

Supplementary File

for

Antibacterial Alkaloids and Polyketide Derivatives from the Deep Sea-Derived Fungus *Penicillium* *cyclopium* SD-413

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Figure S1. HRESIMS spectrum of compound **1**.

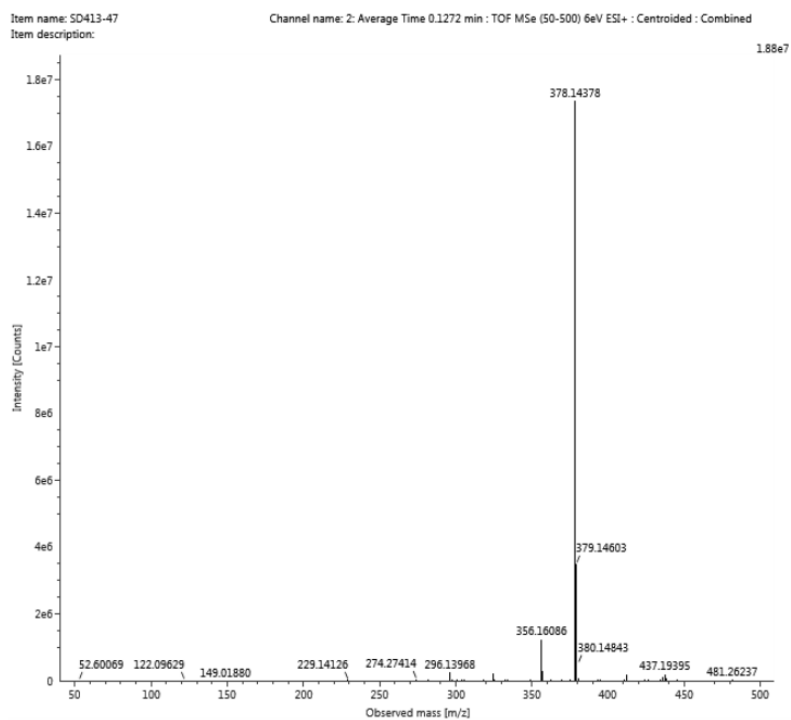


Figure S2. ^1H NMR (500 MHz, $\text{DMSO}-d_6$) spectrum of compound **1**.

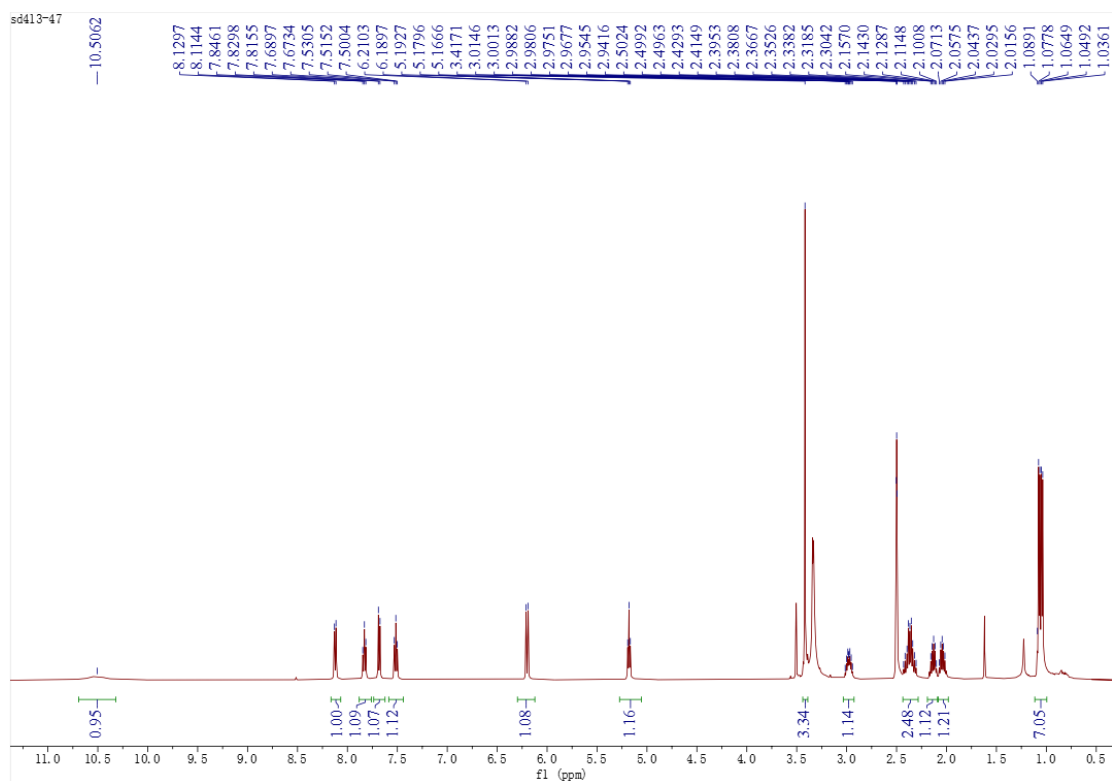


Figure S3. ^{13}C NMR (125 MHz, $\text{DMSO}-d_6$) and DEPT spectra of compound **1**.

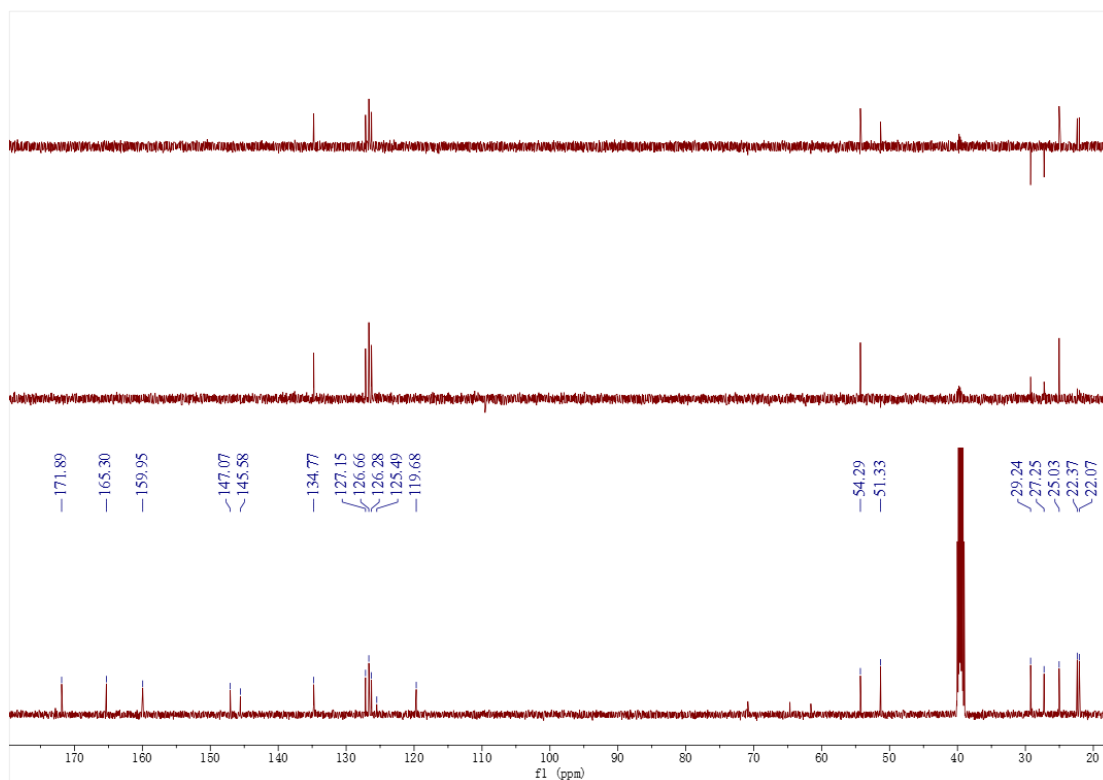


Figure S4. COSY spectrum of compound **1**.

