

Supporting Information

Org. Commun. 12:1 (2019) 1-13

γ -Valerolactone: Promising bio-compatible media for the synthesis of 2-arylbenzothiazole derivatives

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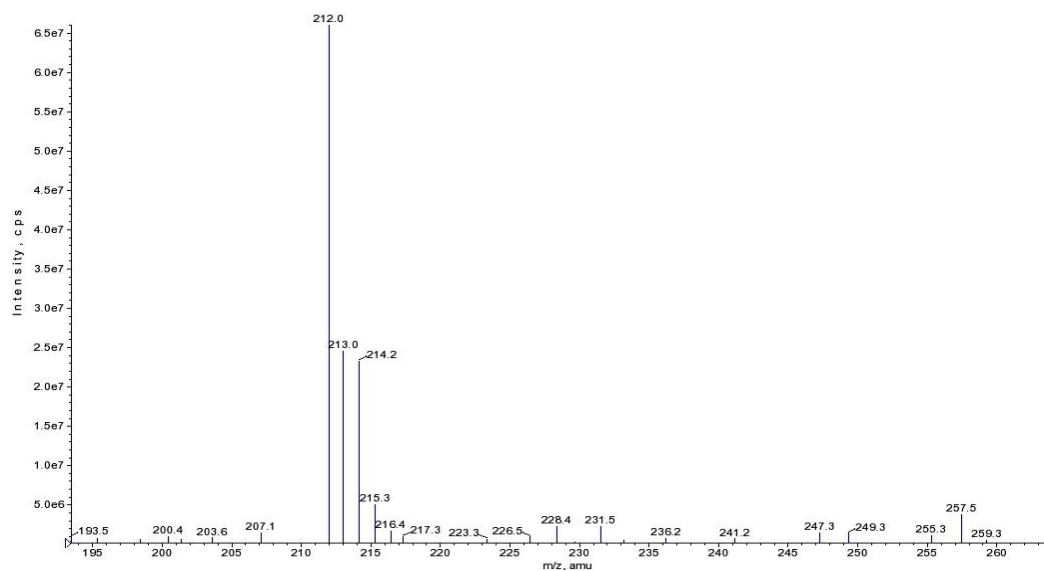


