

Supporting Information

Daphnane-type Diterpenes from *Stelleropsis tianschanica* and Their Anti-tumor Activity

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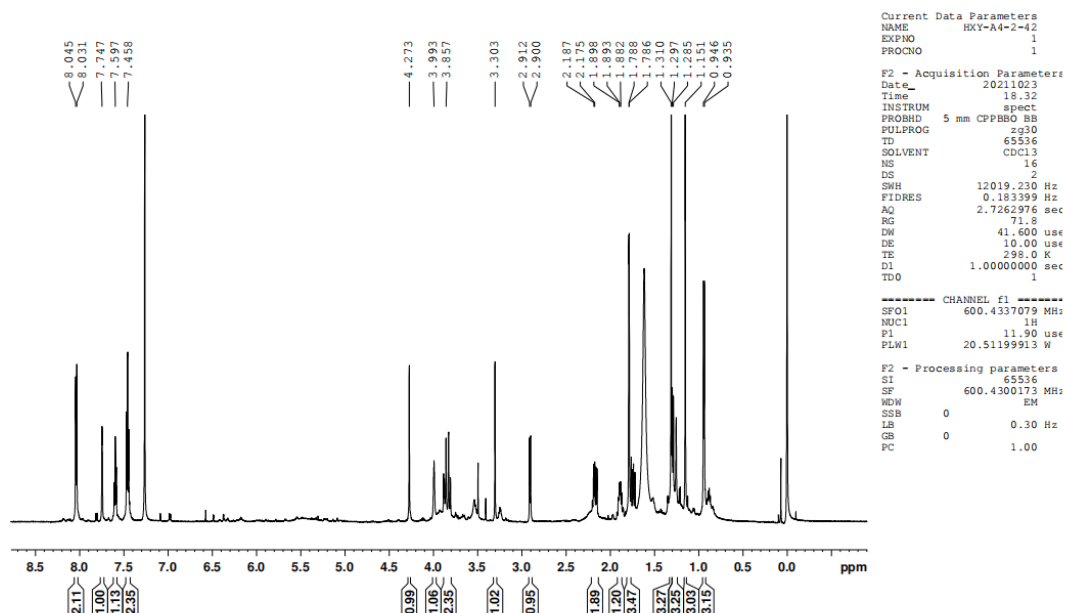


Figure S1. ¹H-NMR (600 MHz, CDCl₃) spectrum of **1**

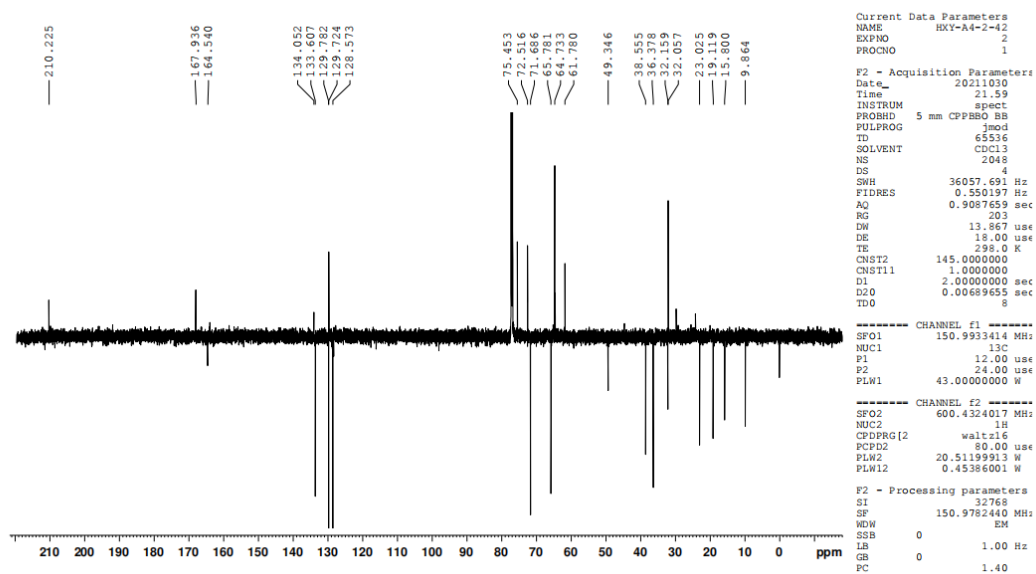


Figure S2. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **1**

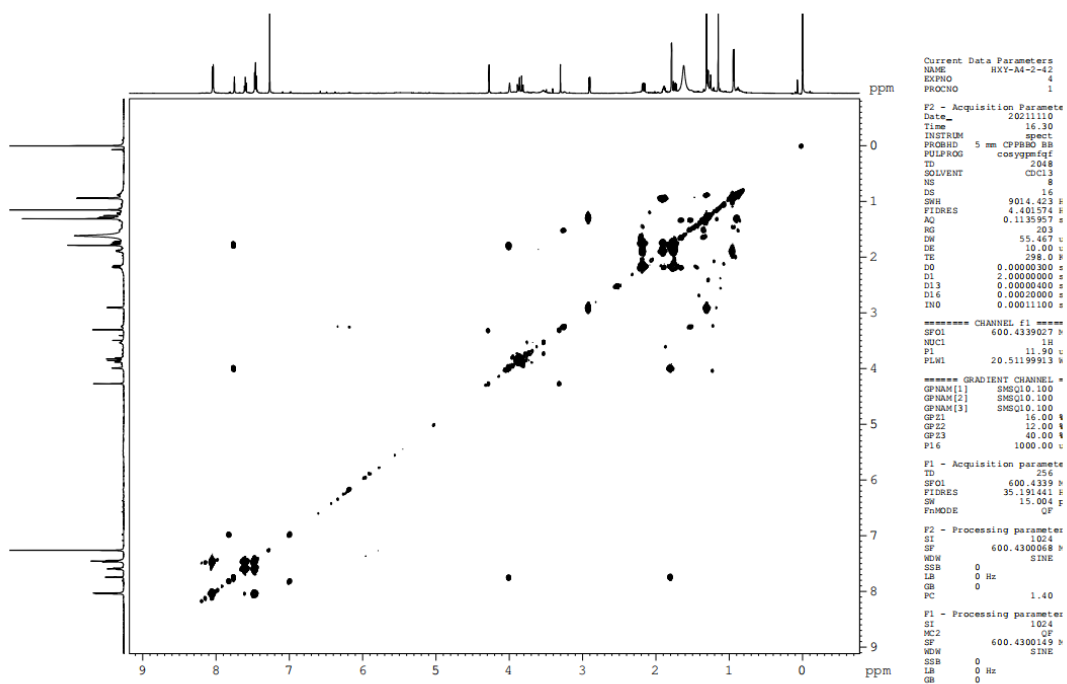


Figure S3. ^1H - ^1H COSY (CDCl_3) spectrum of **1**

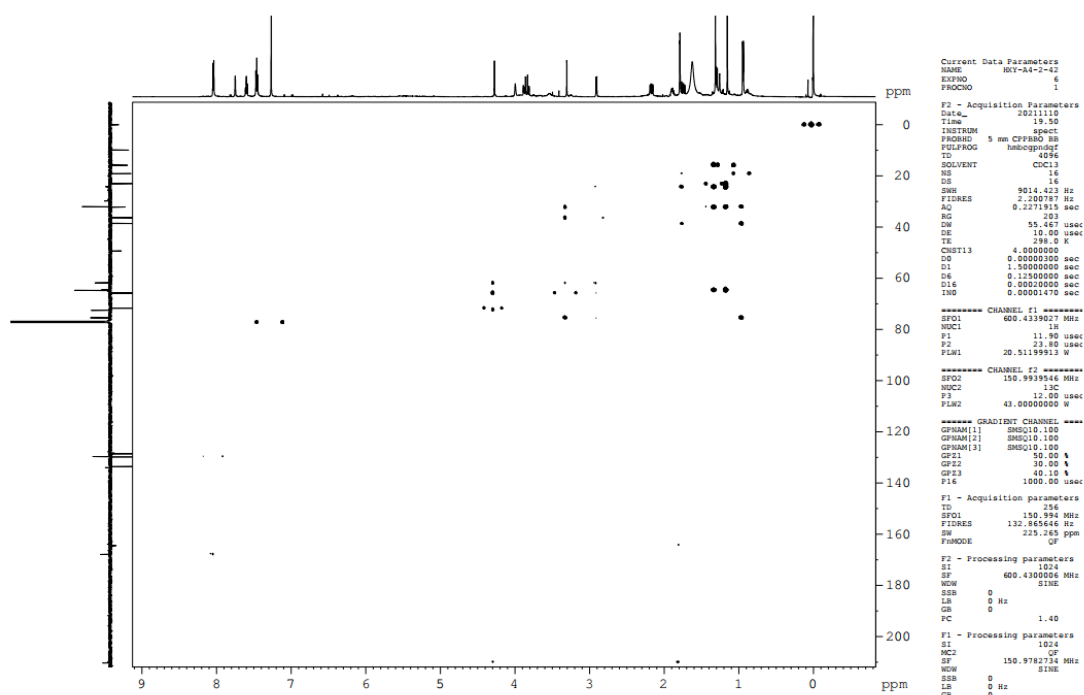


Figure S6. HMBC (CDCl₃) spectrum of **1**

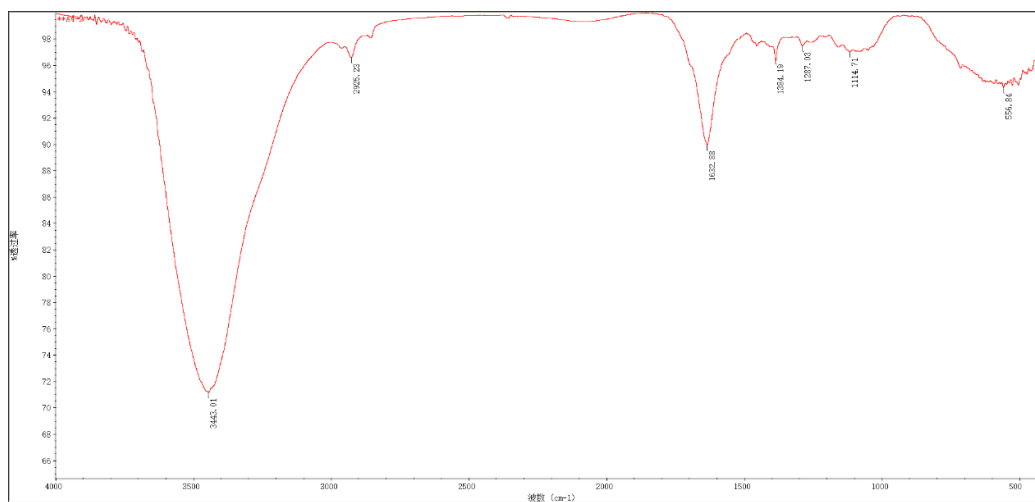


Figure S7. IR spectrum of **1**

a2-2-42-FT_220325142301 #1 RT: 0.01 AV: 1 NL: 6.60E7
T: FTMS + p ESI Full ms [50.00-1500.00]

