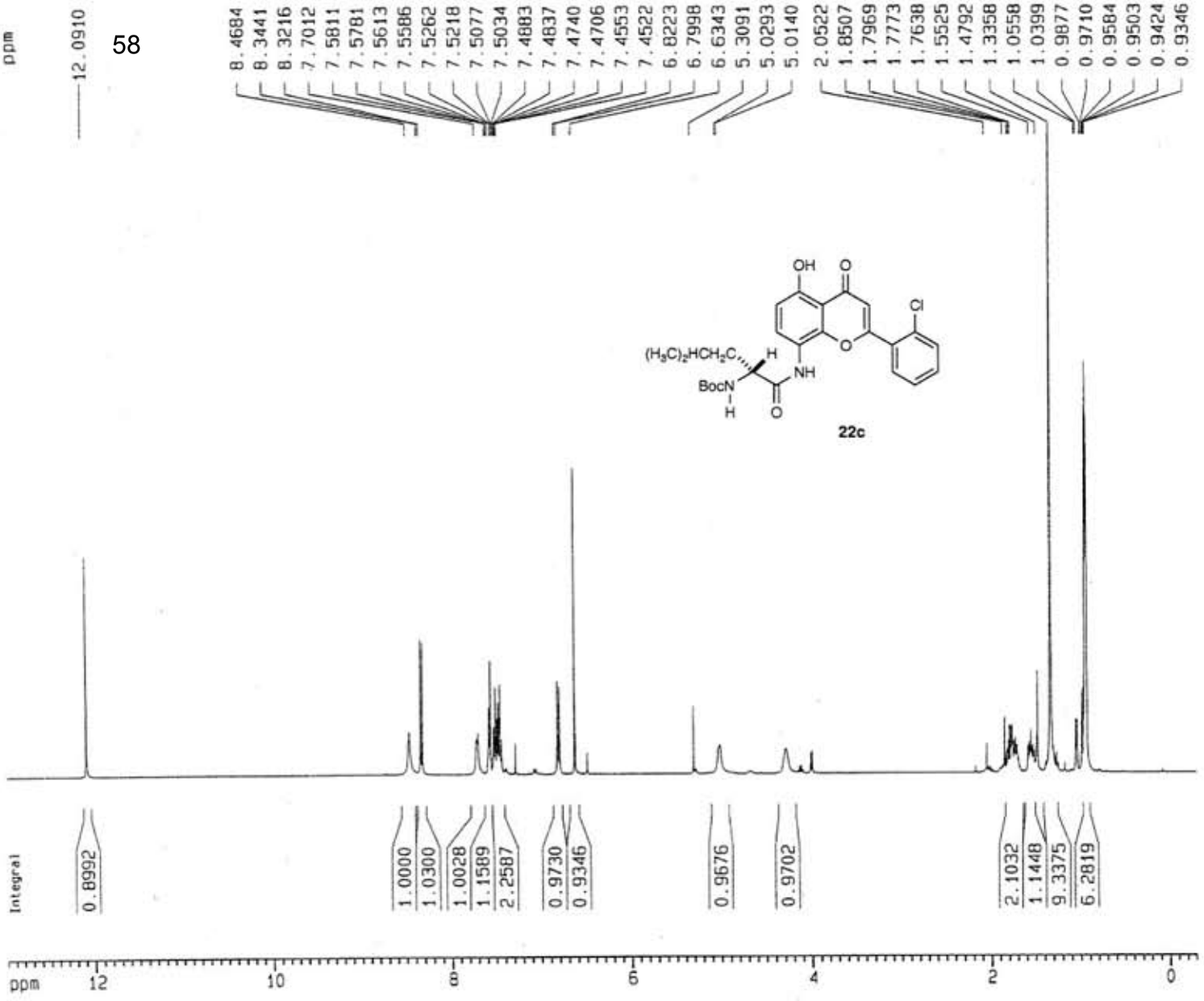


Current Data Parameters

NAME	YA-ii-167-1H
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

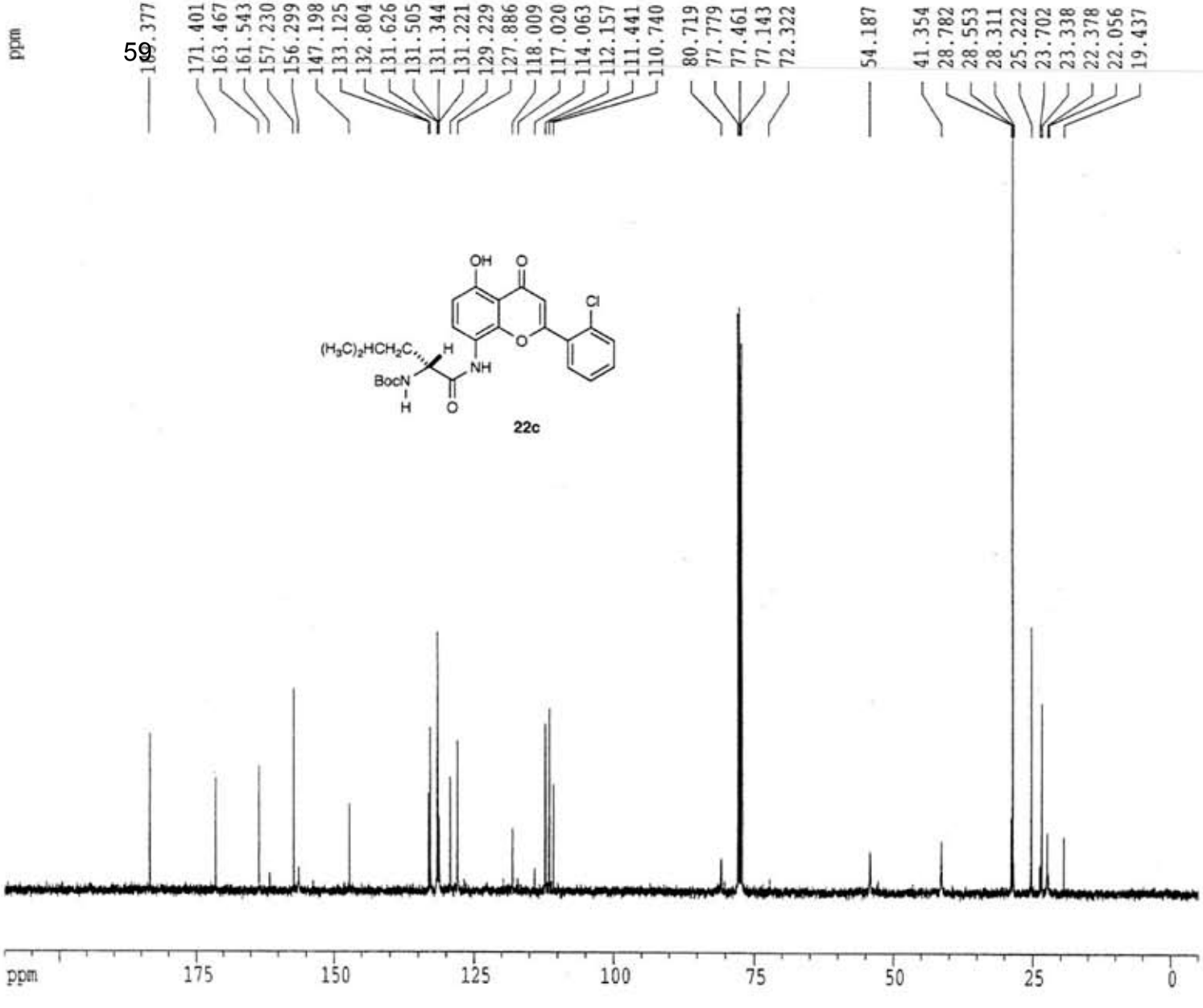
Date_	1010221
Time	18.13
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	90.5
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec
P1	7.70 usec
DE	4.50 usec
SFO1	400.1320007 MHz
NUC1	1H
PL1	-6.00 dB