Figure S1: Mass spectrum of compound **3a**

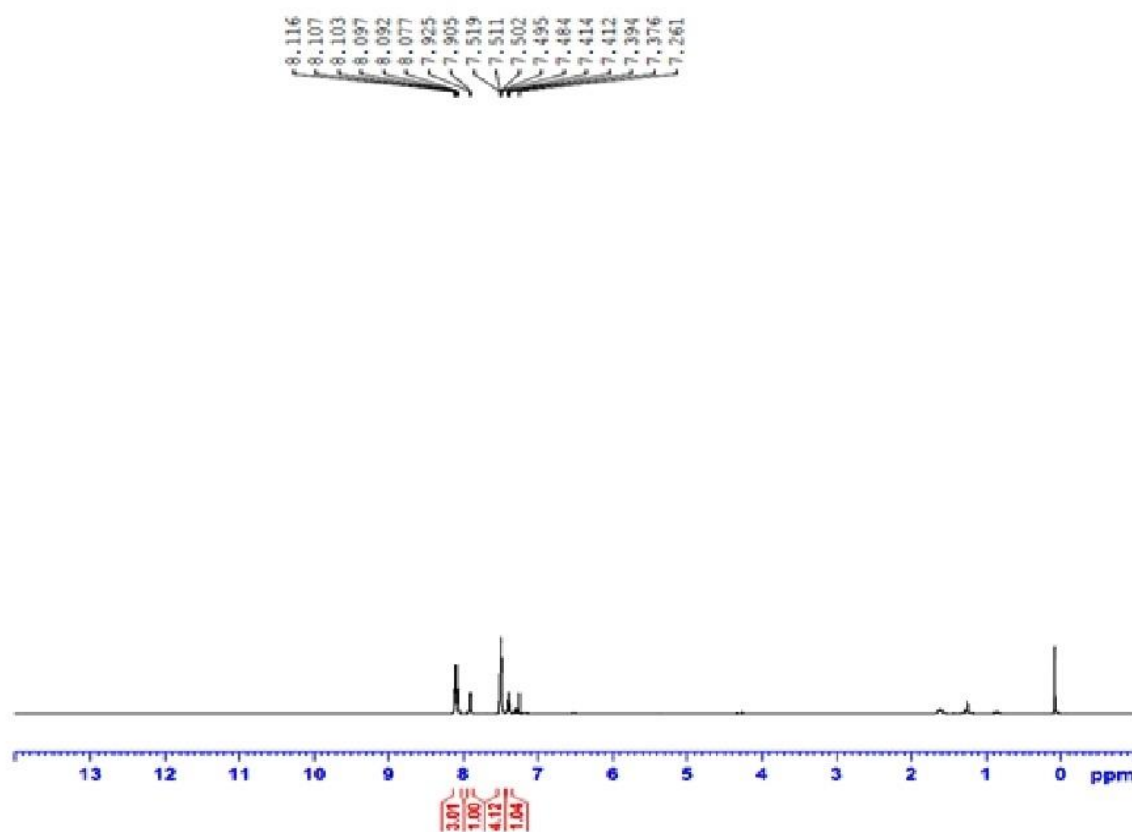


Figure S2: ¹H NMR (400 MHz, CDCl₃) spectrum of compound **3a**

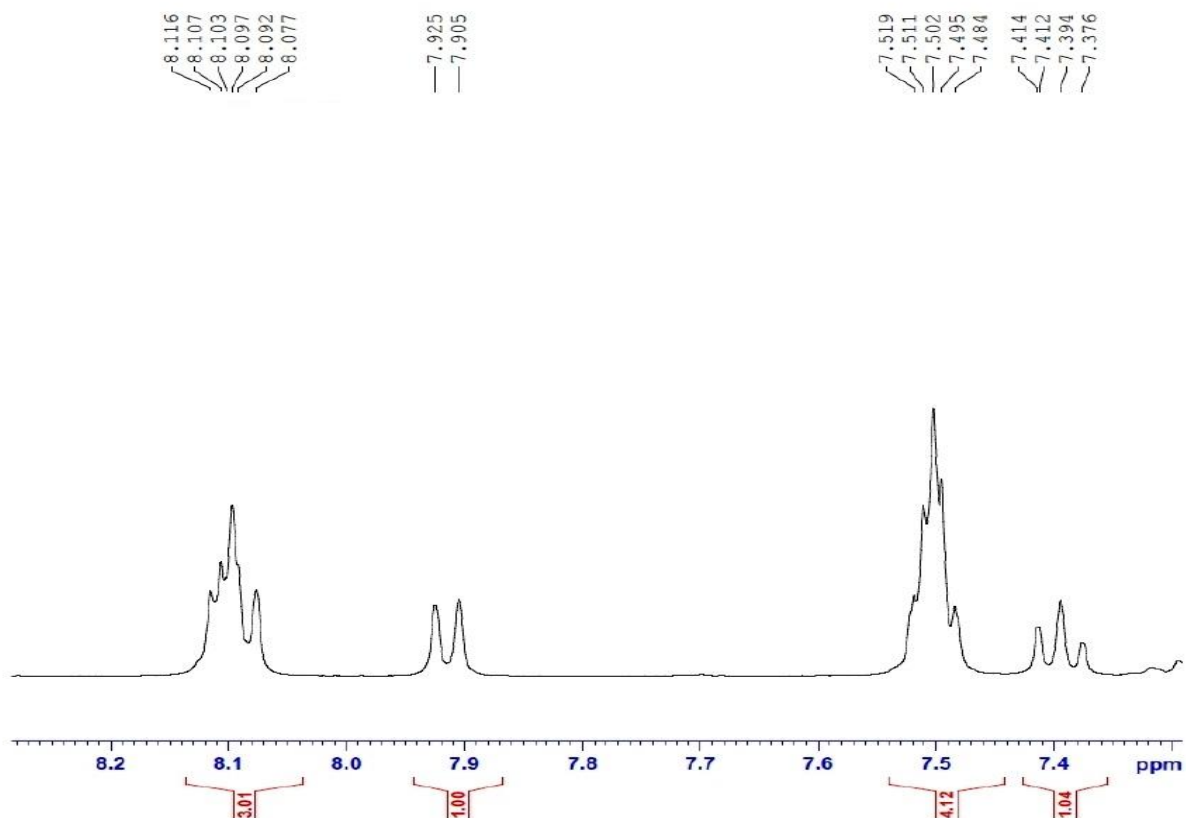


Figure S3: ¹H NMR (400 MHz, CDCl₃) spectrum of compound **3a**

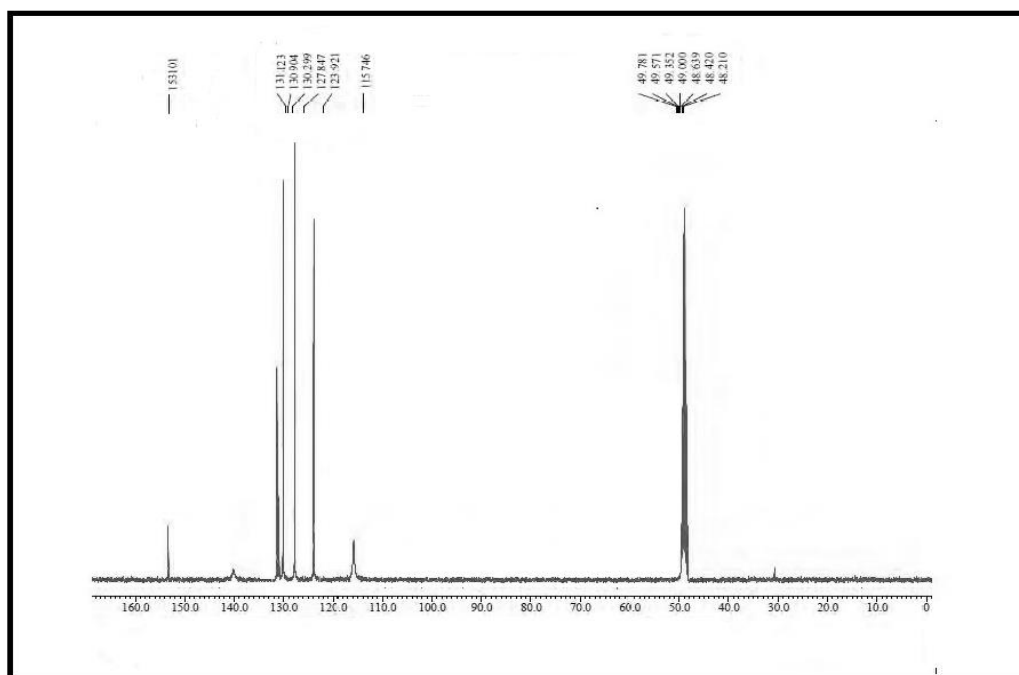


Figure S4: ¹³C NMR (100 MHz, CDCl₃) spectrum of compound **3a**

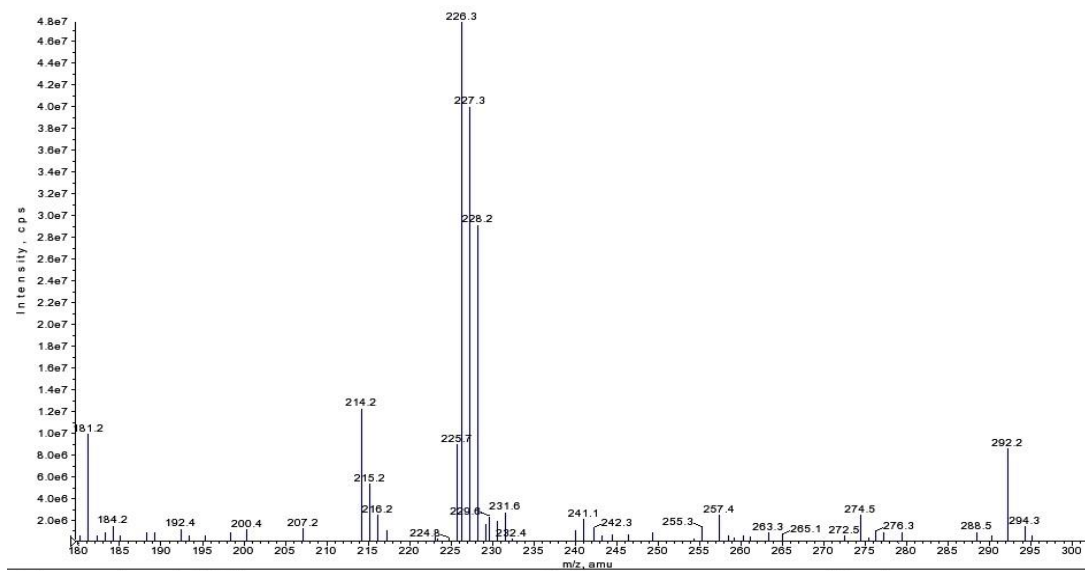


Figure S5: Mass spectrum of compound **3c**

