

Supporting Information

Metal Catalyst Free One-Pot Synthesis of 2-Arylbenzimidazoles From α -Aroylketene Dithioacetals (AKDTAs)

Pandi Dhanalakshmi, Solamalai Thimmarayaperumal Shanmugam Sivakumar*

*Department of Organic chemistry, School of Chemistry,
Madurai Kamaraj University, Madurai-625 021*

Total pages- S17

Details of Spectra

Fig. No	List of Figures	Page
S1	¹ H NMR Spectrum of 1o	S3
S2	¹³ C NMR Spectrum of 1o	S3
S3	¹ H NMR Spectrum of 1p	S4
S4	¹³ C NMR Spectrum of 1p	S4
S5	¹ H NMR Spectrum of 1q	S5
S6	¹³ C NMR Spectrum of 1q	S5
S7	¹ H NMR Spectrum of 1r	S6
S8	¹³ C NMR Spectrum of 1r	S6
S9	¹ H NMR Spectrum of 1s	S7
S10	¹³ C NMR Spectrum of 1s	S7
S11	¹³ H NMR Spectrum of 1t	S8
S12	¹³ C NMR Spectrum of 1t	S8
S13	¹ H NMR Spectrum of 1u	S9
S14	¹³ C NMR Spectrum of 1u	S9
S15	¹ H NMR Spectrum of 1v	S10
S16	¹³ C NMR Spectrum of 1v	S10

S17	¹ H NMR Spectrum of 4g	S11
S18	¹³ C NMR Spectrum of 4g	S11
S19	¹ H NMR Spectrum of 4j	S12
S20	¹³ C NMR Spectrum of 4j	S12
S21	¹ H NMR Spectrum of 4o	S13
S22	¹³ C NMR Spectrum of 4o	S13
S23	¹ H NMR Spectrum of 4p	S14
S24	¹³ C NMR Spectrum of 4p	S14
S25	¹ H NMR Spectrum of 4s	S15
S26	¹³ C NMR Spectrum of 4s	S15
S27	¹³ H NMR Spectrum of 4u	S16
S28	¹³ C NMR Spectrum of 4u	S16
S29	¹ H NMR Spectrum of 4v	S17
S30	¹³ C NMR Spectrum of 4v	S17