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters
NAME YA-ii-167-1C
EXPNO 1
PROCNO 1

F2 - Acquisition Parameters

Date_	20010228
Time	17.28
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	1287
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	8192
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
D1	0.05000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	12.30 usec
PL1	2.00 dB
SFO1	100.6232933 MHz

========== CHANNEL f2 ==========

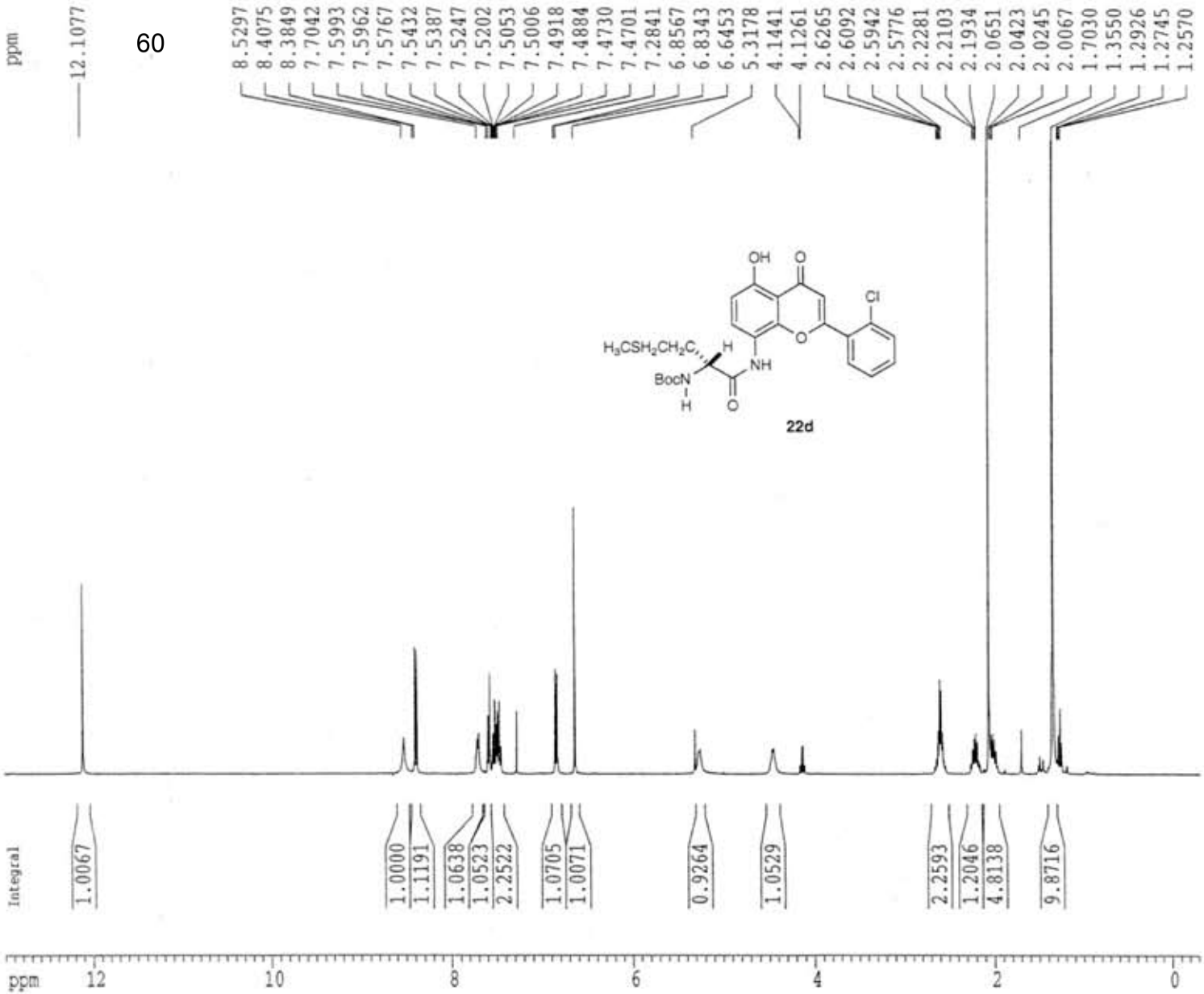
CPDPRG2	waltz16
NUC2	1H
PCPD2	100.00 usec
PL2	0.00 dB
PL12	18.00 dB
PL13	18.00 dB
SFO2	400.1316005 MHz

F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.67 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58691 Hz/cm