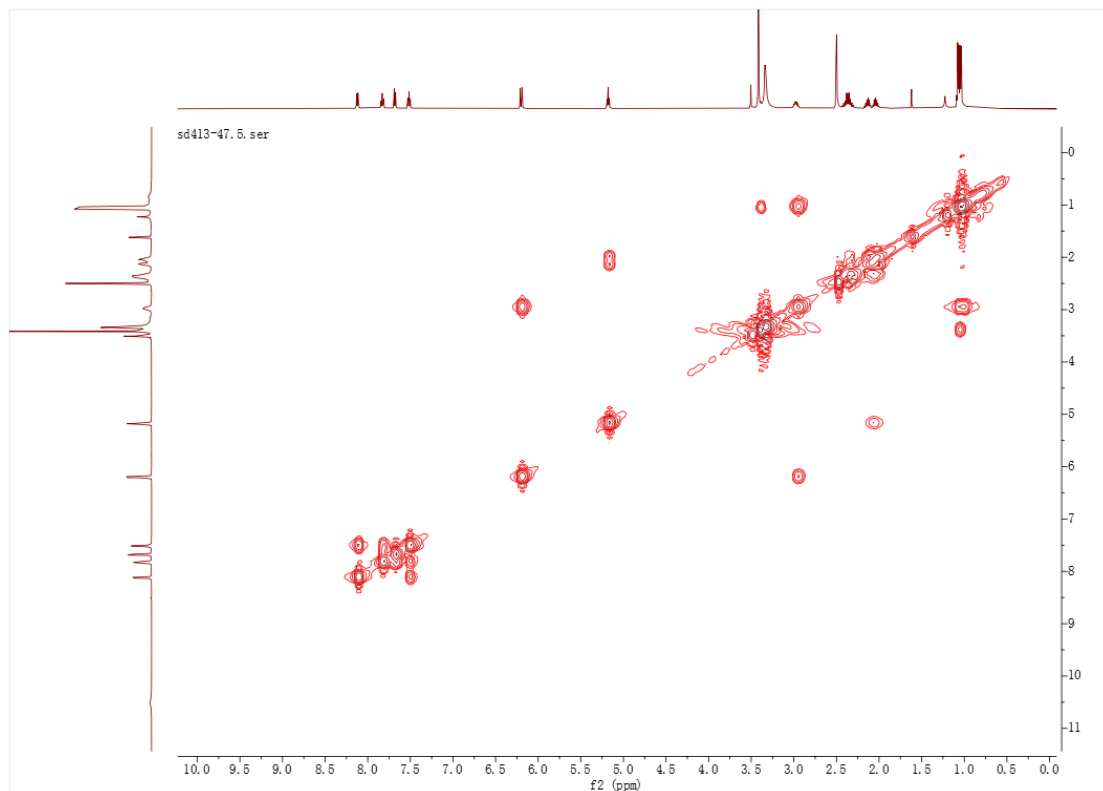


Figure S5. HSQC spectrum of compound **1**.

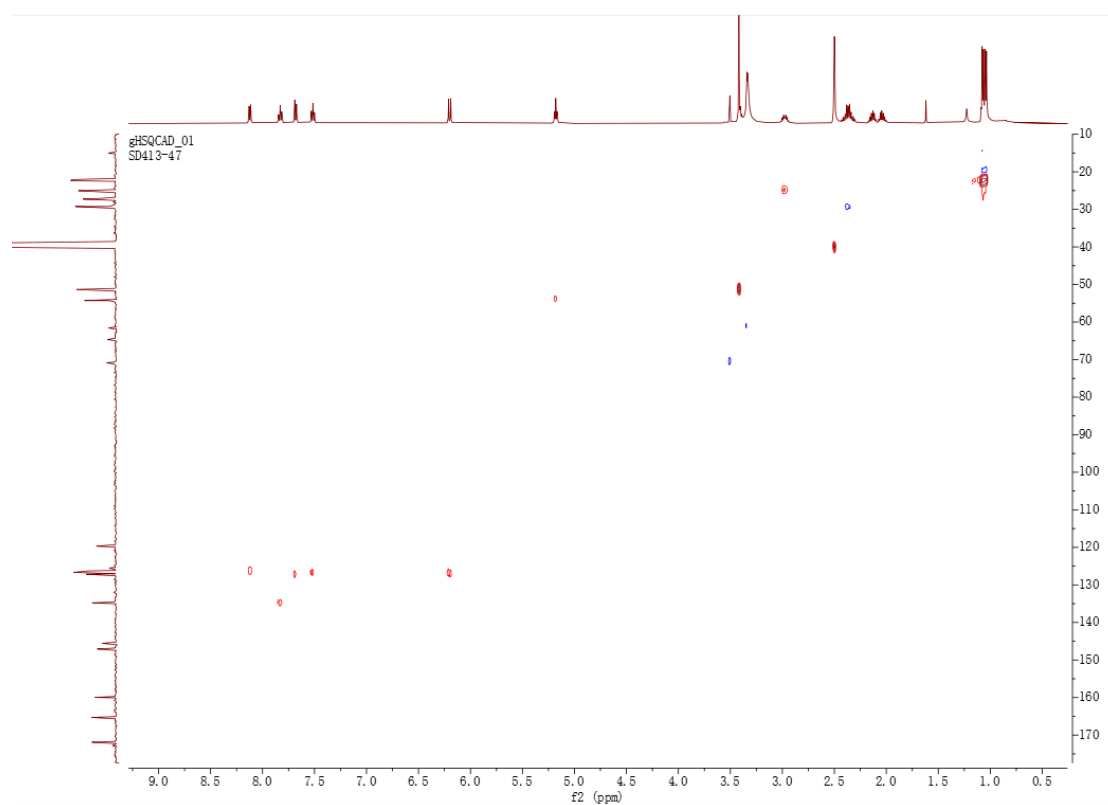


Figure S6. HMBC spectrum of compound **1**.

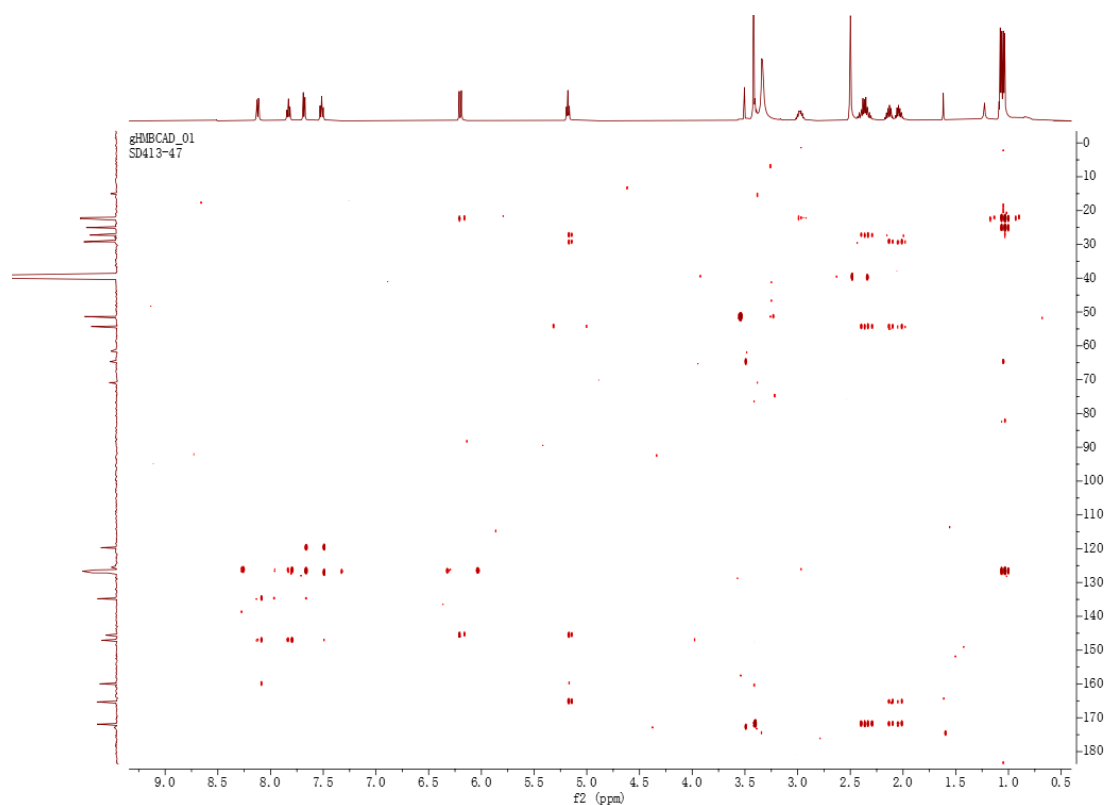


Figure S7. NOESY spectrum of compound **1**.