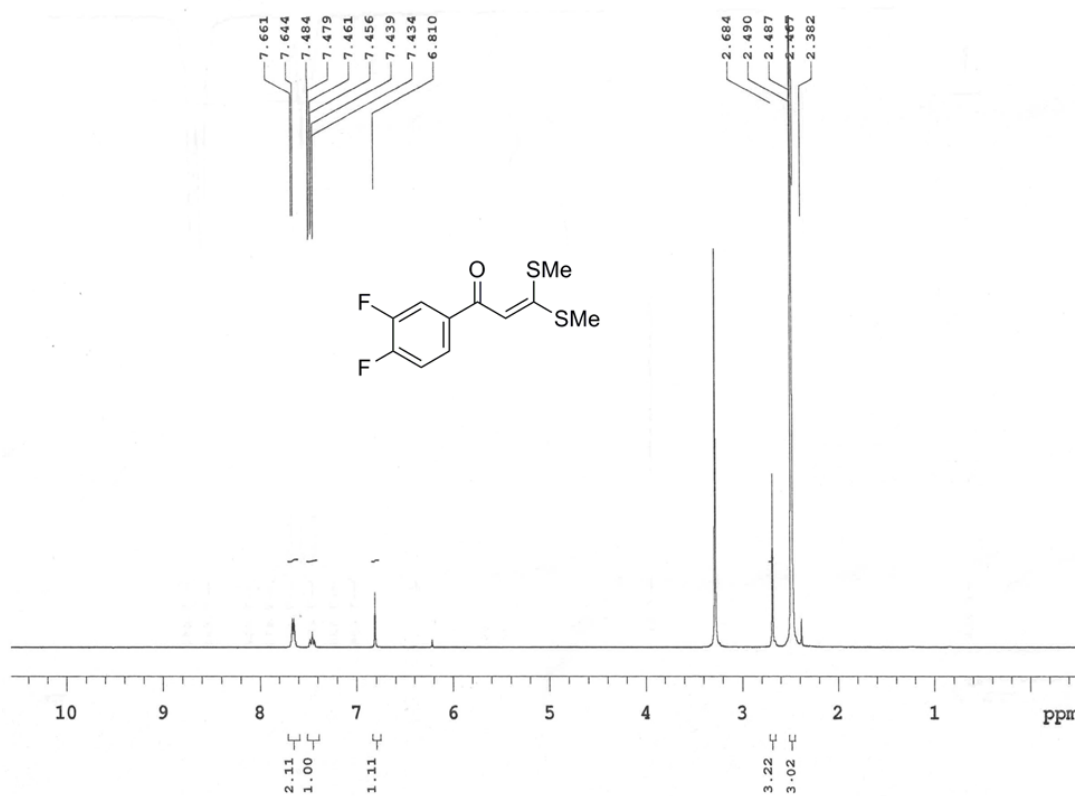


Figure S1: (400MHz, DMSO- d_6) ^1H NMR spectrum of compound **1o**

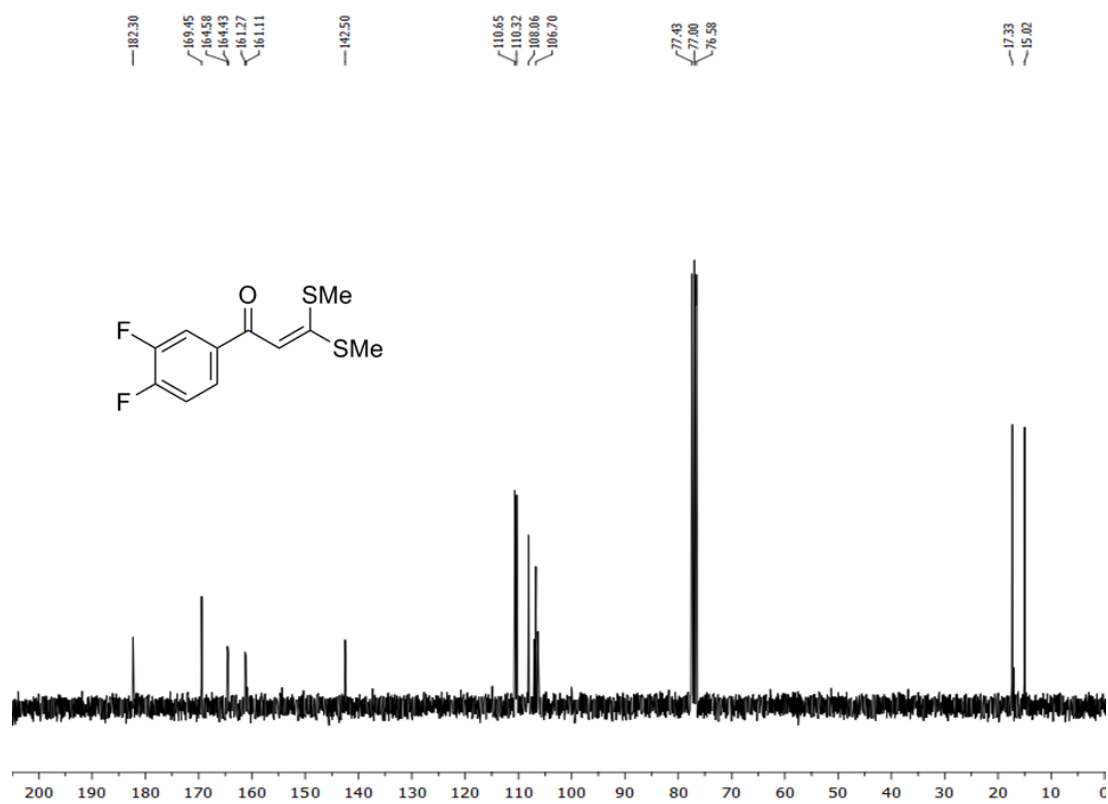


Figure S2: (75MHz, CDCl_3) ^{13}C NMR spectrum of compound **1o**

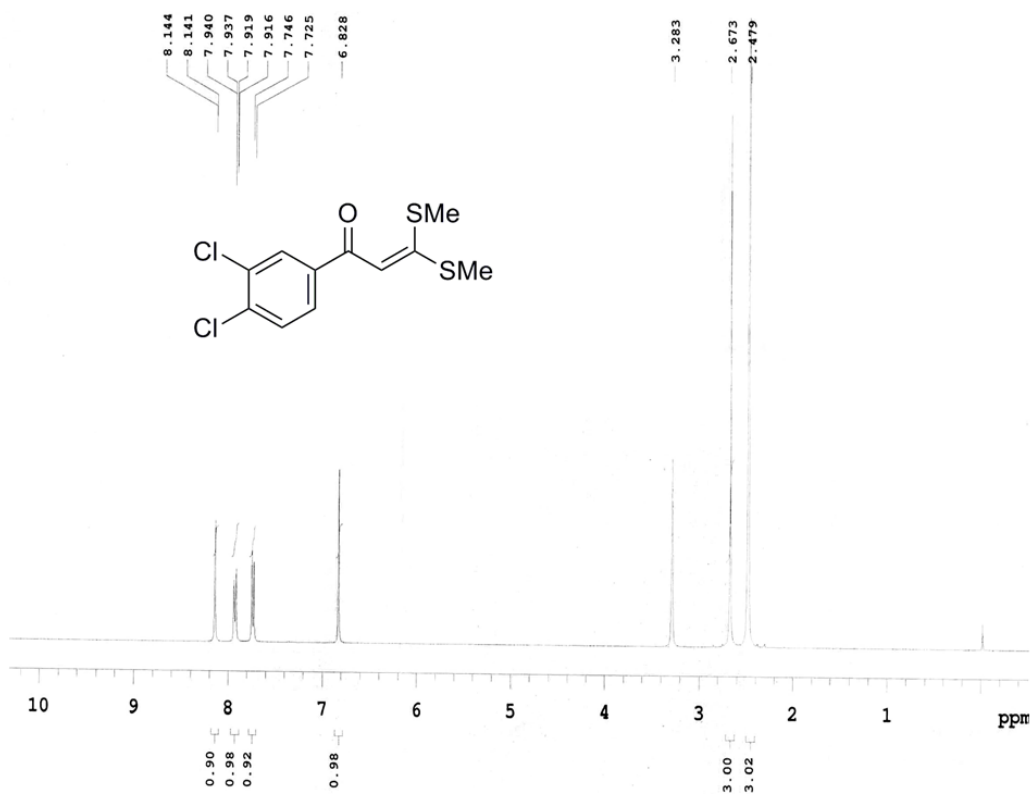


Figure S3: (400MHz, DMSO- d_6) ^1H NMR spectrum of compound **1p**

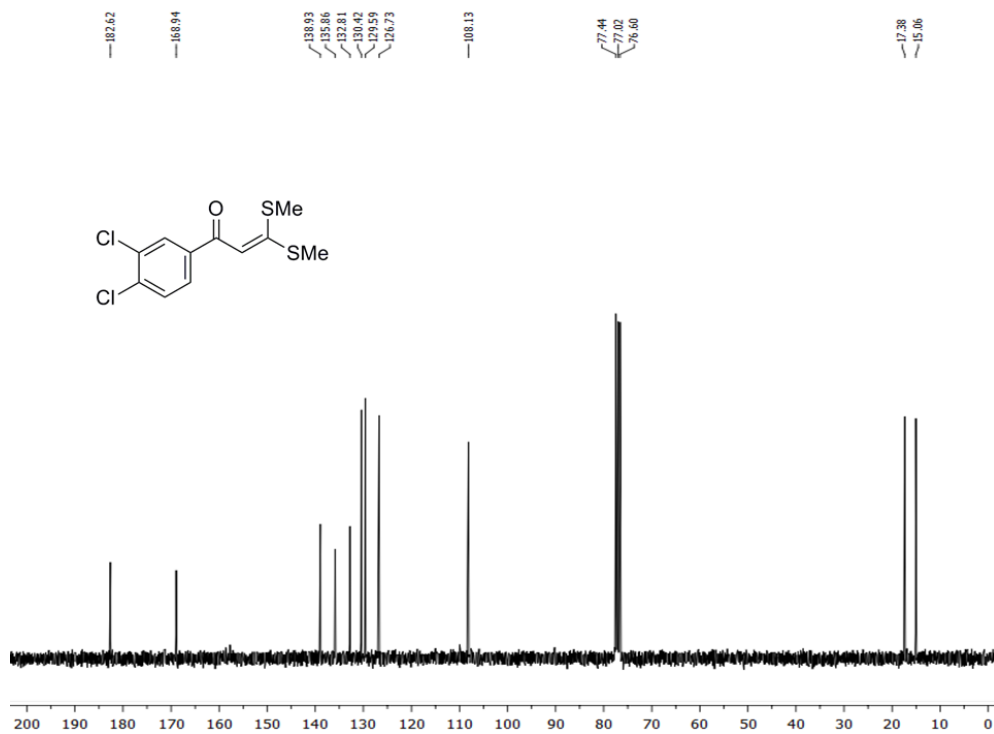


