Electronic Supplementary Material (ESI) for RSC Advances

Azaindole-1,2,3-triazole in a tripod for selective sensing of chloride, dihydrogenphosphate and ATP under different conditions

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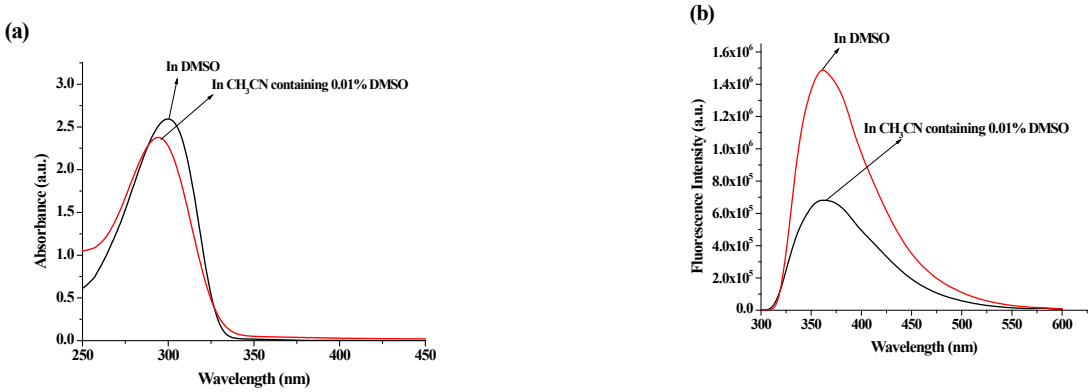
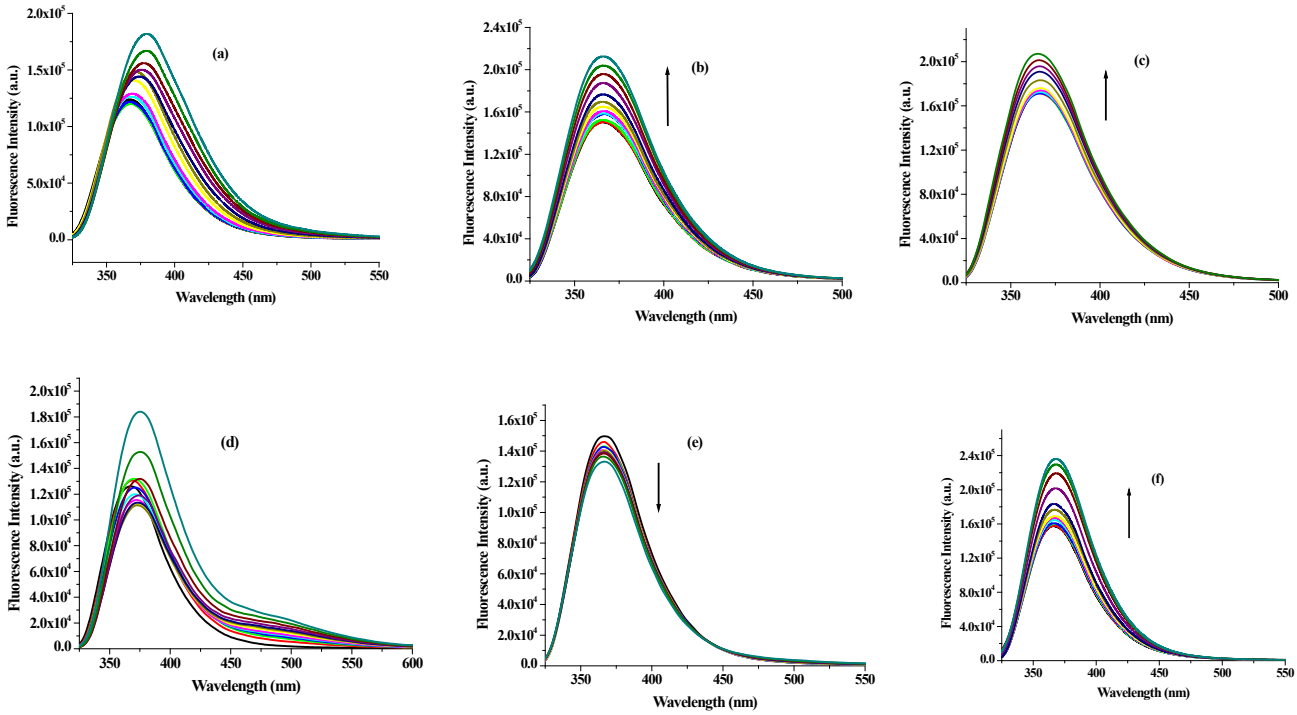


Figure 1S. Absorbance spectra (a) and emission spectra (b) of **2** (c = 5.73 x 10^{-5} M) in different solvents.