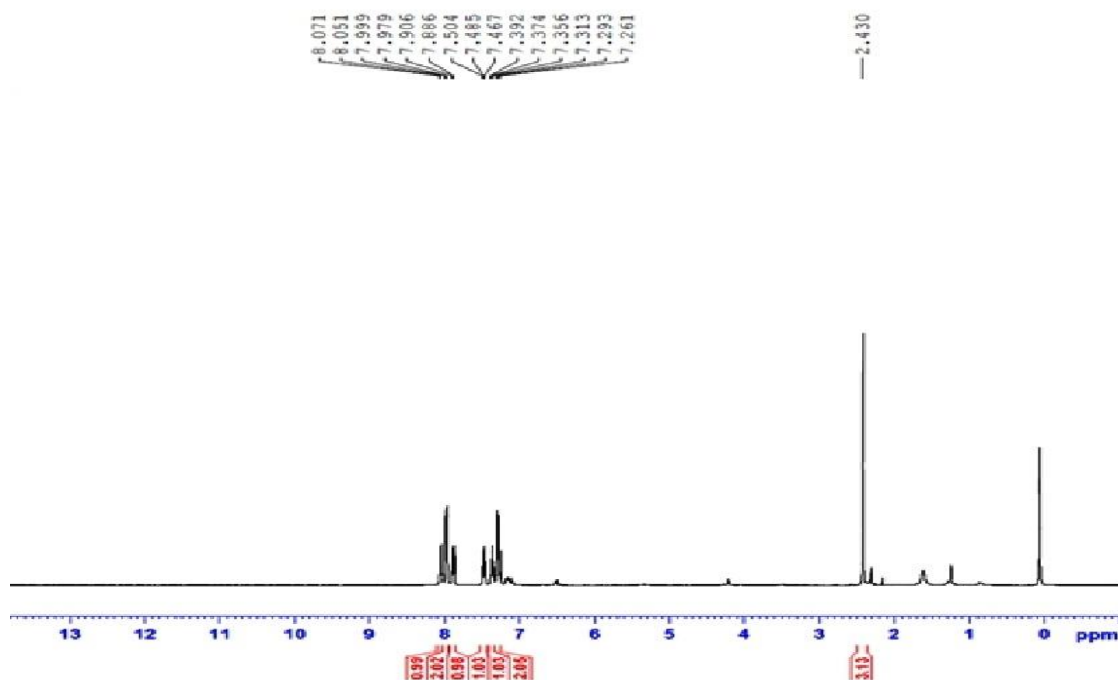


Figure S6: ¹H NMR (400 MHz, CDCl₃) spectrum of compound **3c**

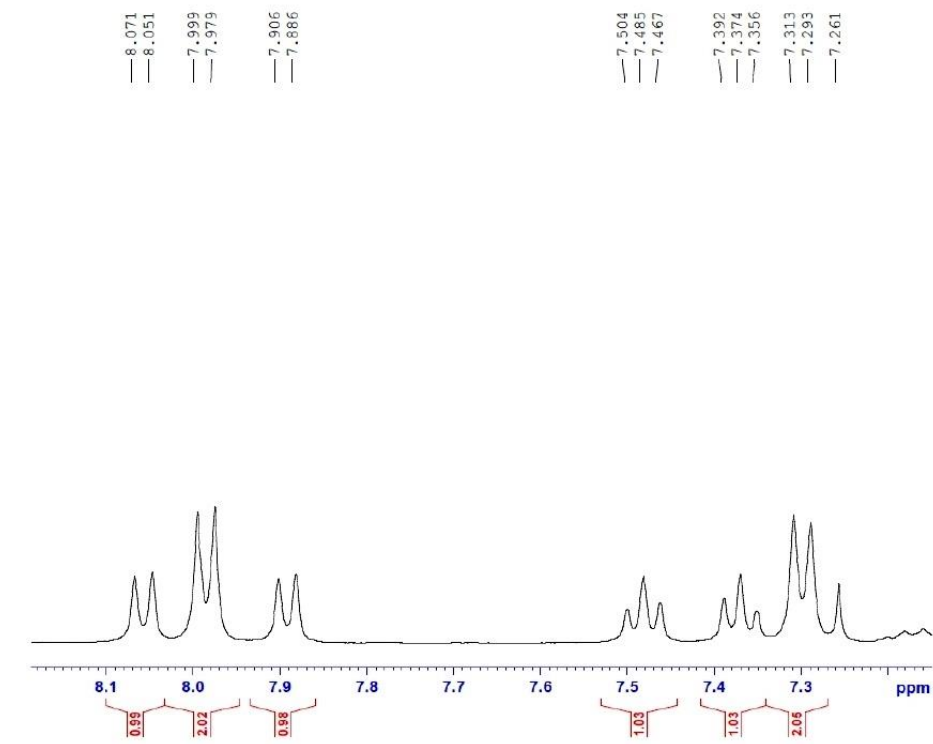


Figure S7: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3c**

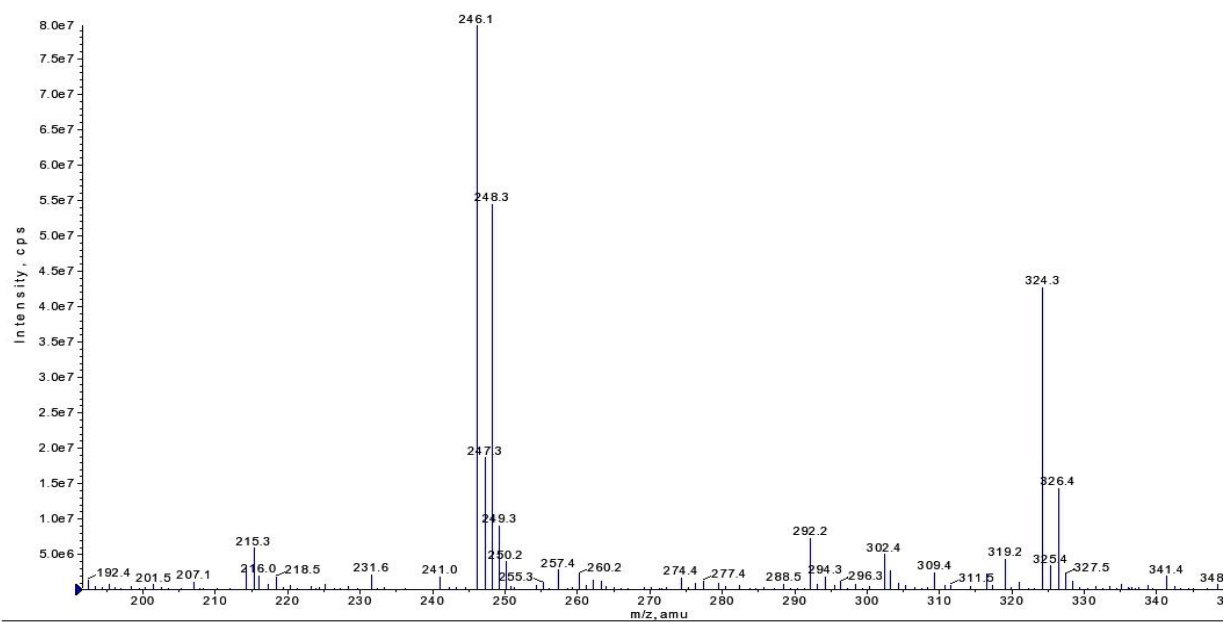


Figure S8: Mass spectrum of compound **3f**

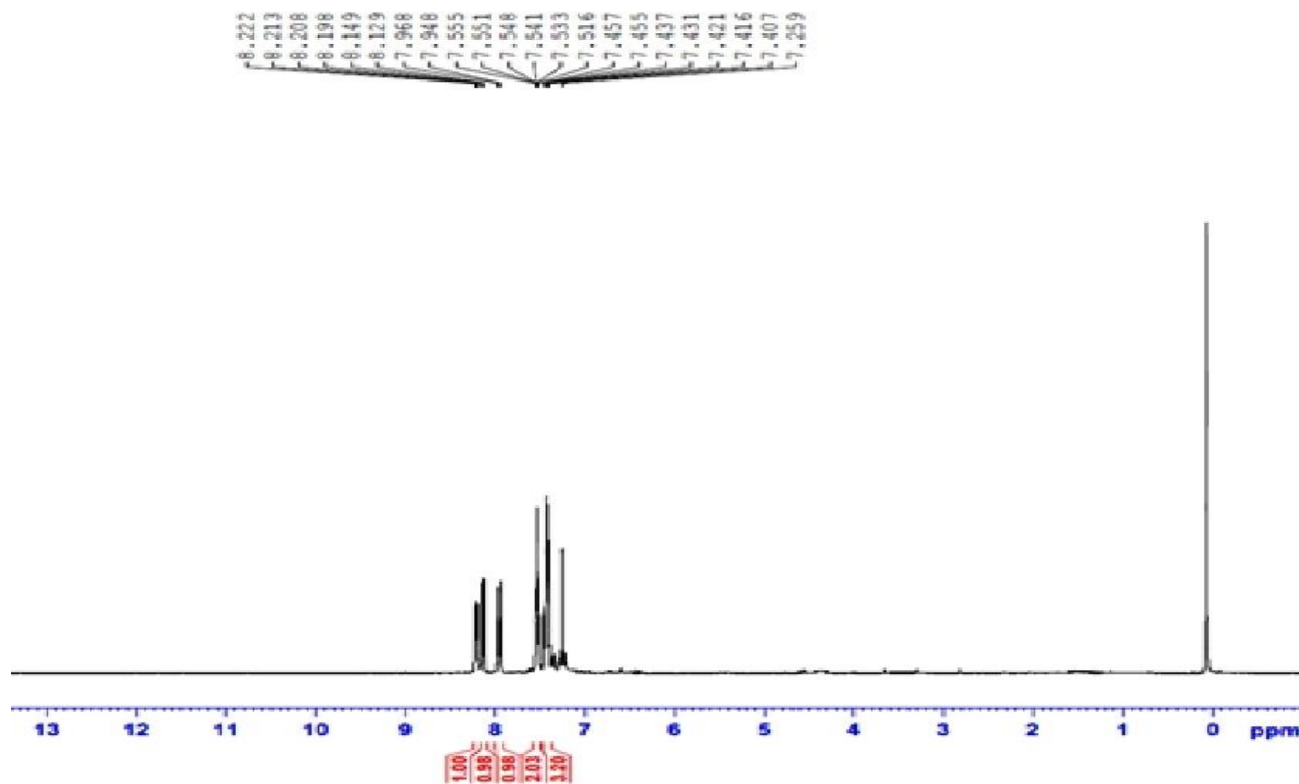


Figure S9: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3f**

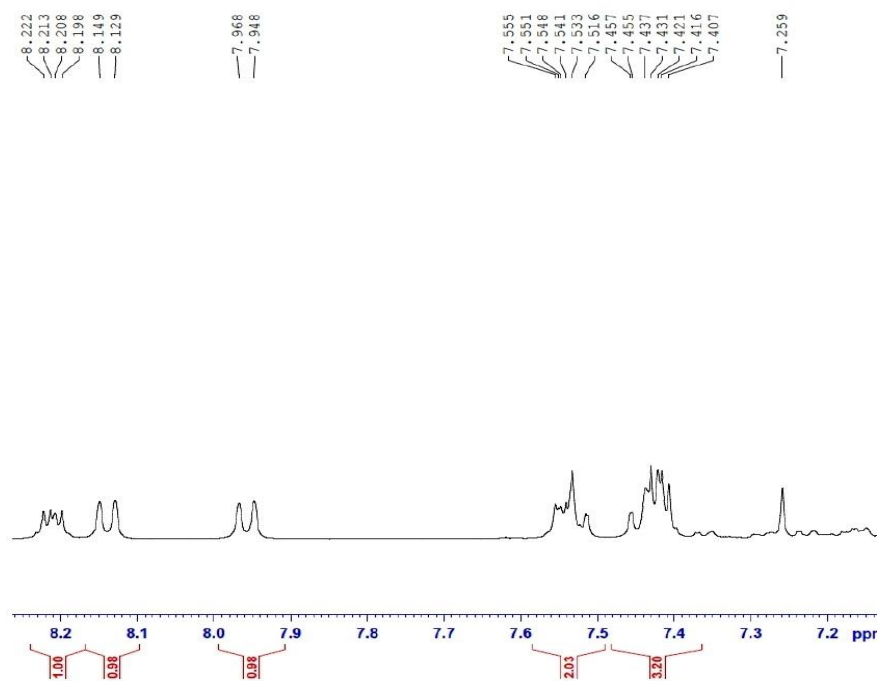