Figure S4: (75MHz, CDCl_3) ^{13}C NMR spectrum of compound **1p**

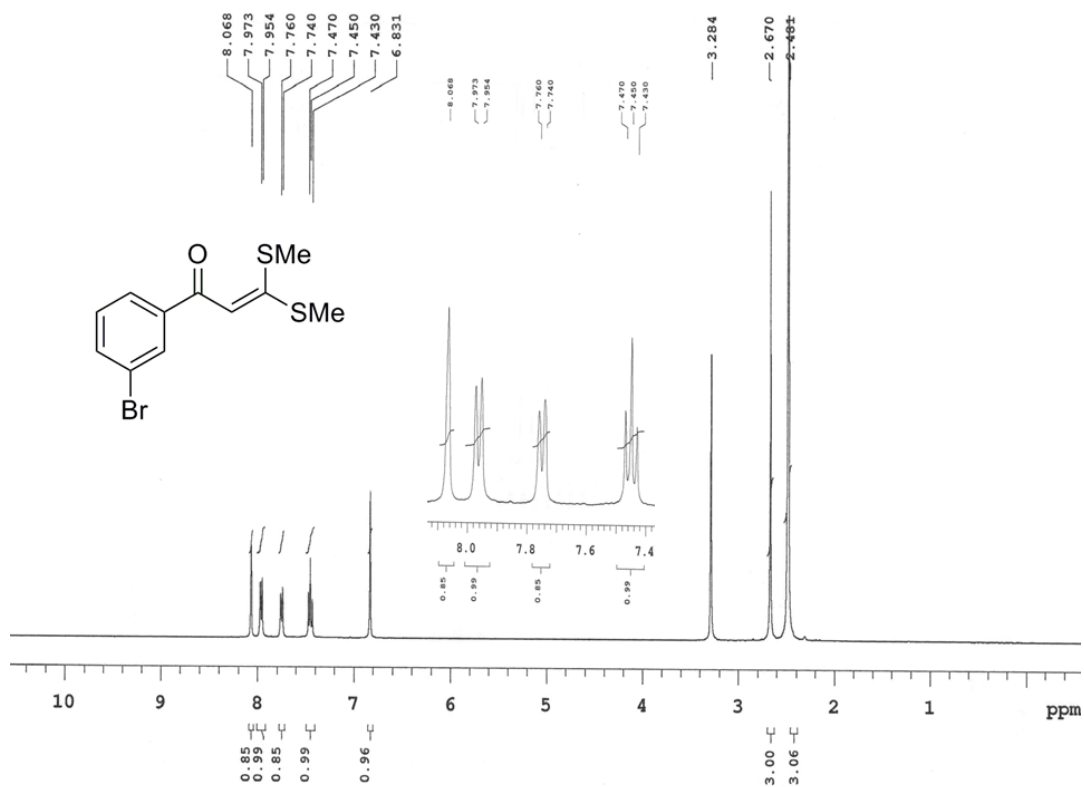


Figure S5: (400MHz, DMSO-d₆) ¹H NMR spectrum of compound **1q**

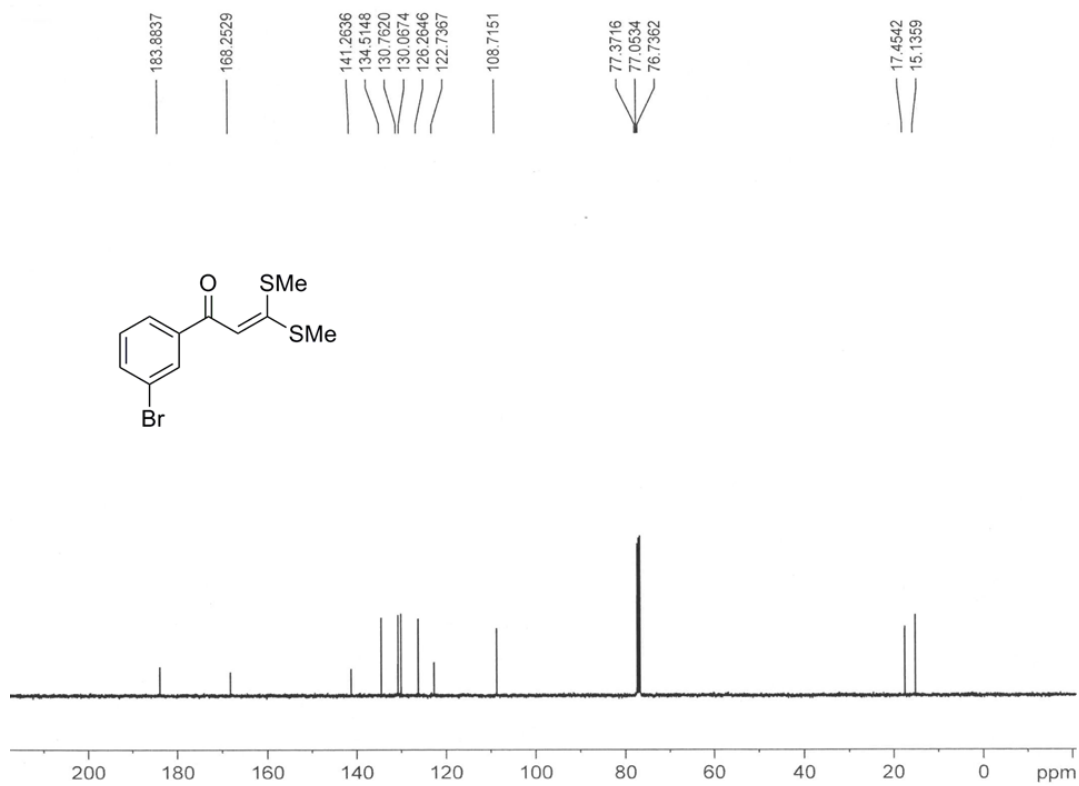


Figure S6: (100MHz, CDCl₃) ¹³C NMR spectrum of compound **1q**

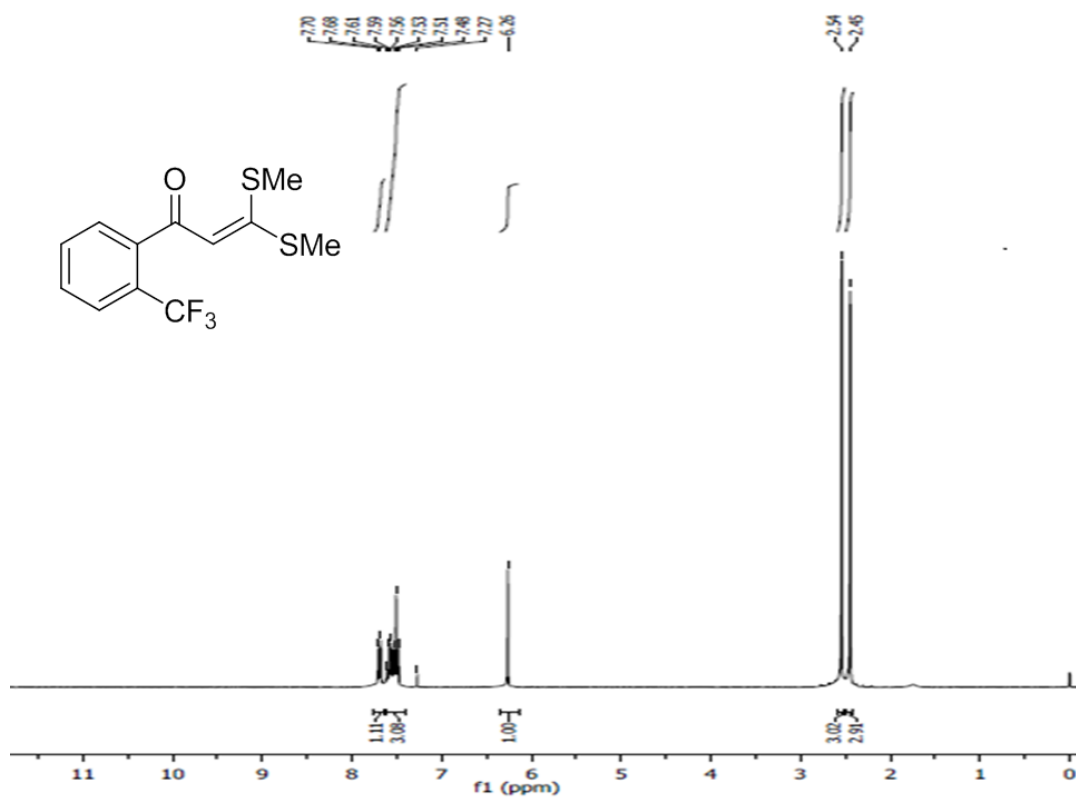


Figure S7: (300MHz, CDCl₃) ¹H NMR spectrum of compound **1r**

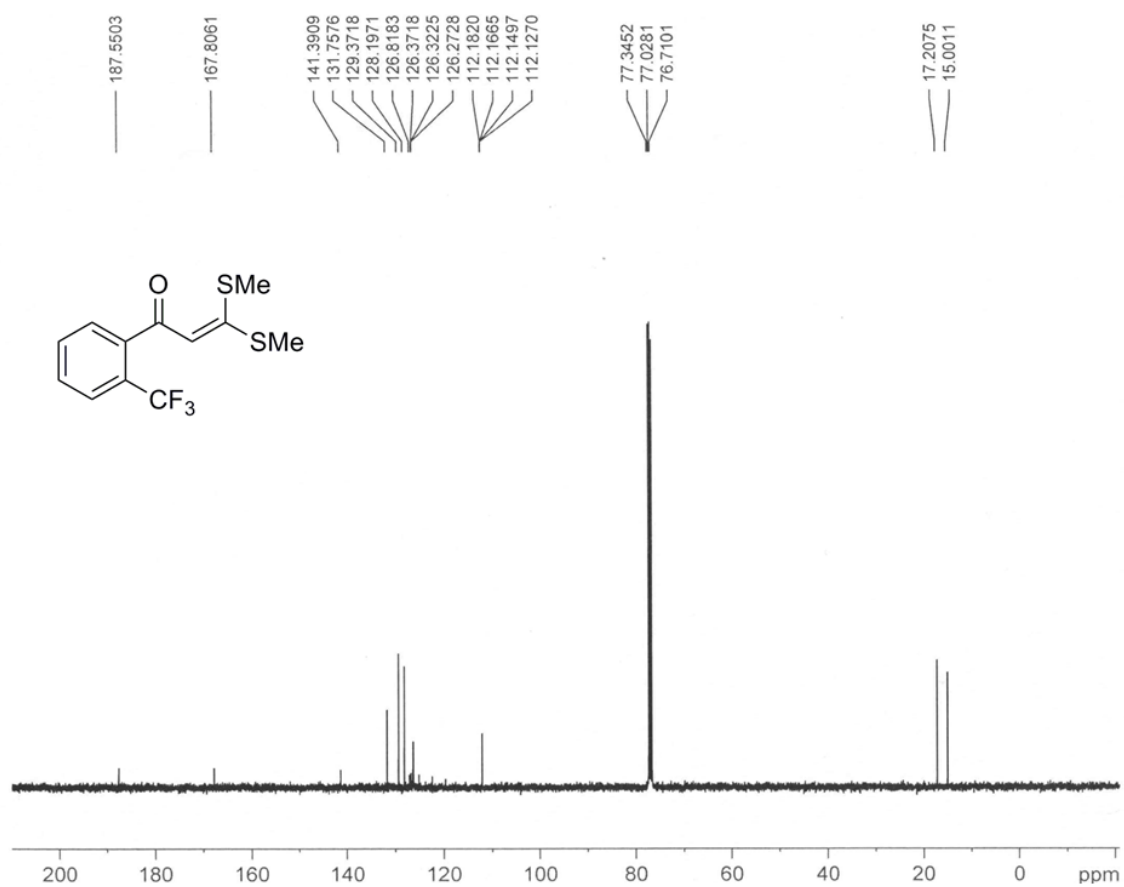