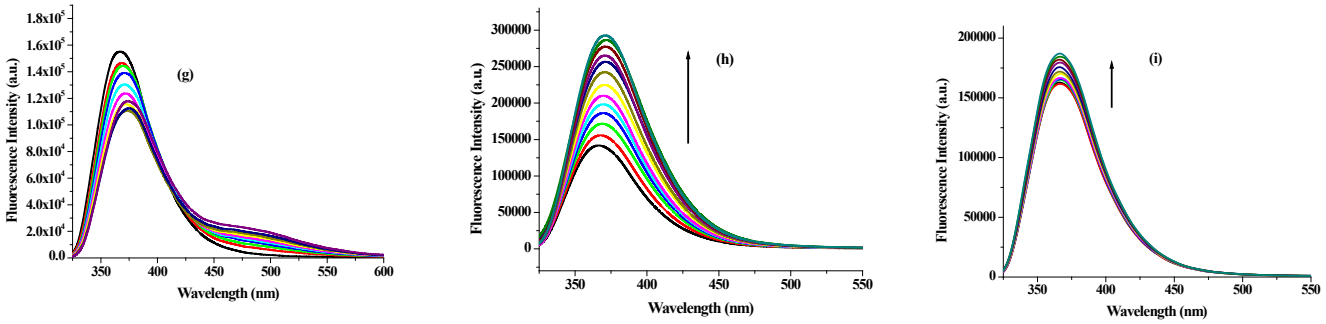
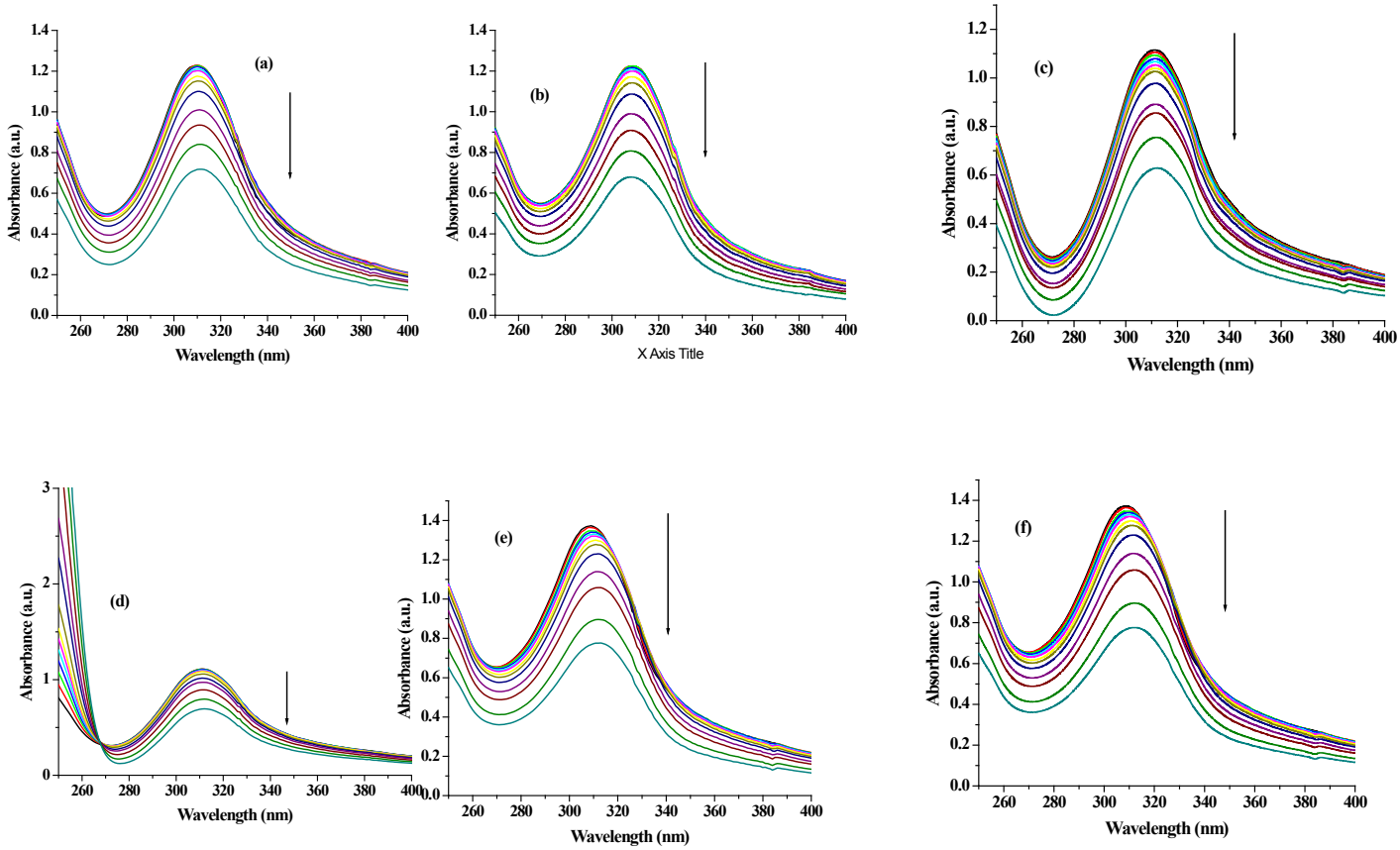