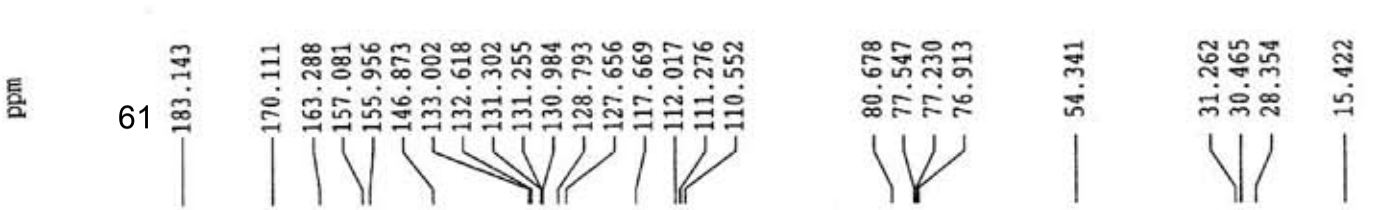

```
Current Data Parameters
NAME          YA-ii-187-2
EXPNO                   1
PROCNO                  1

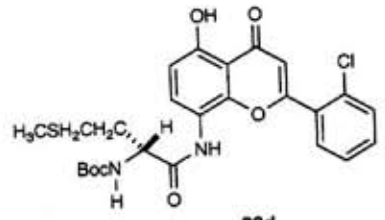
F2 - Acquisition Parameters
Date_           20010321
Time               18.48
INSTRUM          drx400
PROBHD     5 mm Multinu
PULPROG            zg30
TD                32768
SOLVENT           CDCl3
NS                   16
DS                    2
SWH            8012.820 Hz
FIDRES            0.244532 Hz
AQ             2.0447731 sec
RG                 322.5
DW                62.400 usec
DE                 4.50 usec
TE                300.0 K
D1             1.00000000 sec

============ CHANNEL f1 ============
NUC1                   1H
P1                   7.70 usec
PL1                 -6.00 dB
SFO1          400.1320007 MHz

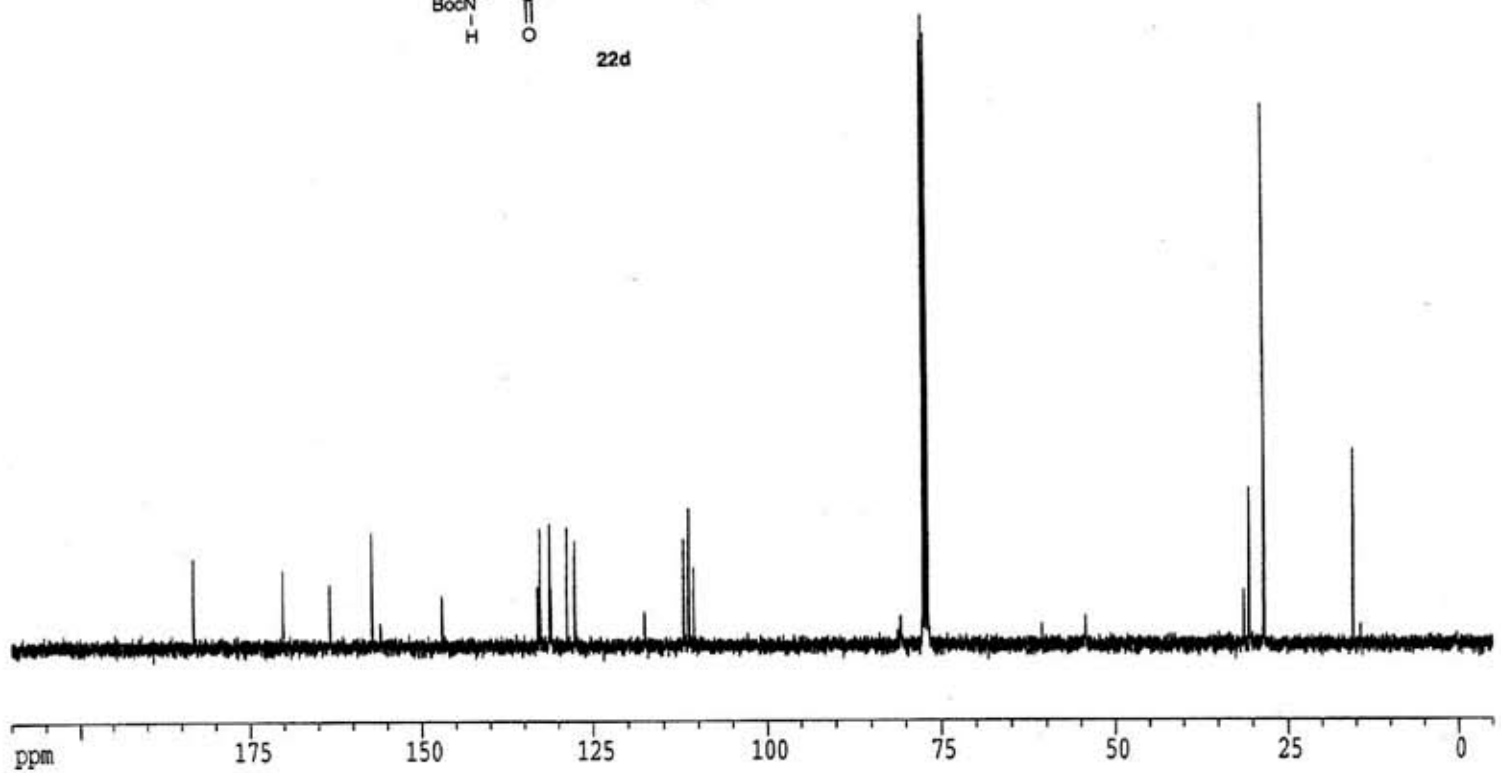
F2 - Processing parameters
SI                  16384
SF            400.1300000 MHz
WDW                    EM
SSB                     0
LB                   0.30 Hz
GB                      0
PC                   1.00

1D NMR plot parameters
CX                  20.00 cm
F1P                 13.000 ppm
F1                5201.69 Hz
F2P                -0.300 ppm
F2                -120.04 Hz
PPMCM             0.66500 ppm/cm
HZCM            266.08646 Hz/cm
```





22d



Current Data Parameters

NAME	YA-ii-187-2C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20010321
Time	18.51
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	678
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	2048
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
D1	0.05000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

========== CHANNEL f1 ==========

NUC1	13C
P1	12.30 usec
PL1	2.00 dB
SFO1	100.6232933 MHz

========== CHANNEL f2 ==========

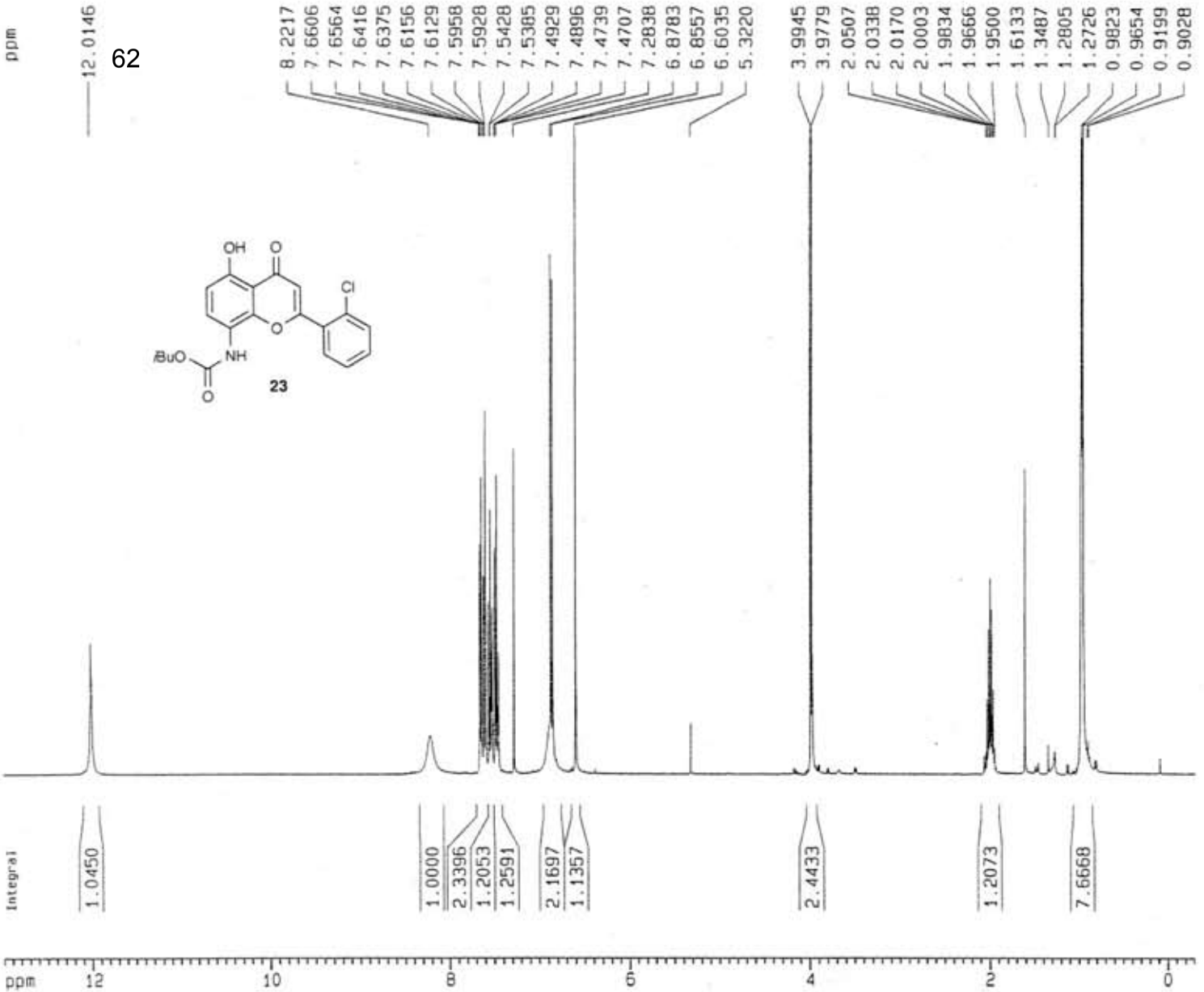
CPDPRG2	waltz16
NUC2	1H
PCPD2	100.00 usec
PL2	0.00 dB
PL12	18.00 dB
PL13	18.00 dB
SFO2	400.1316005 MHz