Figure S8: (100MHz, CDCl₃) ¹³C NMR spectrum of compound **1r**

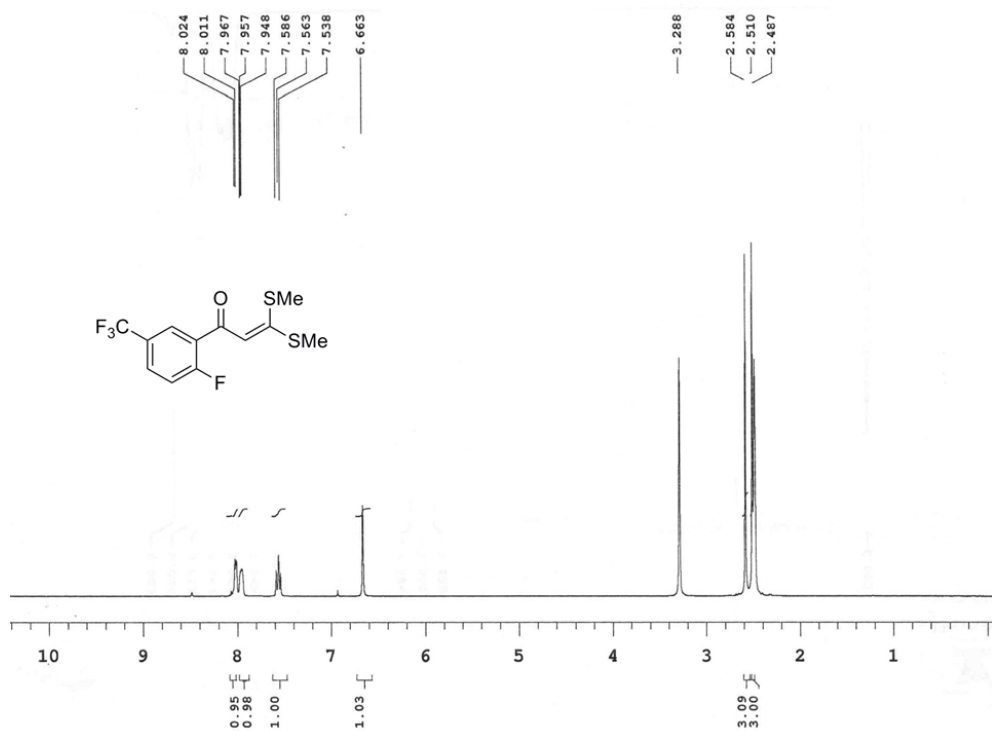


Figure S9: (400MHz, DMSO- d_6) ^1H NMR spectrum of compound **1s**

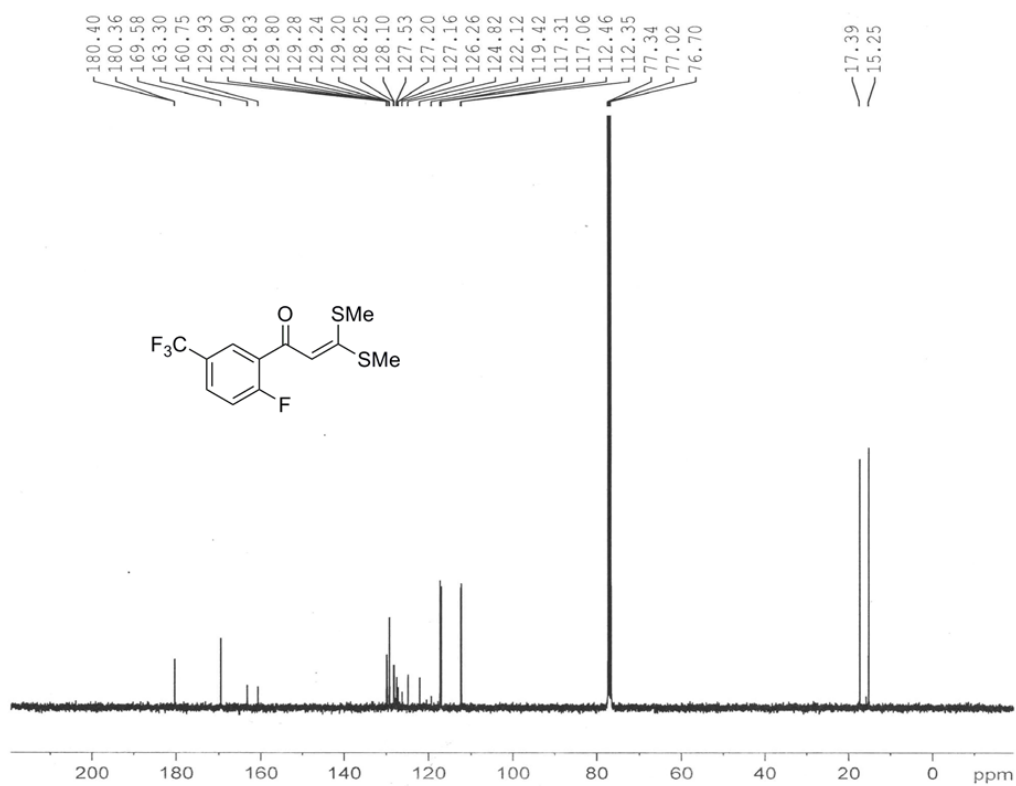
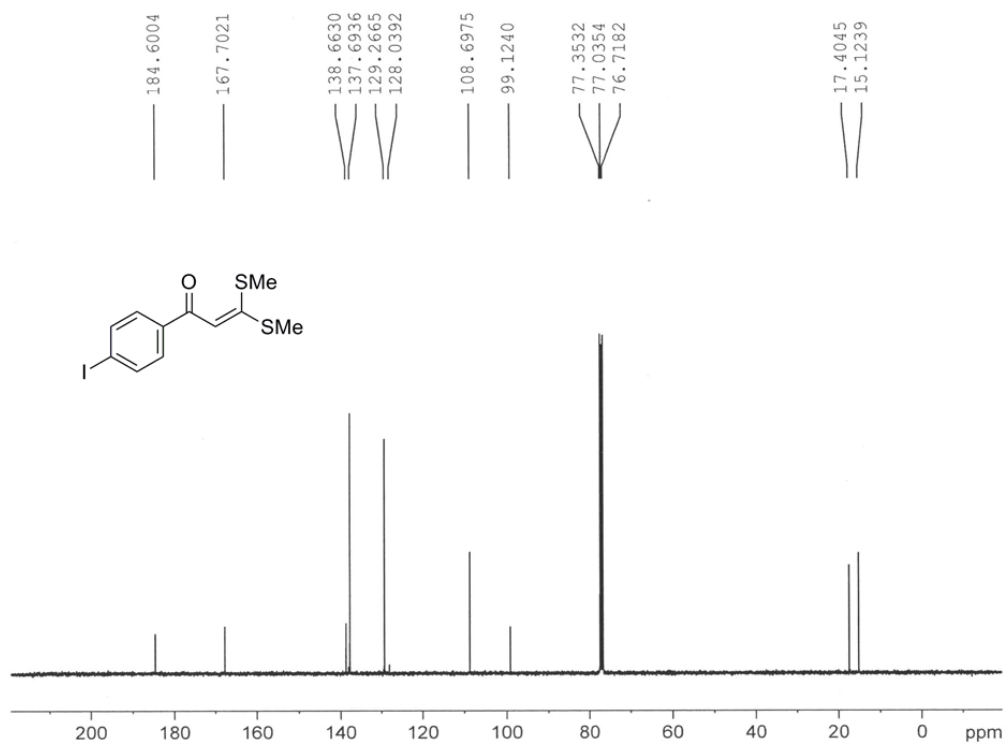
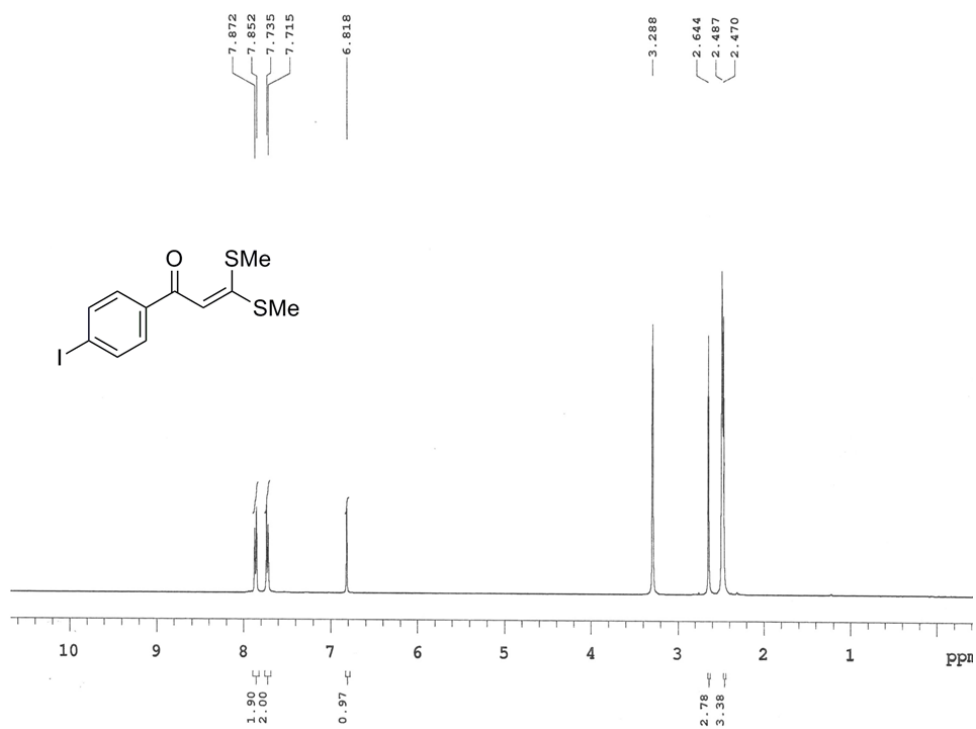
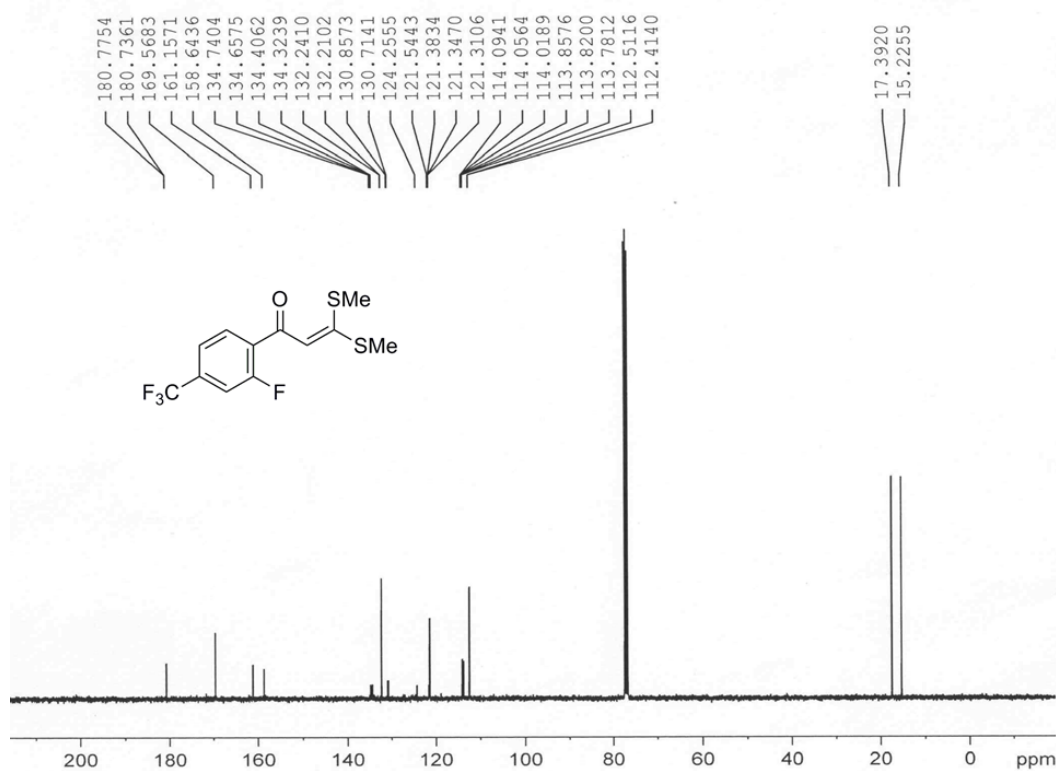
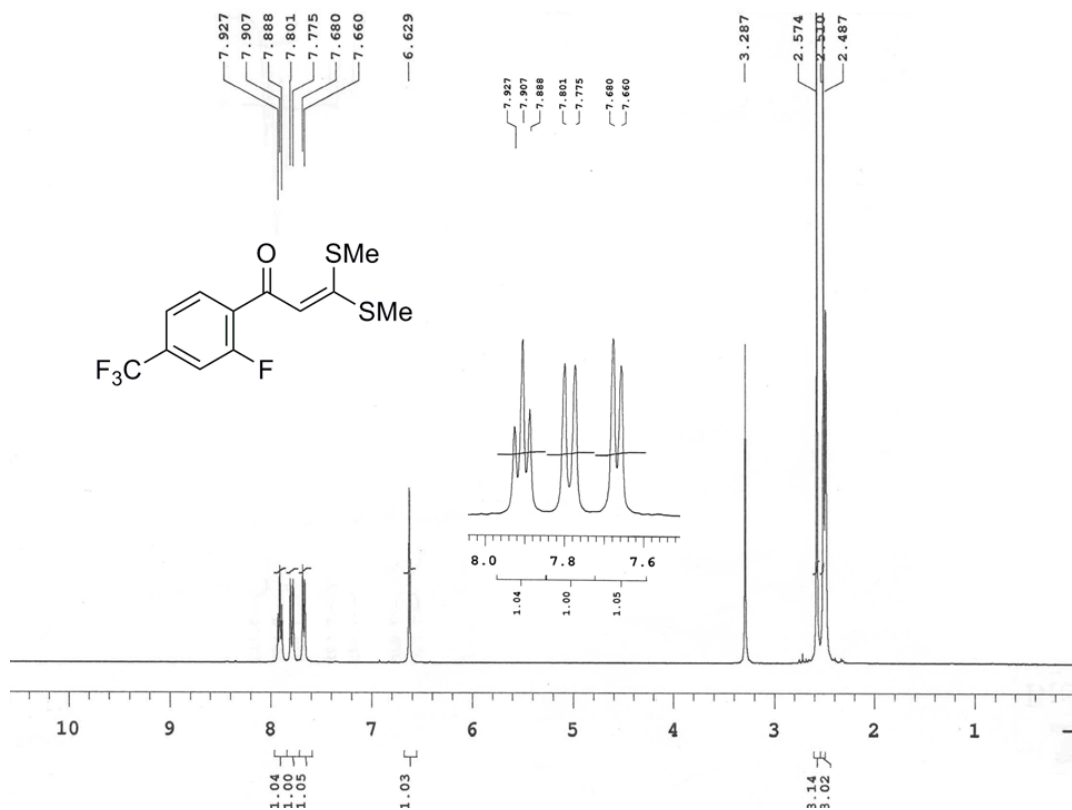