Figure 2S. Change in emission of **1** (c = 5.02 x 10^{-5} M) upon addition of a) F^- (b) Br^- (c) I^- (d) $P_2O_7^{4-}$ (e) HSO_4^- (f) ClO_4^- (g) $HP_2O_7^{3-}$ (h) AcO^- (i) NO_3^- in CH_3CN containing 0.01% DMSO [changes in Figs. a, d and g are irregular].



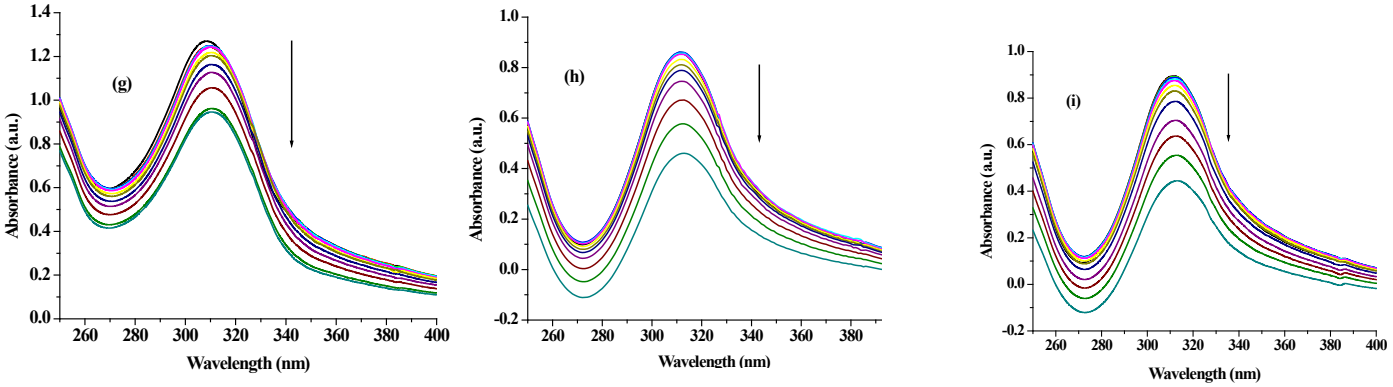


Figure 3S. Change in absorbance of **1** (c = 2.51 x 10^{-5} M) upon addition of a) F^- (b) Br^- (c) I^- (d) $P_2O_7^{4-}$ (e) HSO_4^- (f) ClO_4^- (g) $HP_2O_7^{3-}$ (h) AcO^- (i) NO_3^- in CH_3CN containing 0.01% DMSO.