F2 - Processing parameters

SI	32768
SF	100.6127510 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.68 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58704 Hz/cm



Current Data Parameters

NAME	YA-ii-166-1
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

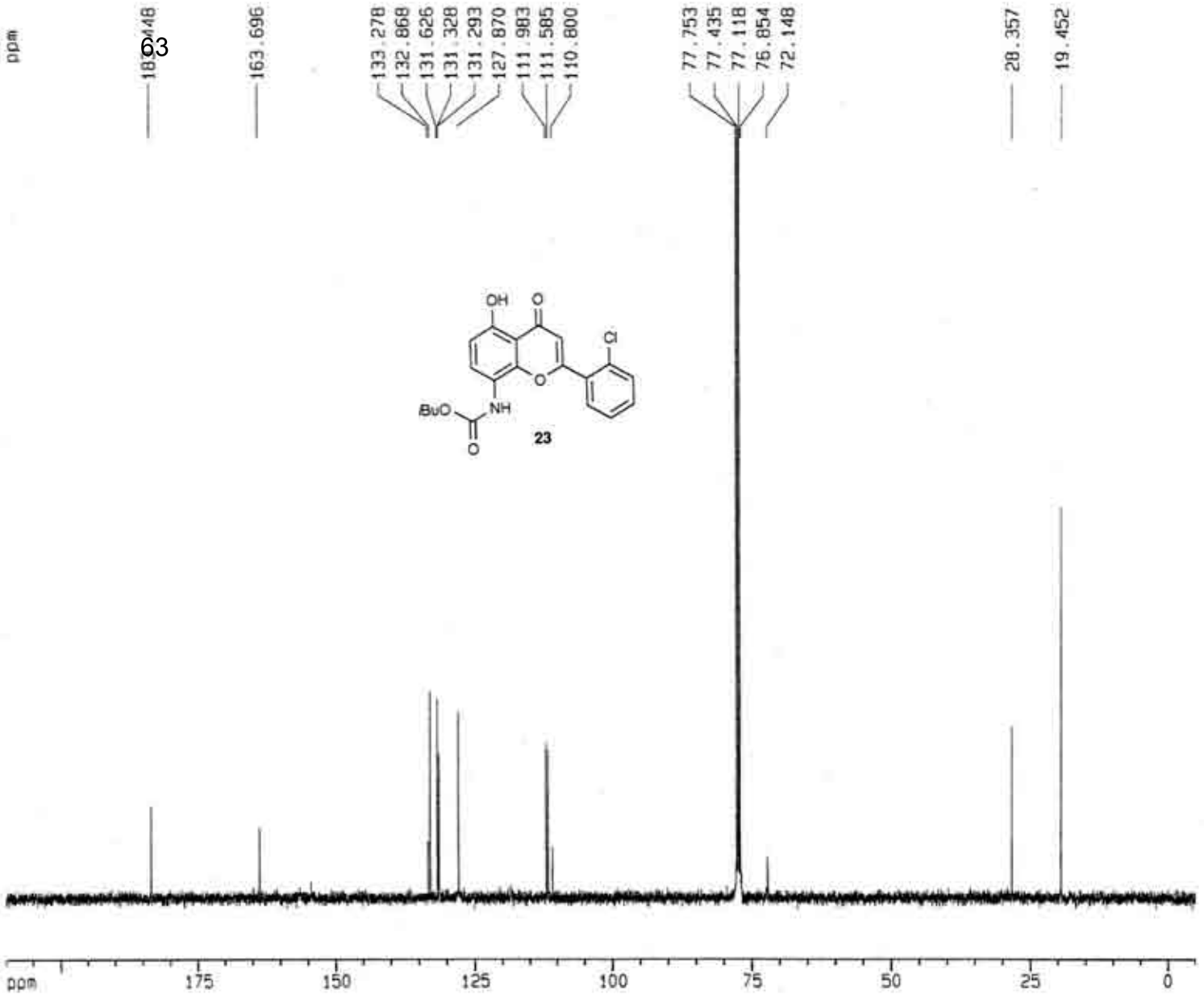
Date_	1010220
Time	16.57
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	362
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec
P1	7.70 usec
DE	4.50 usec
SFO1	400.1320007 MHz
NUC1	1H
PL1	-6.00 dB

F2 - Processing parameters

SI	16384
SF	400.1300000 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	13.000 ppm
F1	5201.69 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.66500 ppm/cm
HZCM	266.08646 Hz/cm