Figure S10: (100MHz, CDCl_3) ^{13}C NMR spectrum of compound **1s**





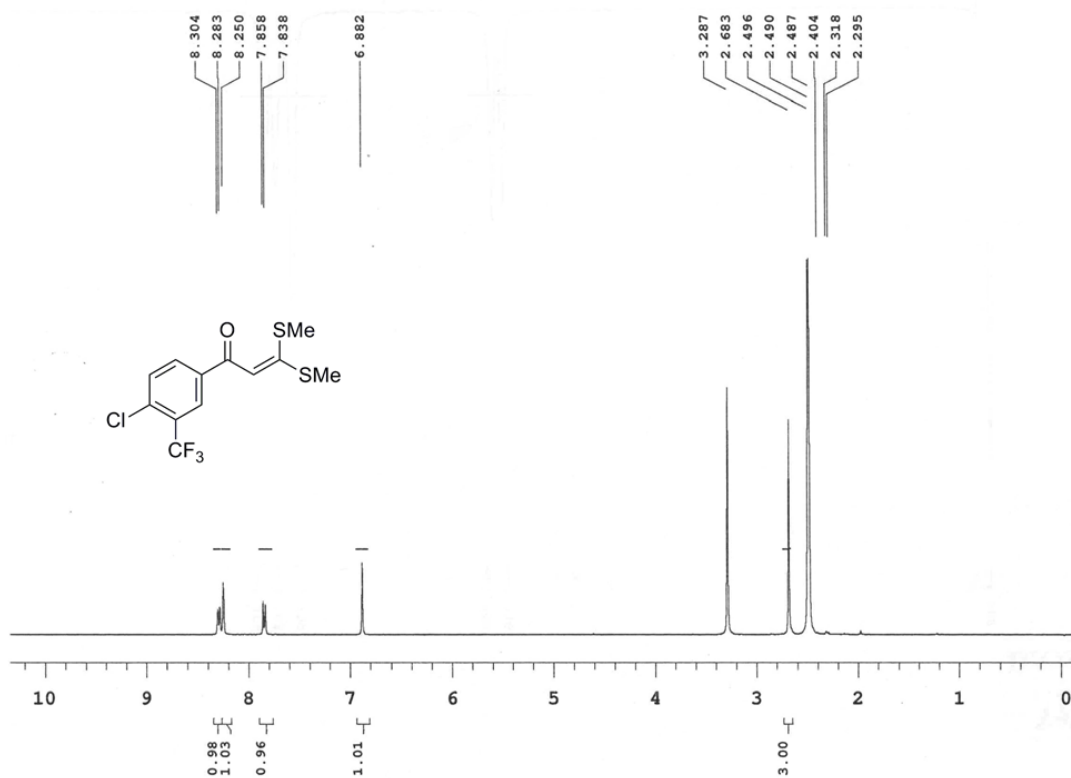


Figure S15: (400MHz, DMSO-d₆) ¹H NMR spectrum of compound **1v**

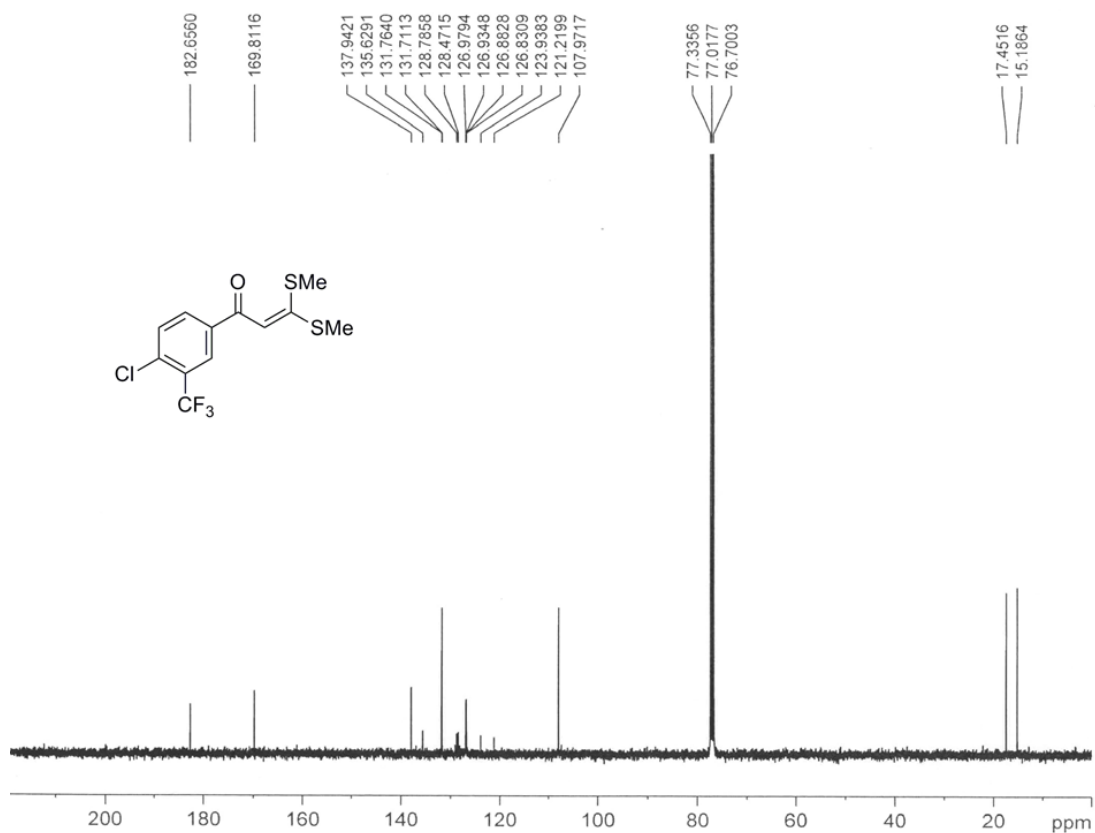


Figure S16: (100MHz, CDCl₃) ¹³C NMR spectrum of compound **1v**

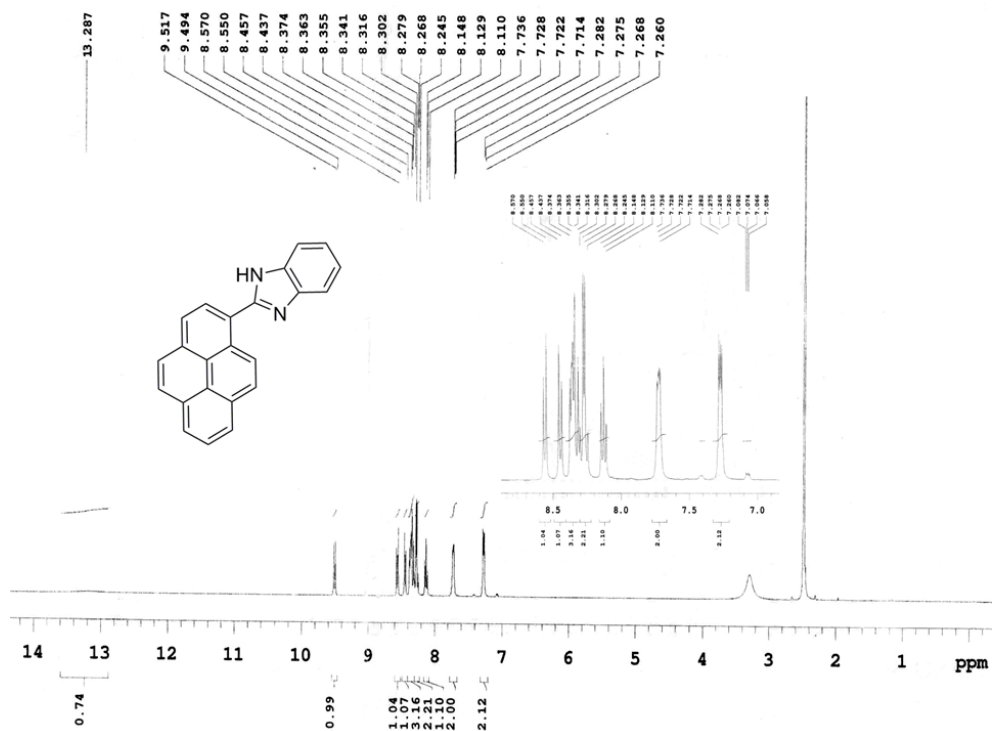


Figure S17: (400MHz, DMSO-d₆) ¹H NMR spectrum of compound 4g

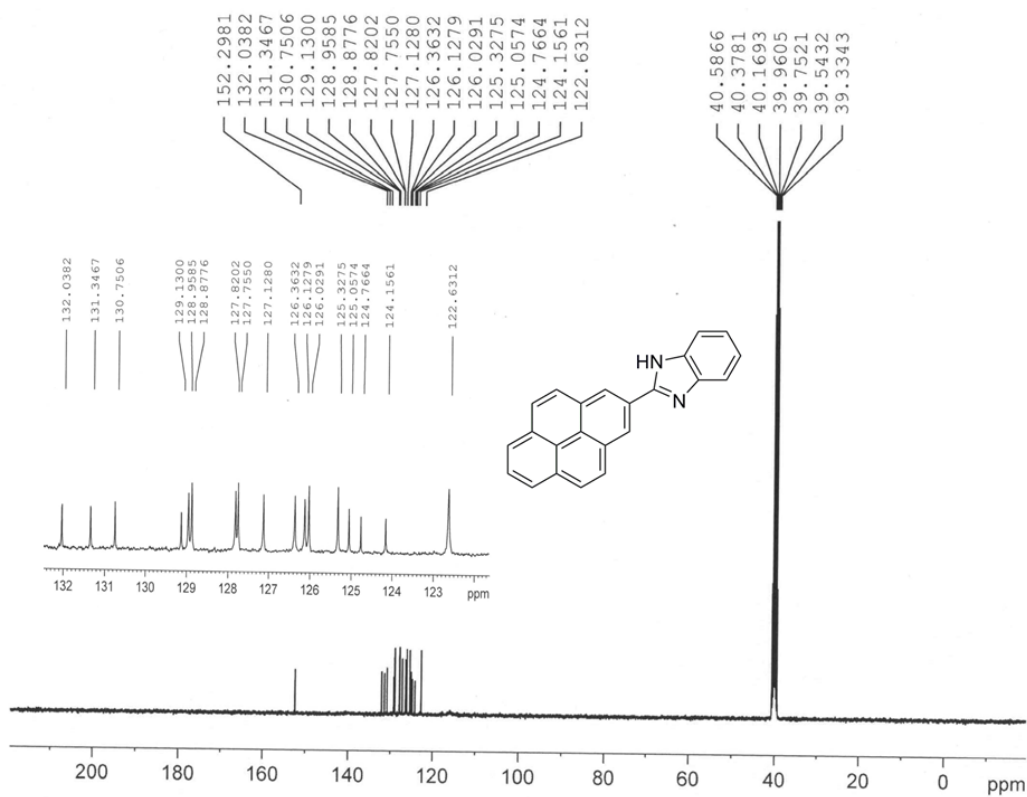