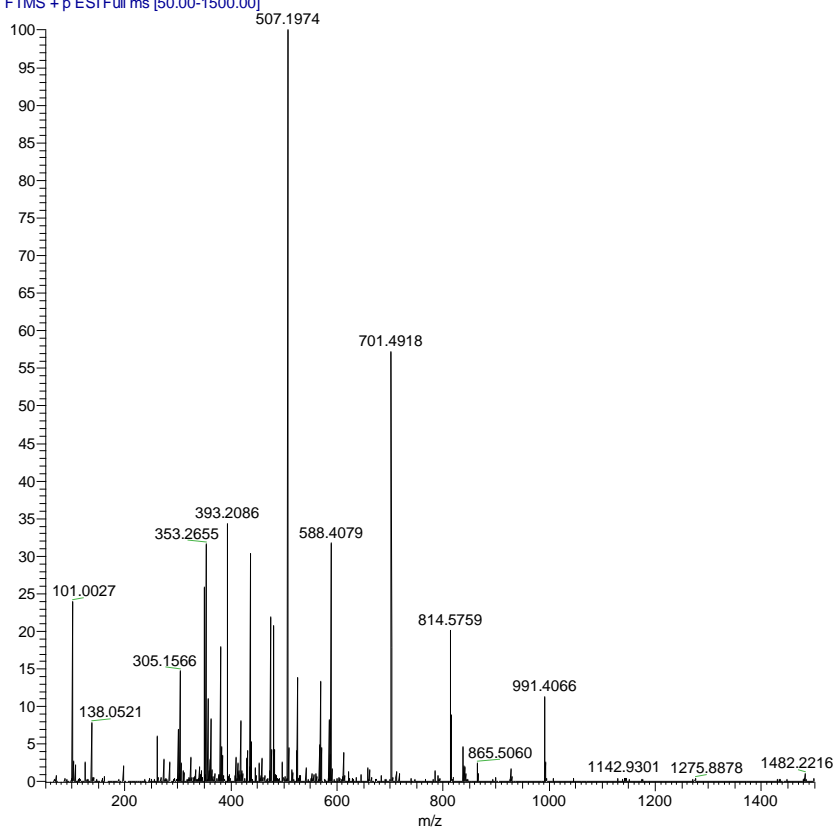


Figure S8. HRESIMS spectrum of 1

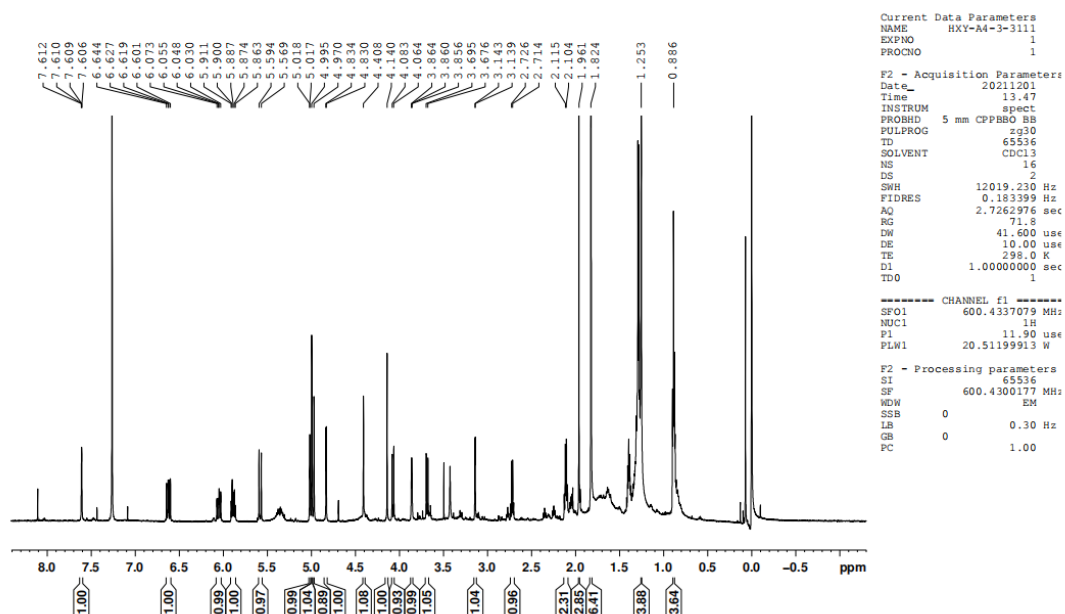


Figure S9. ¹H-NMR (600 MHz, CDCl₃) spectrum of 2

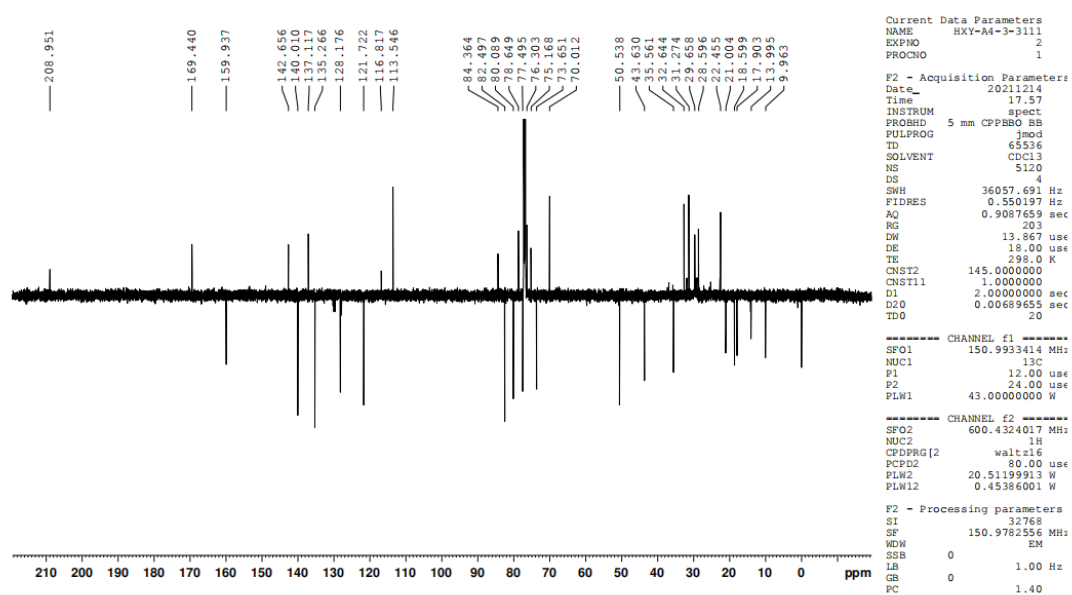


Figure S10. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **2**

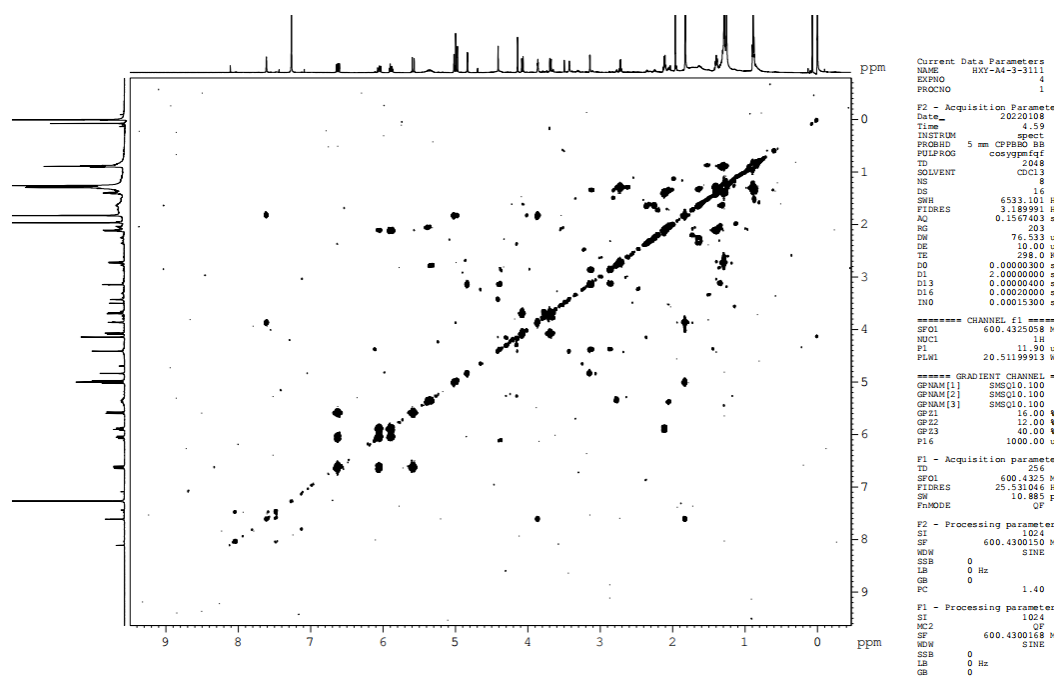


Figure S11. ^1H - ^1H COSY (CDCl_3) spectrum of **2**