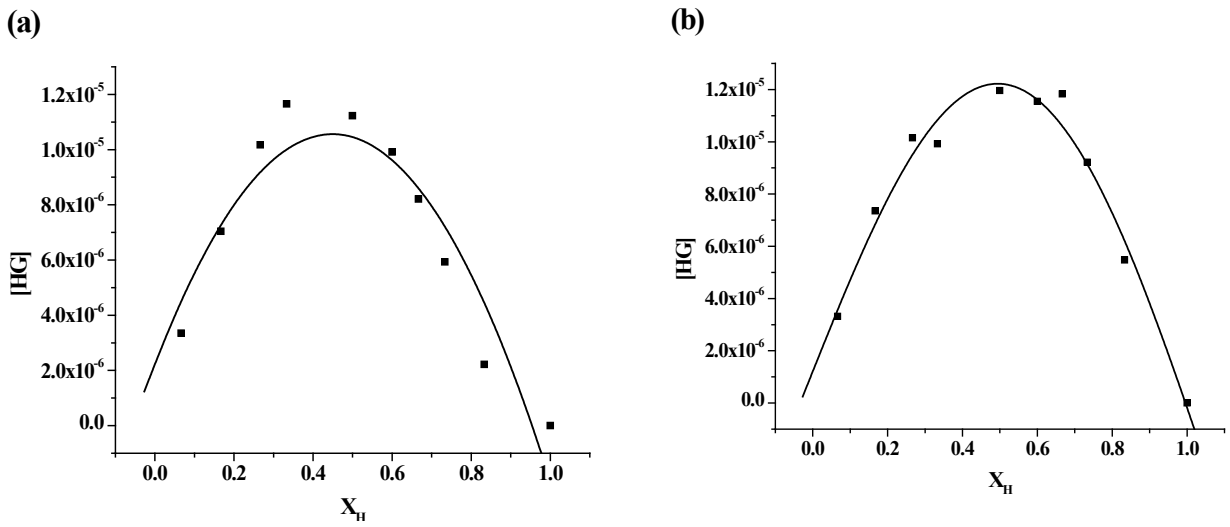


Figure 4S. UV-vis Job plots for **1** with (a) $H_2PO_4^-$ and (b) Cl^- ions in CH_3CN containing 0.01% DMSO ([H] = [G] = 5.42 x 10^{-5} M).

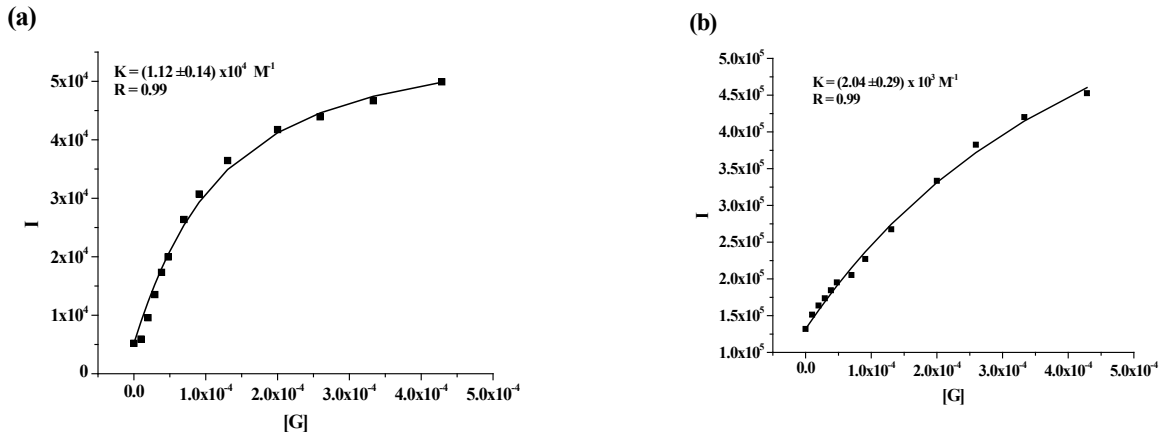


Figure 5S. Non linear plots for binding constants of **1** with (a) $H_2PO_4^-$ and (b) Cl^- in CH_3CN containing 0.01% DMSO.

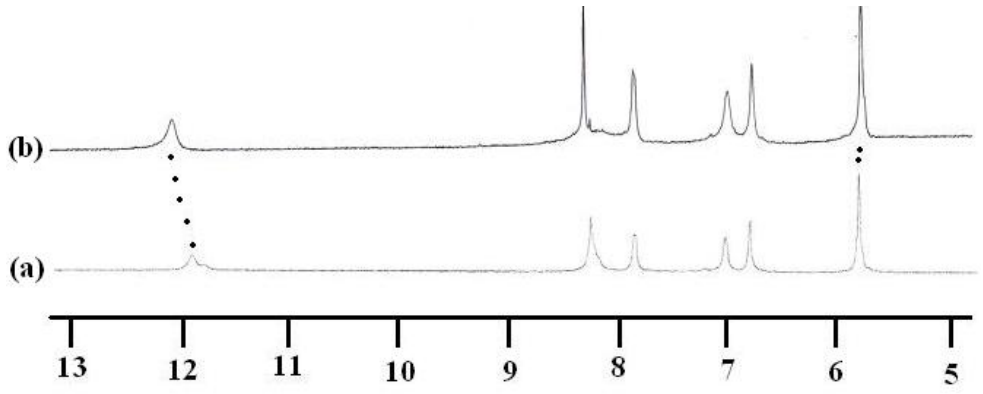


Figure 6S. Partial ^1H NMR (400 MHz) of **1** (c = 4.63 x 10^{-3} M) in (a) CD_3CN containing 2% d_6-DMSO and (b) in d_6-DMSO.