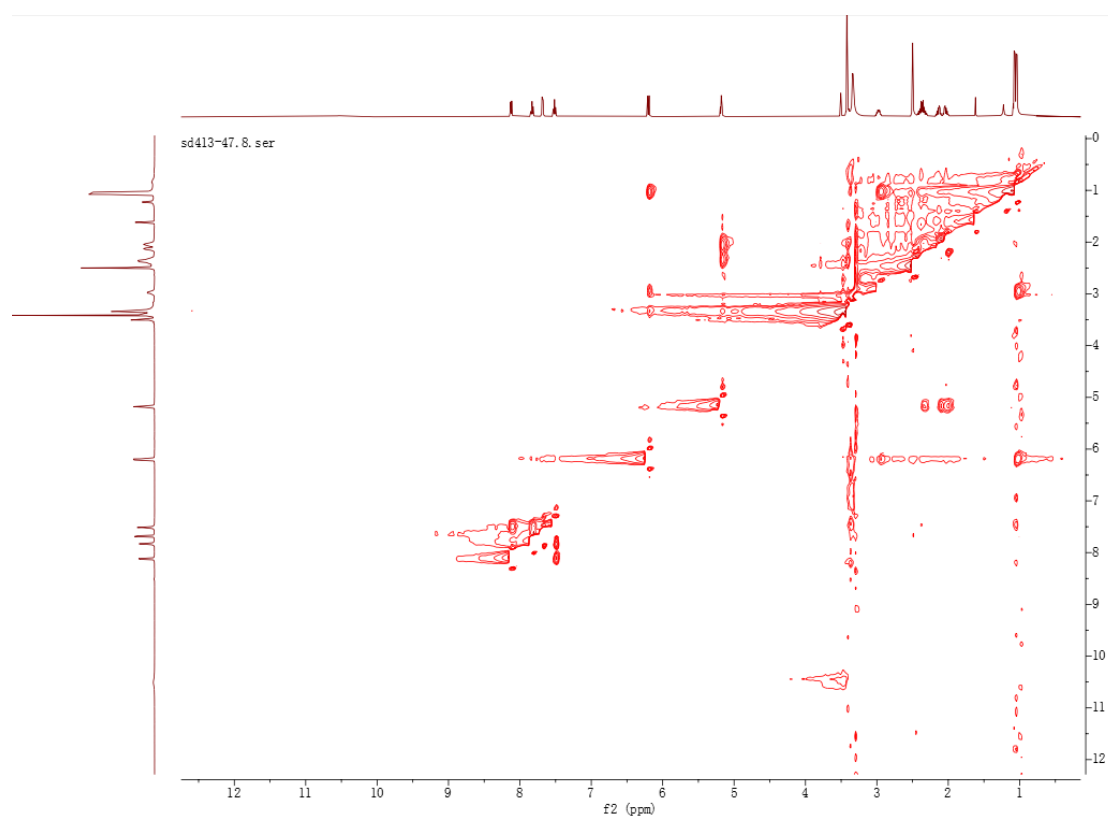


Figure S8. HRESIMS spectrum of compound **2**.

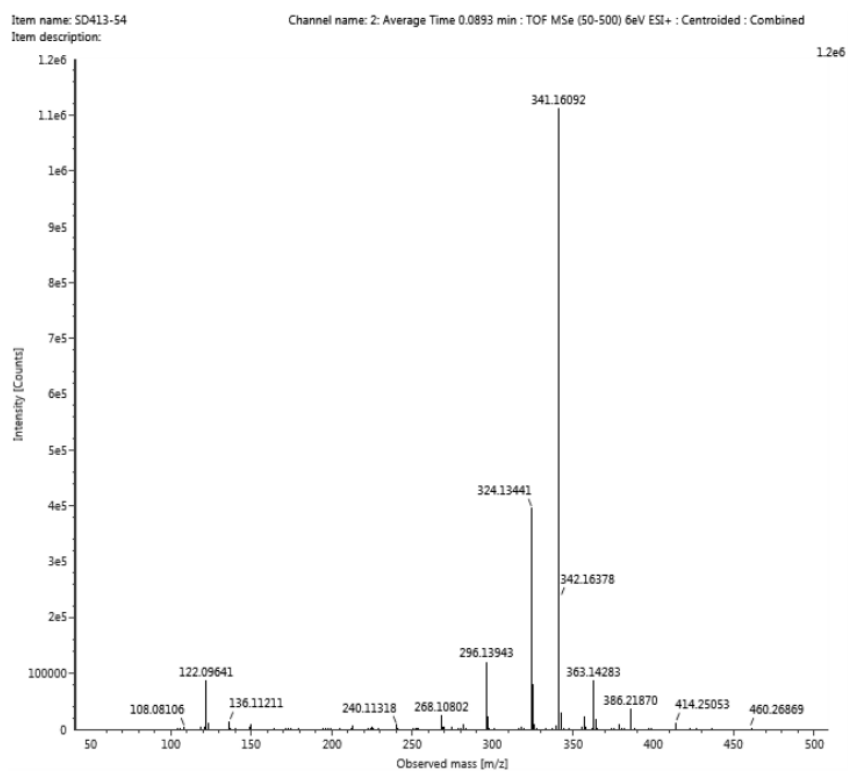


Figure S9. ^1H NMR (500 MHz, $\text{DMSO}-d_6$) spectrum of compound **2**.

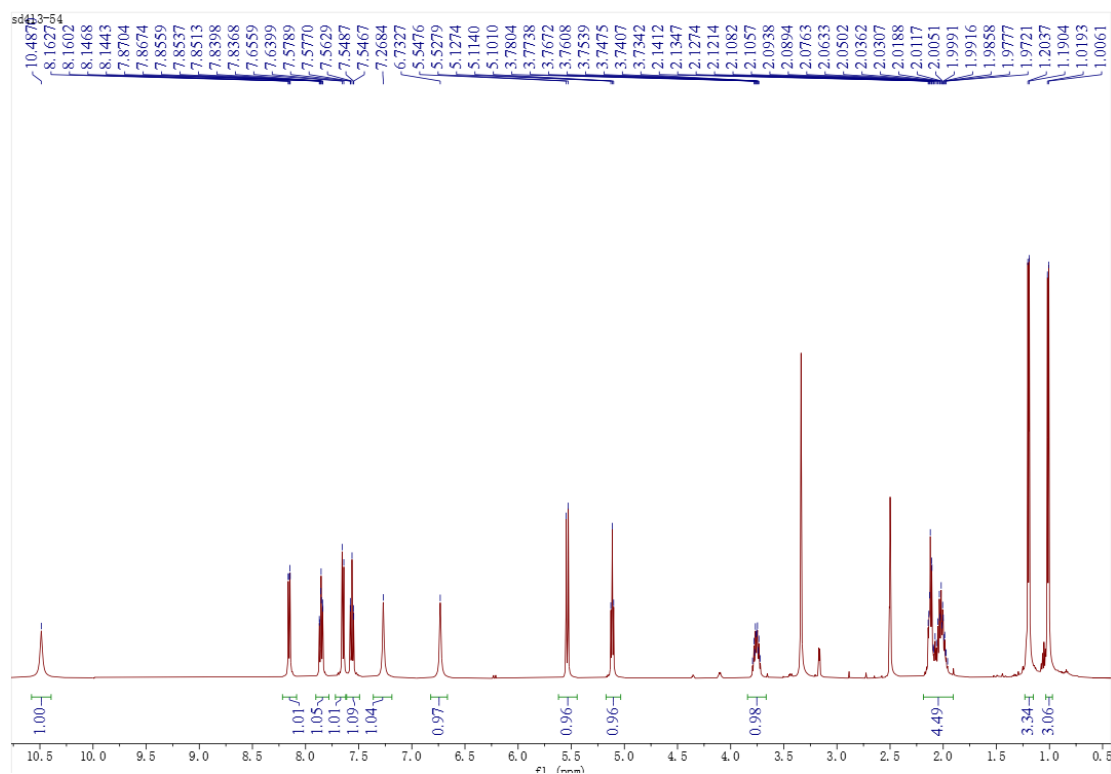


Figure S10. ^{13}C NMR (125 MHz, $\text{DMSO}-d_6$) and DEPT spectra of compound **2**.

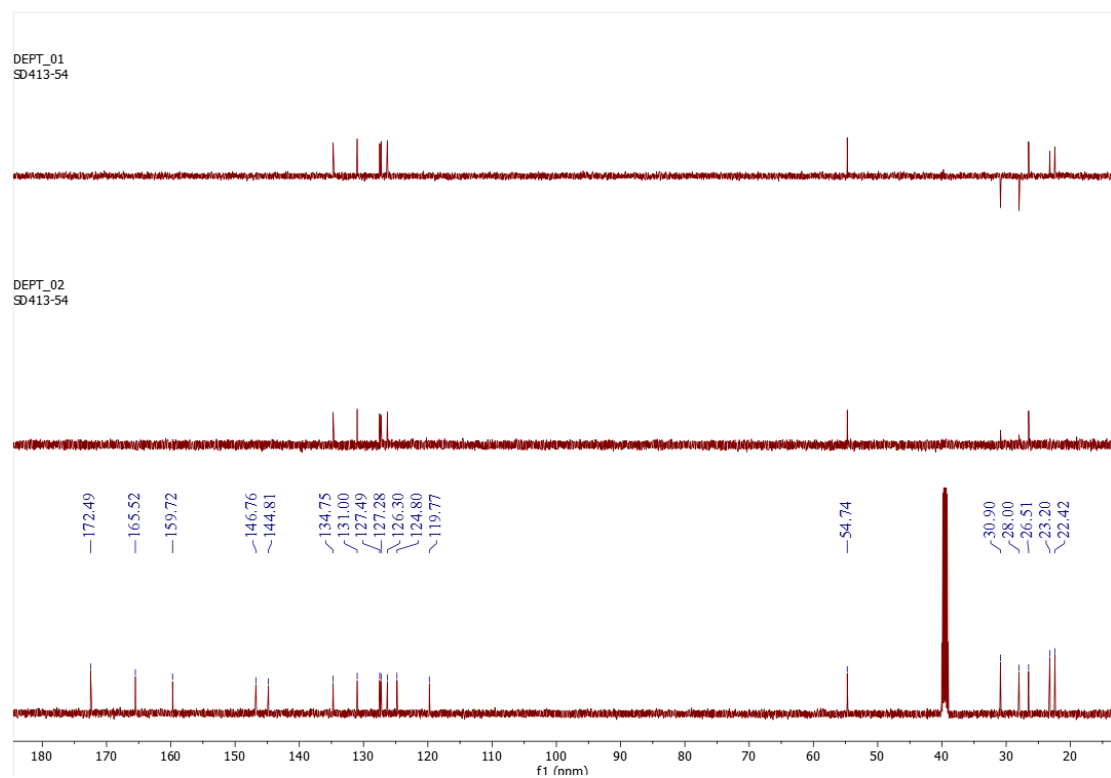


Figure S11. NOESY spectrum of compound **2**.