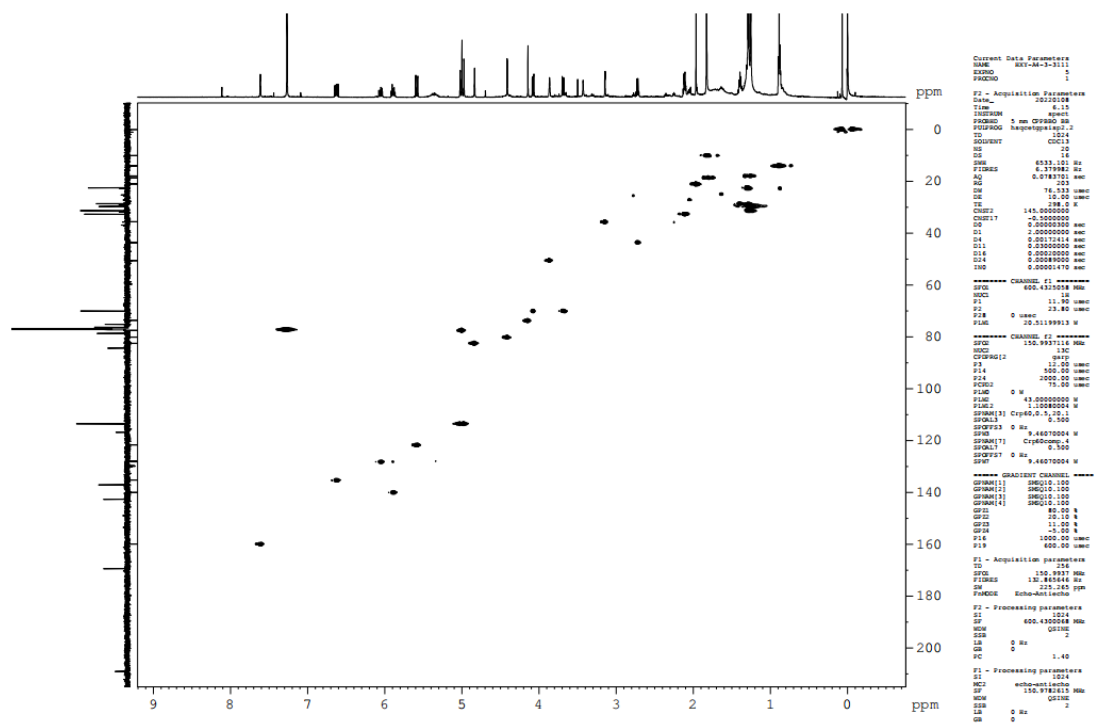


Figure S12. HSQC (CDCl₃) spectrum of **2**

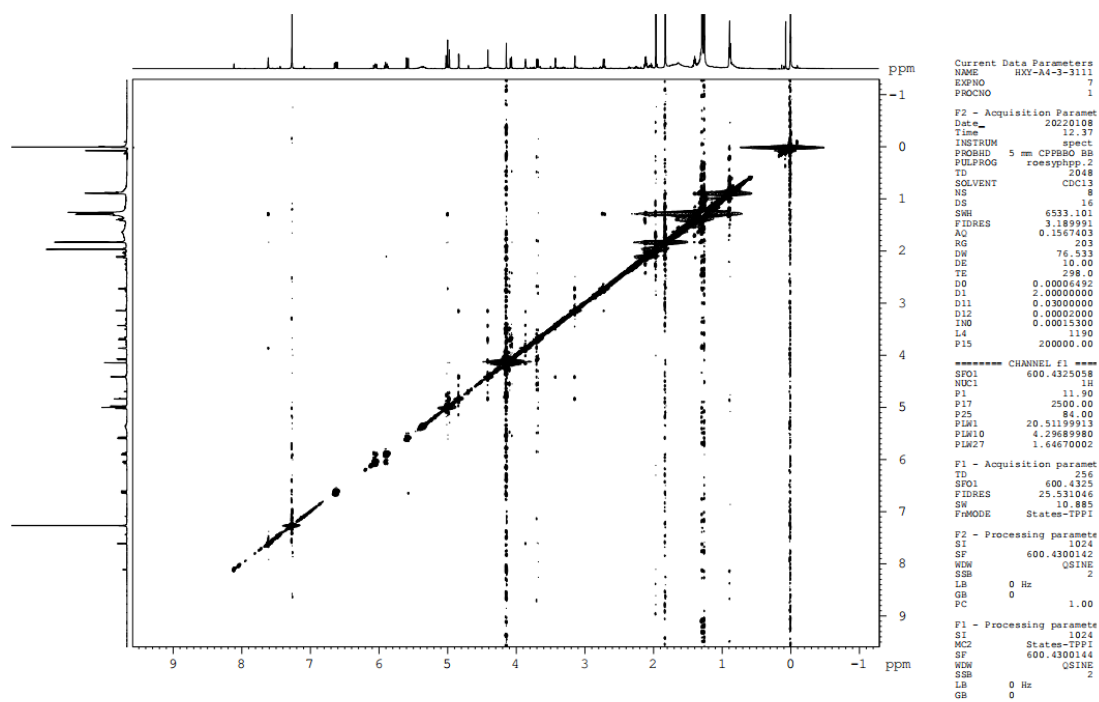


Figure S13. NOESY (CDCl₃) spectrum of **2**

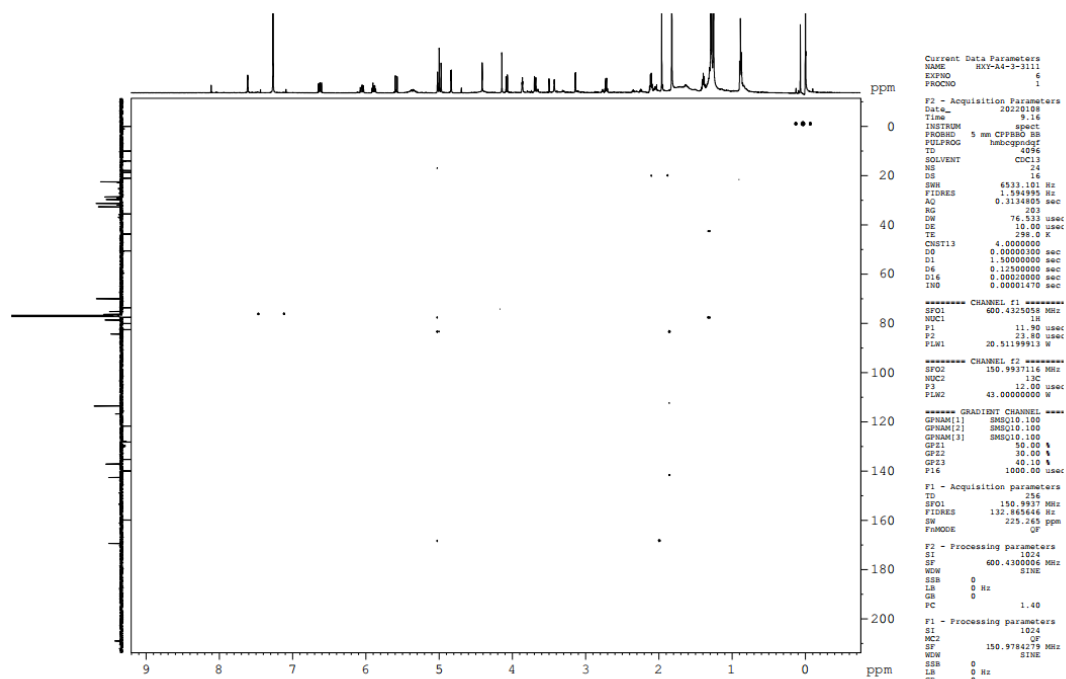


Figure S14. HMBC (CDCl₃) spectrum of **2**

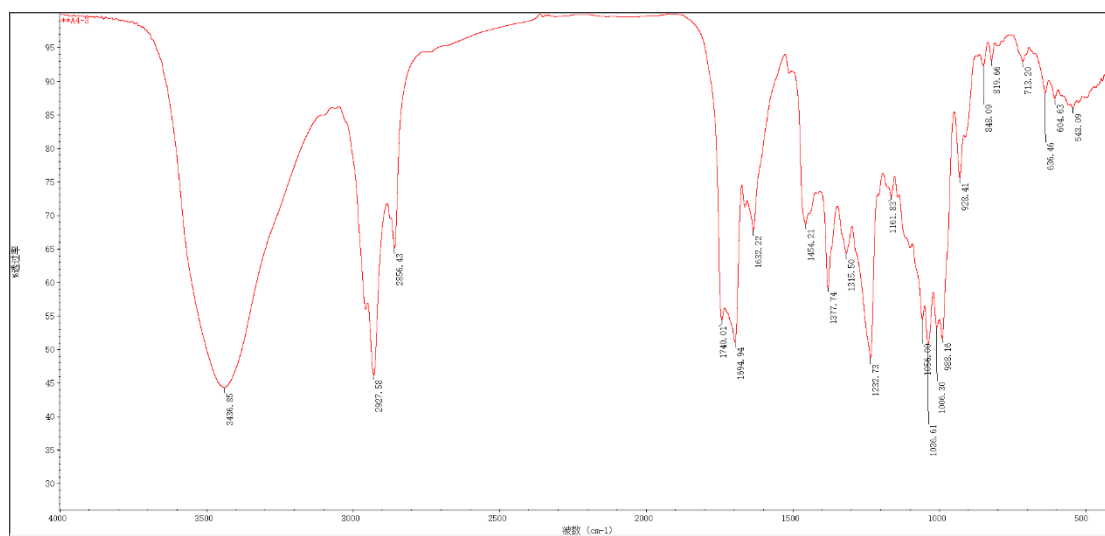


Figure S15. IR spectrum of **2**

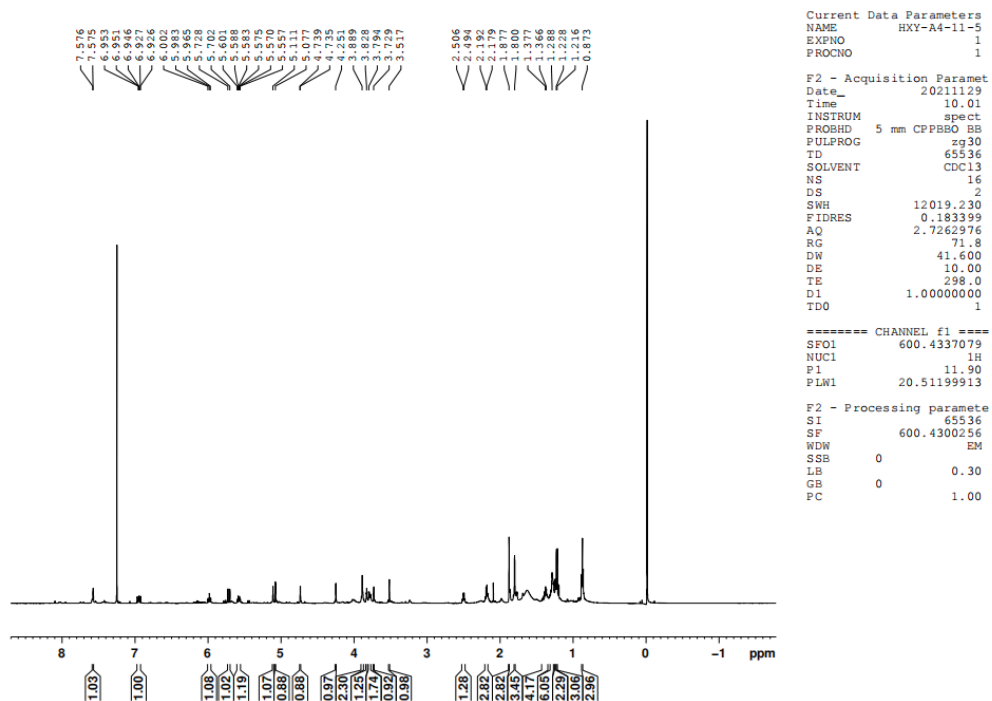
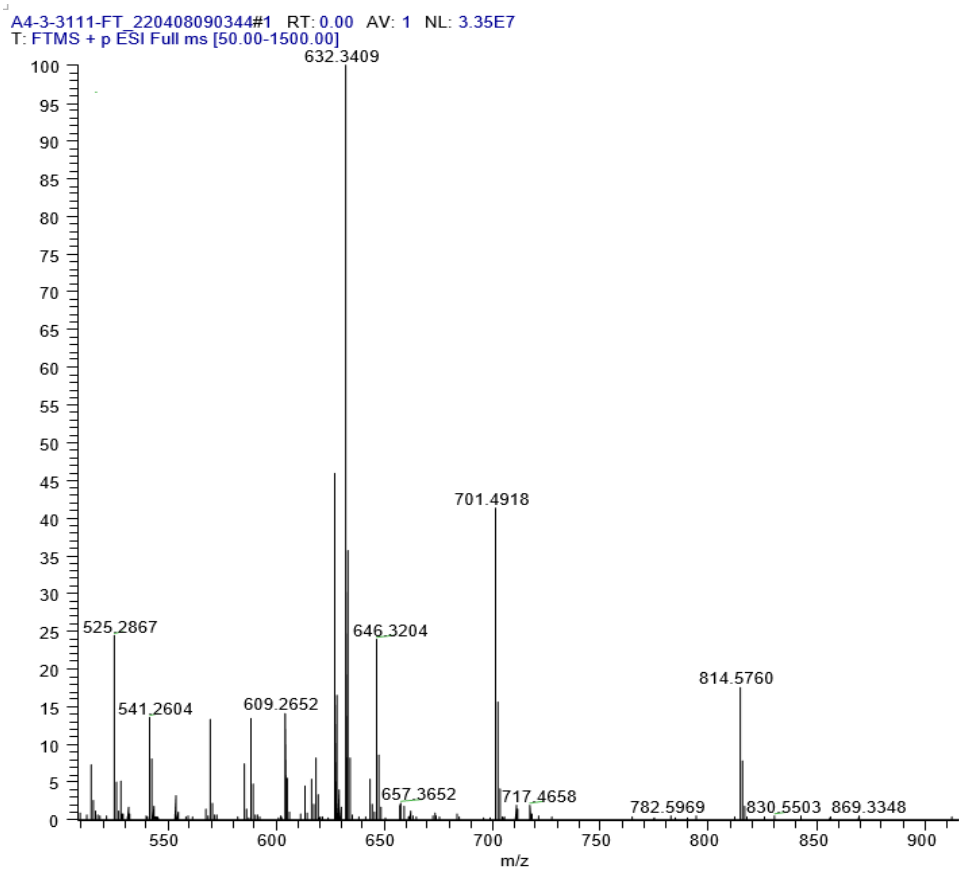