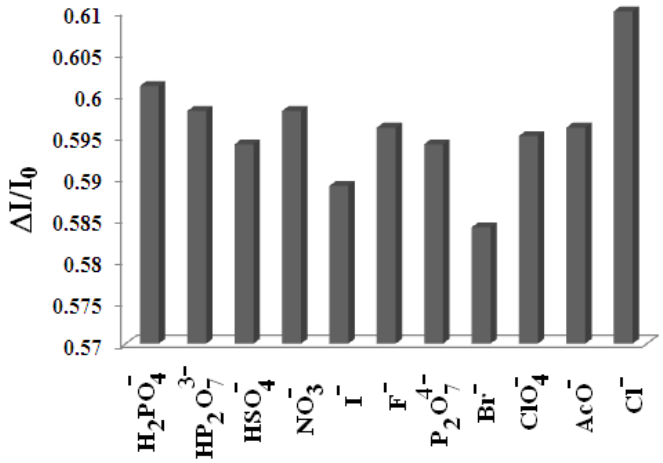
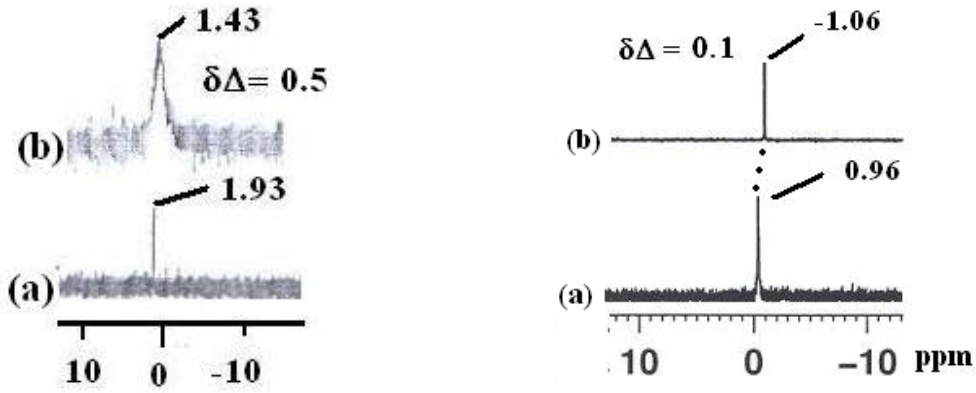


Figure 7S. Change in fluorescence ratio of **1** (c = 5.07 x 10^{-5} M) at 370 nm upon addition of 15 equiv. amounts of different guests in DMSO.



(A) (B)

Figure 8S. Partial ^{31}P NMR (400 MHz) of **1** (c = 4.68 x 10^{-3} M) in (A) a. absence, b. presence of 1 equiv. amount of $TBAH_2PO_4$ in CD_3CN containing 4% d_6-DMSO; (B) a. absence, b. presence of 1 equiv. amount of $TBAH_2PO_4$ in d_6-DMSO.

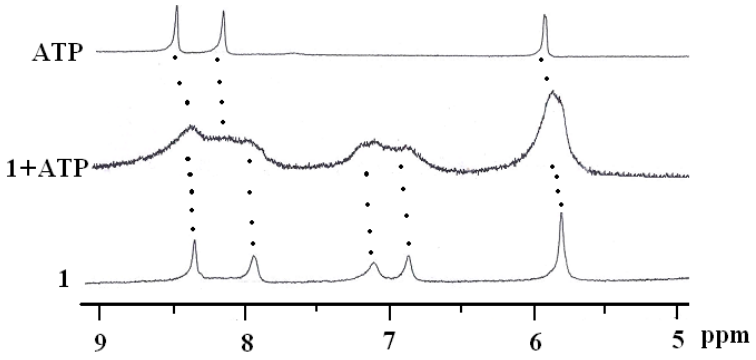


Figure 9S. Partial ^{1}H NMR (400 MHz) of **1** (c = 5.96 x 10^{-3} M) in presence and absence of 1 equiv. amount of ATP in d_6-DMSO: D_2O (1:1, v/v).

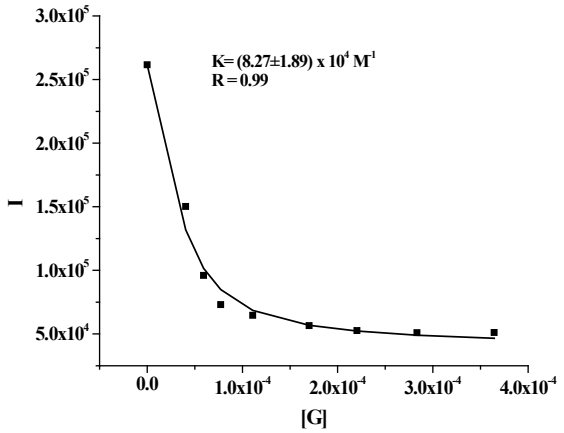


Figure 10S. Non linear binding constant plot for **1** with ATP in CH_3CN: H_2O (1:1, v/v) at pH = 7.3 containing10mM HEPPES buffer.