Figure S10: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3f**

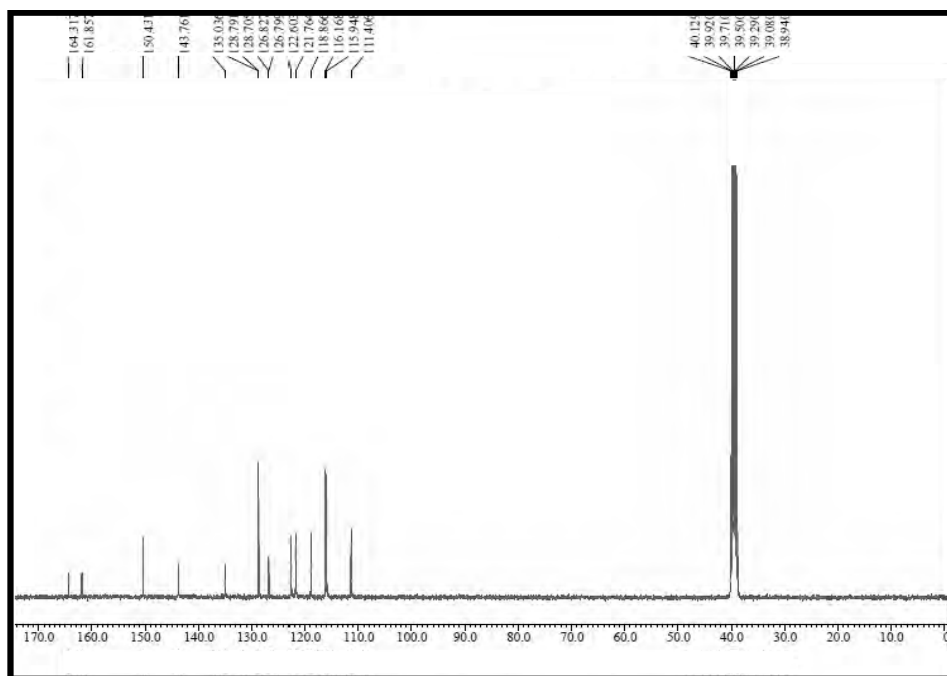


Figure S11: ^{13}C NMR (100 MHz, CDCl_3) spectrum of compound **3f**

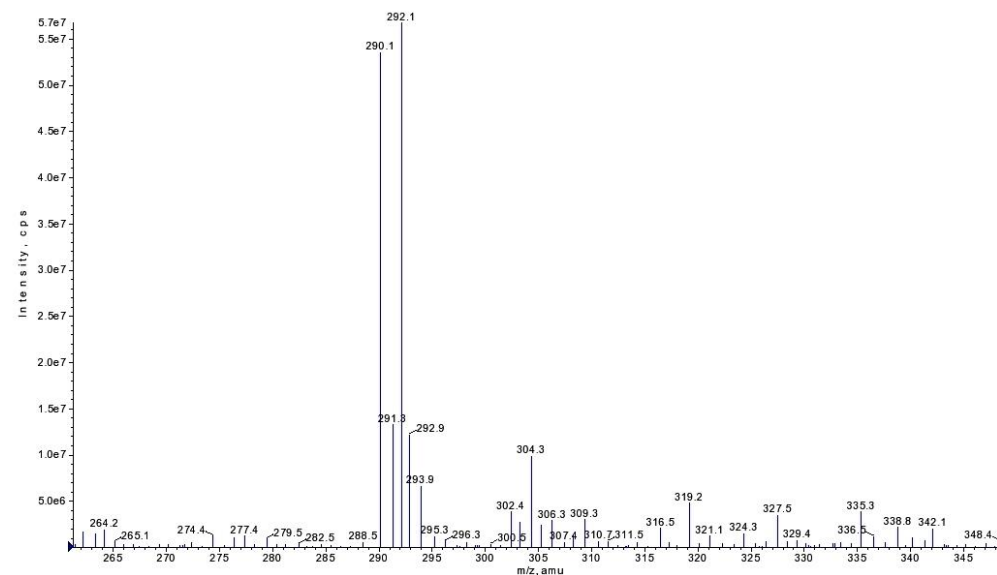


Figure S12: Mass spectrum of compound **3h**

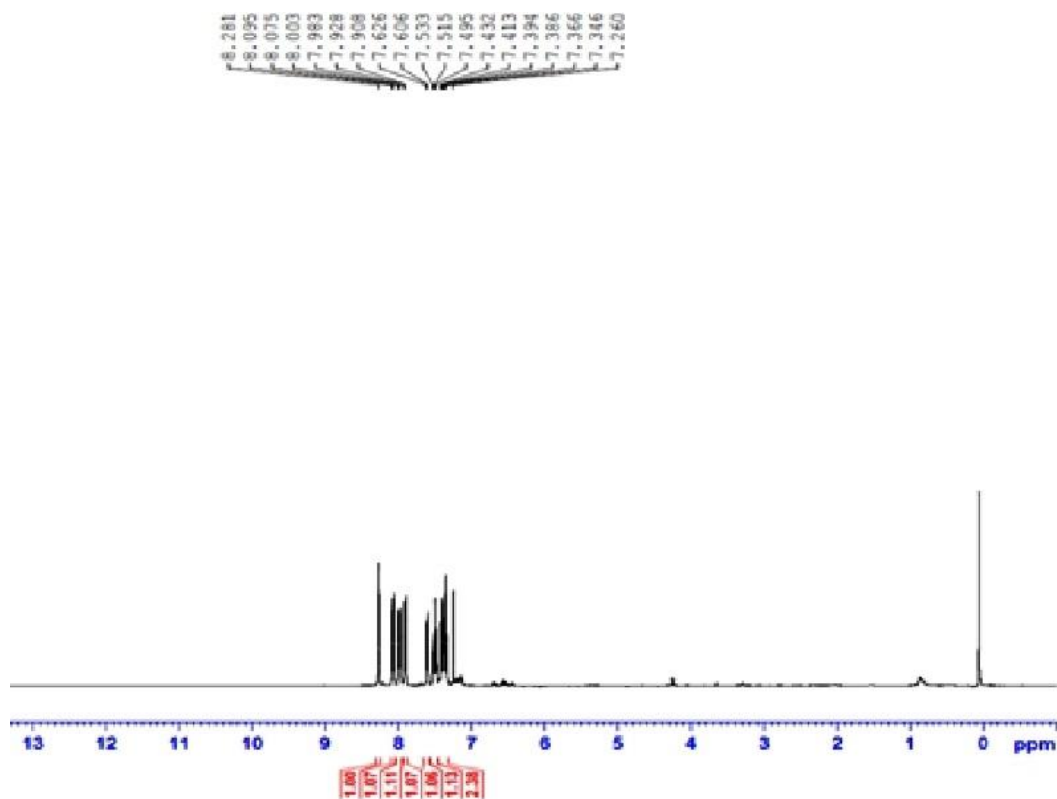


Figure S13: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3h**

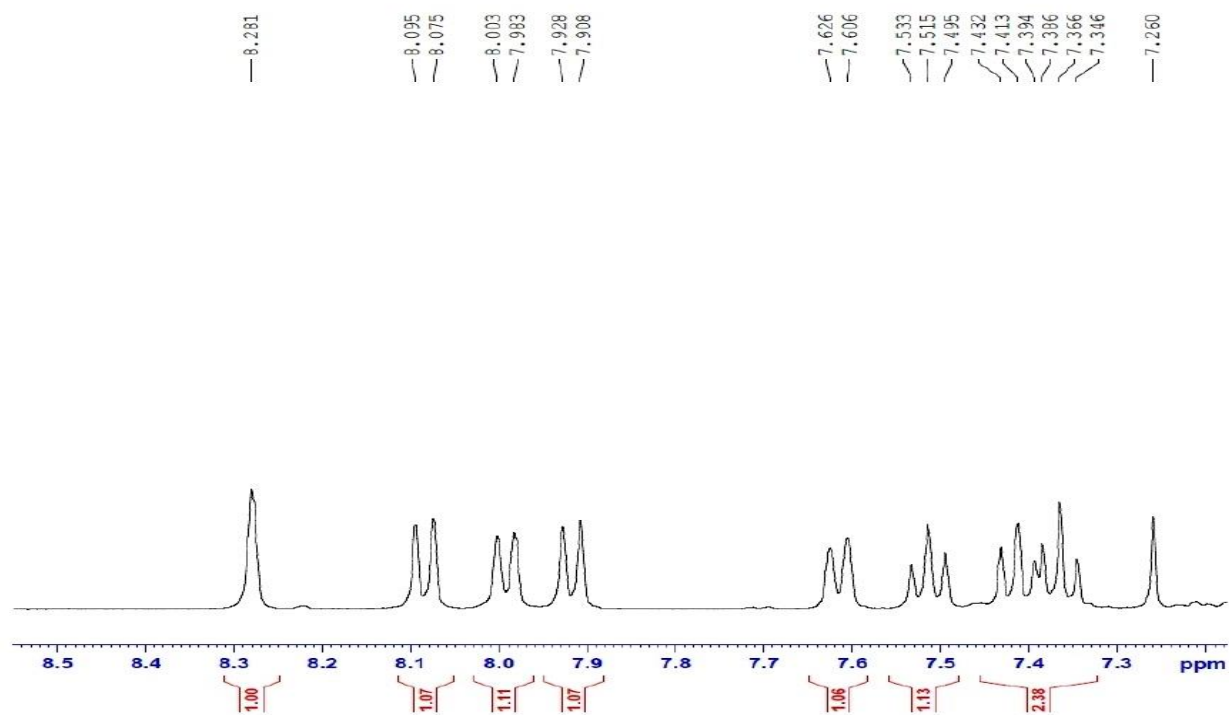