Current Data Parameters

NAME	YA-11-166-1C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

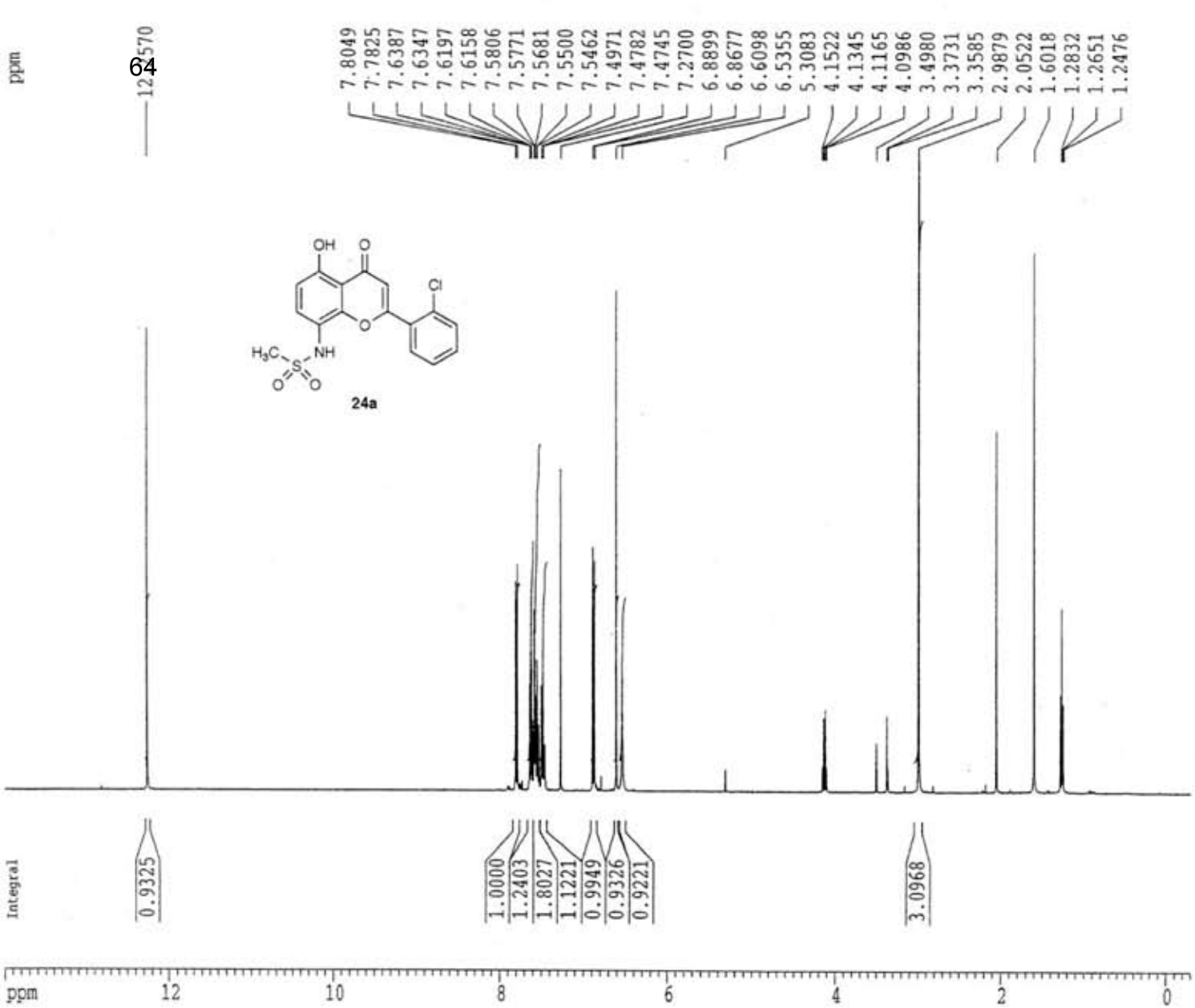
Date_	1010221
Time	17.16
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	2238
DS	2
SWH	23148.148 Hz
FIDRES	0.353213 Hz
AQ	1.4156276 sec
RG	8192
DW	21.600 usec
DE	4.50 usec
TE	300.0 K
d11	0.0300000 sec
d12	0.0000200 sec
PL13	18.00 dB
D1	0.05000000 sec
CPDPRG2	waltz16
PCPD2	100.00 usec
SFO2	400.1316005 MHz
NUC2	1H
PL2	0.00 dB
PL12	18.00 dB
P1	12.30 usec
DE	4.50 usec
SFO1	100.6232933 MHz
NUC1	13C
PL1	2.00 dB

F2 - Processing parameters

SI	32768
SF	100.6127290 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
F1P	210.000 ppm
F1	21128.57 Hz
F2P	-5.000 ppm
F2	-503.06 Hz
PPMCM	10.75000 ppm/cm
HZCM	1081.58691 Hz/cm



Current Data Parameters

NAME	YA-iii-20-3
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20011001
Time	16.50
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	228.1
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

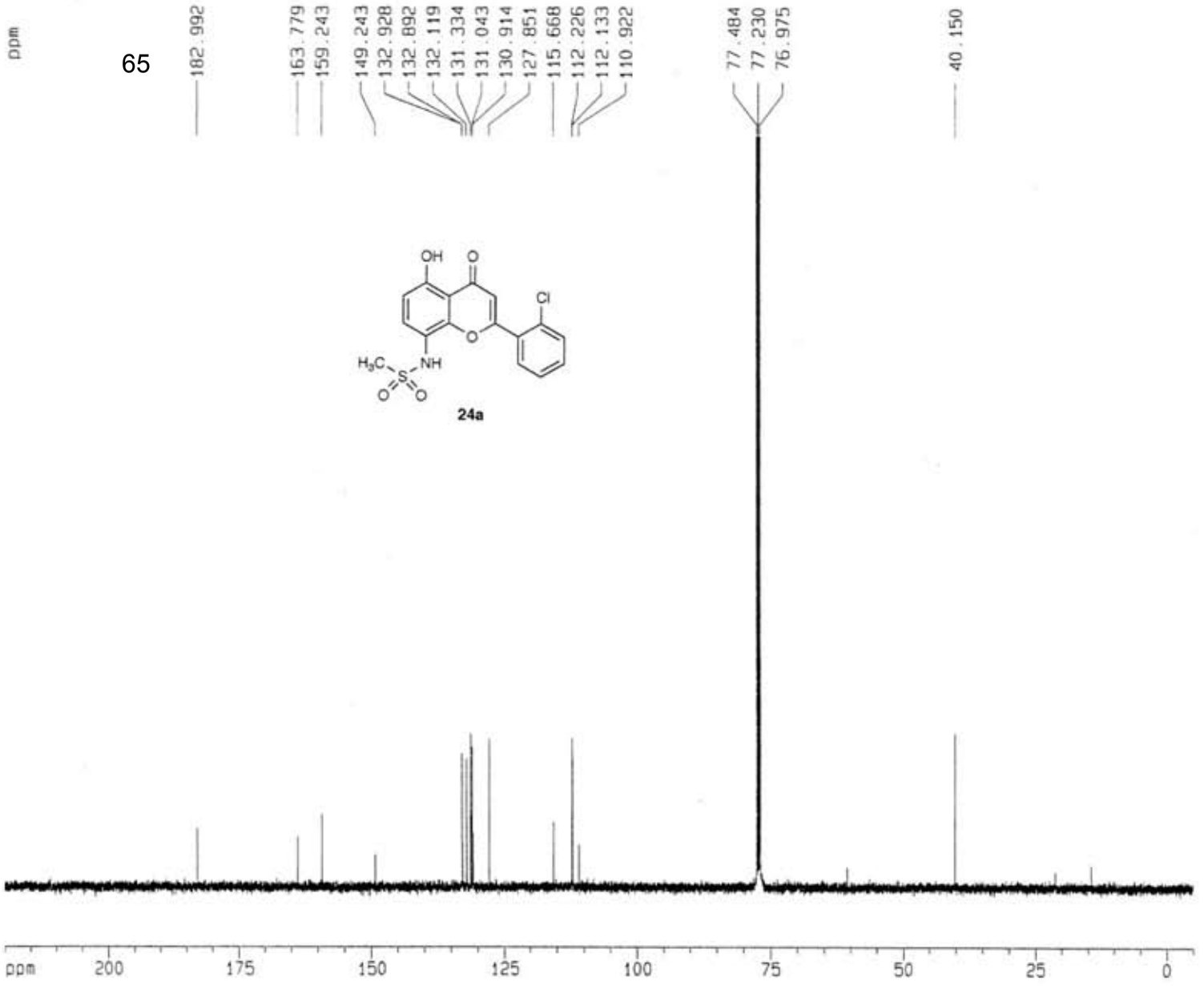
NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