Figure S17. ¹H-NMR (600 MHz, CDCl₃) spectrum of **3**

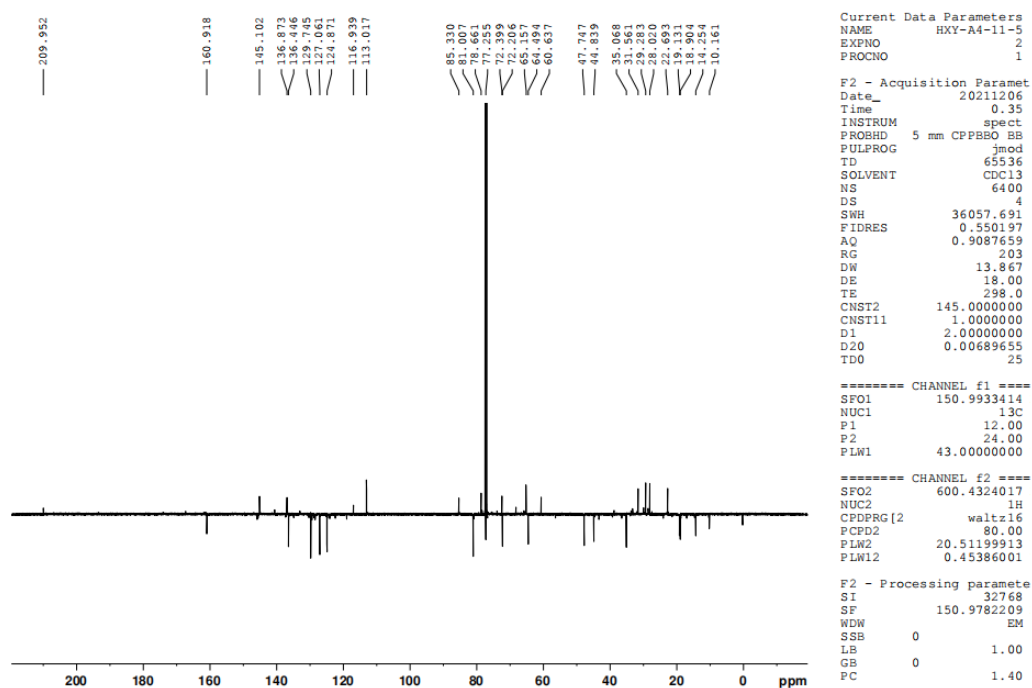


Figure S18. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **3**

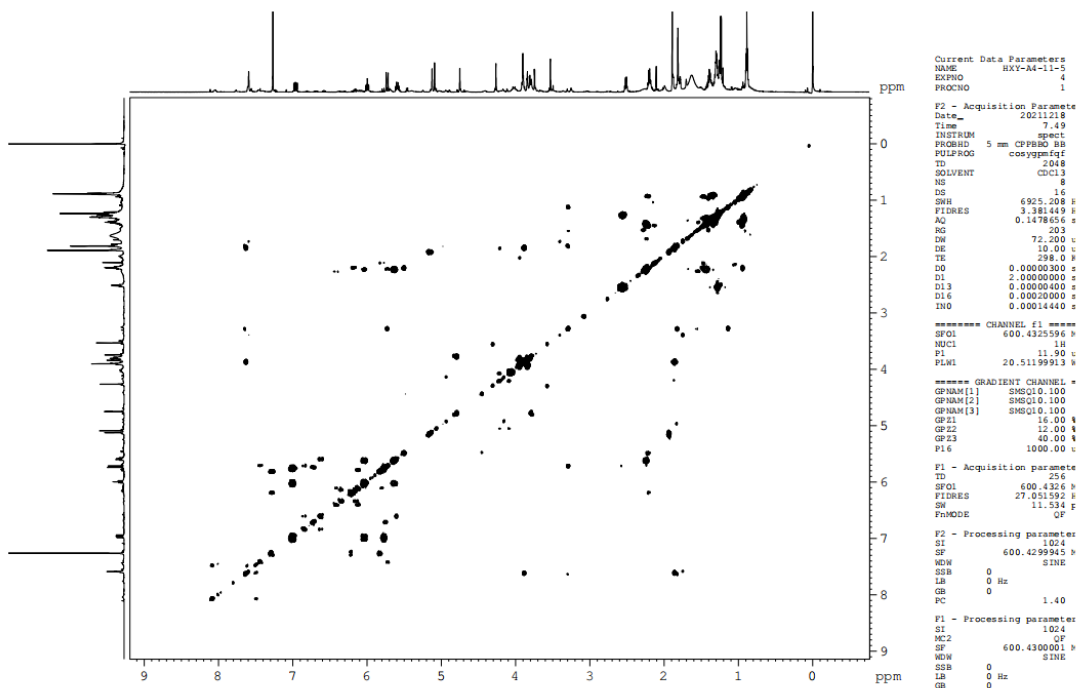


Figure S19. ^1H - ^1H COSY (CDCl_3) spectrum of **3**

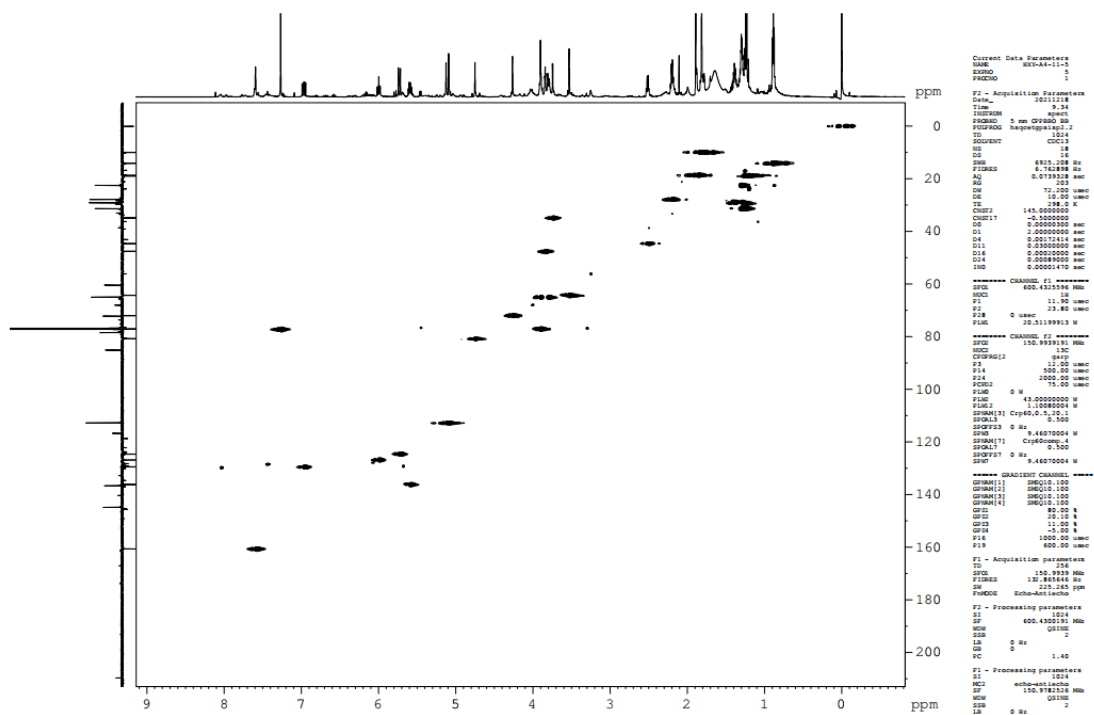


Figure S20. HSQC (CDCl₃) spectrum of **3**

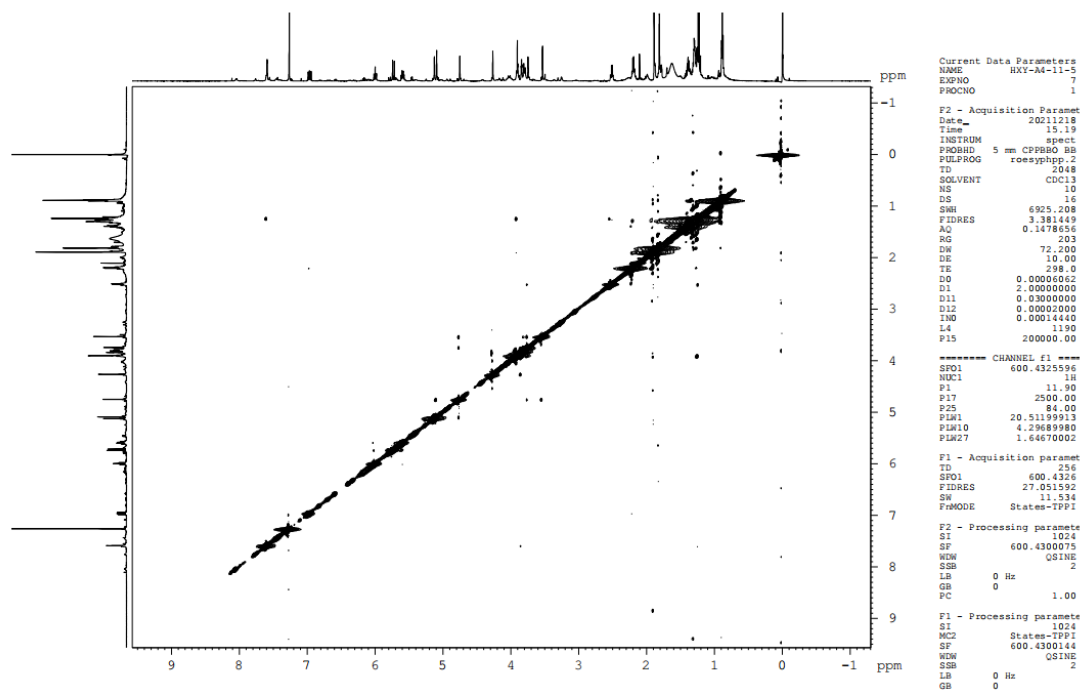


Figure S21. NOESY (CDCl₃) spectrum of **3**

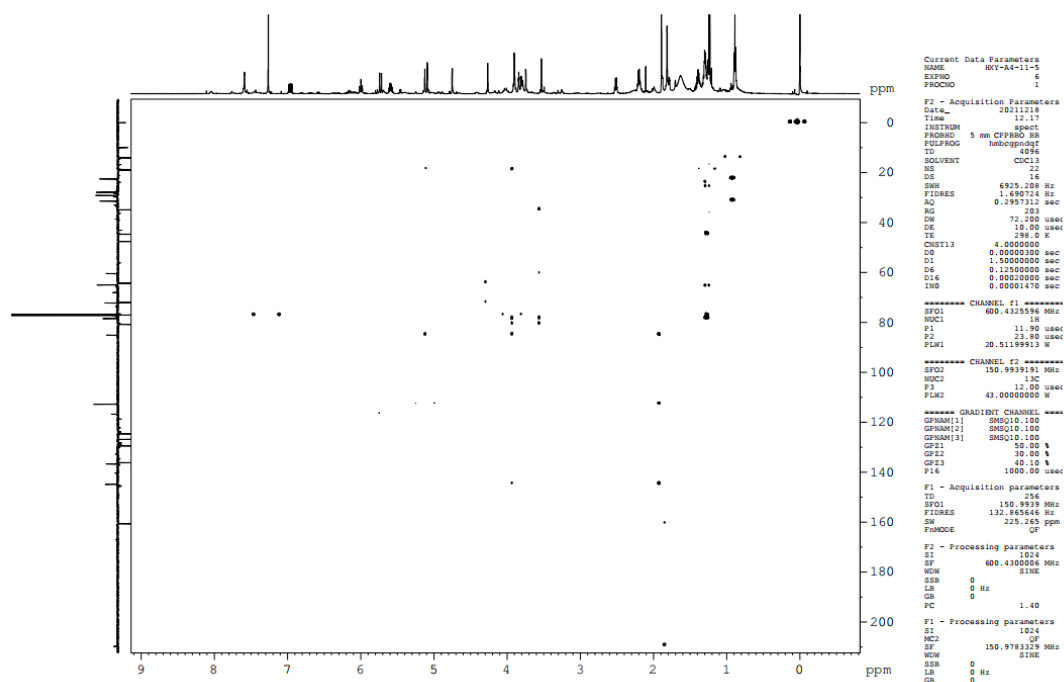


Figure S22. HMBC (CDCl₃) spectrum of **3**

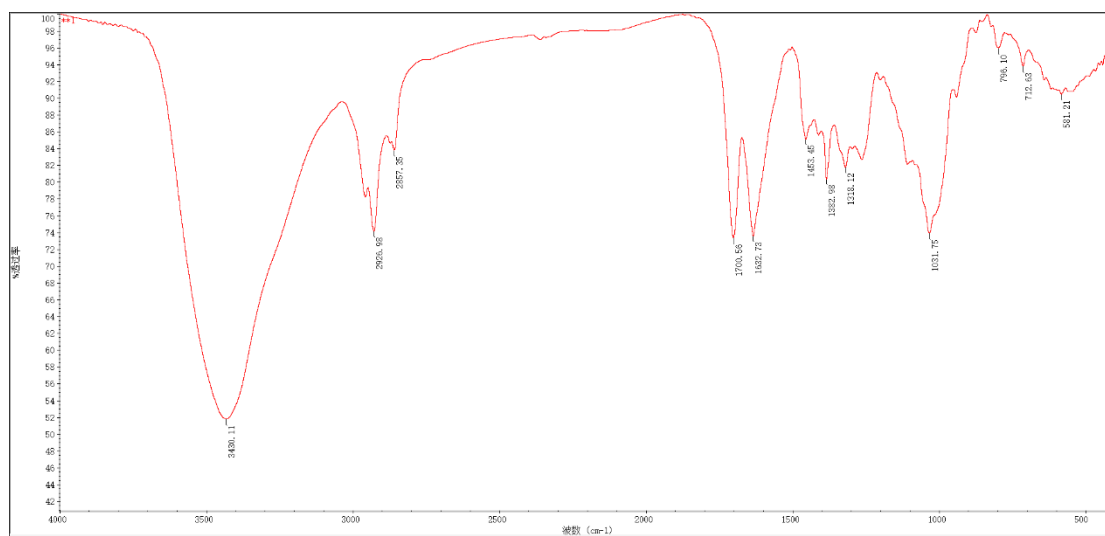


Figure S23. IR spectrum of **3**

A4-11-5-TF_220408090344 #1 RT: 0.00 AV: 1 NL: 2.60E7
T: FTMS + p ESI Full ms [50.00-1500.00]