Figure S14: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3h**

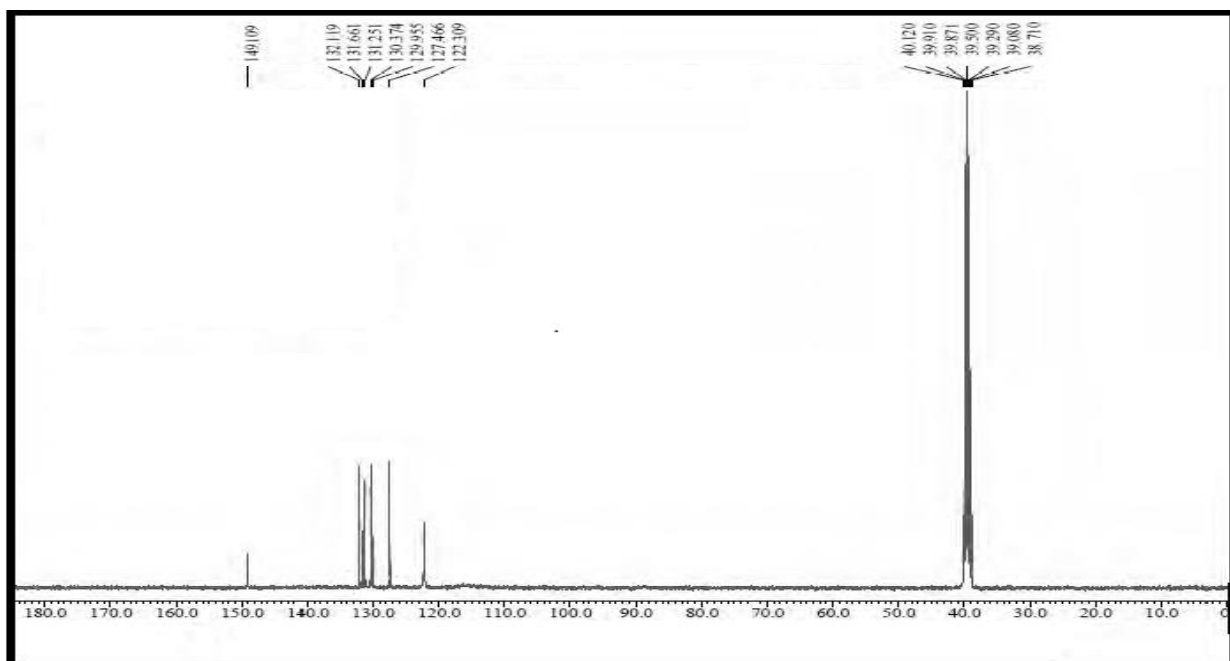


Figure S15: ^{13}C NMR (100 MHz, CDCl_3) spectrum of compound **3h**

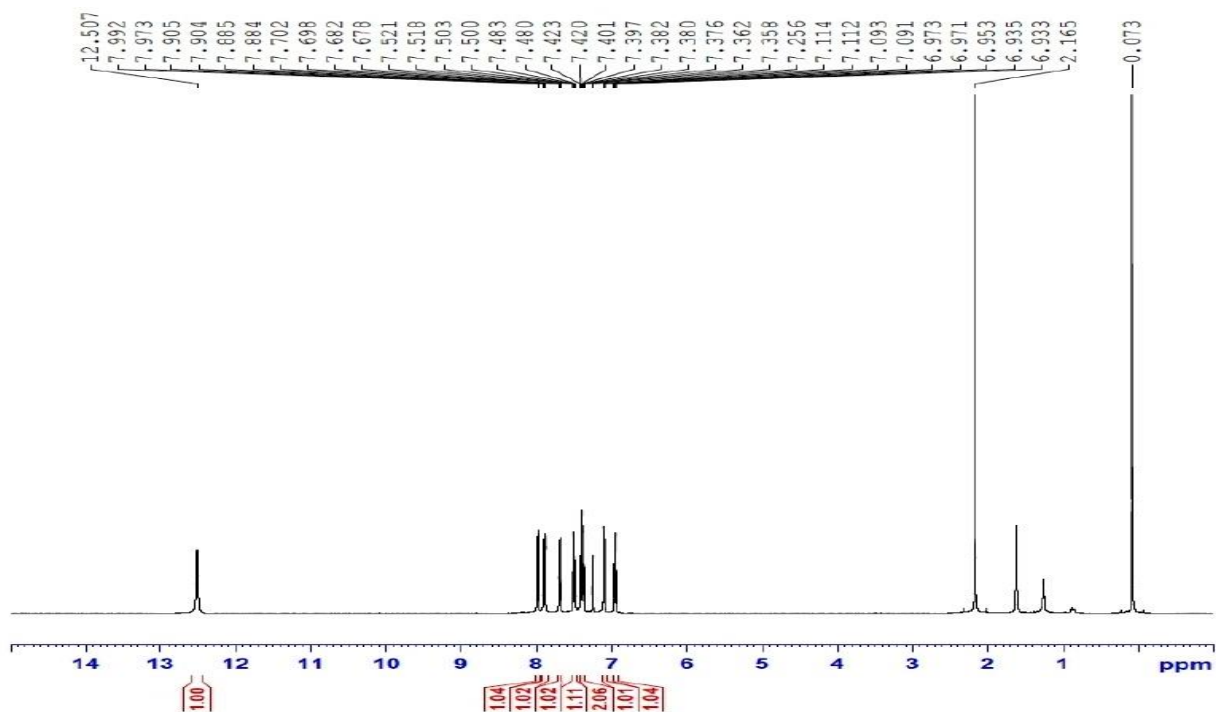


Figure S16: ^{13}C NMR (100 MHz, CDCl_3) spectrum of compound **3l**

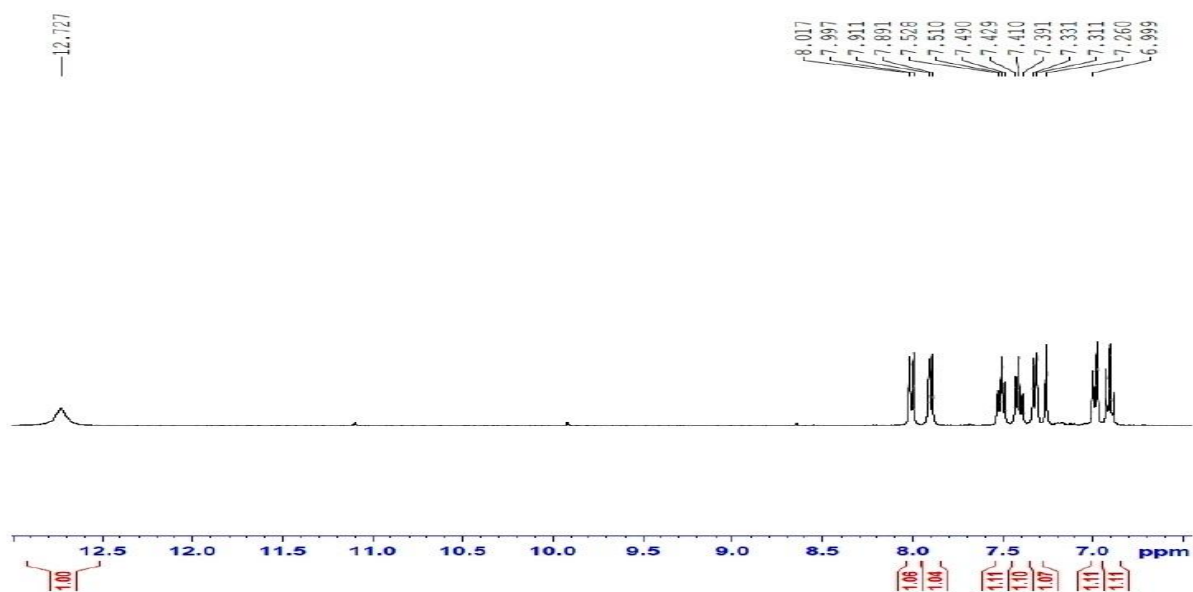


Figure S19: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3m**

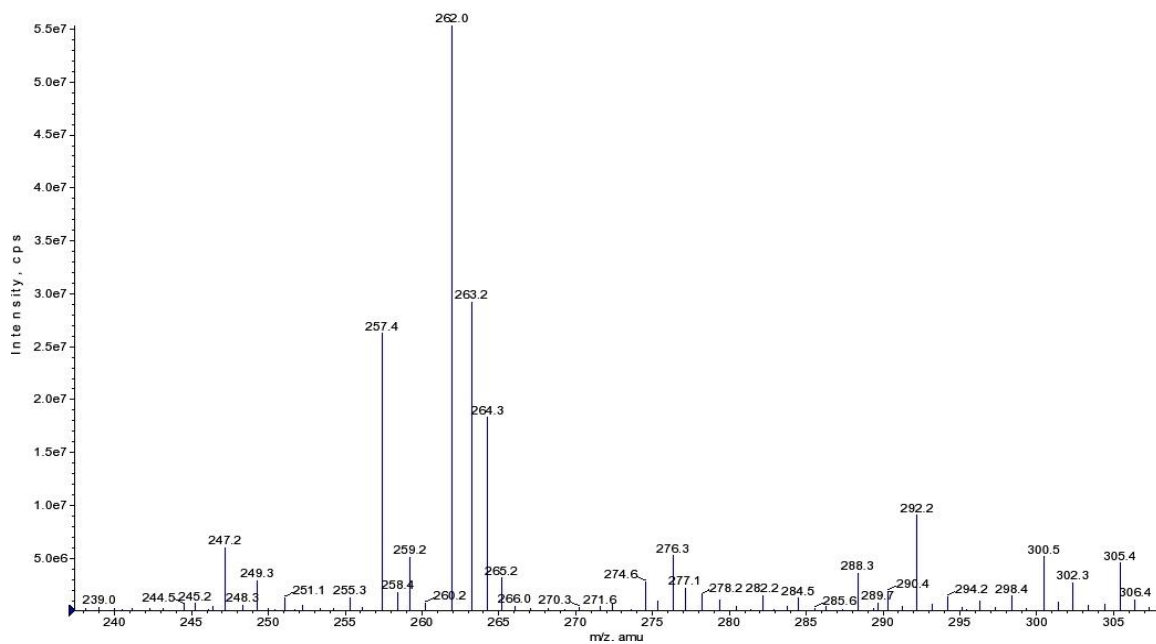