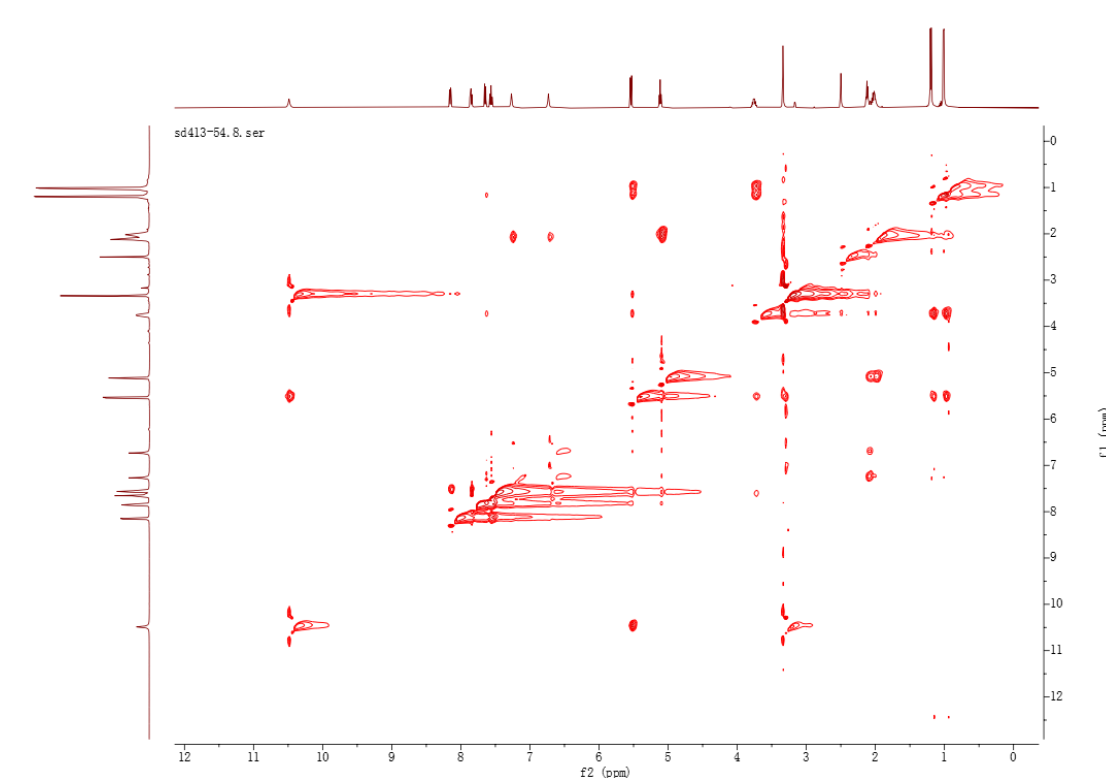


Table S1. ^1H and ^{13}C NMR data of compounds **1** and **2**.

No.	1		2	
	δ_{H} (J in Hz) ^a	δ_{C} , Type ^b	δ_{H} (J in Hz) ^a	δ_{C} , Type ^b
1		165.3, C		165.5, C
2-NH	10.51, s		10.49, s	
3		125.5, C		124.8, C
4		145.6, C		144.8, C
6		147.1, C		146.8, C
7	7.68, d (8.1)	127.2, CH	7.65, dd (8.0, 1.3)	127.5, CH
8	7.83, t (7.5)	134.8, CH	7.85, ddd (8.4, 7.2, 1.5)	134.8, CH
9	7.52, t (7.5)	126.7, CH	7.57, ddd (8.4, 7.2, 1.5)	127.3, CH
10	8.12, d (8.1)	126.3, CH	8.15, dd (8.0, 1.3)	126.3, CH
11		119.7, C		119.8, C
12		160.0, C		159.7, C
14	5.18, t (6.5)	54.3, CH	5.11, t (6.6)	54.7, CH
15a	2.04, dt (14.0, 6.9)	27.3, CH ₂	2.01, m	28.0, CH ₂
15b	2.13, dt (14.0, 6.9)			
16	2.36, m	29.2, CH ₂	2.12, m	30.9, CH ₂
17		171.9, C		172.5, C
18	6.20, d (10.3)	126.7, CH	5.54, d (9.8)	131.0, CH
19	2.98, m	25.0, CH	3.76, m	26.5, CH
20	1.04, d (6.6)	22.1, CH ₃	1.01, d (6.6)	22.4, CH ₃
21	1.07, d (6.6)	22.4, CH ₃	1.20, d (6.6)	23.2, CH ₃
17-OMe	3.42, s	51.3, CH ₃		
17-NH ₂			6.73, s; 7.27, s	

^a Measured at 500 MHz in DMSO-*d*₆; ^b Measured at 125 MHz in DMSO-*d*₆.

Figure S12. HRESI mass spectrum of compound **4**.

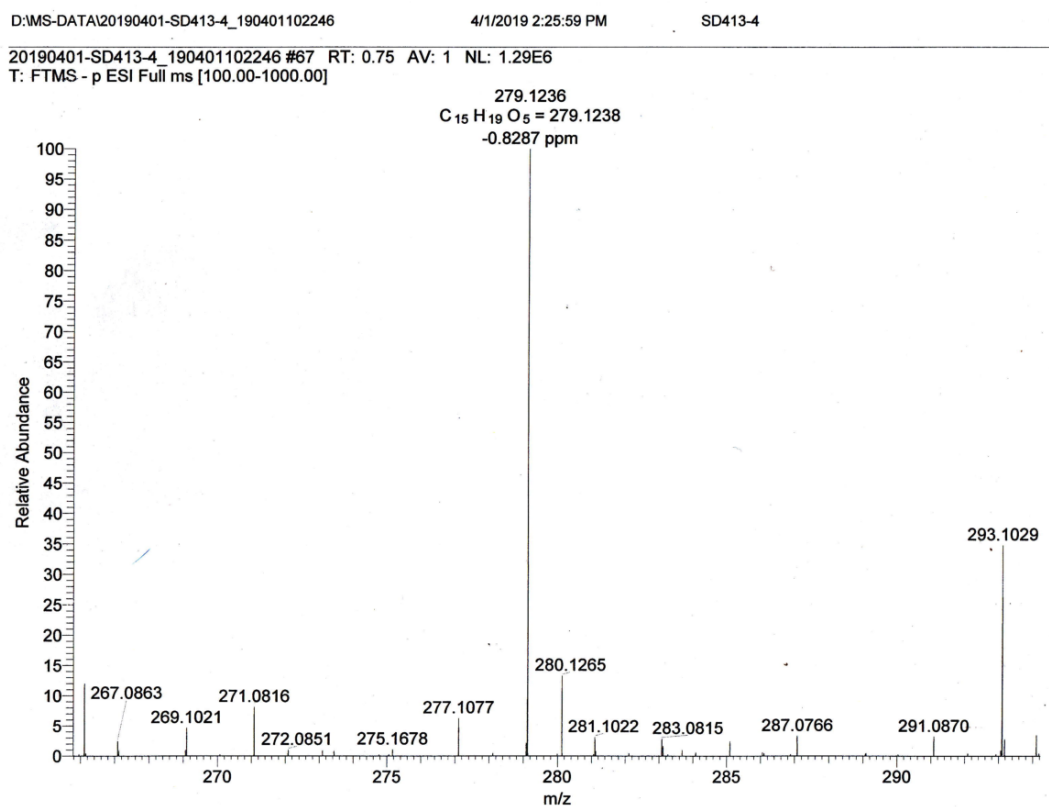


Figure S13. ¹H NMR (500 MHz, DMSO-*d*₆) spectrum of compound **4**.