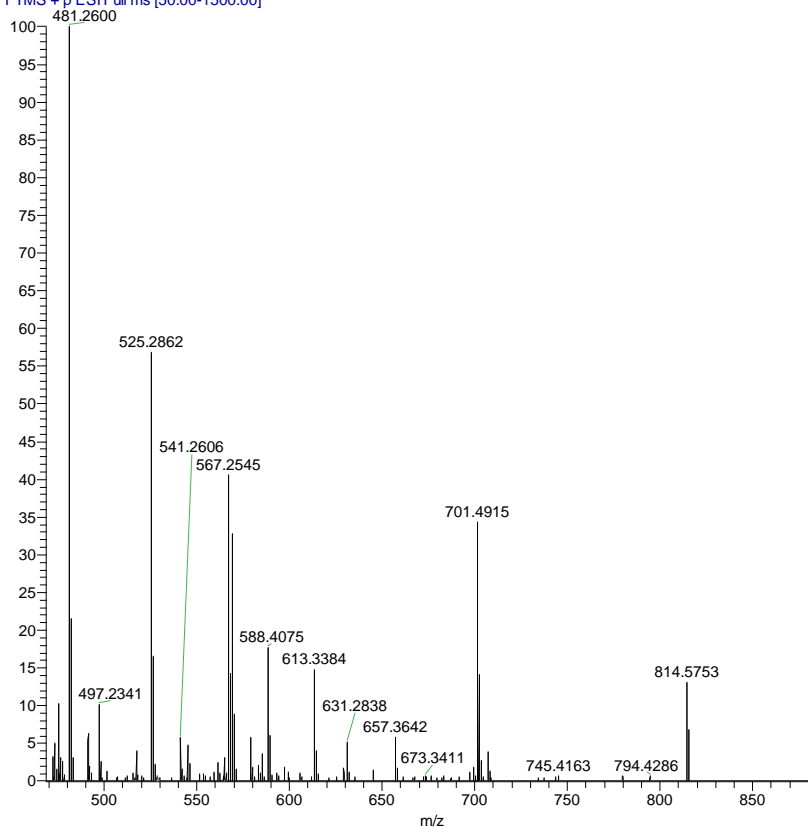


Figure S24. HRESIMS spectrum of **3**

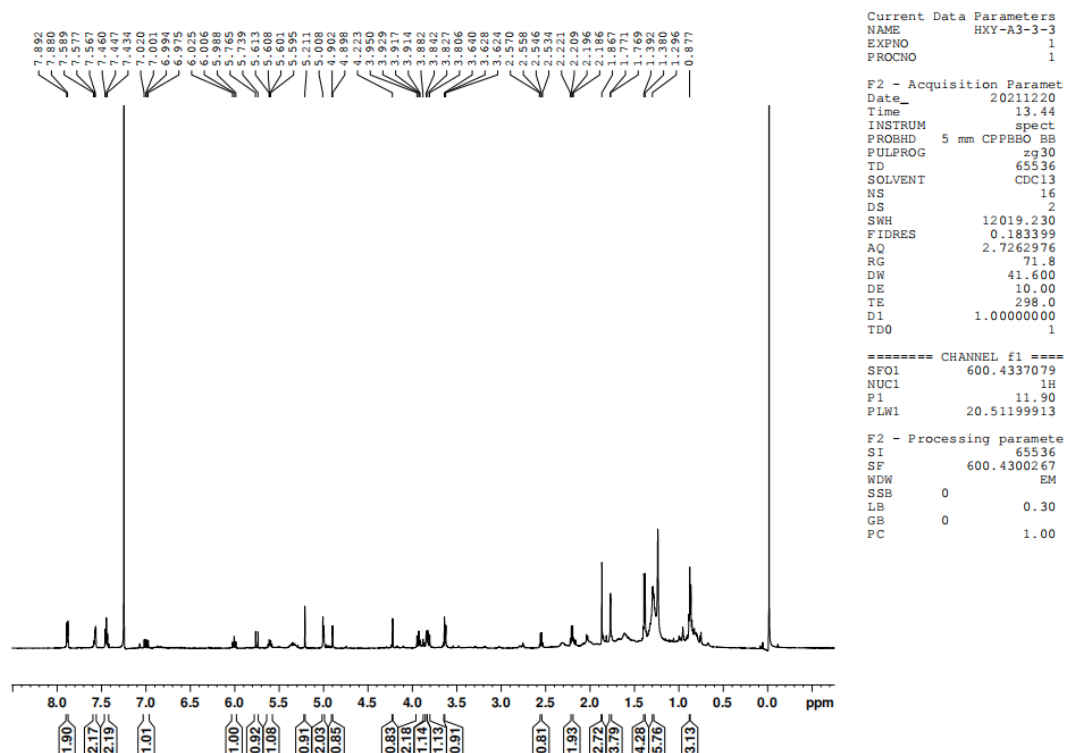


Figure S25. ¹H-NMR (600 MHz, CDCl₃) spectrum of **4**

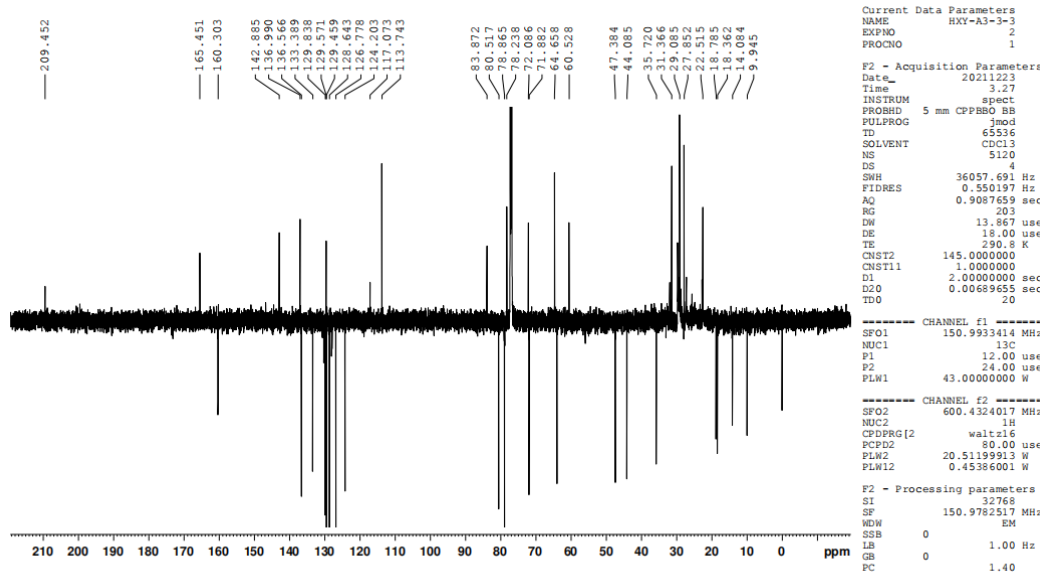


Figure S26. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **4**

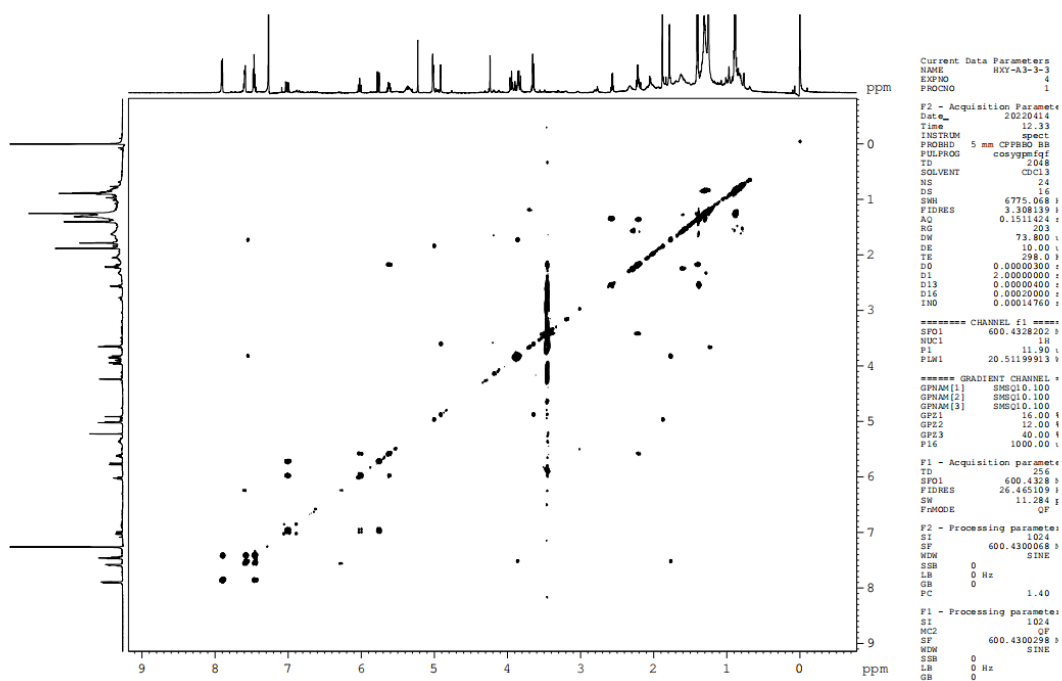


Figure S27. ^1H - ^1H COSY (CDCl_3) spectrum of **4**

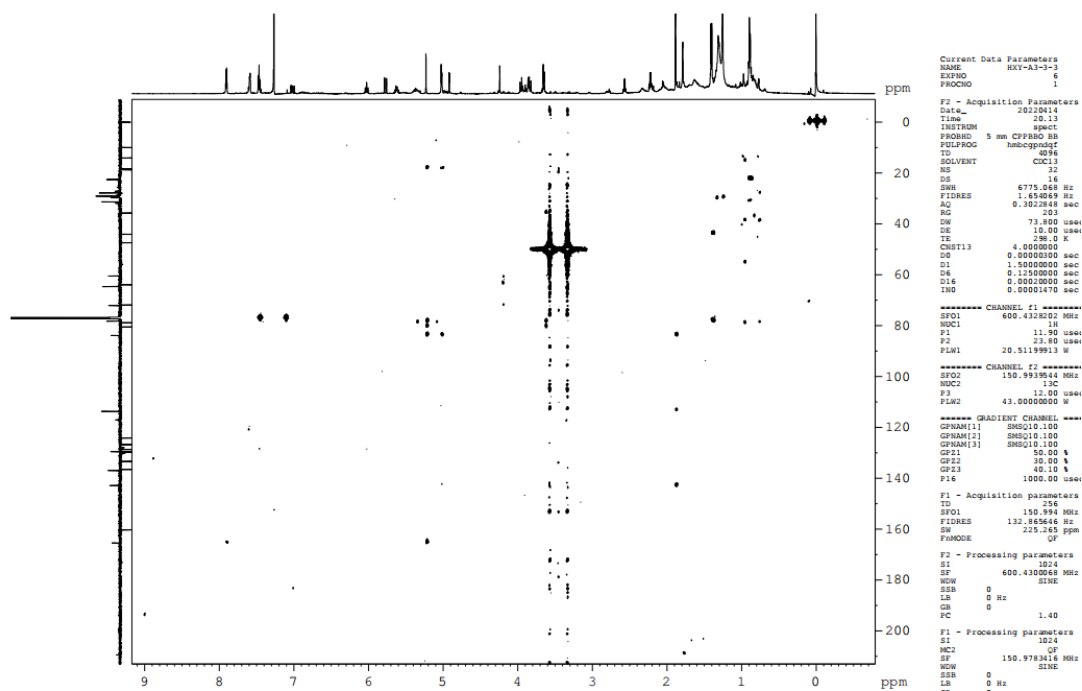


Figure S30. HMBC (CDCl₃) spectrum of **4**

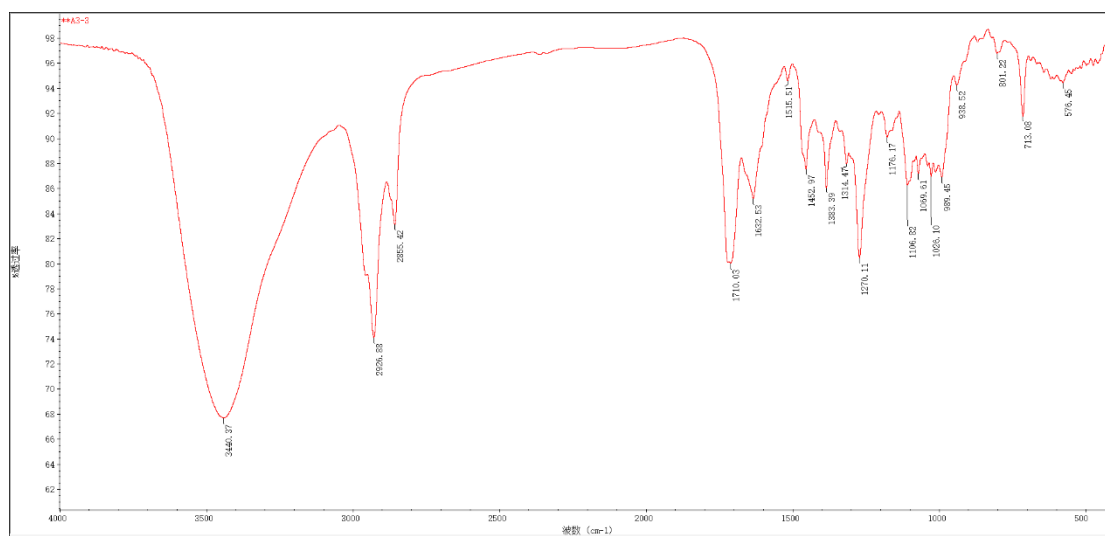


Figure S31. IR spectrum of **4**

A3-3-3-FT-220408090344 #1 RT: 0.01 AV: 1 NL: 3.36E5
T: FTMS + p ESI Full ms [50.00-1500.00]