Figure S20: Mass spectrum of compound **3p**

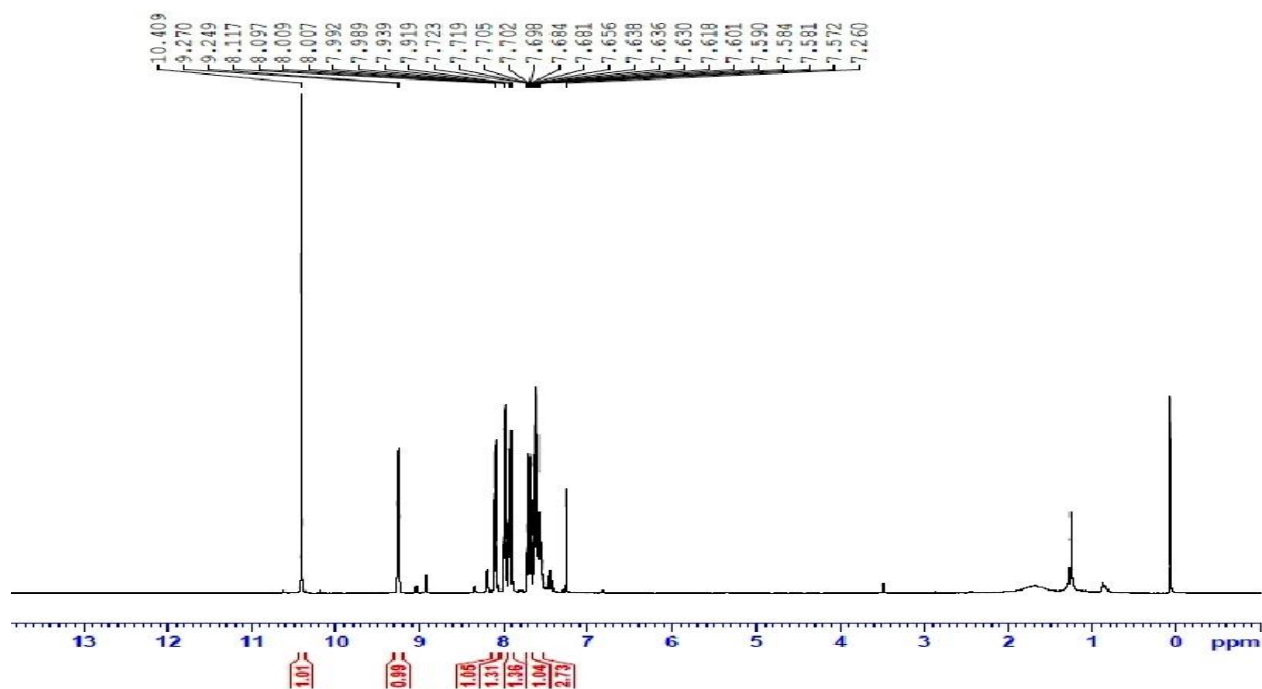


Figure S21: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3p**

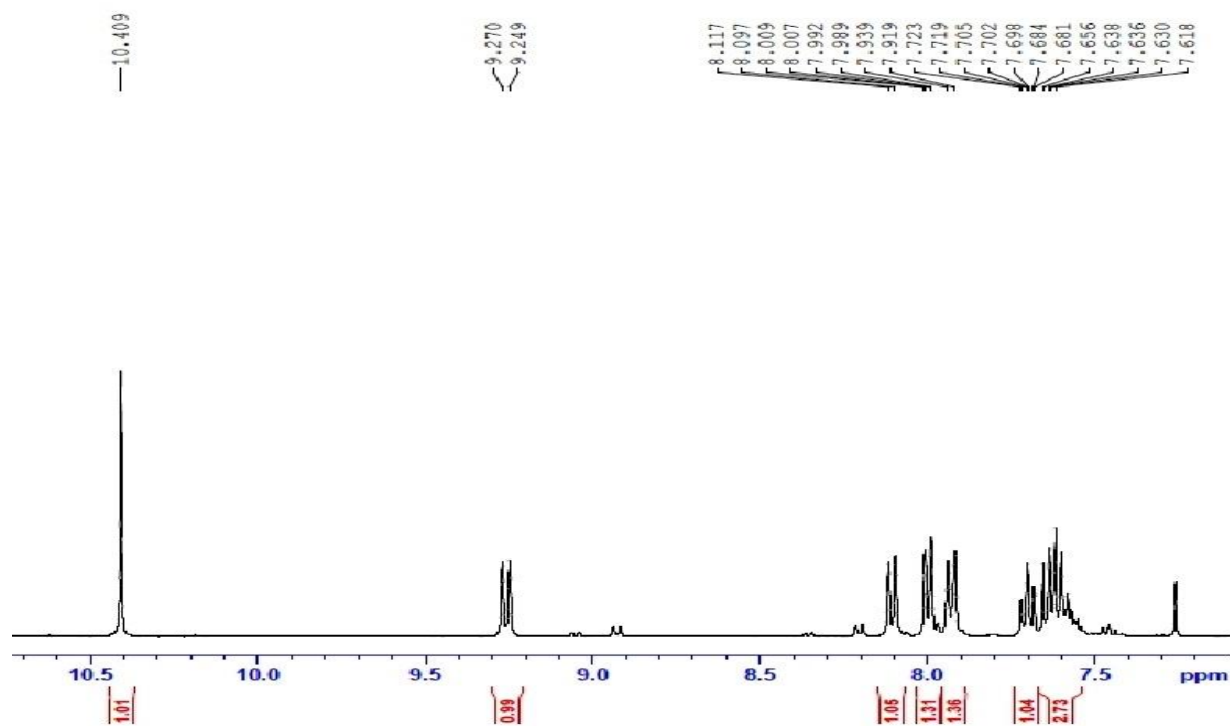


Figure S22: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3p**

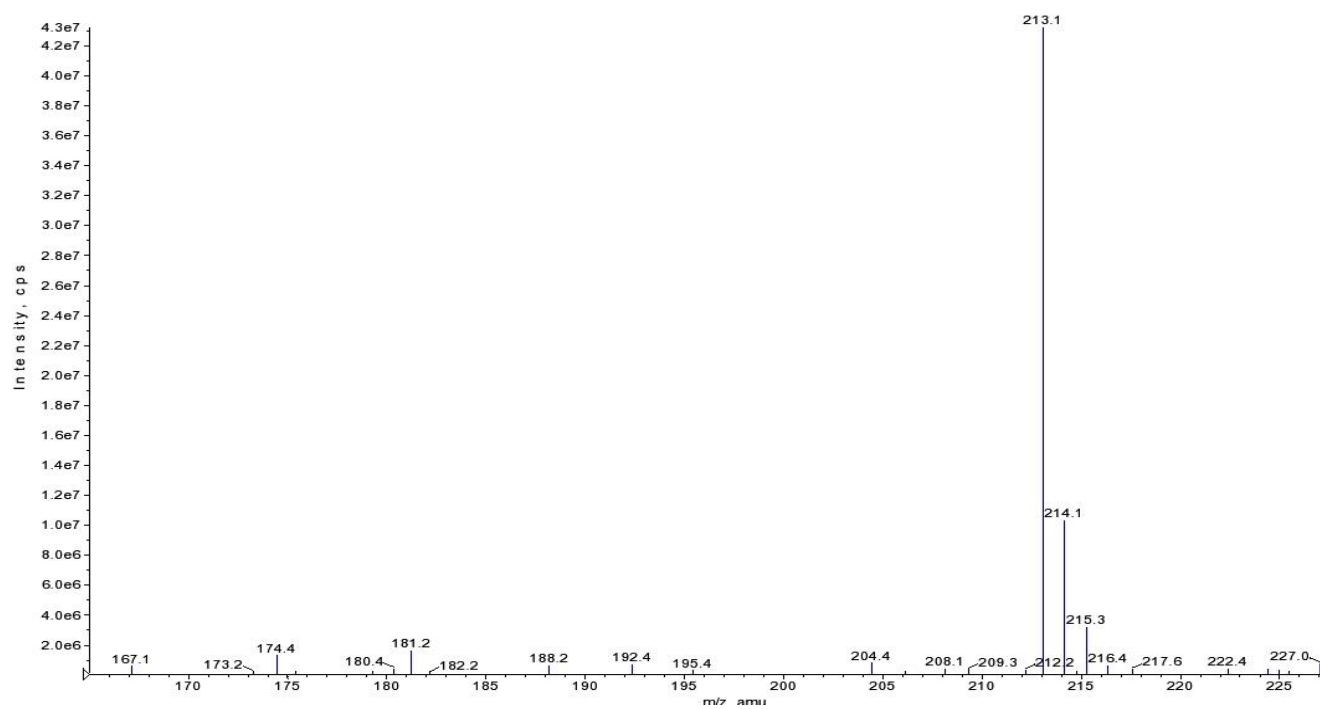


Figure S23: Mass spectrum of compound **3q**

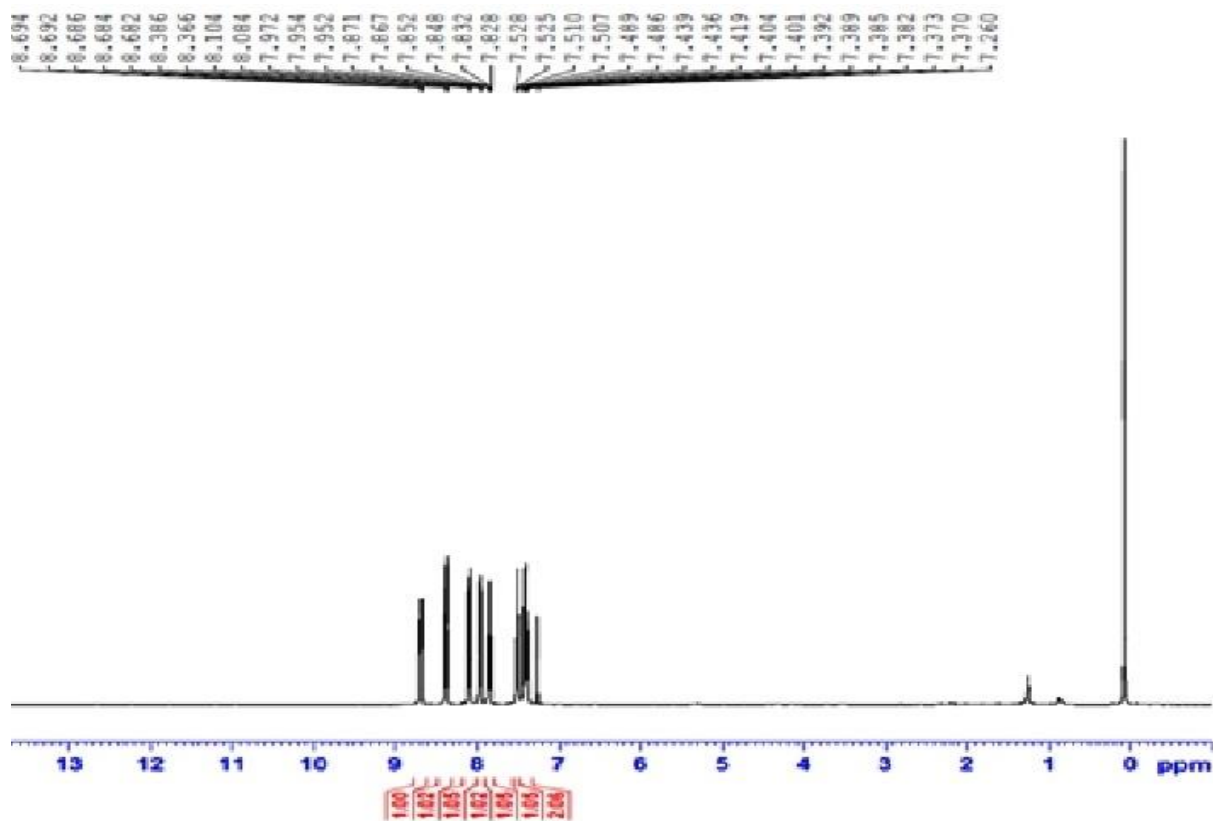


Figure S24: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3q**