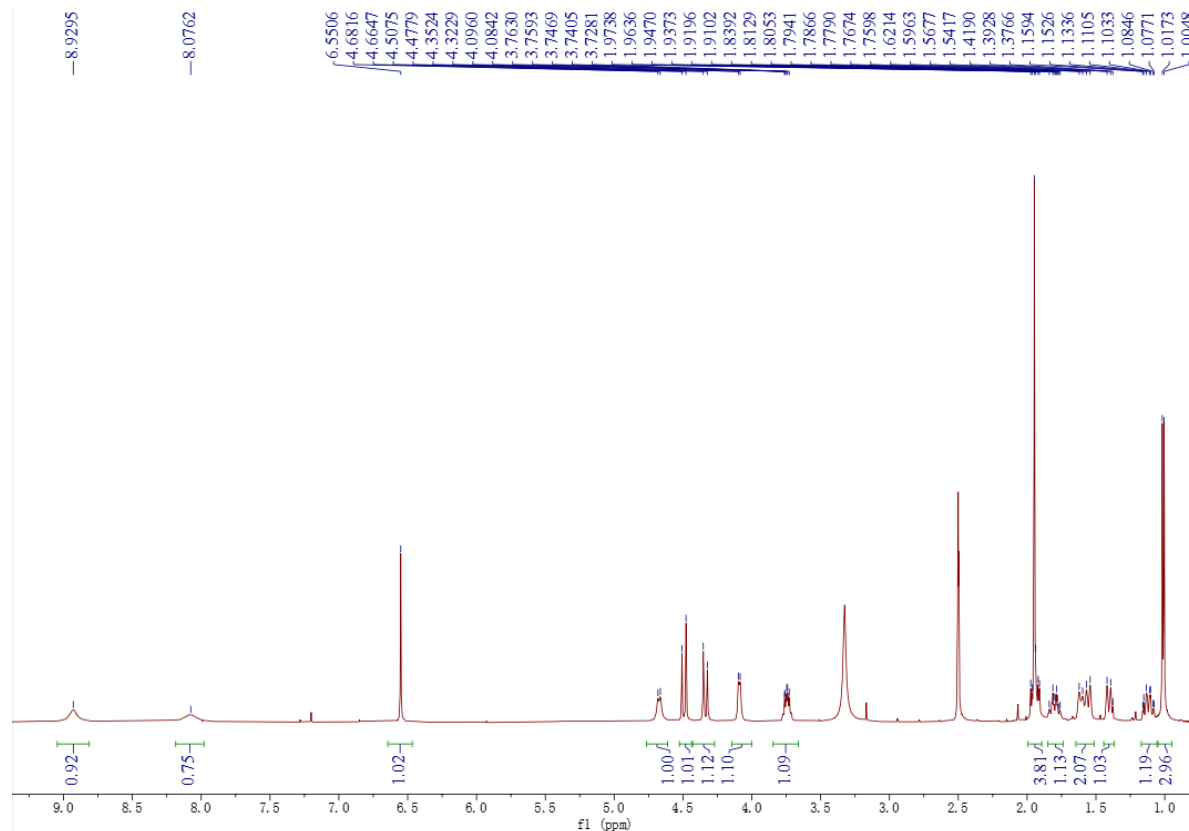


Figure S14. ^{13}C NMR (125 MHz, $\text{DMSO}-d_6$) and DEPT spectra of compound **4**.

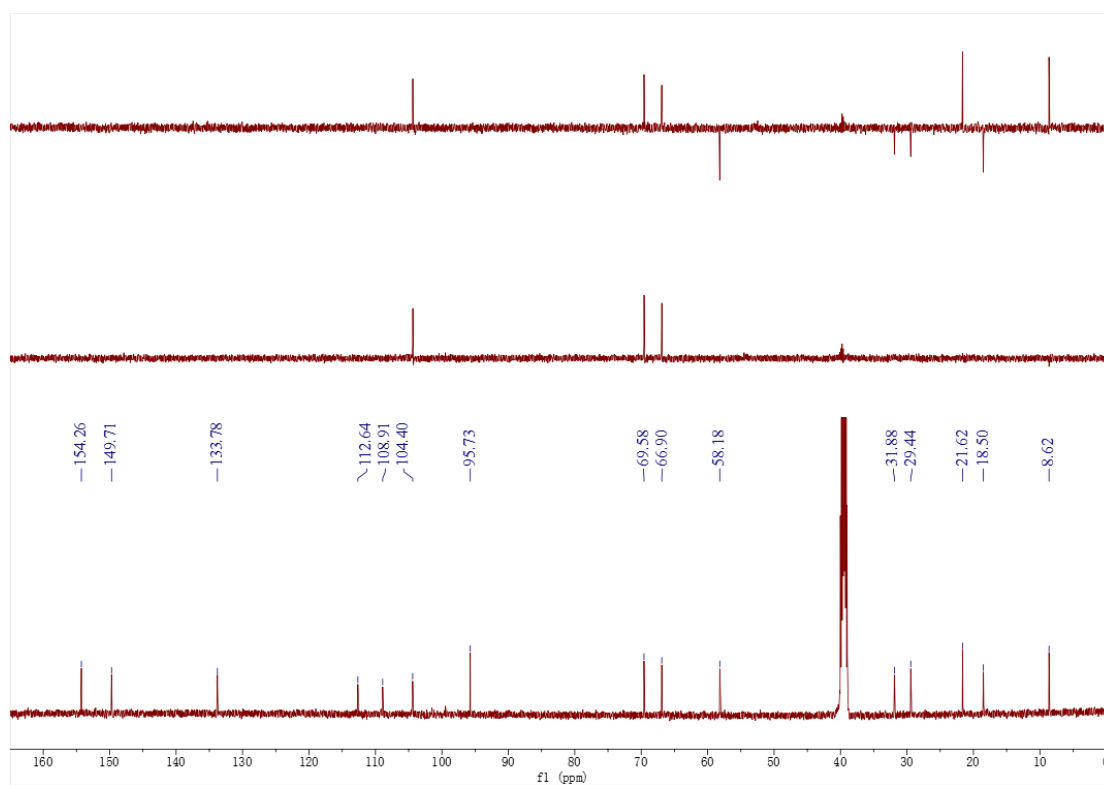


Figure S15. COSY spectrum of compound **4**.

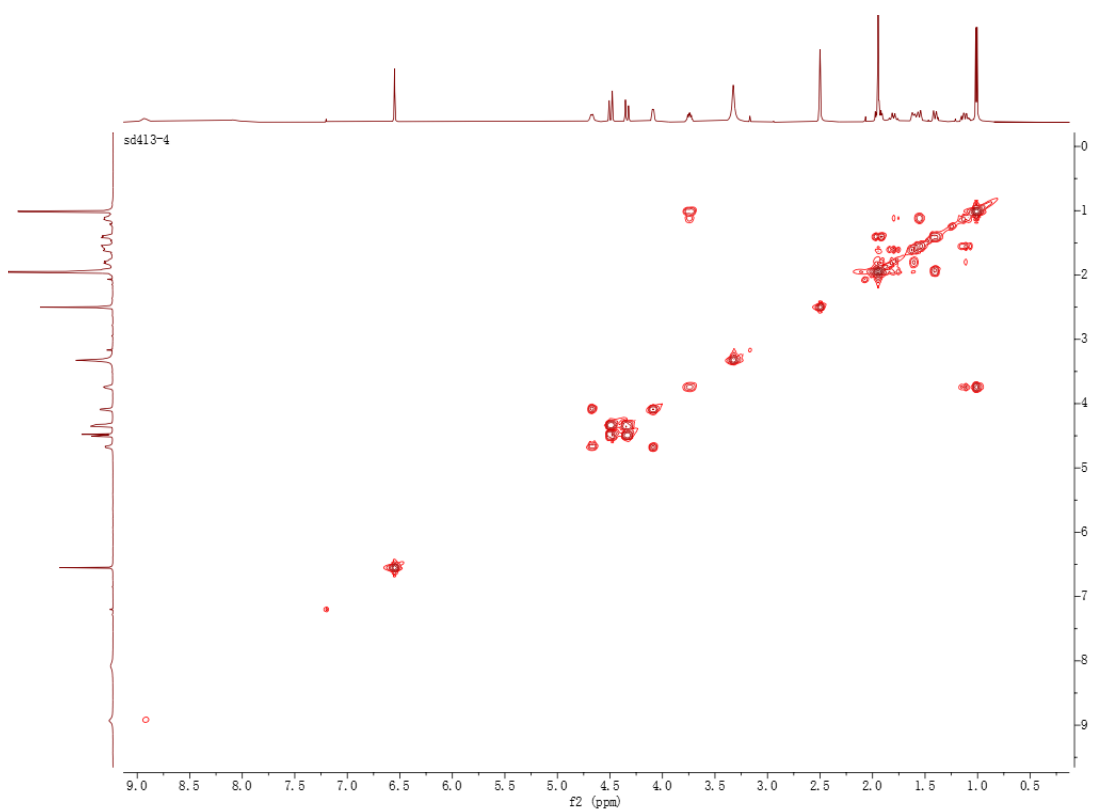


Figure S16. HSQC spectrum of compound **4**.