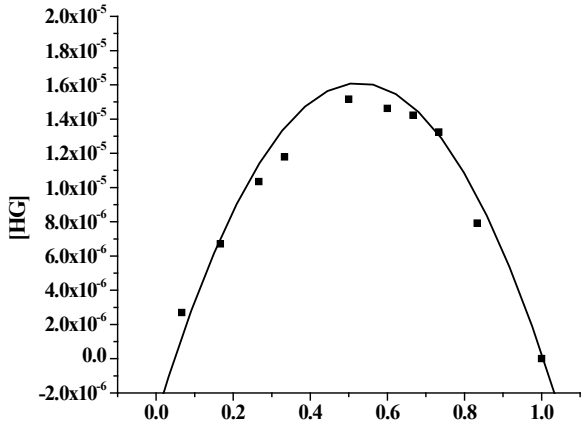


Figure 11S. UV-VIS Job plot for **1** with ATP in CH_3CN: H_2O (1:1, v/v) at pH = 7.3 containing10mM HEPPES buffer ([H] = [G] = 4.25 x 10^{-5} M).

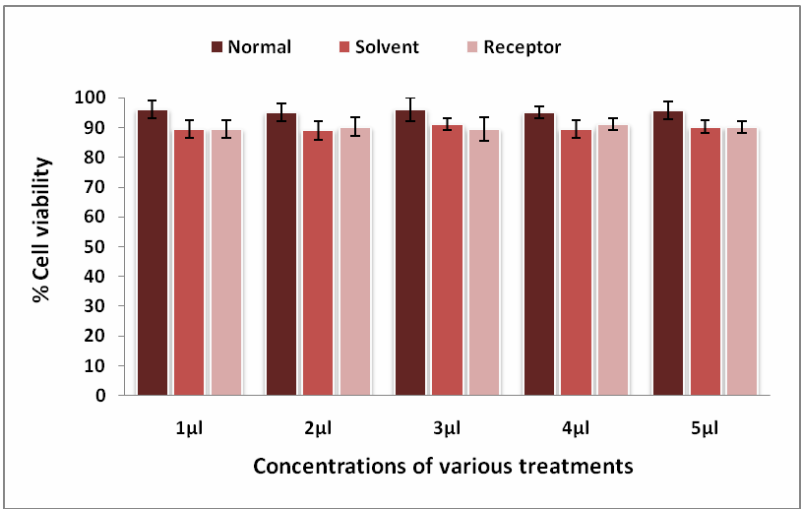
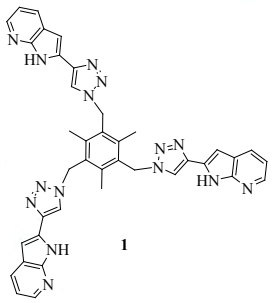


Figure 12S. MTT assay for receptor **1**.

^{1}H NMR (400 MHz, d_6-DMSO)