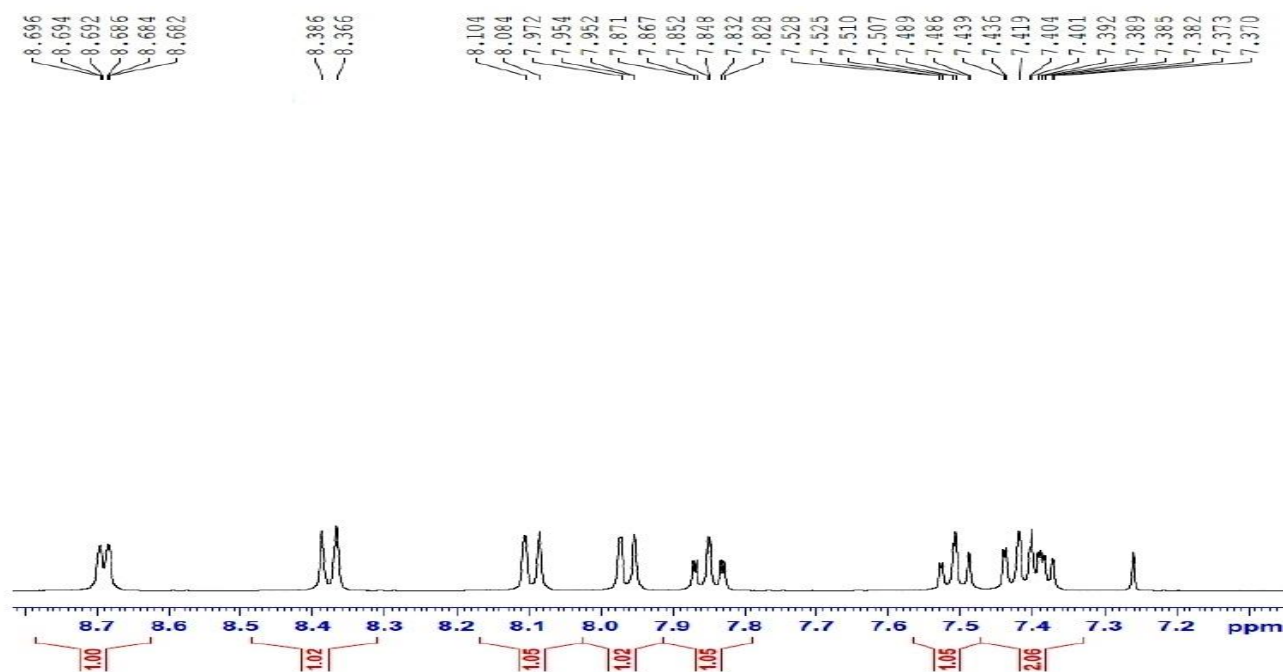


Figure S25: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3q**

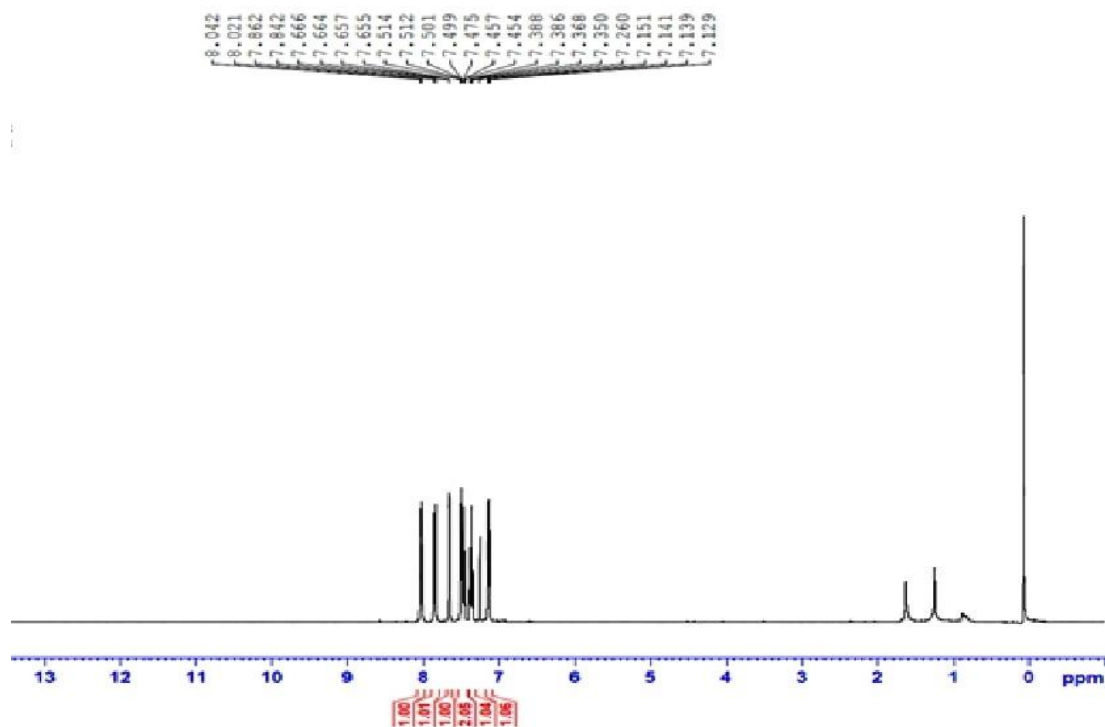


Figure S26: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3r**

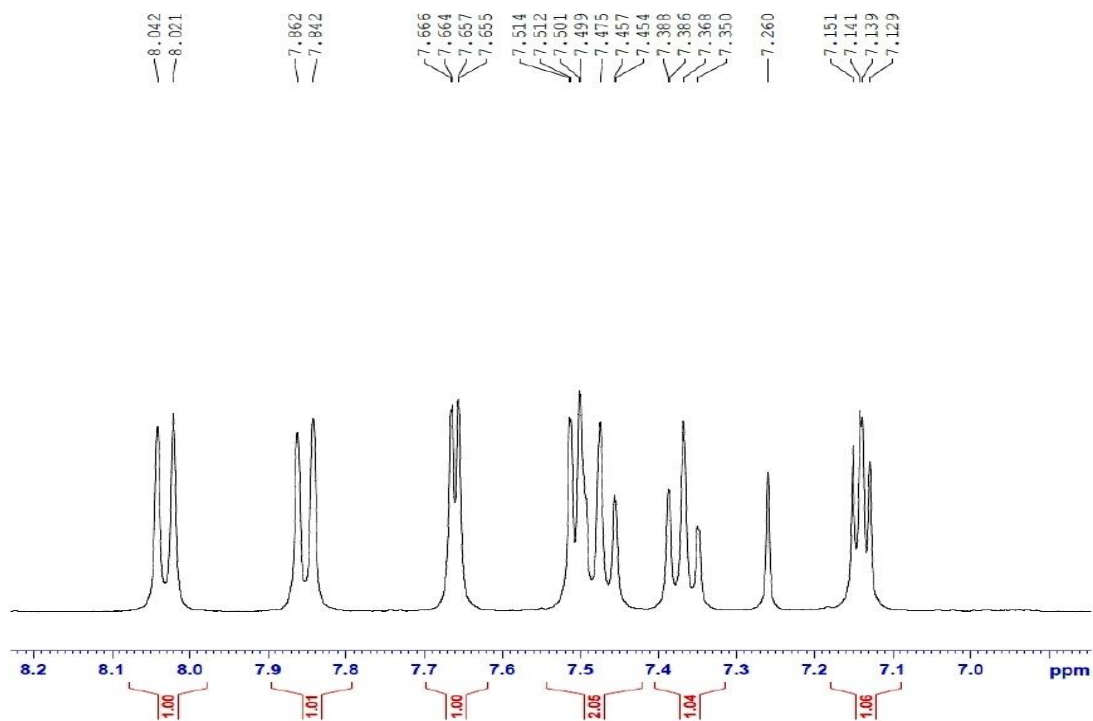


Figure S27: ¹H NMR (400 MHz, CDCl₃) spectrum of compound **3r**

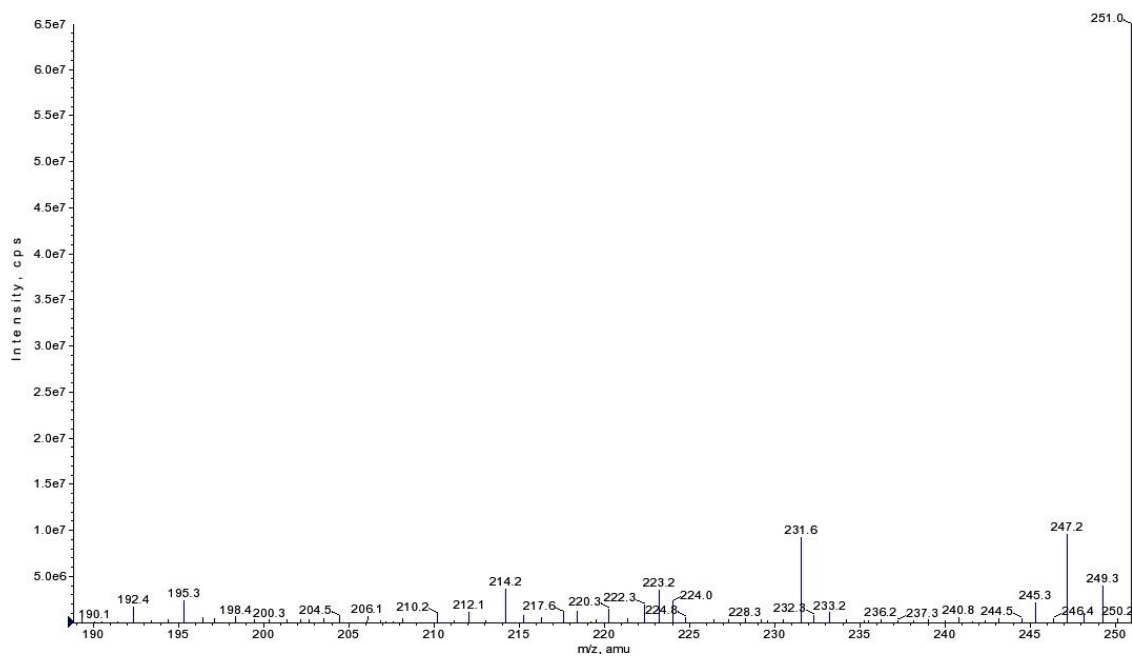


Figure S28: Mass spectrum of compound **3s**