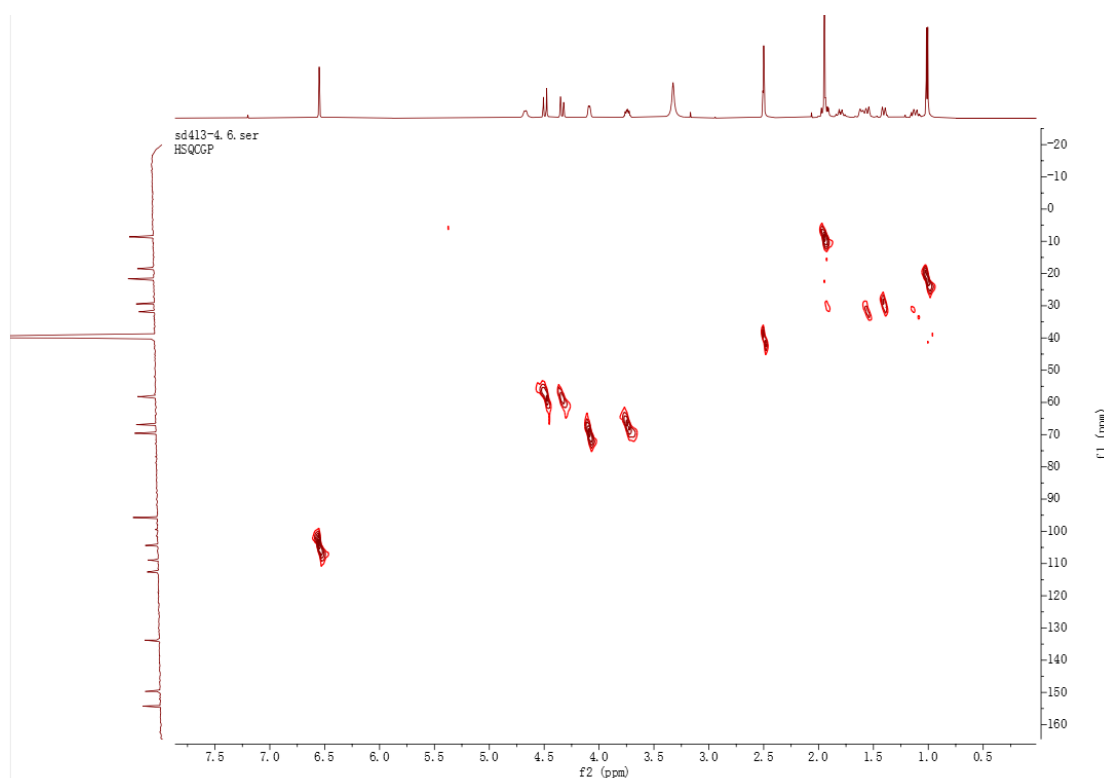


Figure S17. HMBC spectrum of compound **4**.

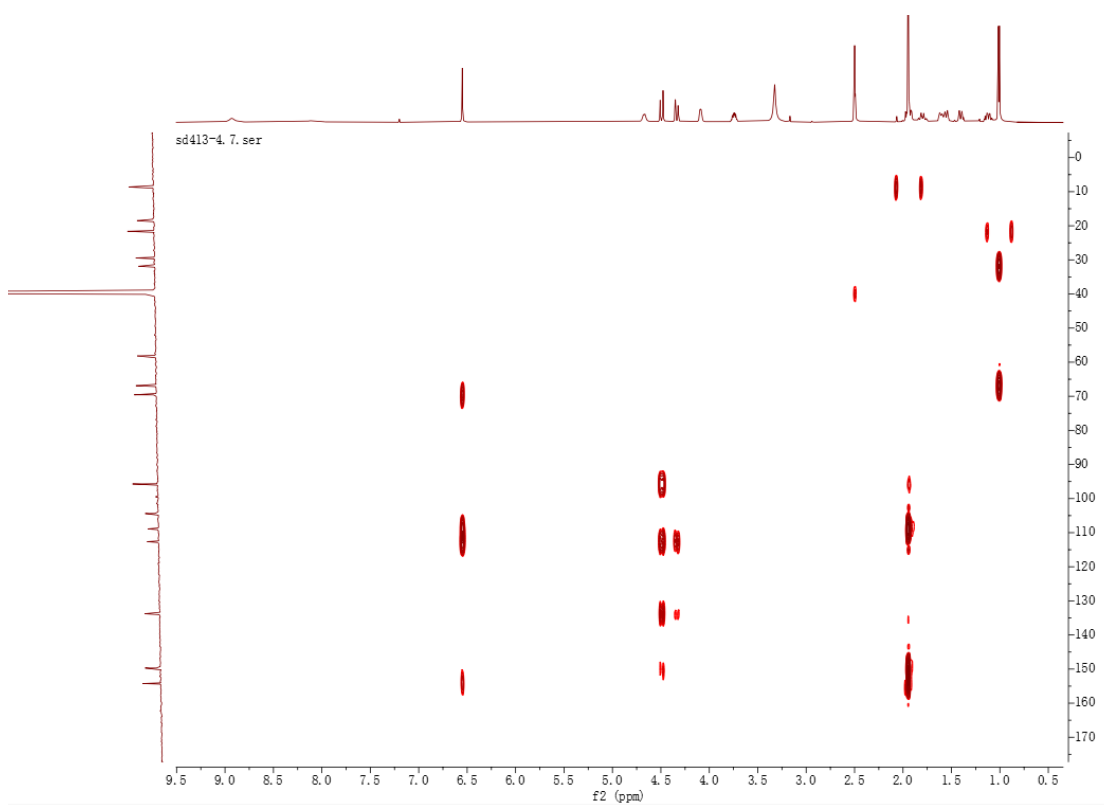


Figure S18. NOESY spectrum of compound **4**.

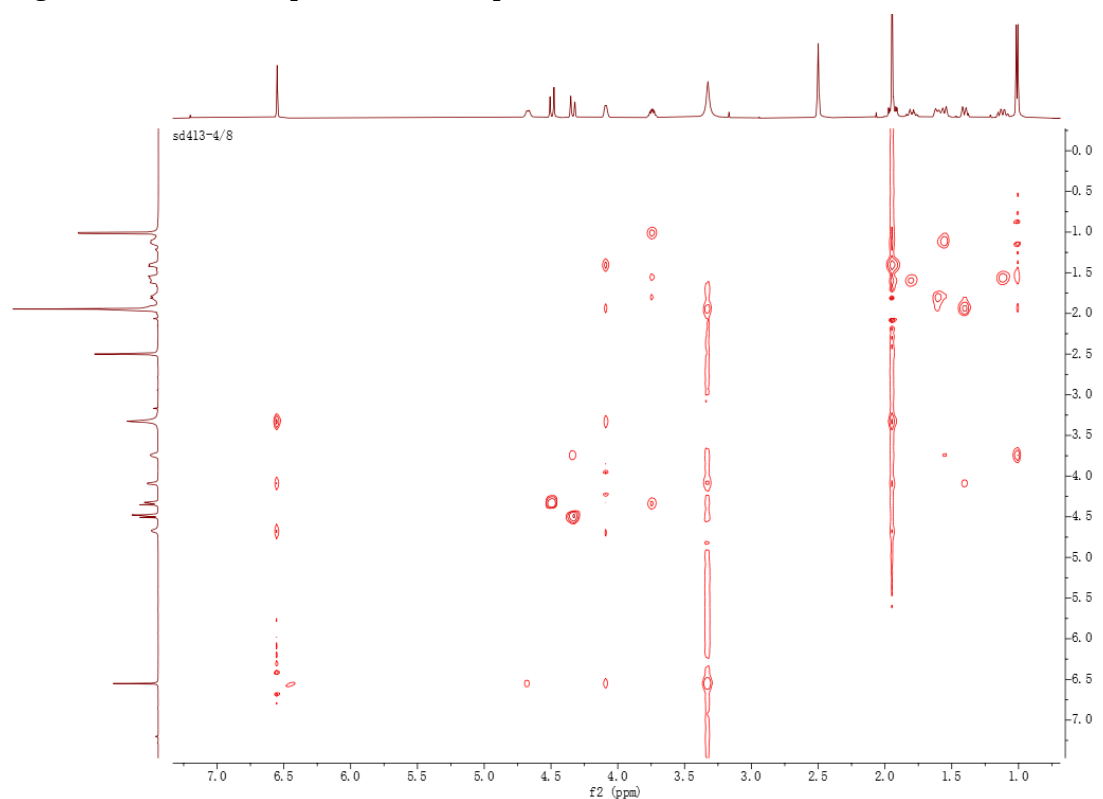


Figure S19. HRESIMS spectrum of compound **5**.