Figure S18: (100MHz, DMSO-d₆) ¹³C NMR spectrum of compound 4g

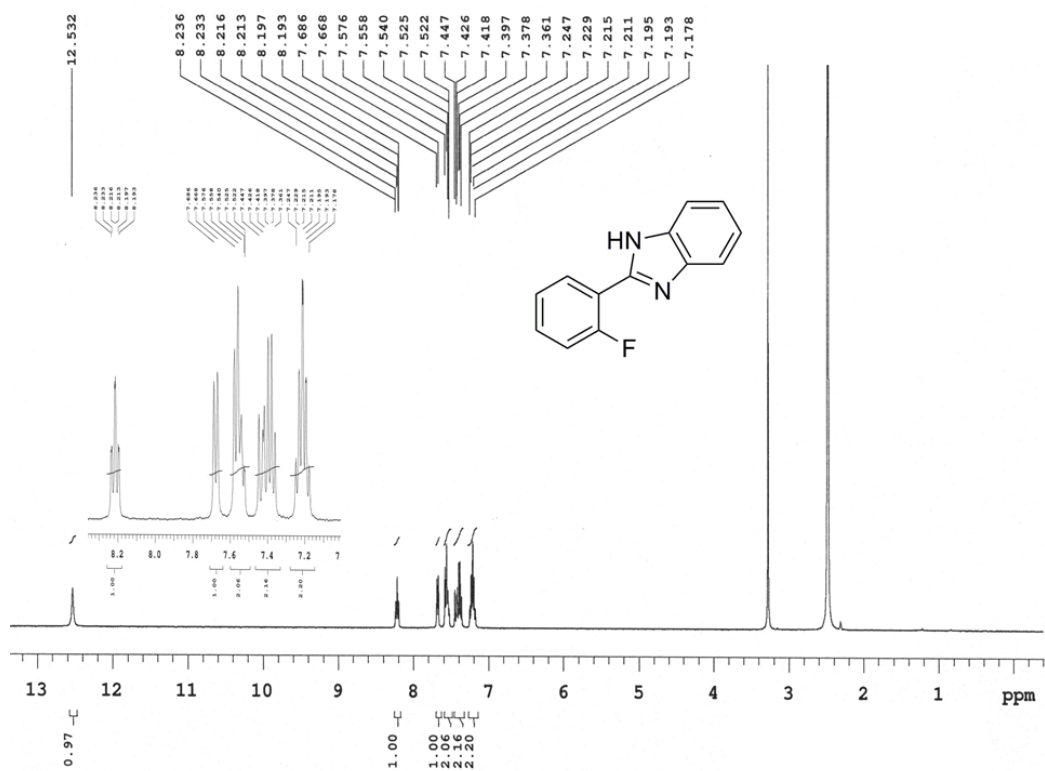


Figure S19: (400MHz, DMSO-d₆) ¹H NMR spectrum of compound **4j**

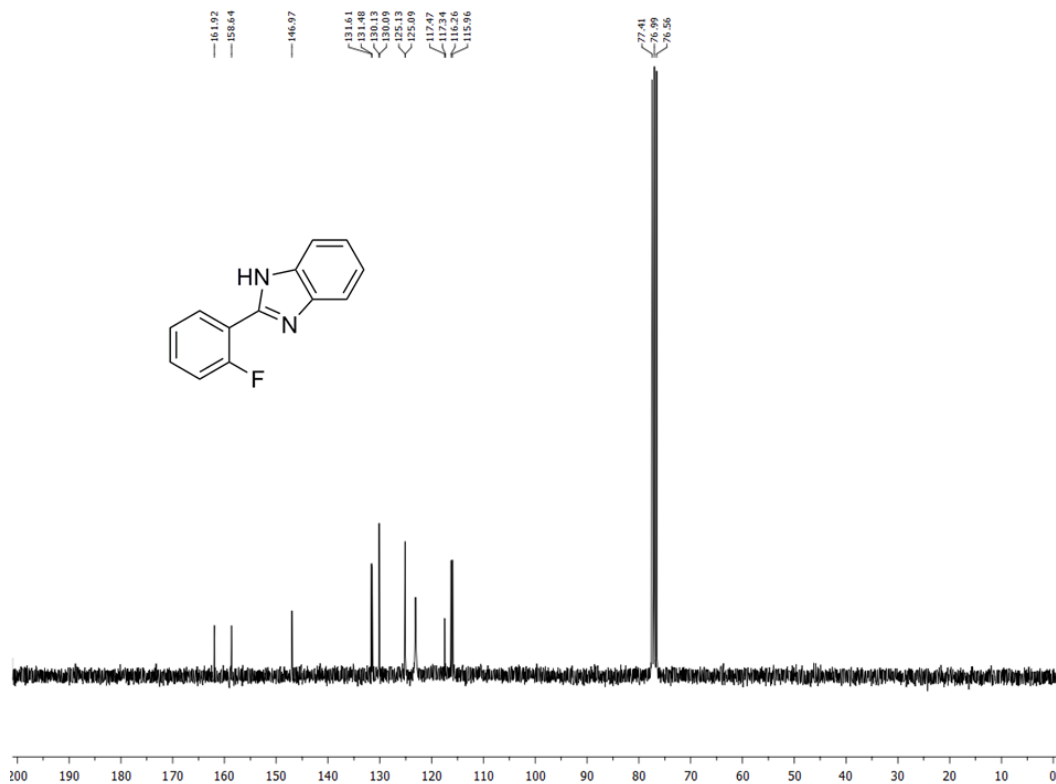


Figure S20: (75MHz, DMSO-d₆) ¹³C NMR spectrum of compound **4j**

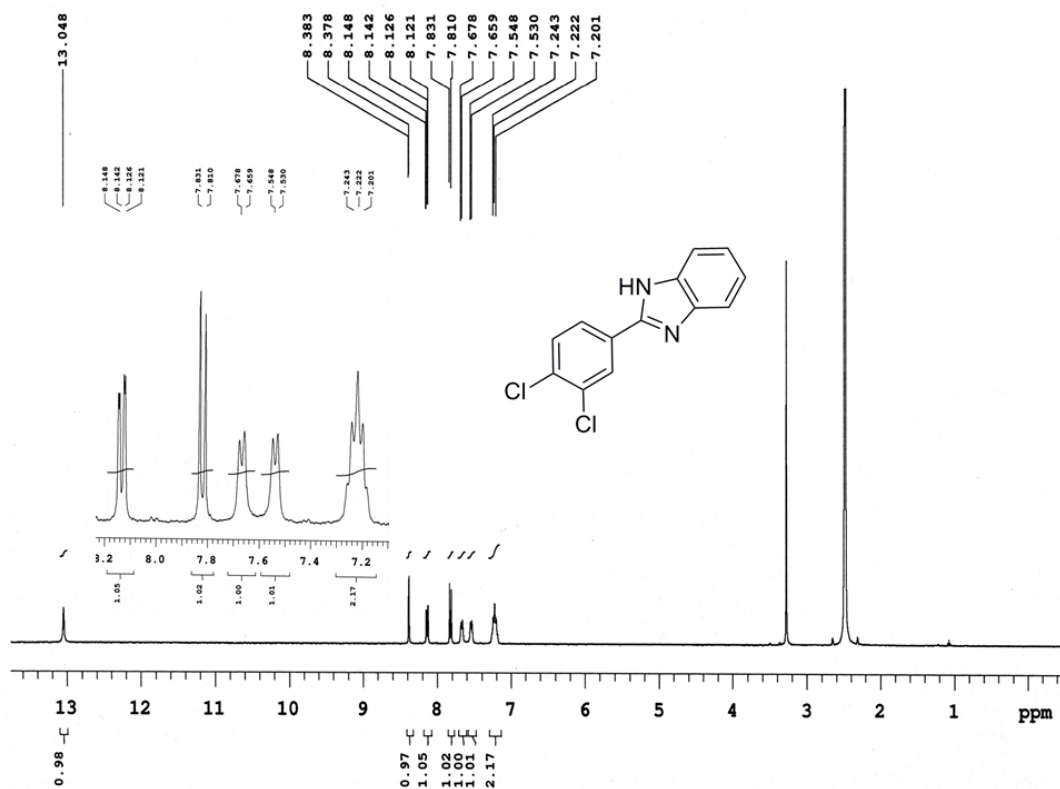


Figure S21: (400MHz, DMSO-d₆) ¹H NMR spectrum of compound **4o**

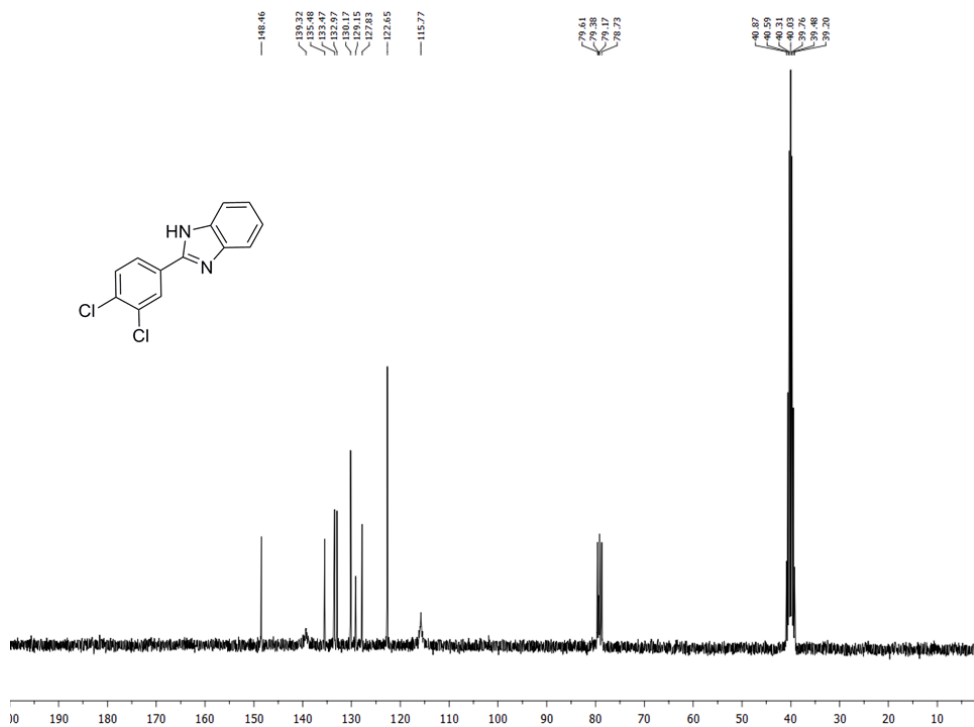