F2 - Processing parameters

SI	16384
SF	400.1300053 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	14.000 ppm
F1	5601.82 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.71500 ppm/cm
HZCM	286.09296 Hz/cm




```
NAME            YA-iii-20-3C
EXPNO                      3
PROCNO                     1

F2 - Acquisition Parameters
Date_           20011001
Time                   18.12
INSTRUM                spect
PROBHD     5 mm BBO BB-1H
PULPROG             zgpg30
TD                     65536
SOLVENT              CDCl3
NS                      1429
DS                         4
SWH              31446.541 Hz
FIDRES           0.479836 Hz
AQ               1.0420863 sec
RG                      3251
DW                 15.900 usec
DE                  6.00 usec
TE                 300.0 K
D1              0.10000000 sec
d11             0.03000000 sec
d12             0.00002000 sec

======== CHANNEL f1 ========
NUC1                     13C
P1                    6.50 usec
PL1                   5.00 dB
SFO1           125.7719472 MHz

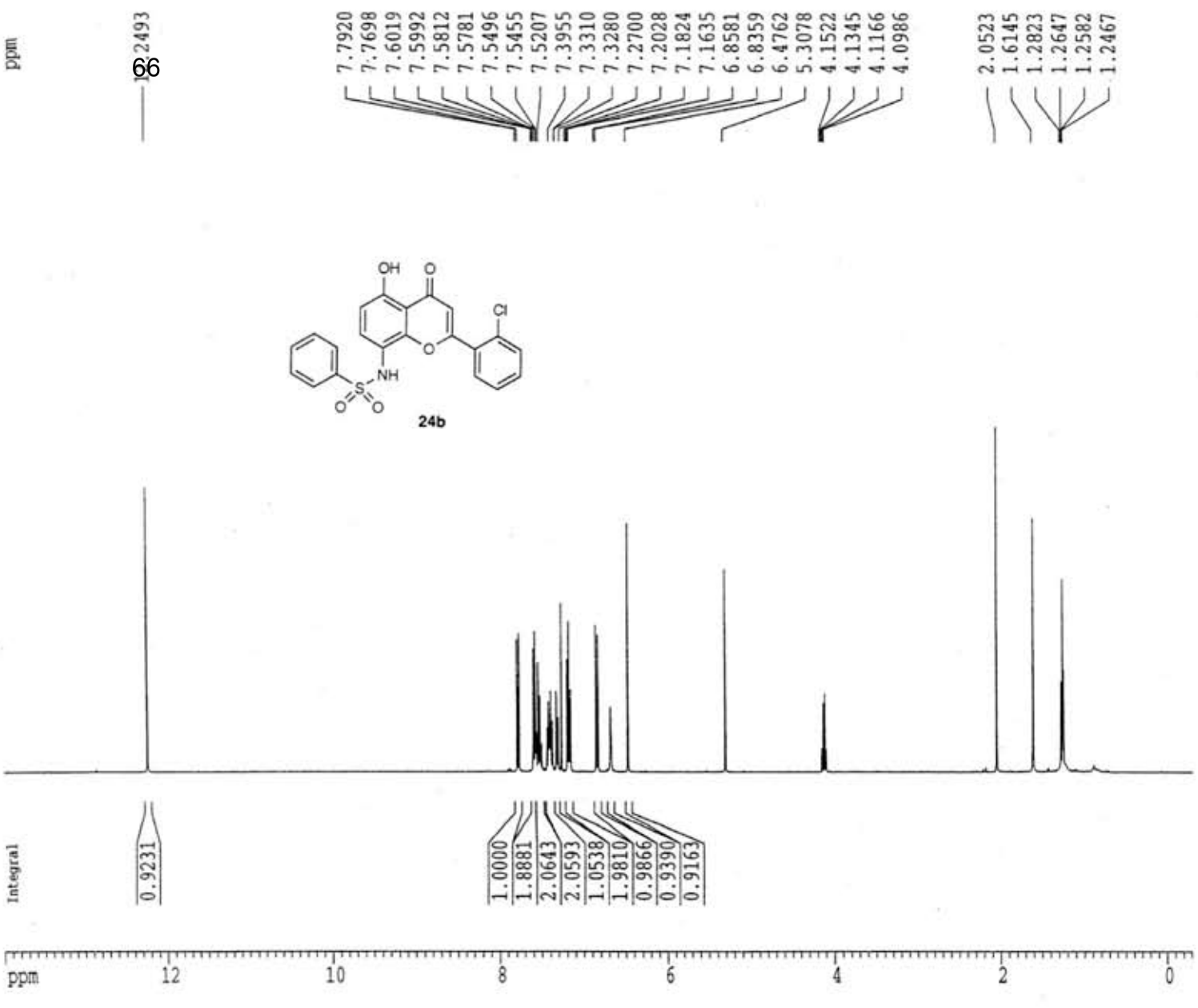
======== CHANNEL f2 ========
CPDPRG2              waltz16
NUC2                      1H
PCPD2                95.00 usec
PL2                  17.50 dB
PL12                 19.00 dB
PL13                 30.00 dB
SFO2           500.1325000 MHz

F1 - Acquisition parameters
ND0                        2
TD                       256
SFO1             500.1325 MHz
FIDRES           23.475060 Hz
SW                   12.016 ppm

F2 - Processing parameters
SI                     65536
SF             125.7577638 MHz
WDW                       EM
SSB                        0
LB                    1.00 Hz
GB                         0
PC                      1.40

F1 - Processing parameters
SI                      1024
WC2                       QF
SF             500.1300000 MHz
WDW                       no
SSB                        0
LB                    0.30 Hz
GB                         0

1D NMR plot parameters
CX                   20.00 cm
CY                   13.69 cm
F1P                220.000 ppm
F1                 27686.71 Hz
F2P                 -5.000 ppm
F2                  -628.79 Hz
PPMCM              11.25000 ppm/cm
HZCM               1414.77490 Hz/cm
```



Current Data Parameters

NAME	YA-iii-19-3
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20011002
Time	17.30
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	32
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	228.1
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec