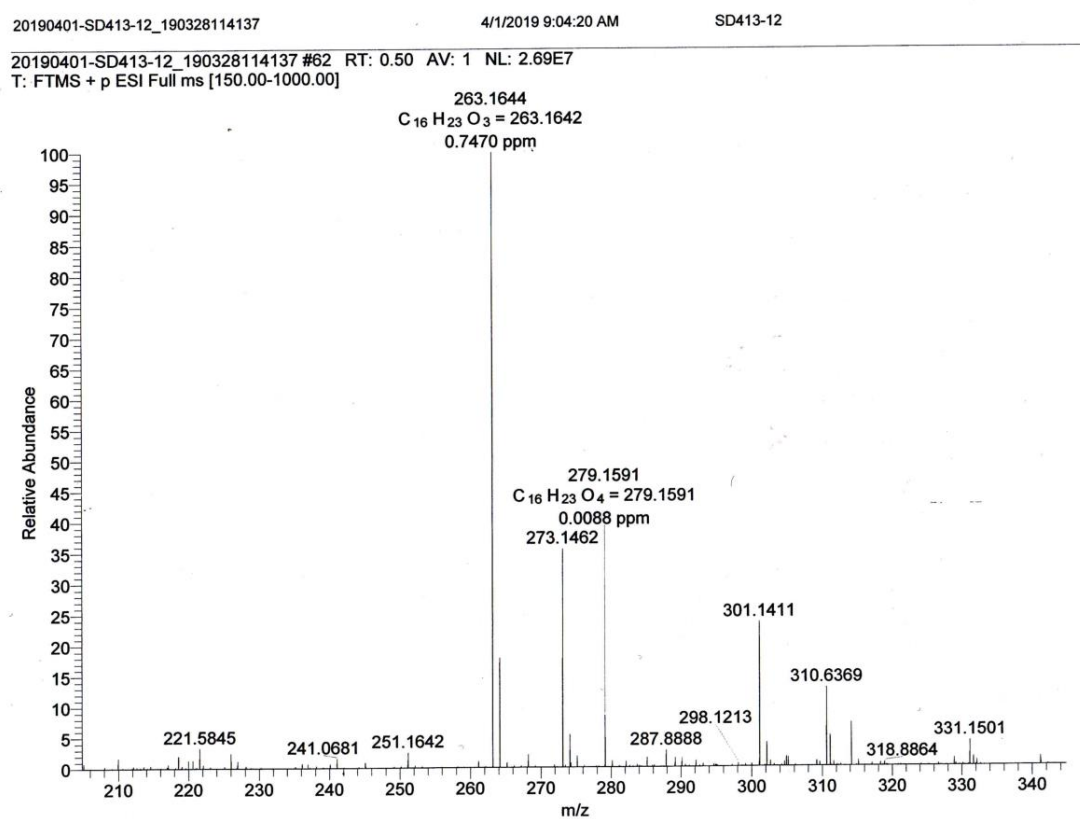


Figure S20. ^1H NMR (500 MHz, $\text{DMSO}-d_6$) spectrum of compound 5.

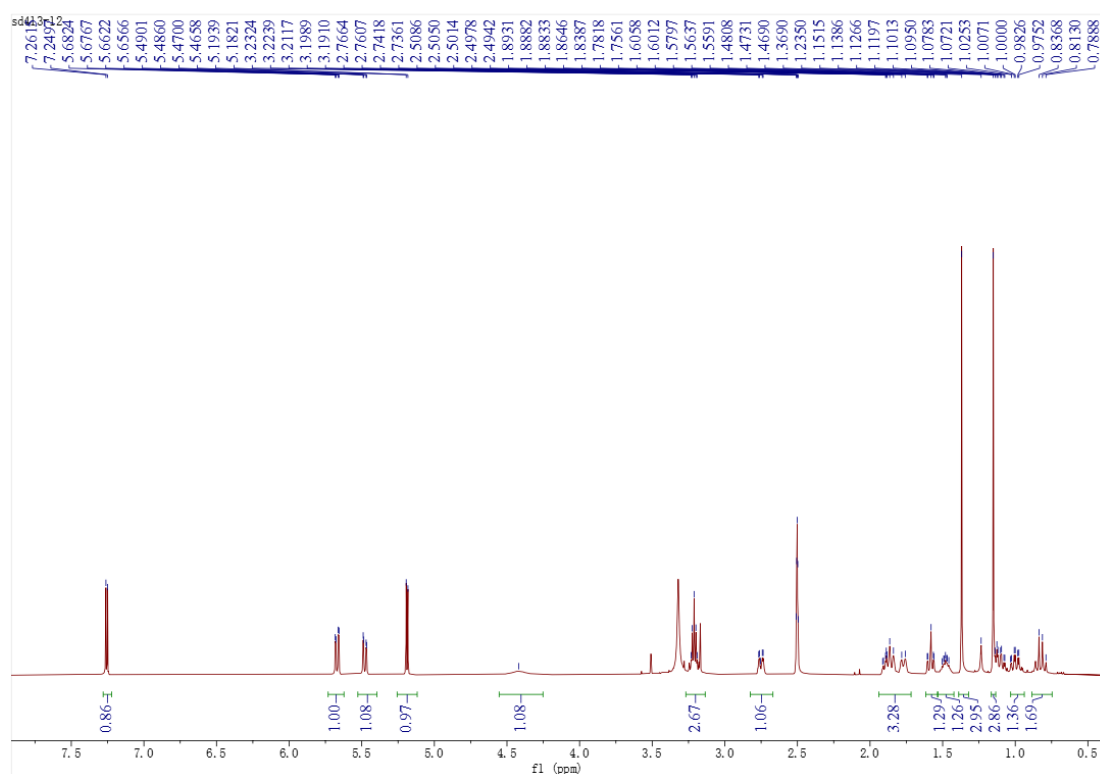


Figure S21. ^{13}C NMR (125 MHz, $\text{DMSO}-d_6$) and DEPT spectra of compound 5.

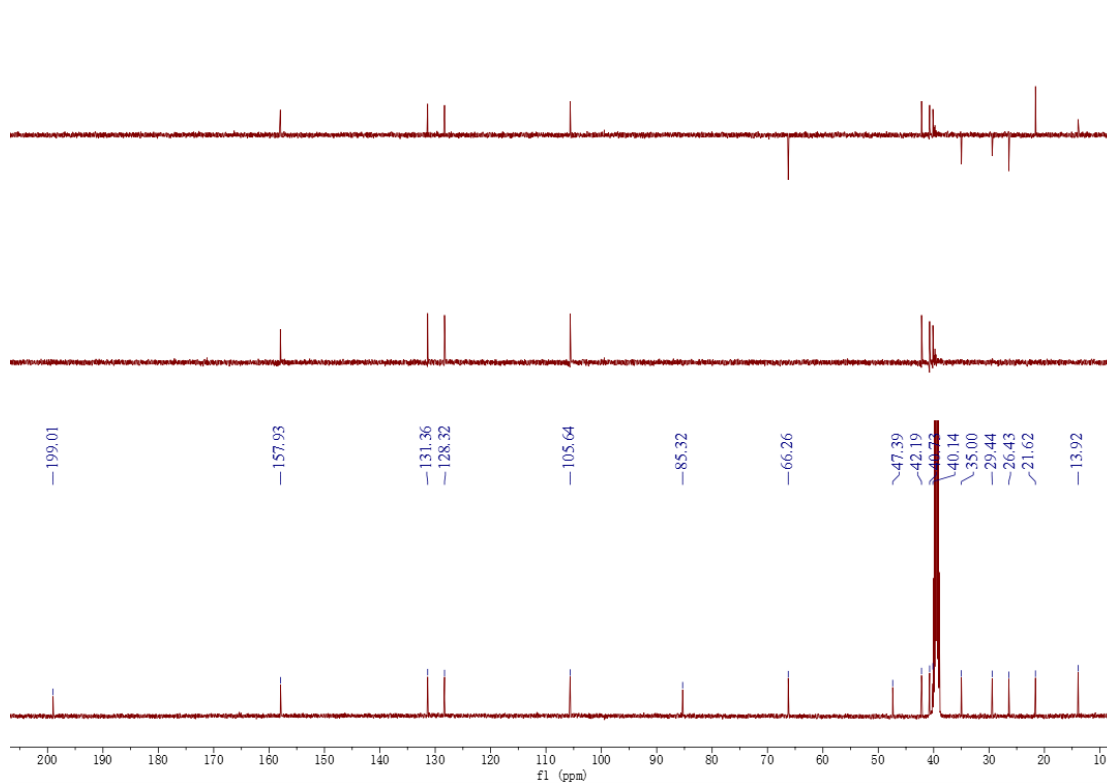


Figure S22. COSY spectrum of compound 5.