Figure S22: (75MHz, DMSO-d₆) ¹³C NMR spectrum of compound **4o**

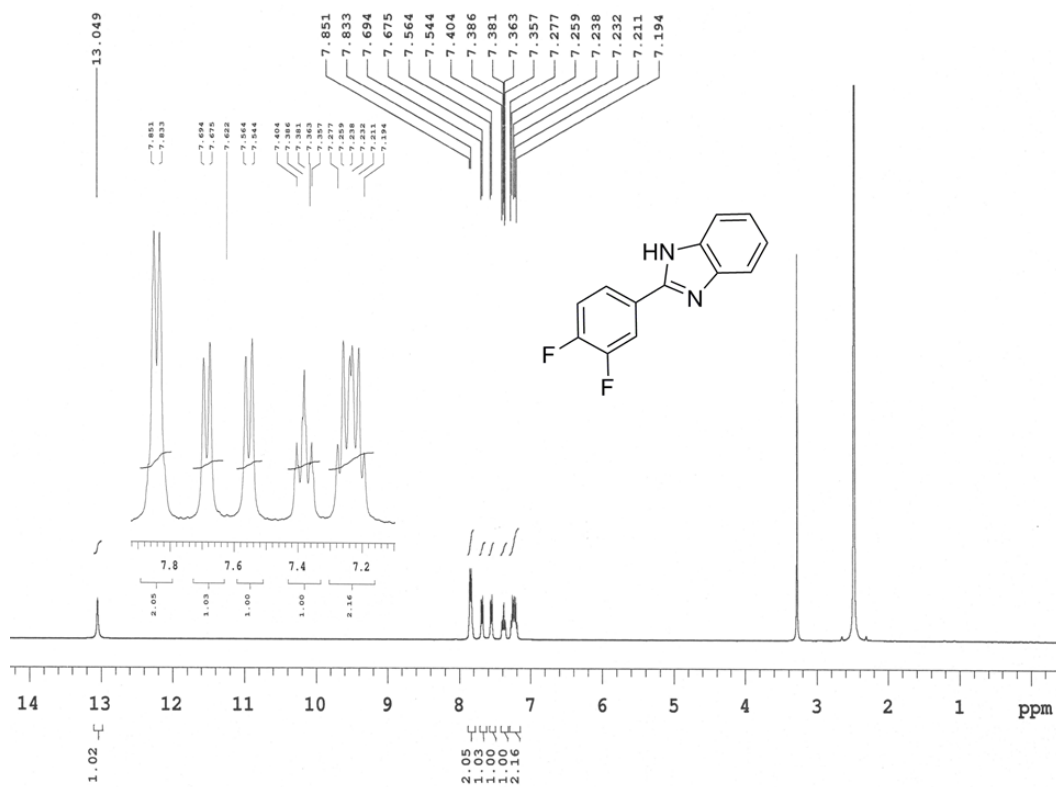


Figure S23: (400MHz, DMSO- d_6) ^1H NMR spectrum of compound 4p

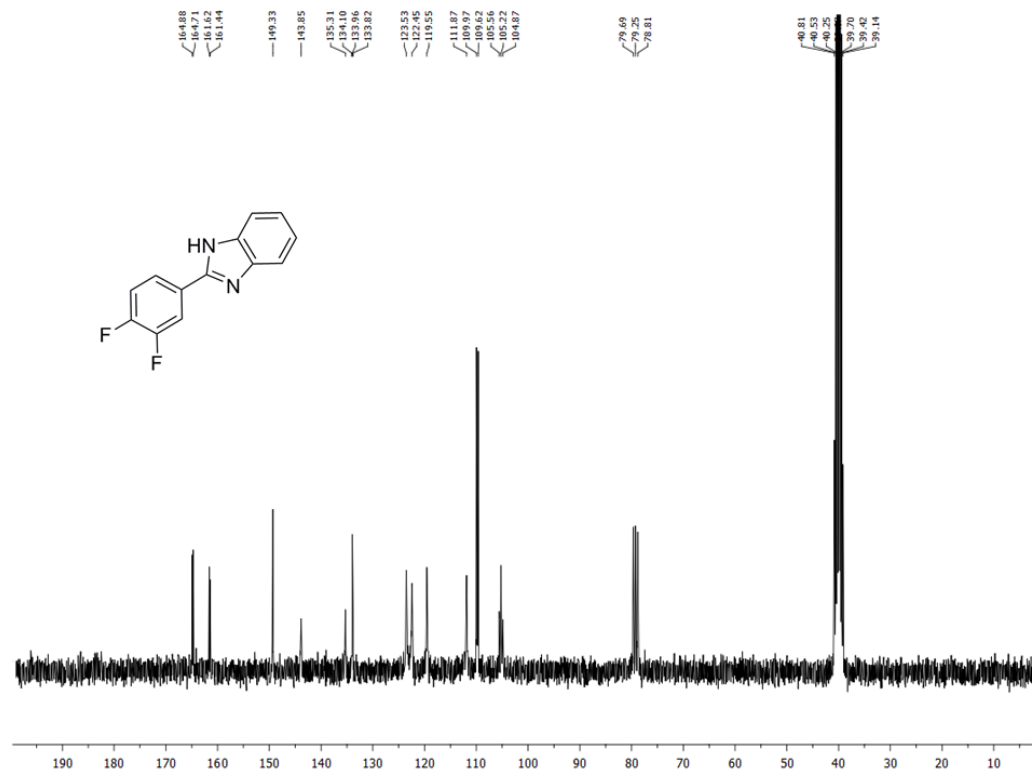


Figure S24: (75MHz, DMSO- d_6) ^{13}C NMR spectrum of compound 4p

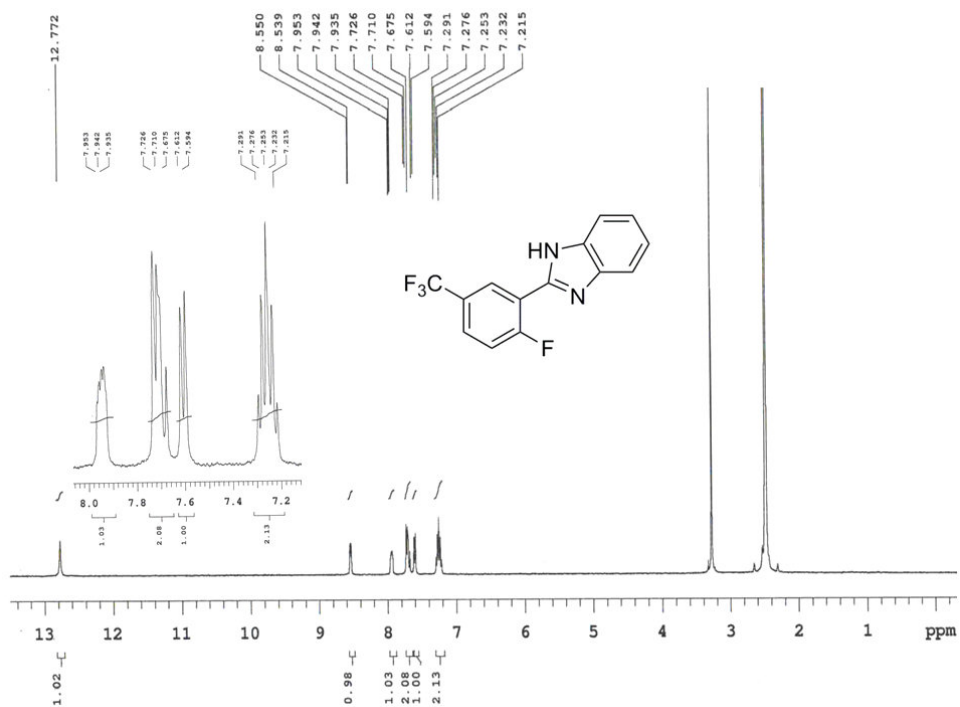


Figure S25: (400MHz, DMSO- d_6) ^1H NMR spectrum of compound 4s

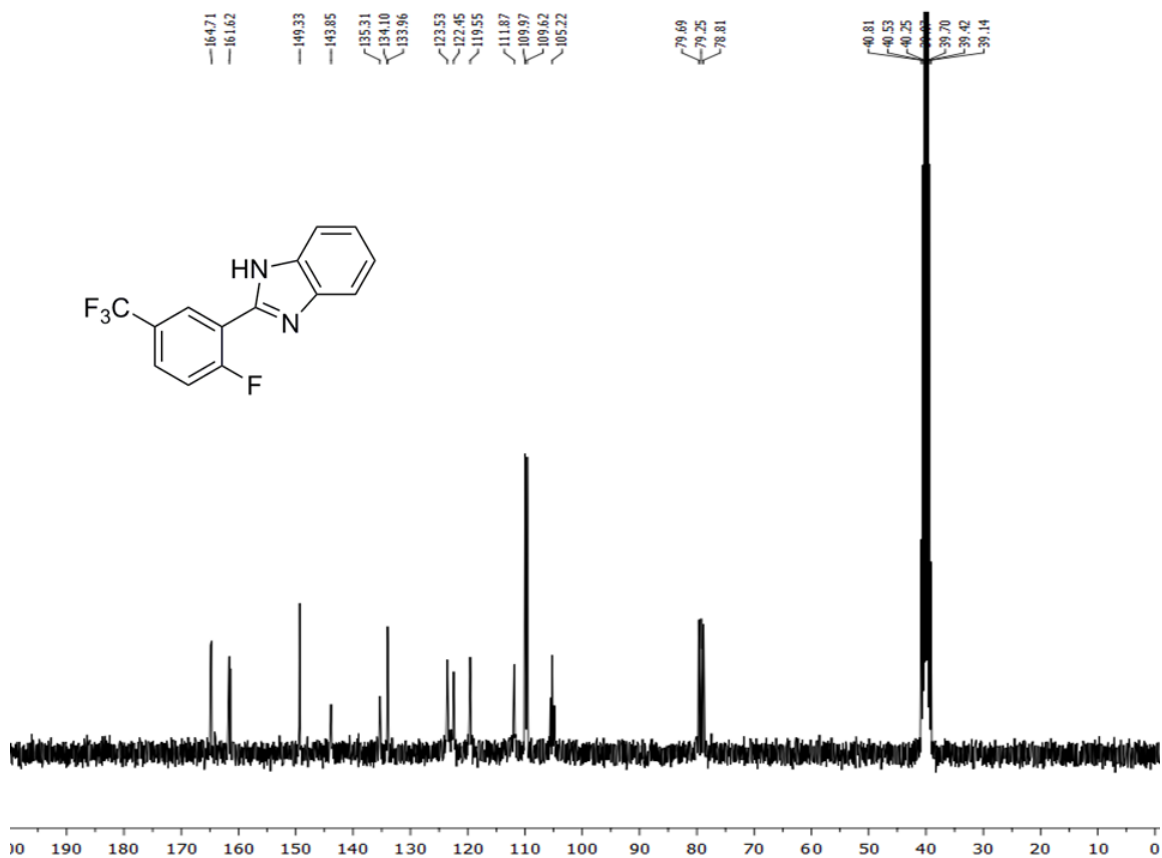


Figure S26: (75MHz, DMSO- d_6) ^{13}C NMR spectrum of compound 4s