========== CHANNEL f1 ==========

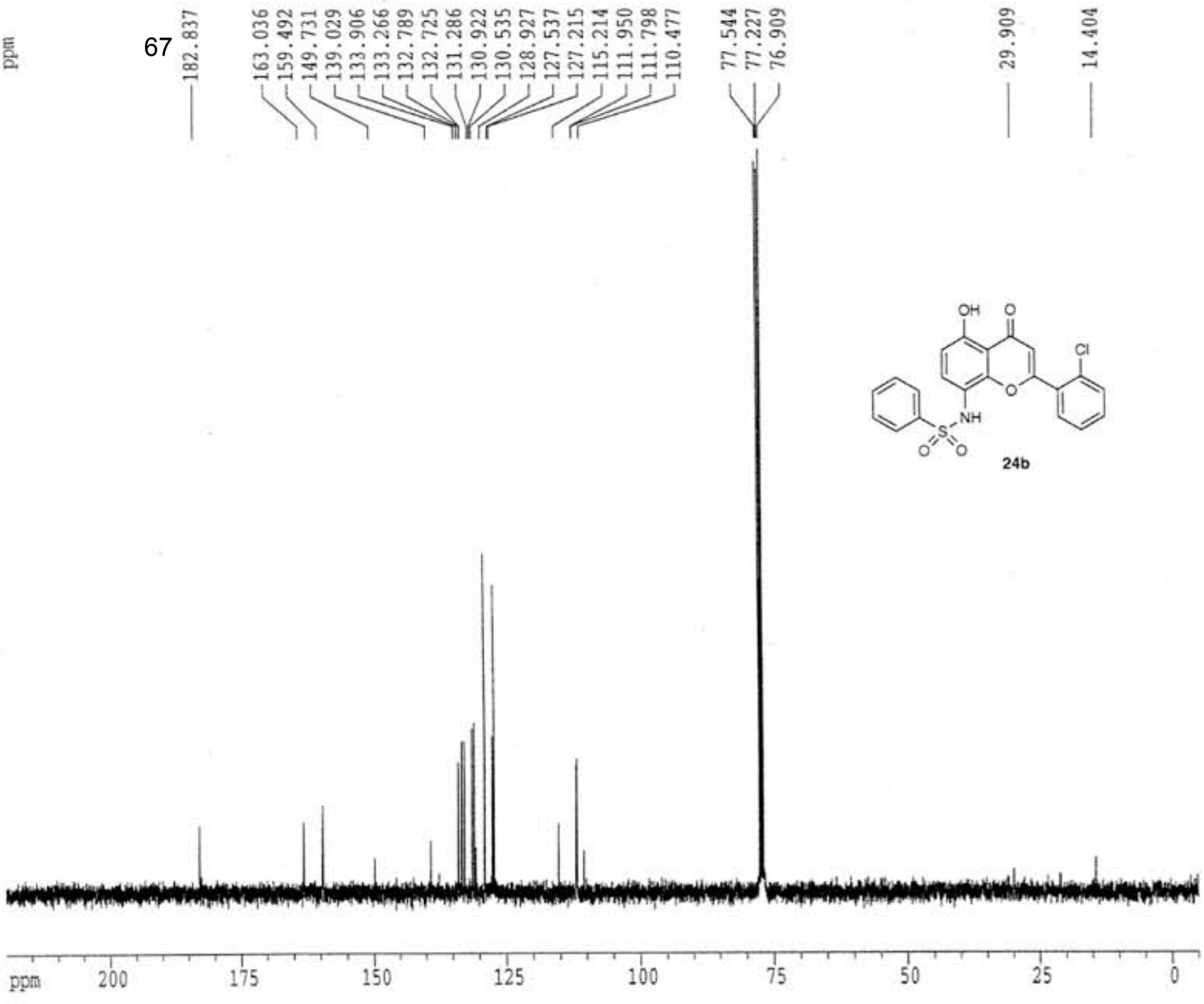
NUC1	1H
P1	7.70 usec
PL1	-6.00 dB
SFO1	400.1320007 MHz

F2 - Processing parameters

SI	16384
SF	400.1300053 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	14.000 ppm
F1	5601.82 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.71500 ppm/cm
HZCM	286.09296 Hz/cm




```
Current Data Parameters
NAME          YA-iii-19-3C
EXPNO                    1
PROCNO                   1

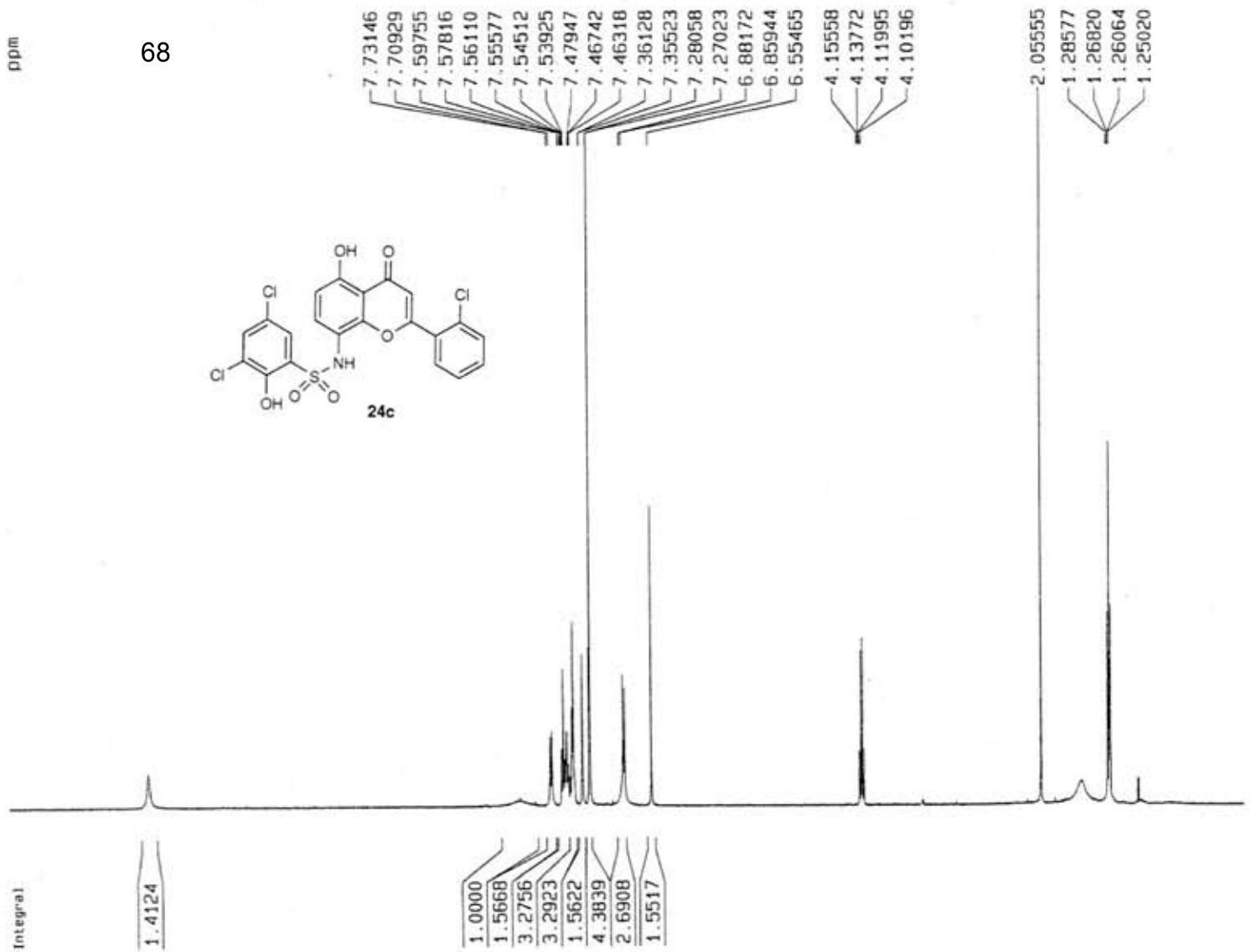
F2 - Acquisition Parameters
Date_              20011002
Time                 17.33
INSTRUM              drx400
PROBHD     5 mm Multinu
PULPROG              zgpg30
TD                    65536
SOLVENT               CDCl3
NS                      556
DS                        2
SWH              23148.148 Hz
FIDRES            0.353213 Hz
AQ                1.4156276 sec
RG                     8192
DW                  21.600 usec
DE                   4.50 usec
TE                  300.0 K
D1                0.05000000 sec
d11               0.03000000 sec
d12               0.00002000 sec

============ CHANNEL f1 ============
NUC1                    13C
P1                   12.30 usec
PL1                   2.00 dB
SFO1           100.6232933 MHz

============ CHANNEL f2 ============
CPDPRG2              waltz16
NUC2                    1H
PCPD2               100.00 usec
PL2                   0.00 dB
PL12                 18.00 dB
PL13                 18.00 dB
SFO2           400.1316005 MHz

F2 - Processing parameters
SI                      32768
SF             100.6127503 MHz
WDW                        EM
SSB                         0
LB                    1.00 Hz
GB                          0
PC                    1.40

1D NMR plot parameters
CX                   20.00 cm
F1P                 220.000 ppm
F1                22134.80 Hz
F2P                 -5.000 ppm
F2                -503.07 Hz
PPMCM             11.25000 ppm/cm
HZCM           1131.89343 Hz/cm
```