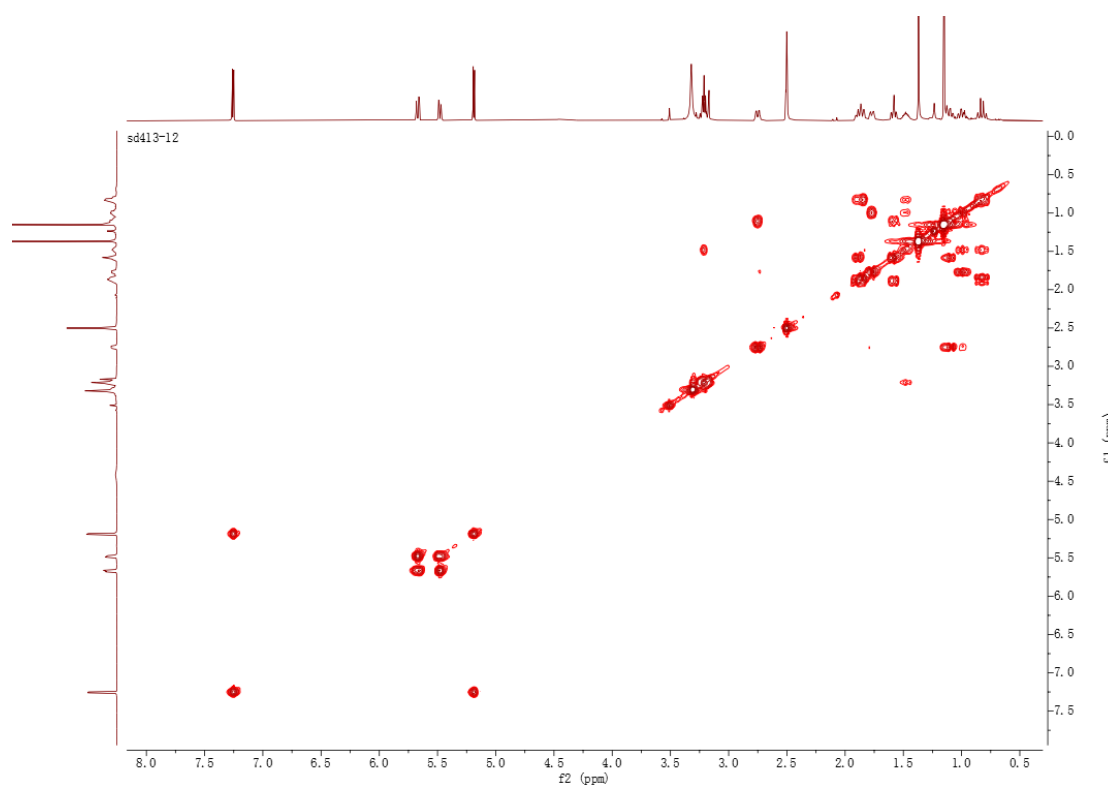


Figure S23. HSQC spectrum of compound 5.

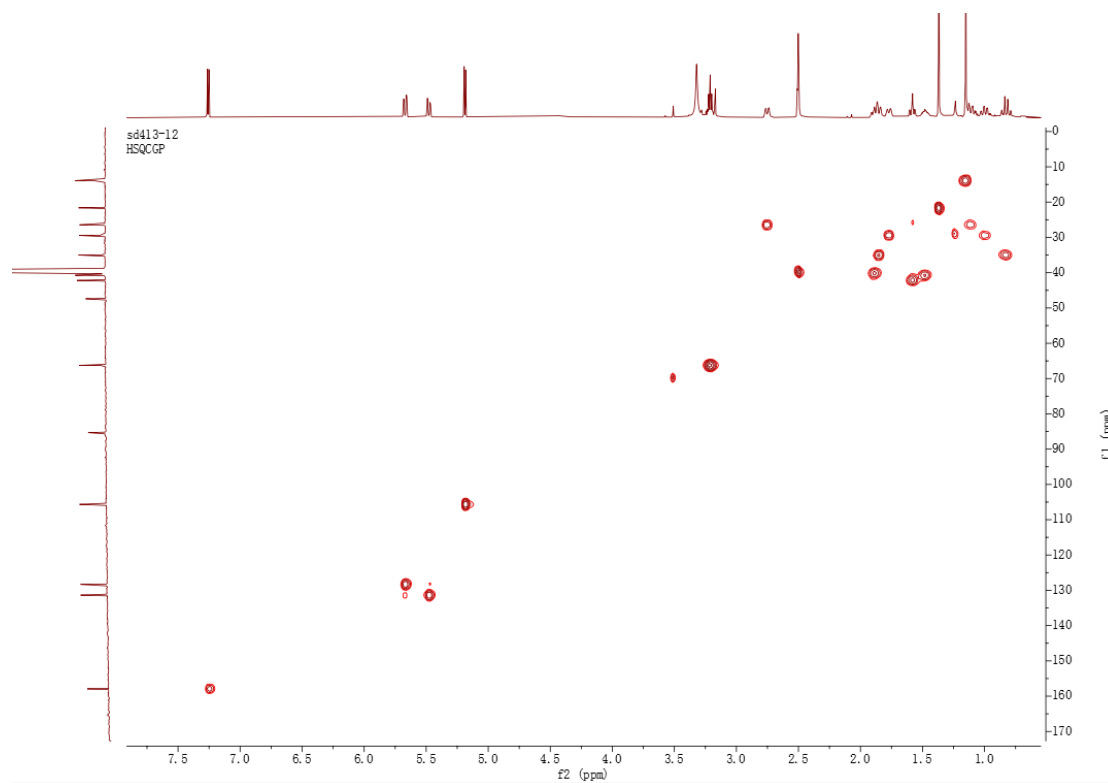


Figure S24. HMBC spectrum of compound 5.

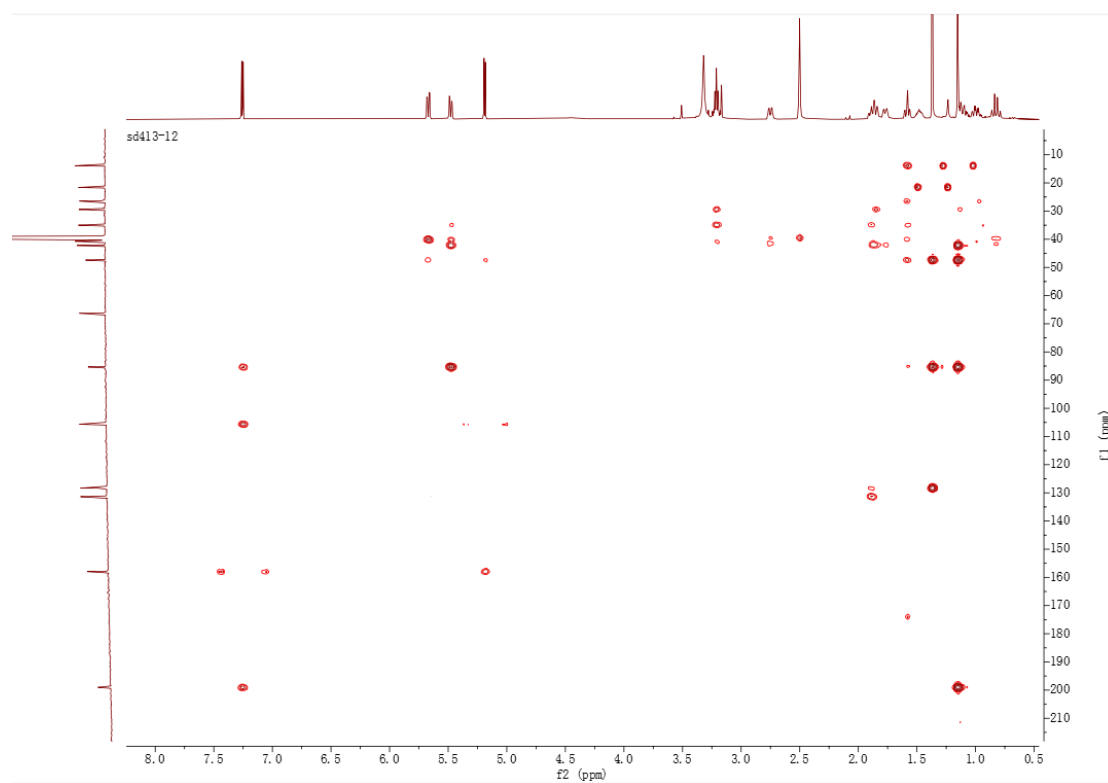


Figure S25. NOESY spectrum of compound 5.