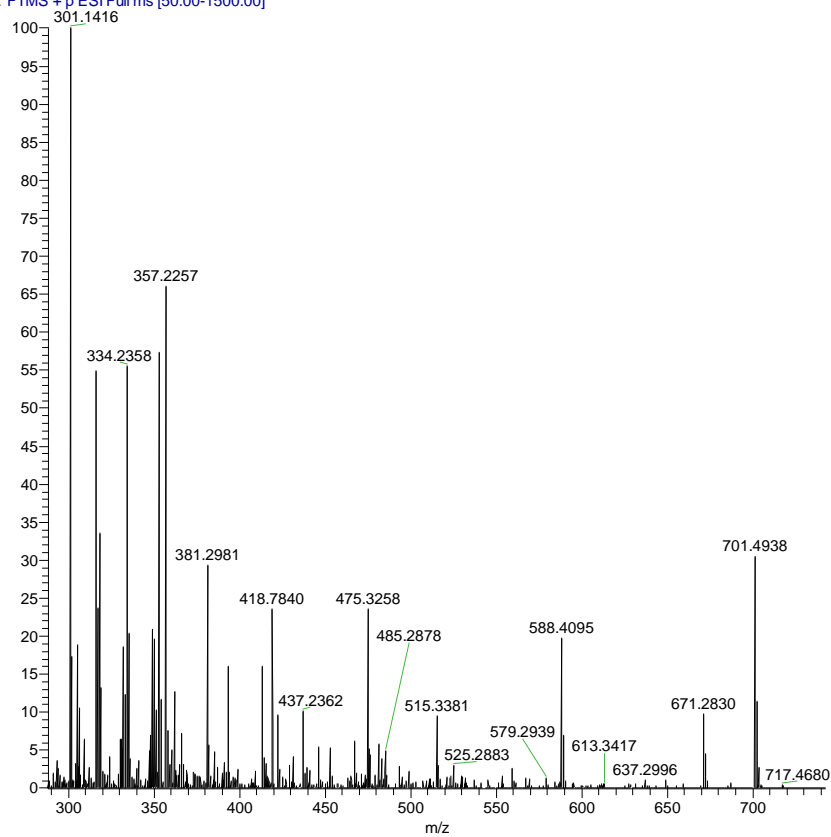


Figure S32. HRESIMS spectrum of 4

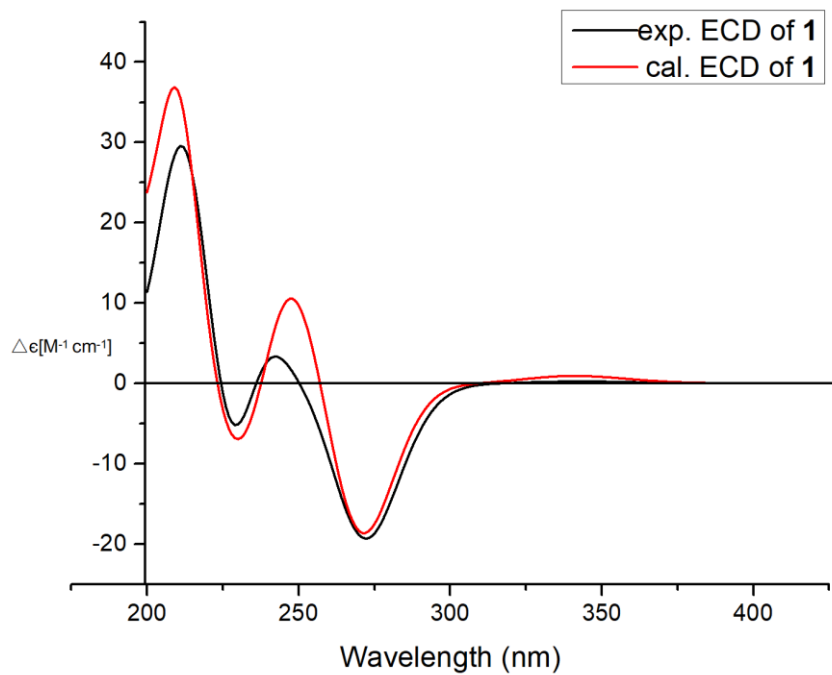


Figure S33. Experimental and calculated ECD spectra of 1

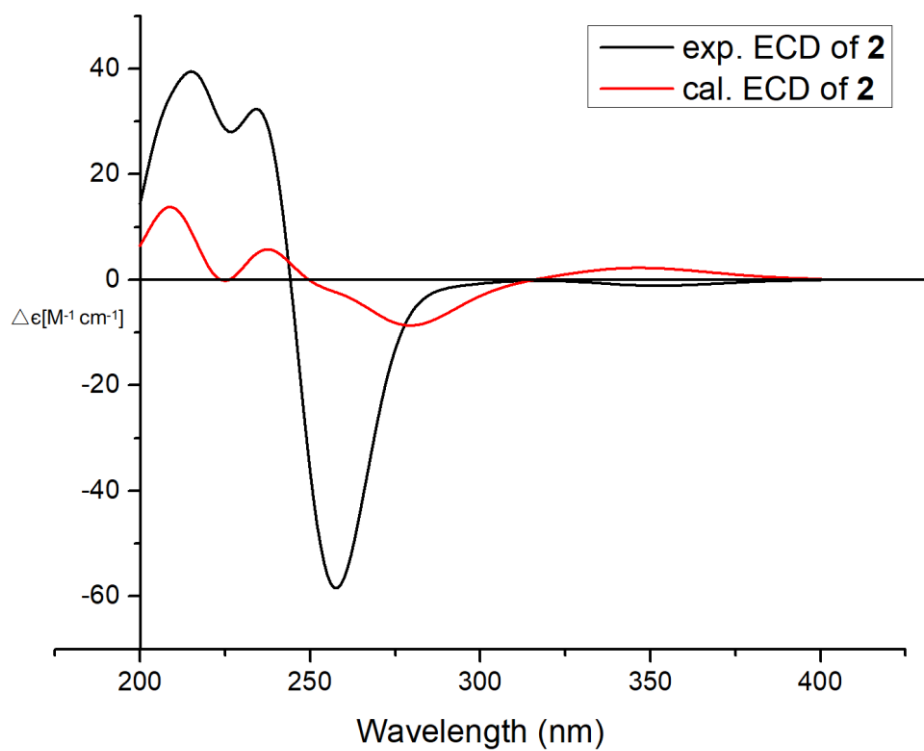


Figure S34. Experimental and calculated ECD spectra of **2**

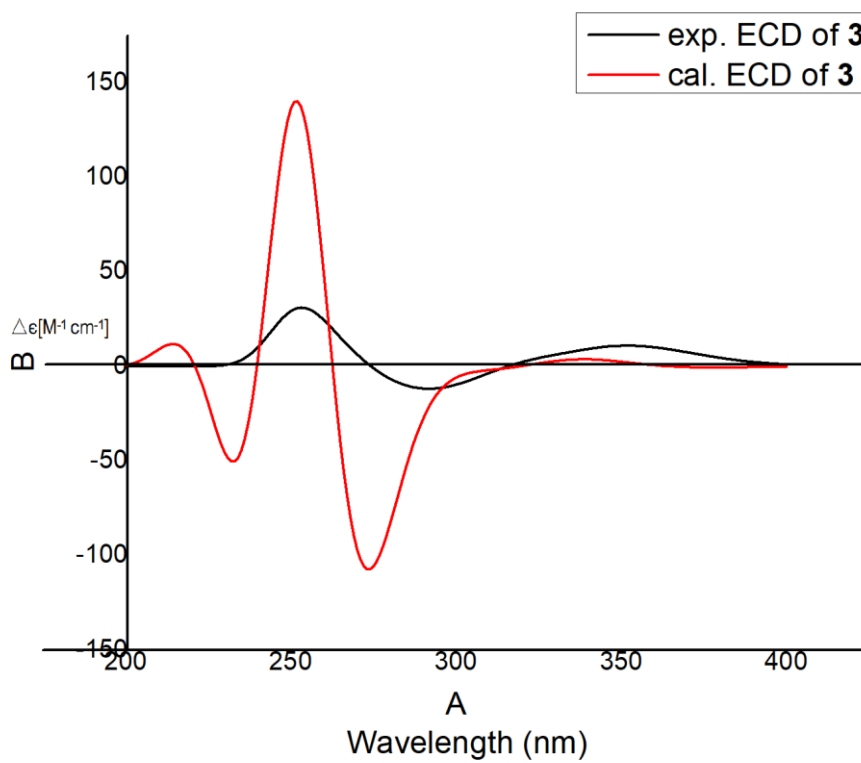


Figure S35. Experimental and calculated ECD spectra of **3**

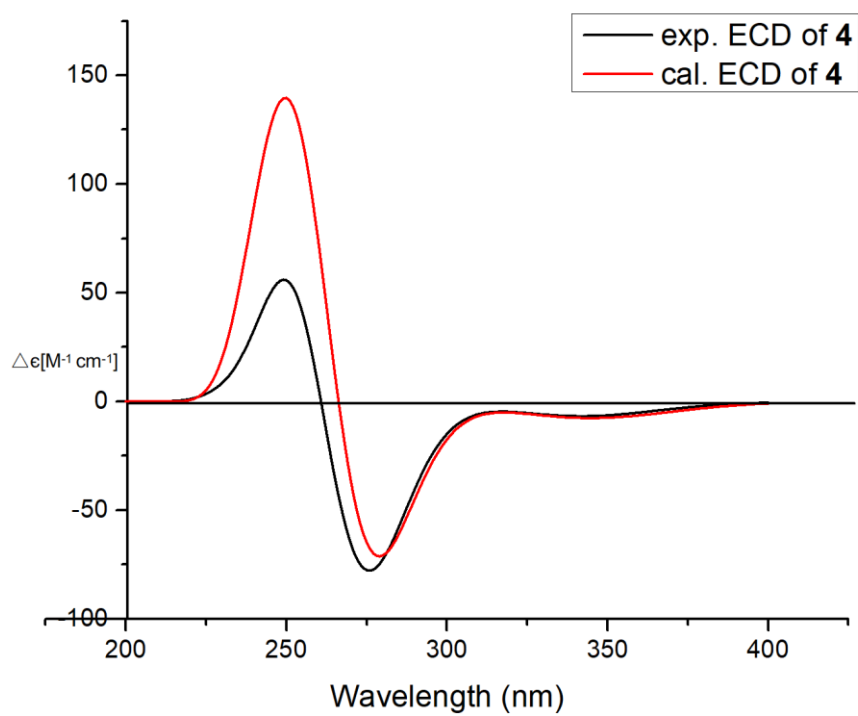


Figure S36. Experimental and calculated ECD spectra of **4**

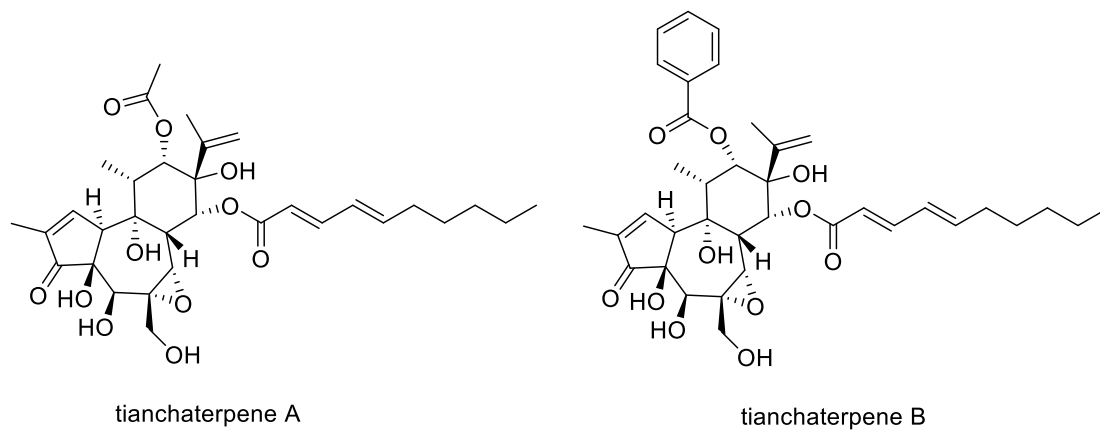


Figure S37. The structure of tianchaterpene A and tianchaterpene B.