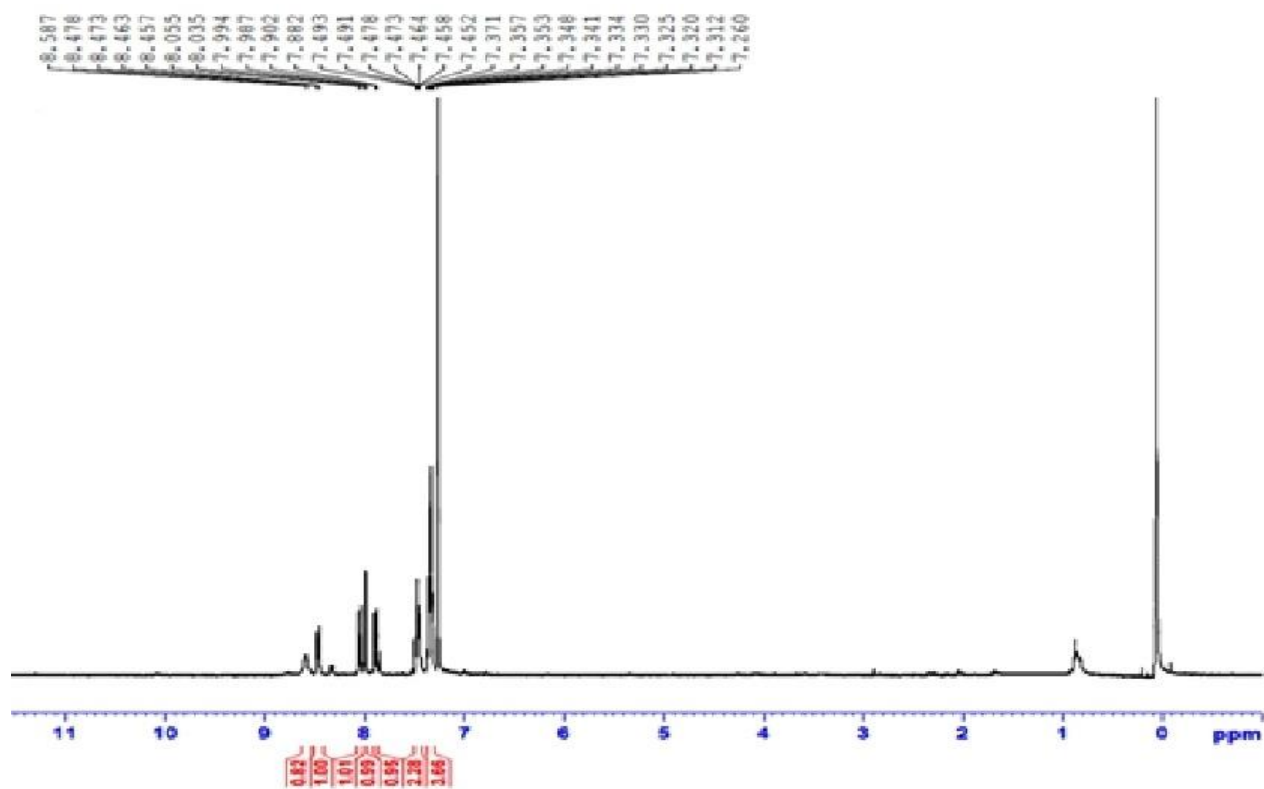


Figure S29: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3s**

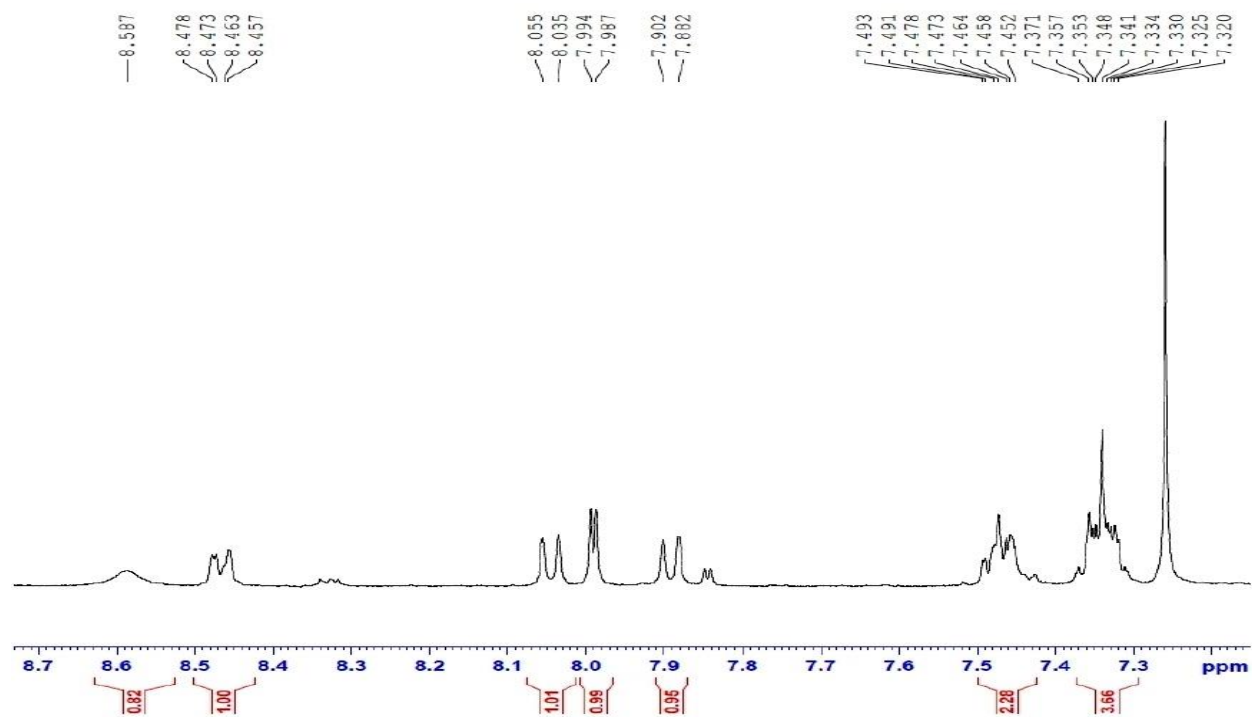


Figure S30: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3s**

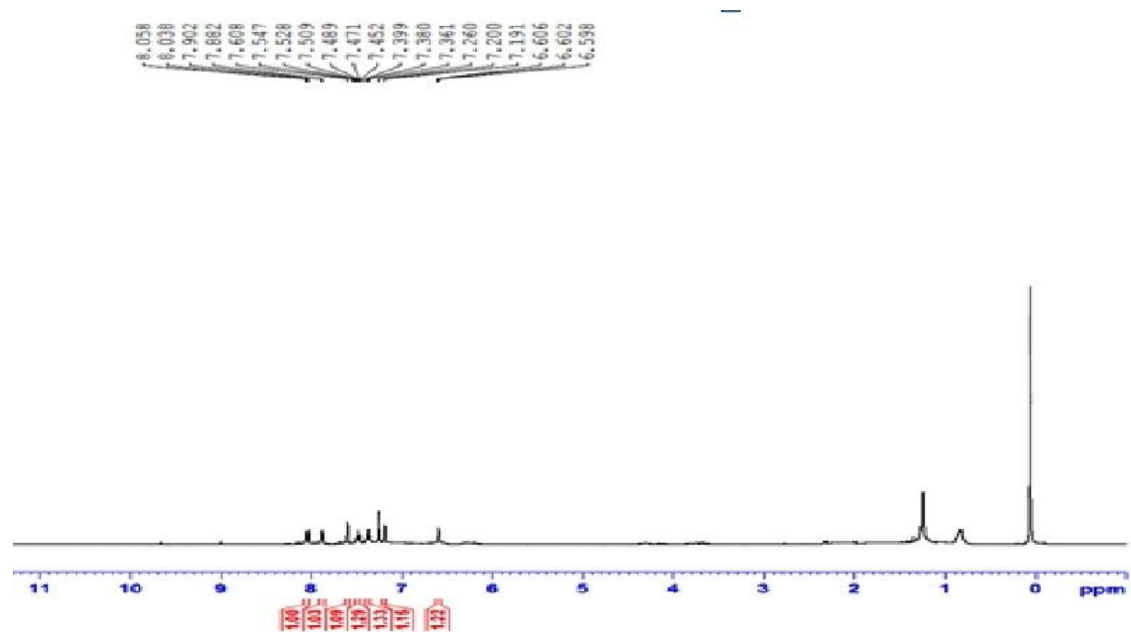


Figure S31: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3t**

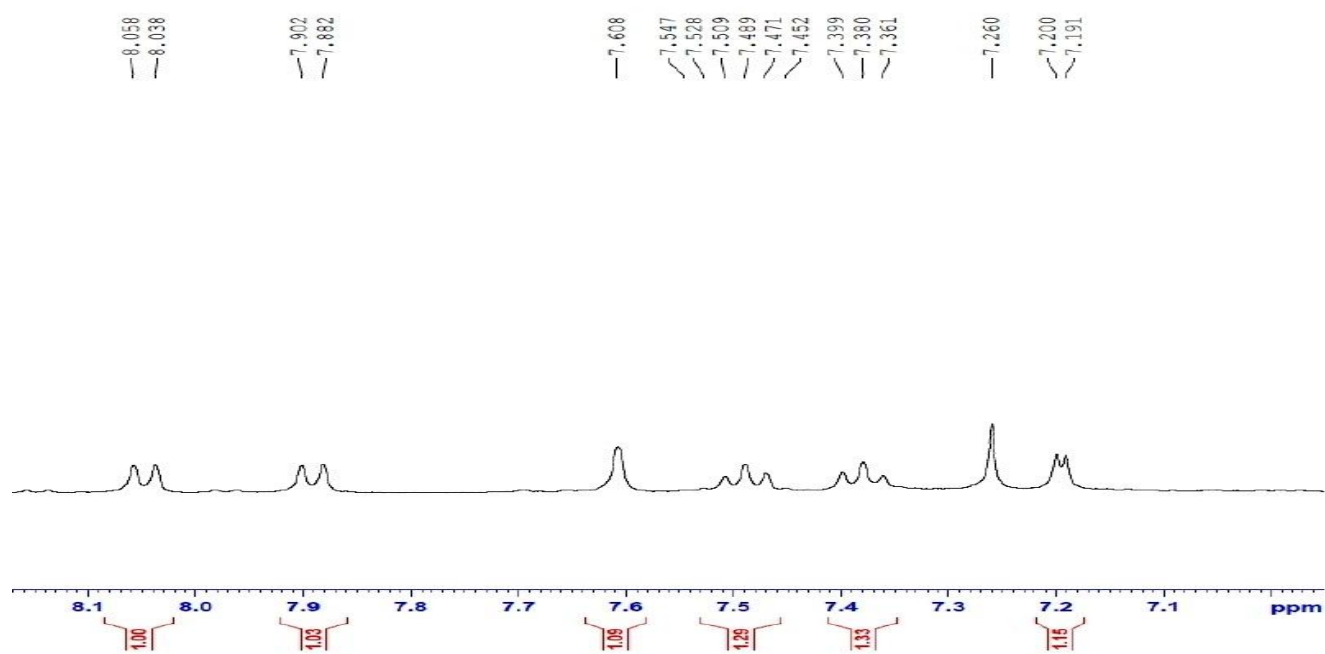


Figure S32: ^1H NMR (400 MHz, CDCl_3) spectrum of compound **3t**