Current Data Parameters

NAME	YA-iii-28-2
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

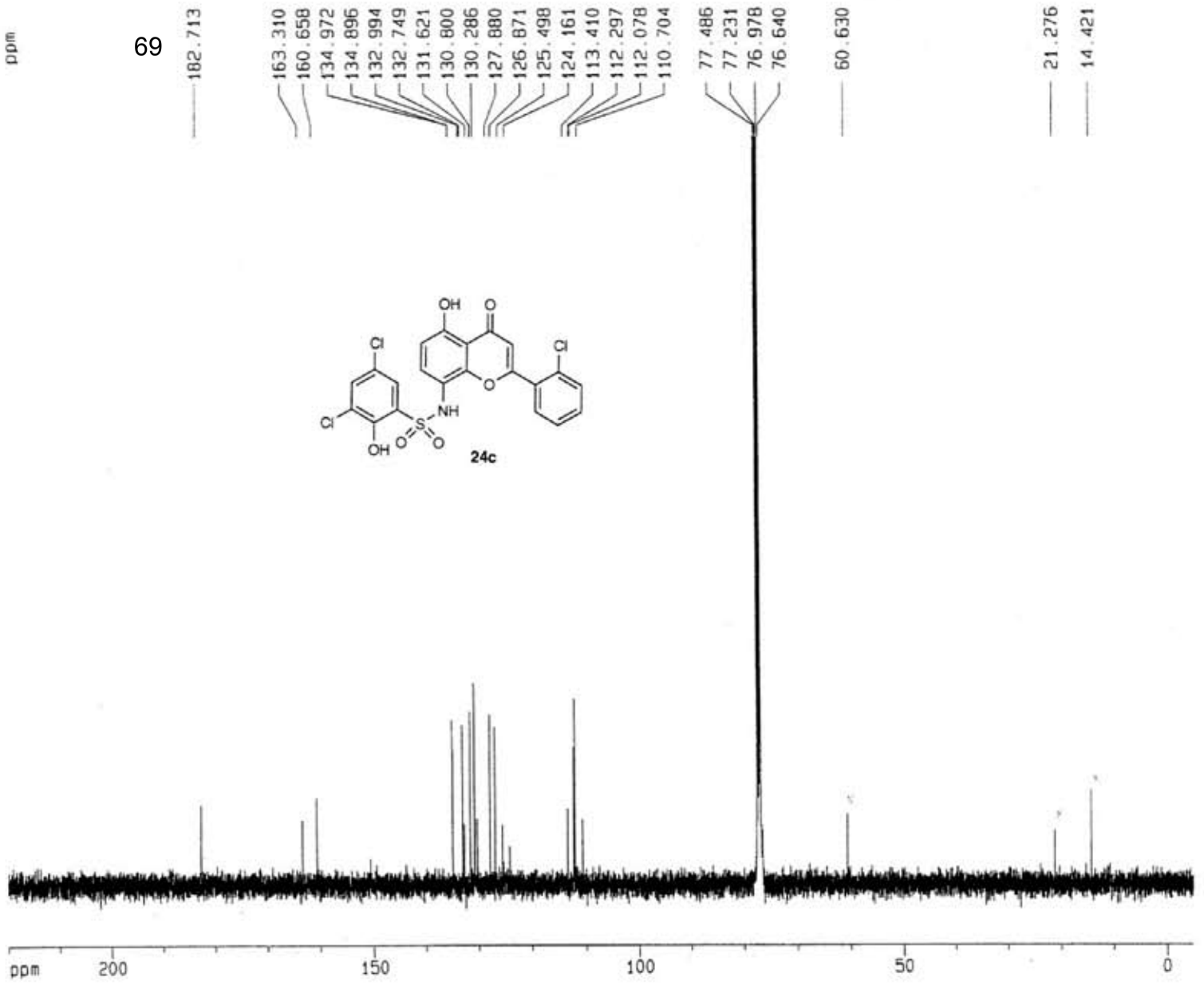
Date_	1011012
Time	11.43
INSTRUM	drx400
PROBHD	5 mm Multinu
PULPROG	zg30
TD	32768
SOLVENT	CDCl3
NS	16
DS	2
SWH	8012.820 Hz
FIDRES	0.244532 Hz
AQ	2.0447731 sec
RG	256
DW	62.400 usec
DE	4.50 usec
TE	300.0 K
D1	1.00000000 sec
P1	7.70 usec
DE	4.50 usec
SFO1	400.1320007 MHz
NUC1	1H
PL1	-6.00 dB

F2 - Processing parameters

SI	16384
SF	400.1300053 MHz
WDW	EM
SSB	0
LB	0.30 Hz
GB	0
PC	1.00

1D NMR plot parameters

CX	20.00 cm
F1P	14.000 ppm
F1	5601.82 Hz
F2P	-0.300 ppm
F2	-120.04 Hz
PPMCM	0.71500 ppm/cm
HZCM	286.09296 Hz/cm



Current Data Parameters

NAME	YA-iii-28-2C
EXPNO	1
PROCNO	1

F2 - Acquisition Parameters

Date_	20011013
Time	14.11
INSTRUM	spect
PROBHD	5 mm BBO BB-1H
PULPROG	zgpg30
TD	65536
SOLVENT	CDCl3
NS	5000
DS	4
SWH	31446.541 Hz
FIDRES	0.479836 Hz
AQ	1.0420863 sec
RG	5160.6
DW	15.900 usec
DE	6.00 usec
TE	300.0 K
D1	0.10000000 sec
d11	0.03000000 sec
d12	0.00002000 sec

======== CHANNEL f1 ========

NUC1	13C
P1	6.50 usec
PL1	5.00 dB
SFO1	125.7719472 MHz

======== CHANNEL f2 ========

CPDPRG2	waltz16
NUC2	1H
PCPD2	95.00 usec
PL2	17.50 dB
PL12	19.00 dB
PL13	30.00 dB
SFO2	500.1325000 MHz

F2 - Processing parameters

SI	65536
SF	125.7577624 MHz
WDW	EM
SSB	0
LB	1.00 Hz
GB	0
PC	1.40

1D NMR plot parameters

CX	20.00 cm
CY	0.00 cm
F1P	220.000 ppm
F1	27666.71 Hz
F2P	-5.000 ppm
F2	-628.79 Hz
PPMCM	11.25000 ppm/cm
HZCM	1414.77478 Hz/cm