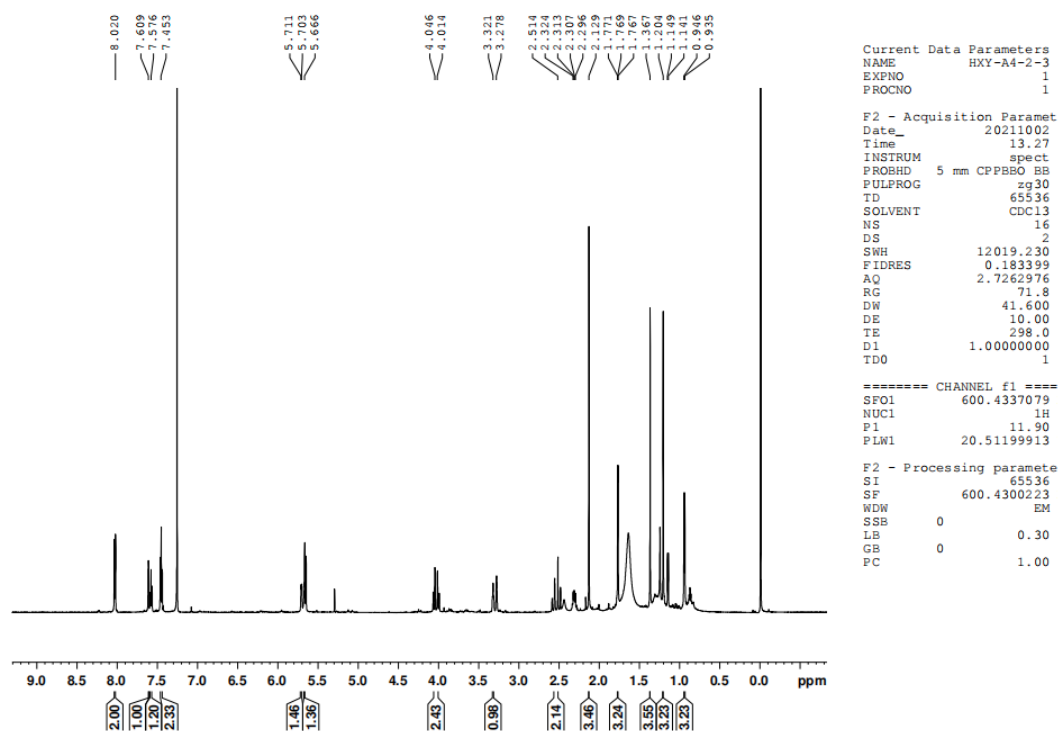


Figure S38. ^1H -NMR (600 MHz, CDCl_3) spectrum of **5**

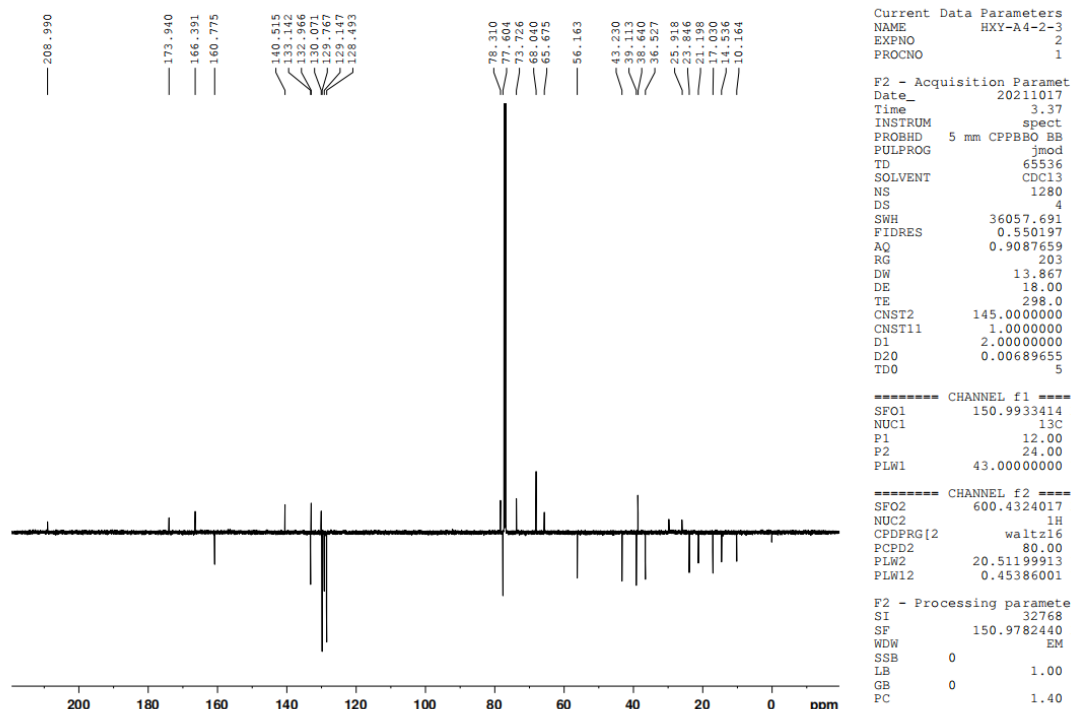


Figure S39. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **5**

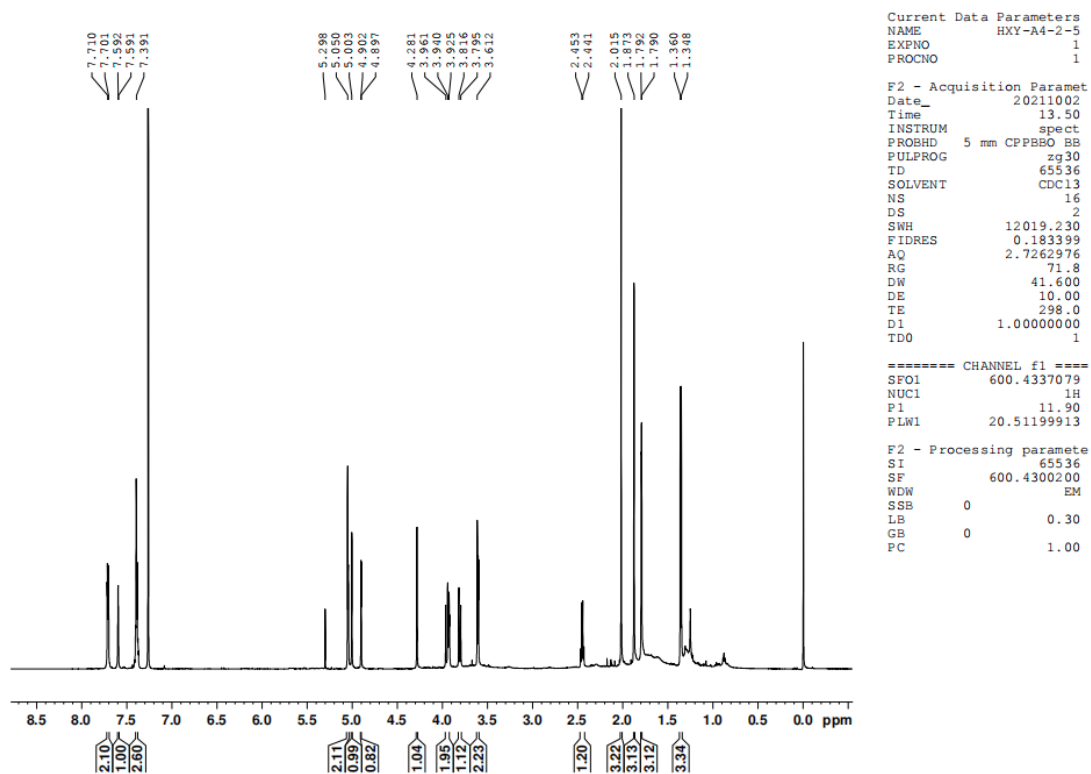


Figure S40. ¹H-NMR (600 MHz, CDCl₃) spectrum of **6**

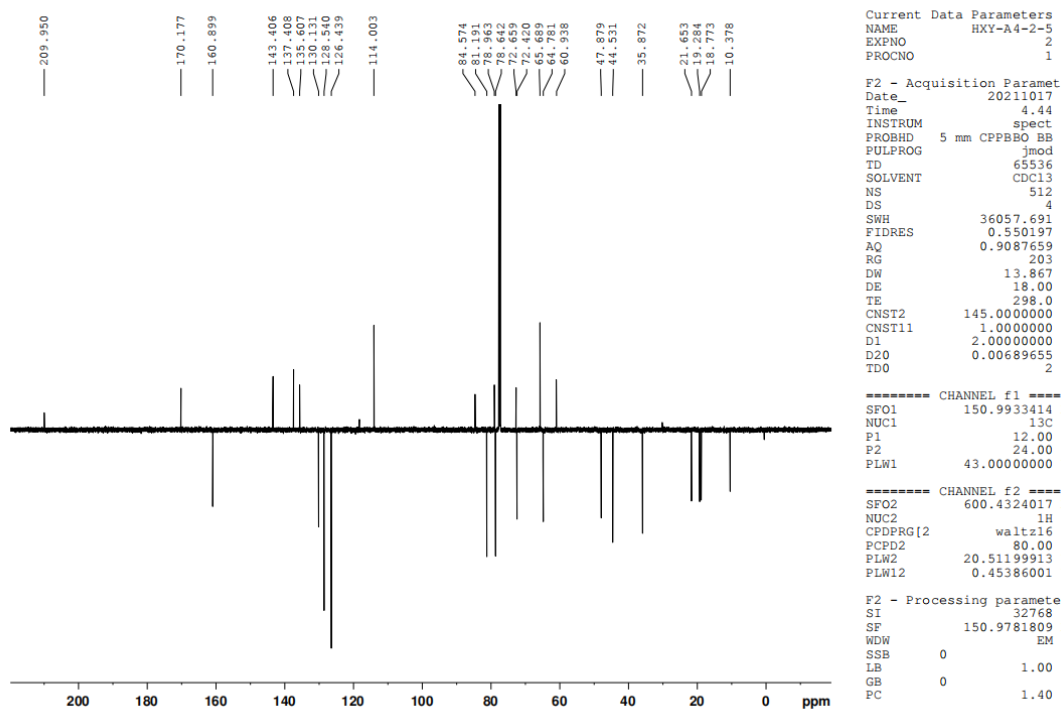


Figure S41. ¹³C-APT (150 MHz, CDCl₃) spectrum of **6**

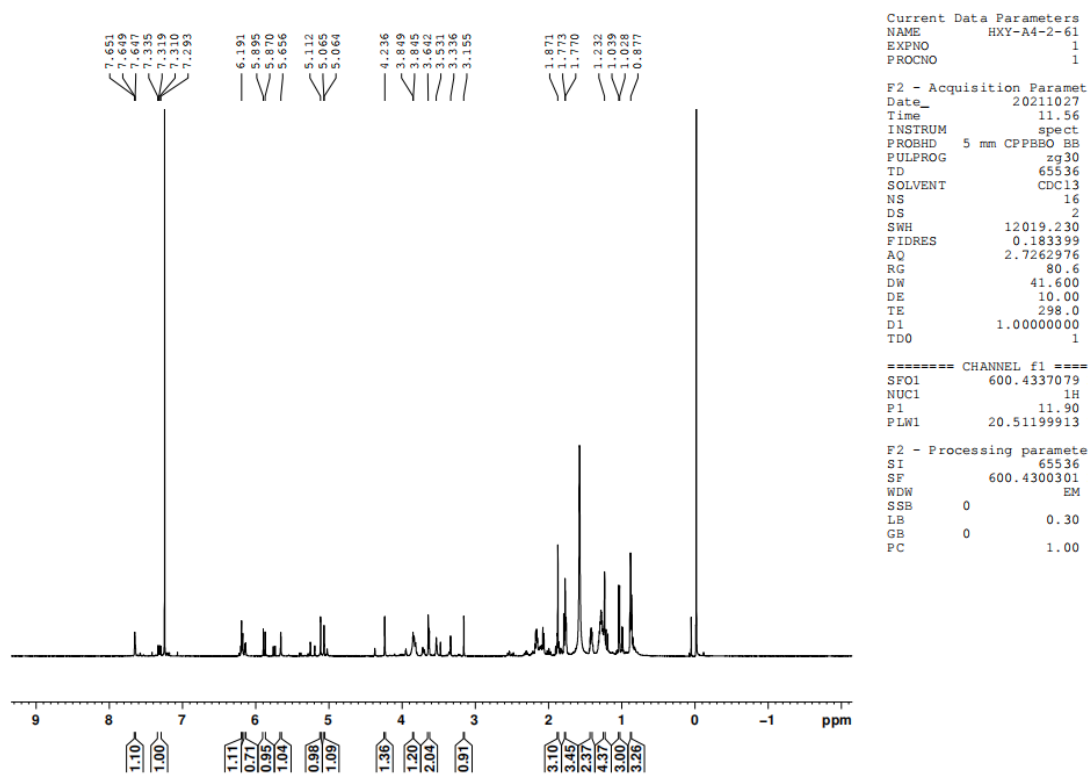


Figure S42. ^1H -NMR (600 MHz, CDCl_3) spectrum of **7**

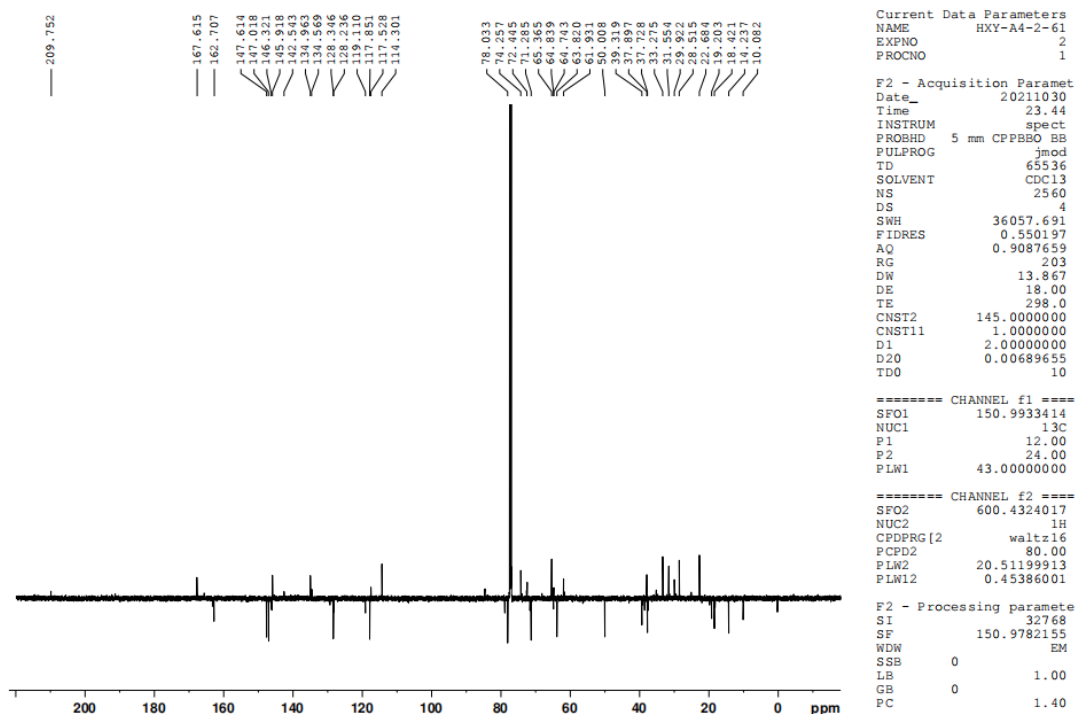


Figure S43. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **7**

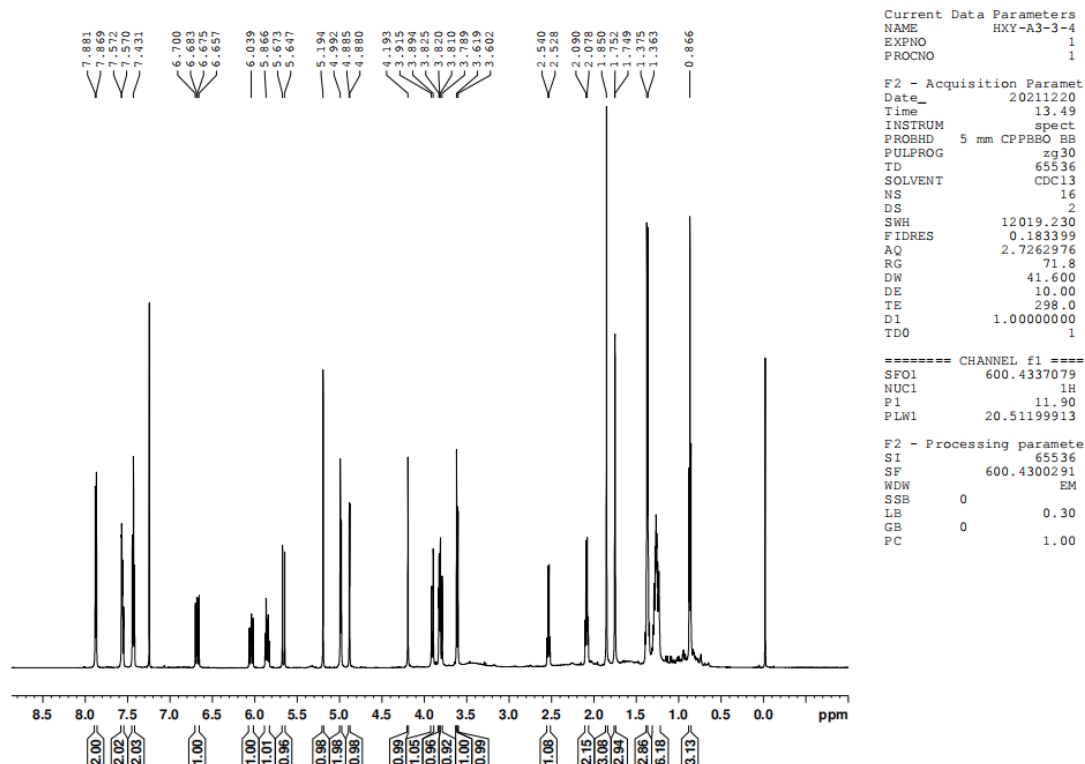


Figure S44. ^1H -NMR (600 MHz, CDCl_3) spectrum of **8**

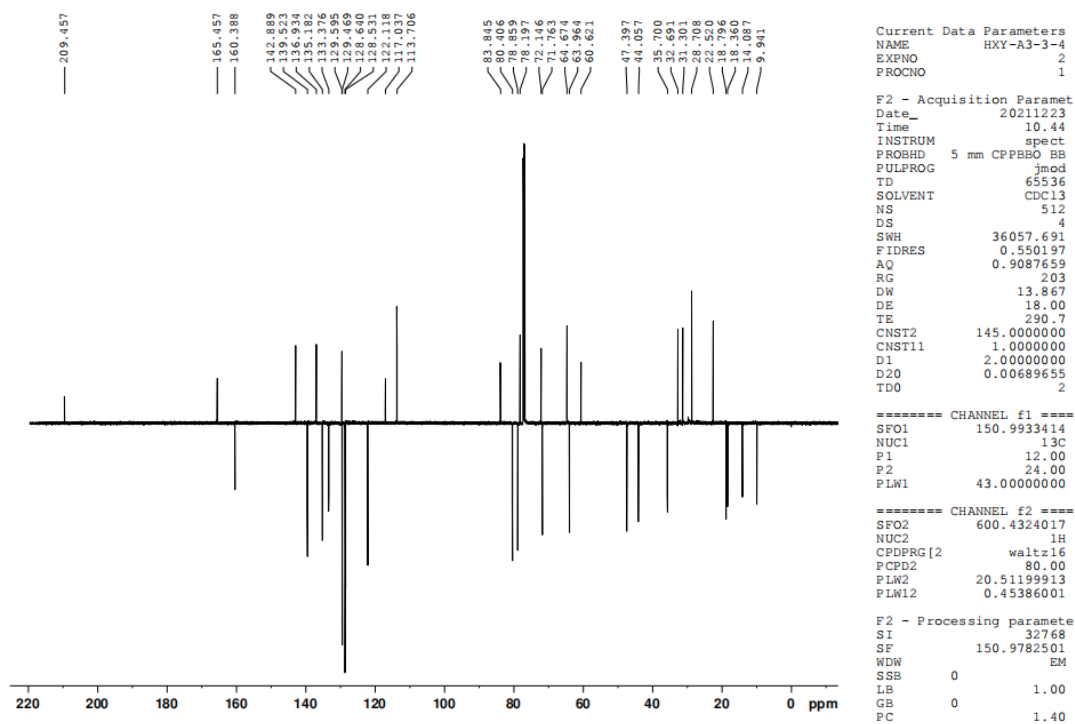


Figure S45. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **8**

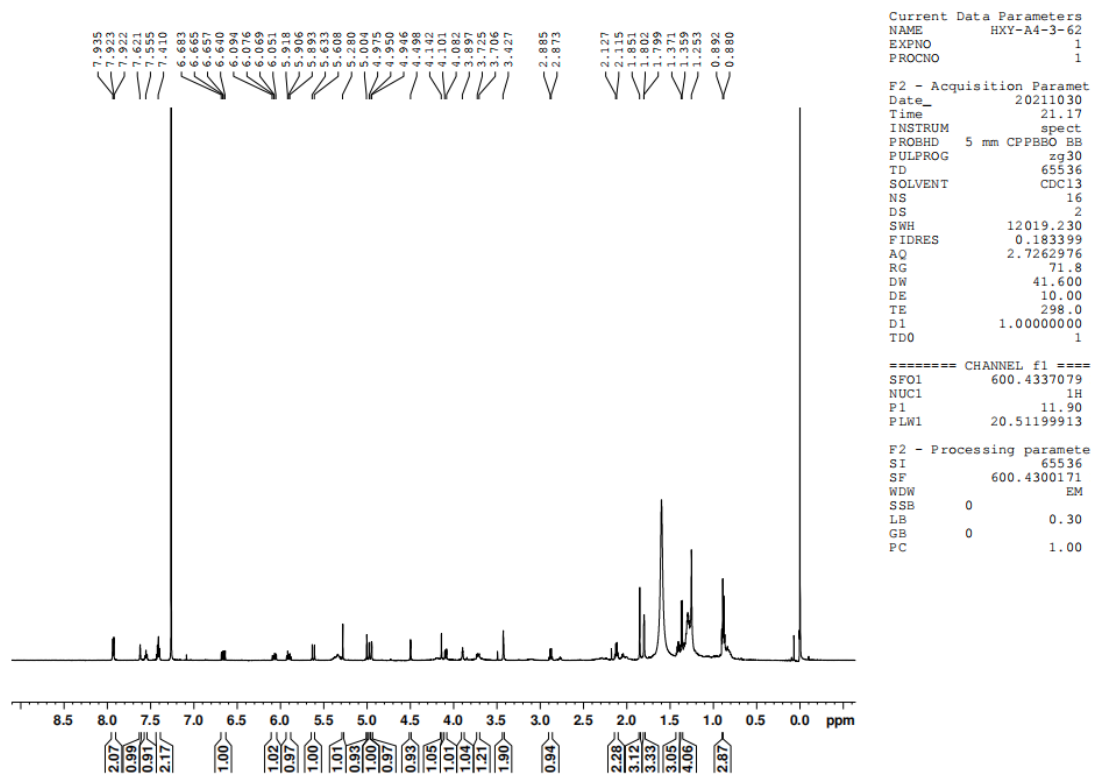


Figure S46. ¹H-NMR (600 MHz, CDCl₃) spectrum of **9**

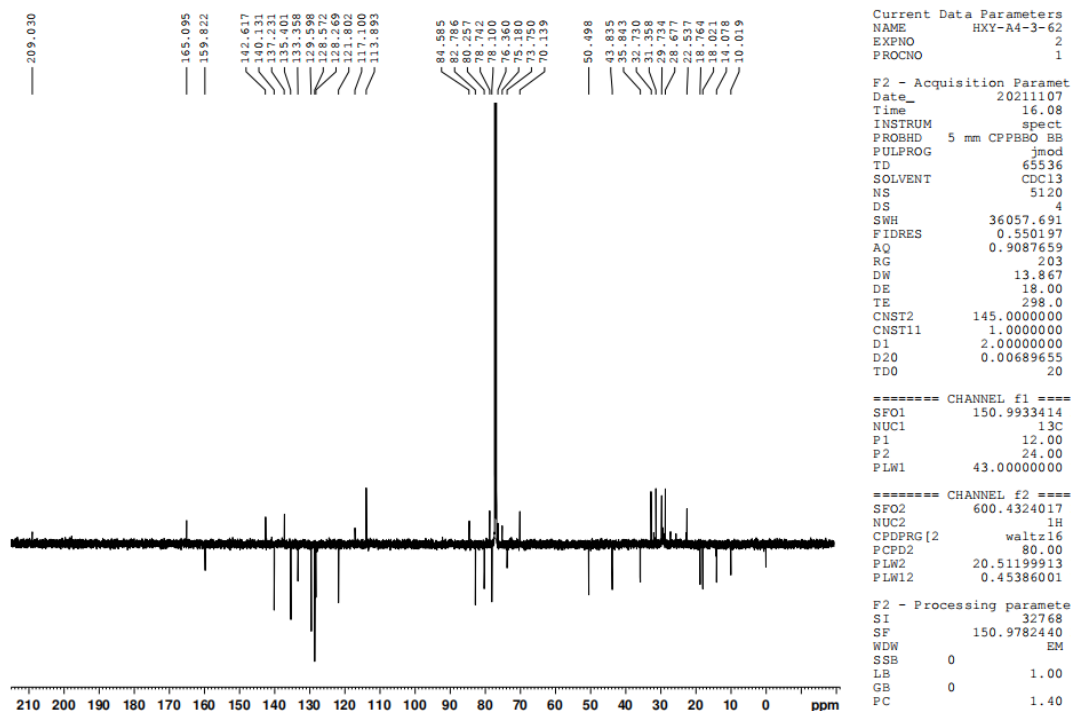


Figure S47. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **9**

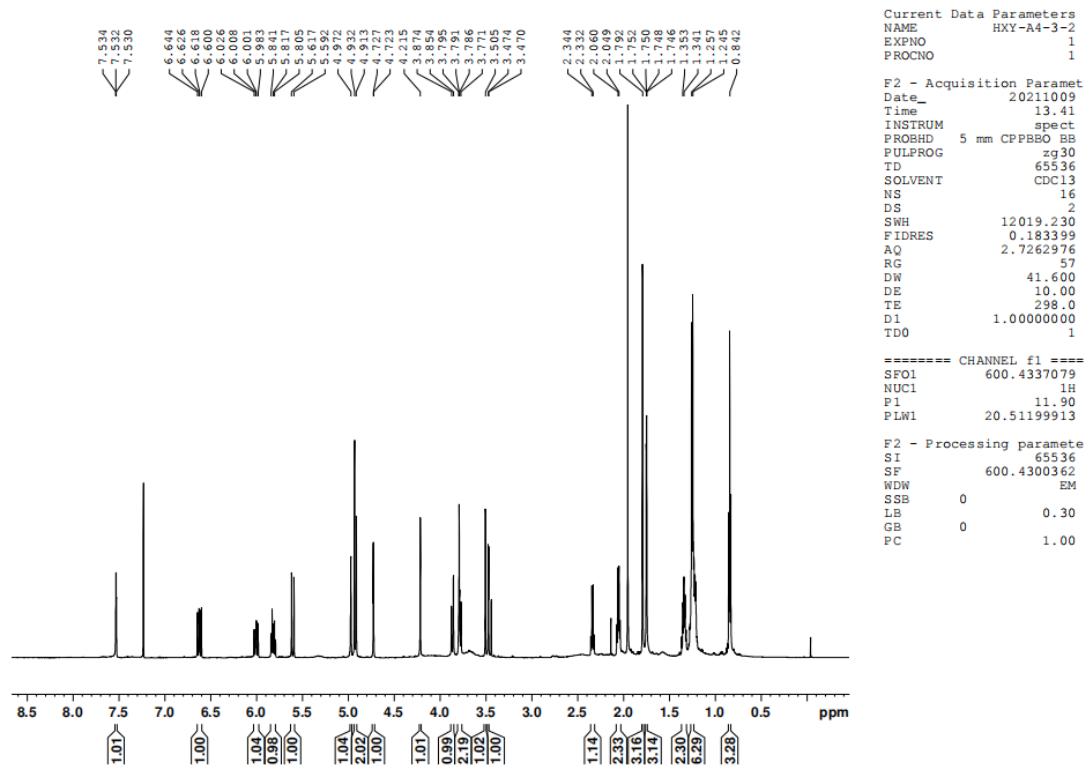


Figure S48. ^1H -NMR (600 MHz, CDCl_3) spectrum of **10**

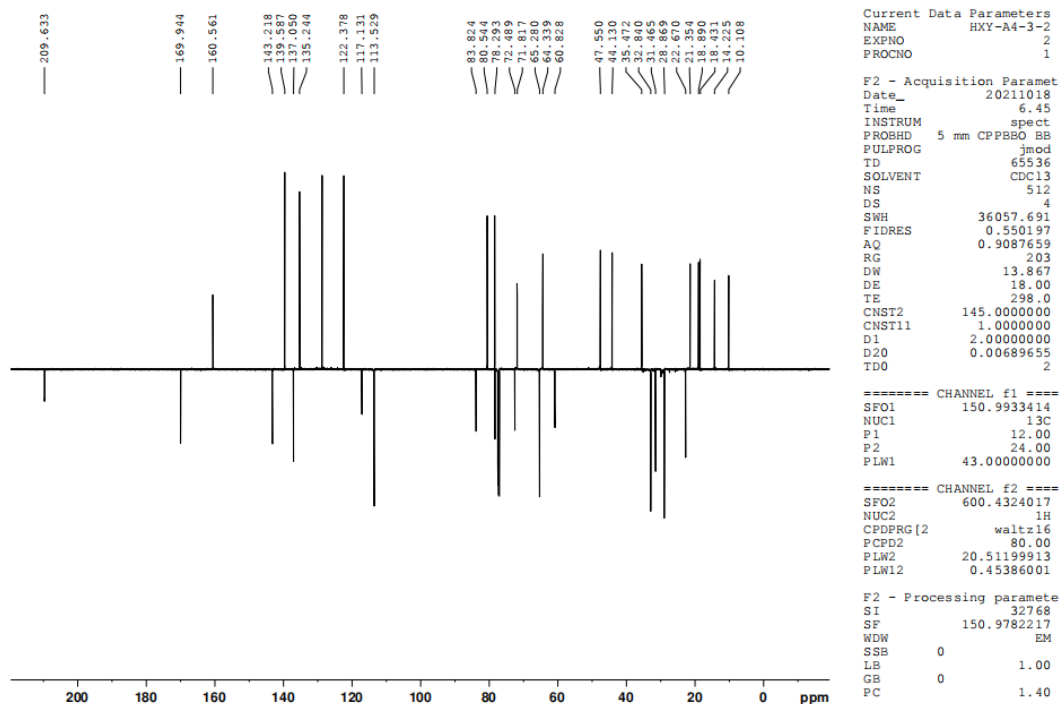


Figure S49. ^{13}C -APT (150 MHz, CDCl_3) spectrum of **10**

The figures of cytotoxicity data (against HGC-27) for the tested compounds **1-10**

Compound 1

Concentration(μ M)	\bar{x}_{OD}	%Viability \pm STDEV ($\bar{v} \pm s$)
12.5	1.4065	14.4933 \pm 0.54
25	1.3885	15.5876 \pm 1.26
50	0.5385	67.2624 \pm 1.43
100	0.1285	92.1880 \pm 0.78
200	0.11	93.3127 \pm 0.89

Compound 2

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	0.6200	51.1157 \pm 0.96
25	0.1630	87.1482 \pm 0.67