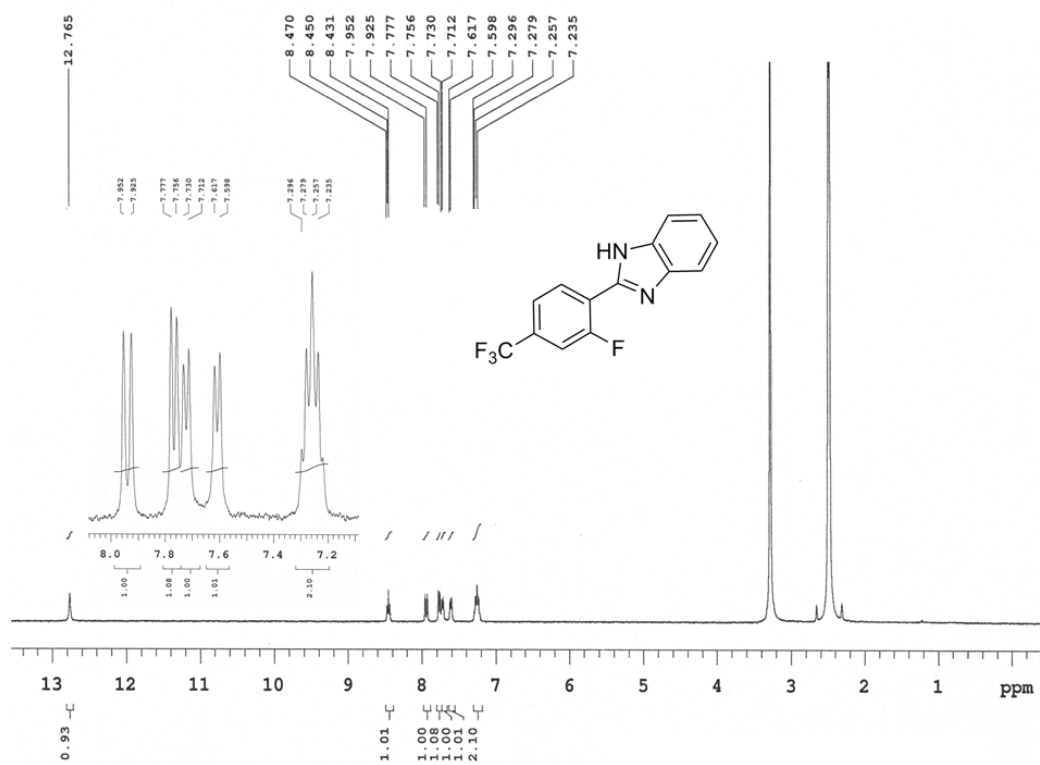


Figure S27: (400MHz, DMSO-d₆) ¹H NMR spectrum of compound **4u**

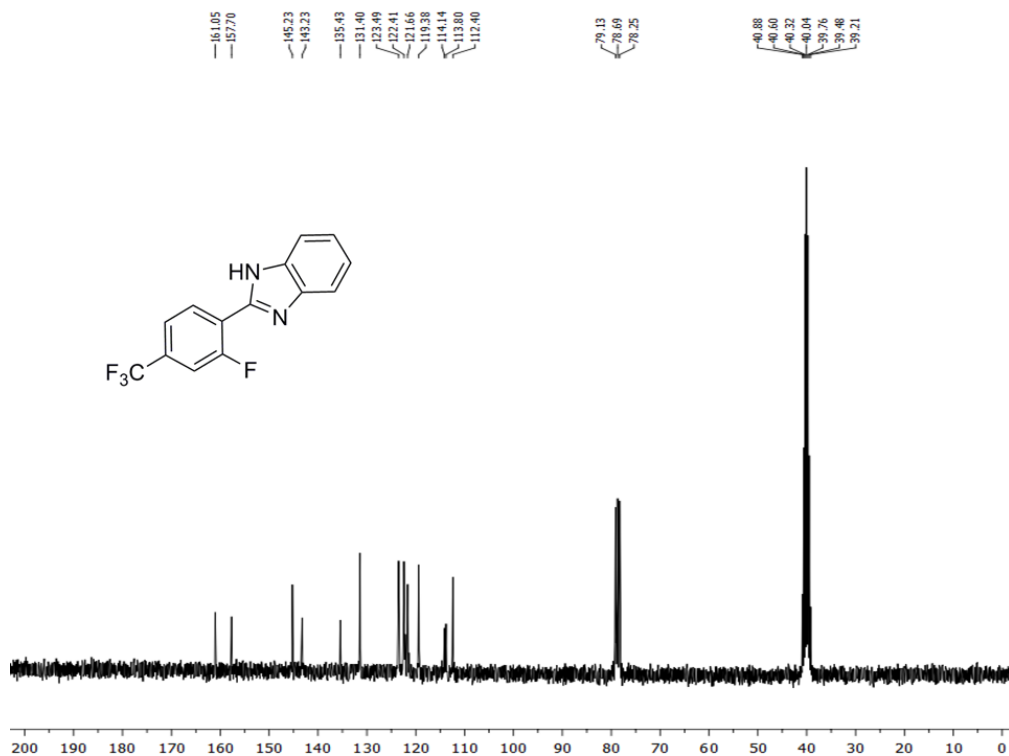


Figure S28: (75MHz, DMSO-d₆) ¹³C NMR spectrum of compound **4u**

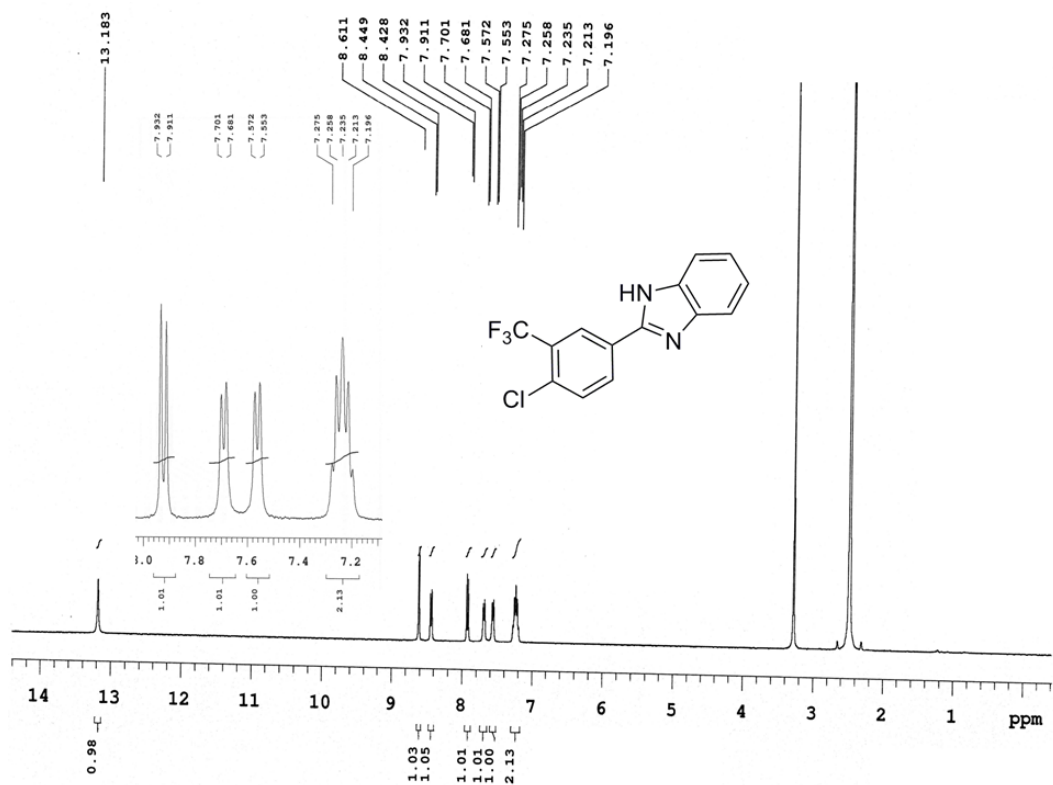


Figure S29: (400MHz, DMSO-d₆) ¹H NMR spectrum of compound 4v

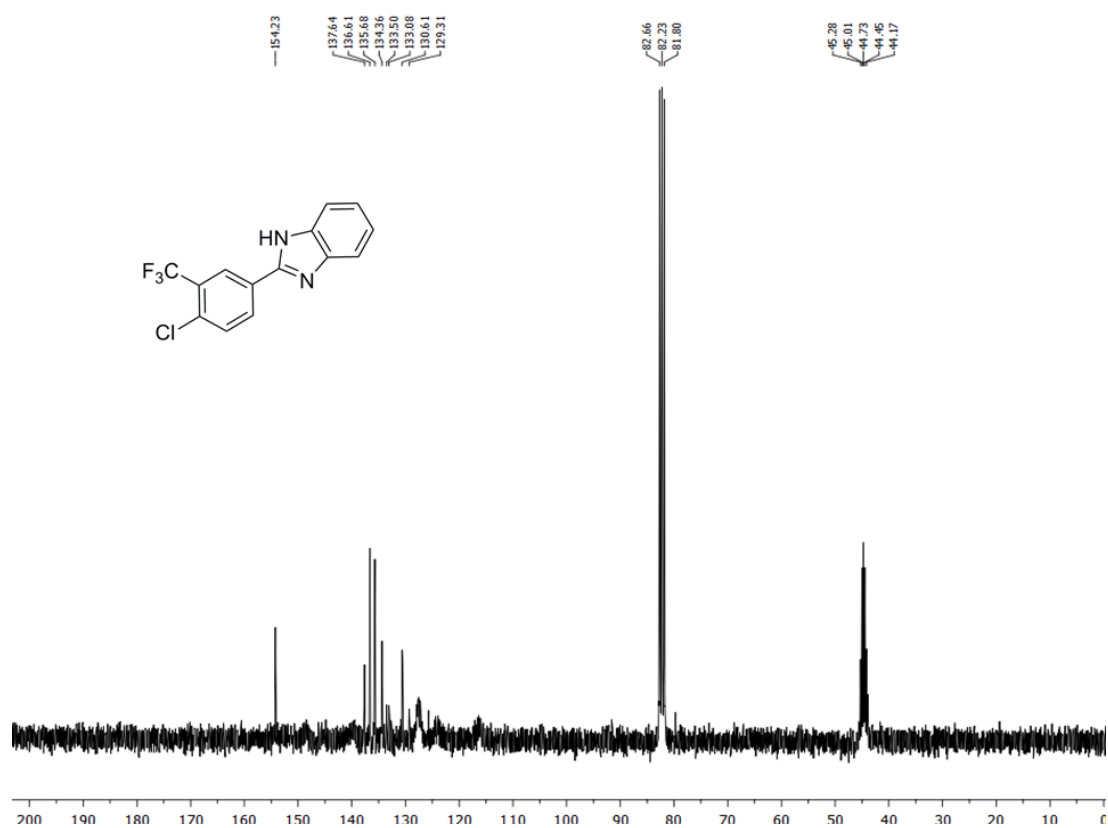


Figure S30: (75MHz, DMSO-d₆) ¹³C NMR spectrum of compound 4v