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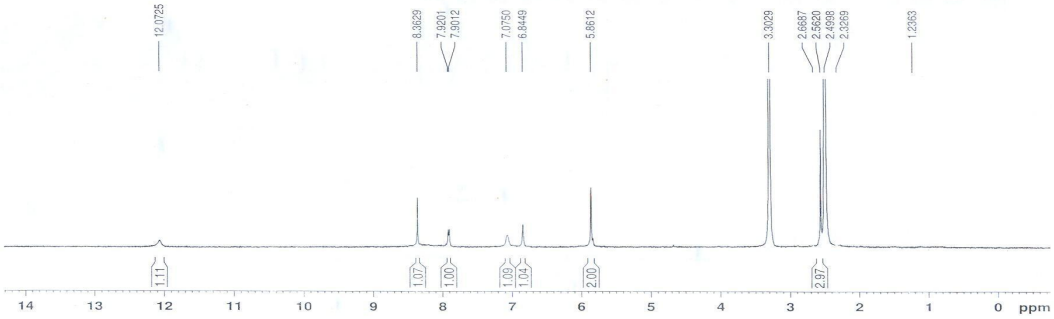
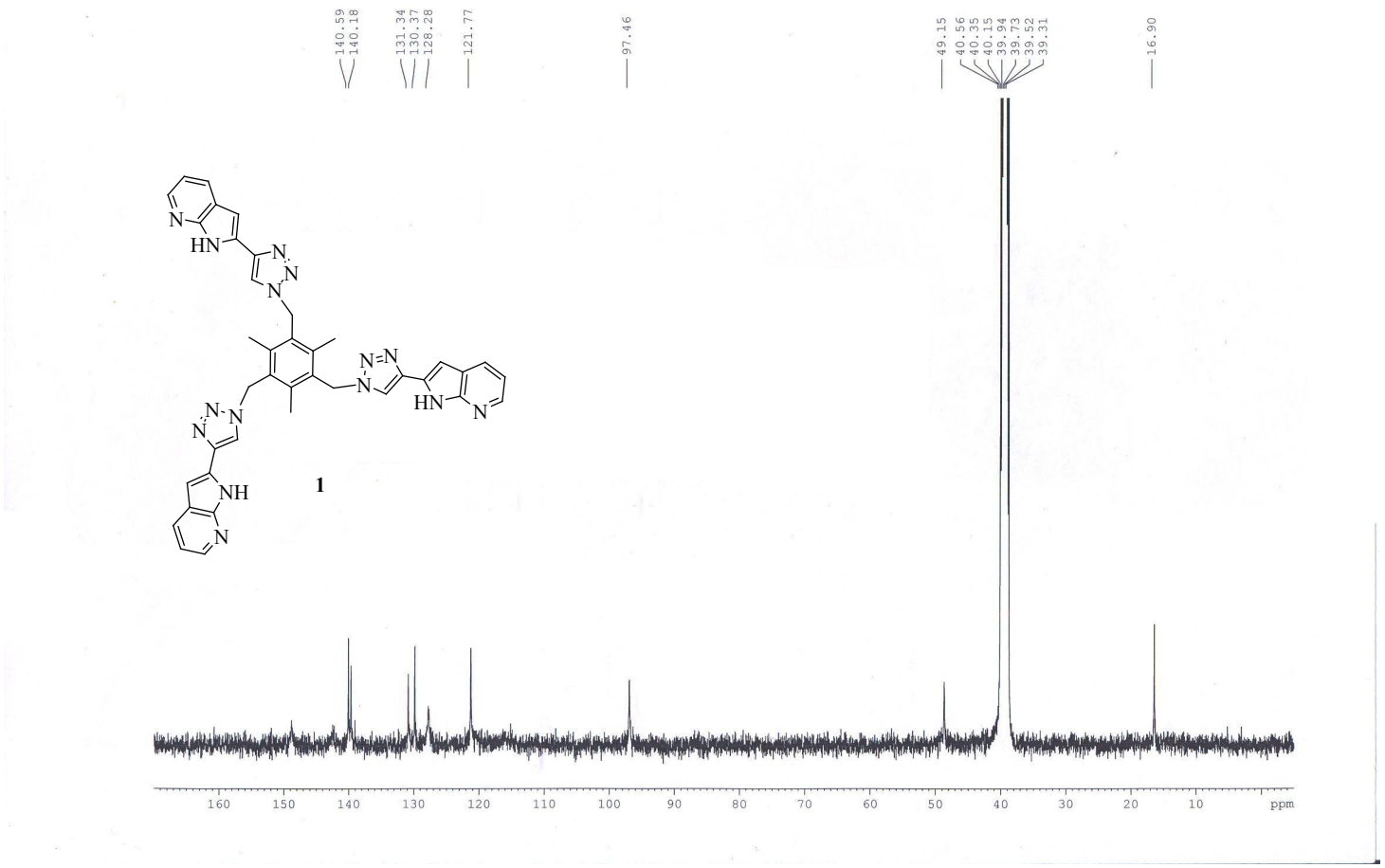


^{13}C NMR (100 MHz, d_6-DMSO)