50	0.0860	93.2193 \pm 0.98
100	0.0835	93.4164 \pm 1.39
200	0.076	94.0077 \pm 2.27

Compound 3

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	0.8865	30.1033 \pm 1.08
25	0.6695	47.2128 \pm 0.96
50	0.1155	90.8933 \pm 0.74
100	0.0875	93.1010 \pm 1.68
200	0.0730	94.2443 \pm 2.09

Compound 4

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	0.6200	11.8505 \pm 1.31
25	0.1630	44.8474 \pm 0.92
50	0.0860	92.5491 \pm 1.65
100	0.0835	93.4164 \pm 1.67
200	0.0760	93.7712 \pm 2.08

Compound 5

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	1.37	16.7123 \pm 2.15
25	1.3625	17.1682 \pm 1.31
50	0.315	80.8499 \pm 2.18
100	0.128	92.2184 \pm 1.09
200	0.1055	93.5862 \pm 0.77

Compound 6

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	1.271	22.7309 \pm 1.26
25	1.2805	22.1533 \pm 0.79
50	0.5155	68.6607 \pm 1.23
100	0.1235	92.4919 \pm 2.61
200	0.1065	93.5254 \pm 0.81

Compound 7

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	1.416	13.9157 \pm 0.29
25	1.1945	27.3816 \pm 2.01
50	0.5059	69.0255 \pm 0.94
100	0.12	92.7047 \pm 1.09
200	0.128	92.2184 \pm 0.94

Compound 8

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	0.9635	41.4250 \pm 0.92
25	0.4675	71.5788 \pm 1.07
50	0.112	93.1911 \pm 1.37
100	0.0925	94.3766 \pm 2.38
200	0.0895	94.5589 \pm 1.63

Compound 9

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	1.063	35.3760 \pm 0.68
25	0.654	60.2407 \pm 2.39
50	0.123	92.5223 \pm 2.11
100	0.094	94.2854 \pm 1.97
200	0.087	94.7109 \pm 1.64

Compound 10

Concentration(μ M)	\bar{x}_{OD}	$\bar{v} \pm s$
12.5	0.962	41.5162 \pm 0.91
25	0.098	94.0422 \pm 1.25
50	0.0835	94.9237 \pm 1.09
100	0.077	95.3189 \pm 0.98
200	0.0785	95.2277 \pm 1.67