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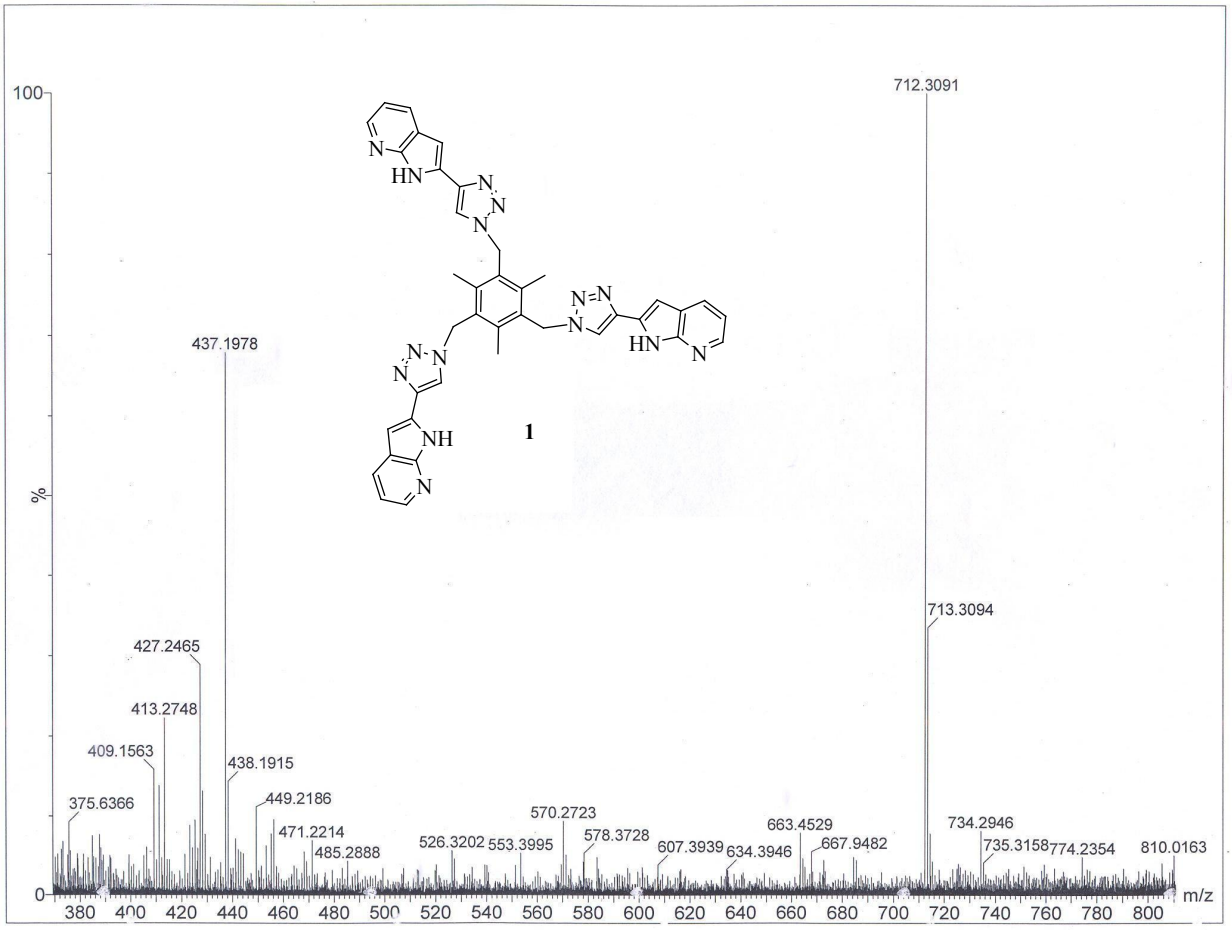
Mass



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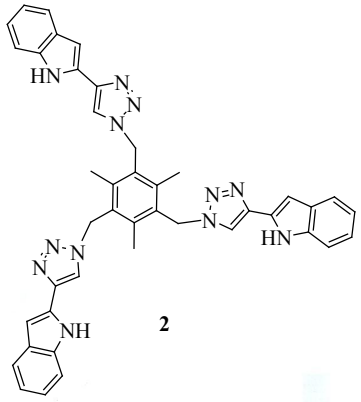
^{1}H NMR (400 MHz, d_6-DMSO)



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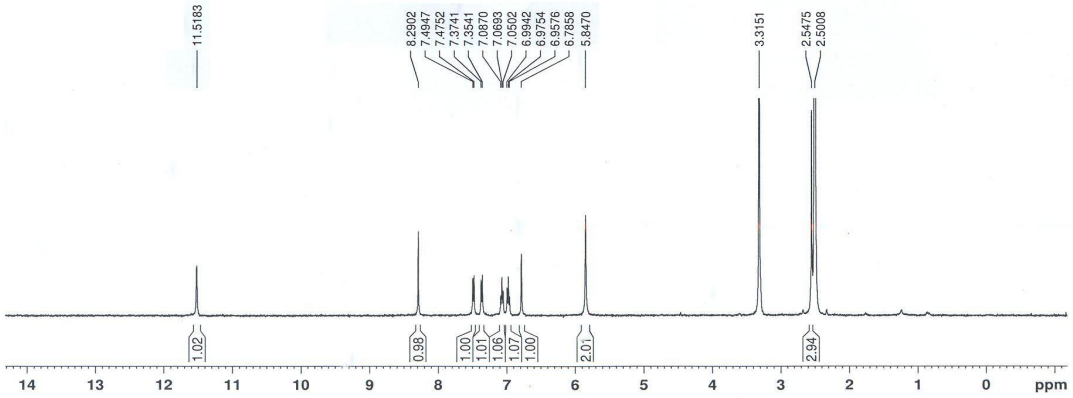
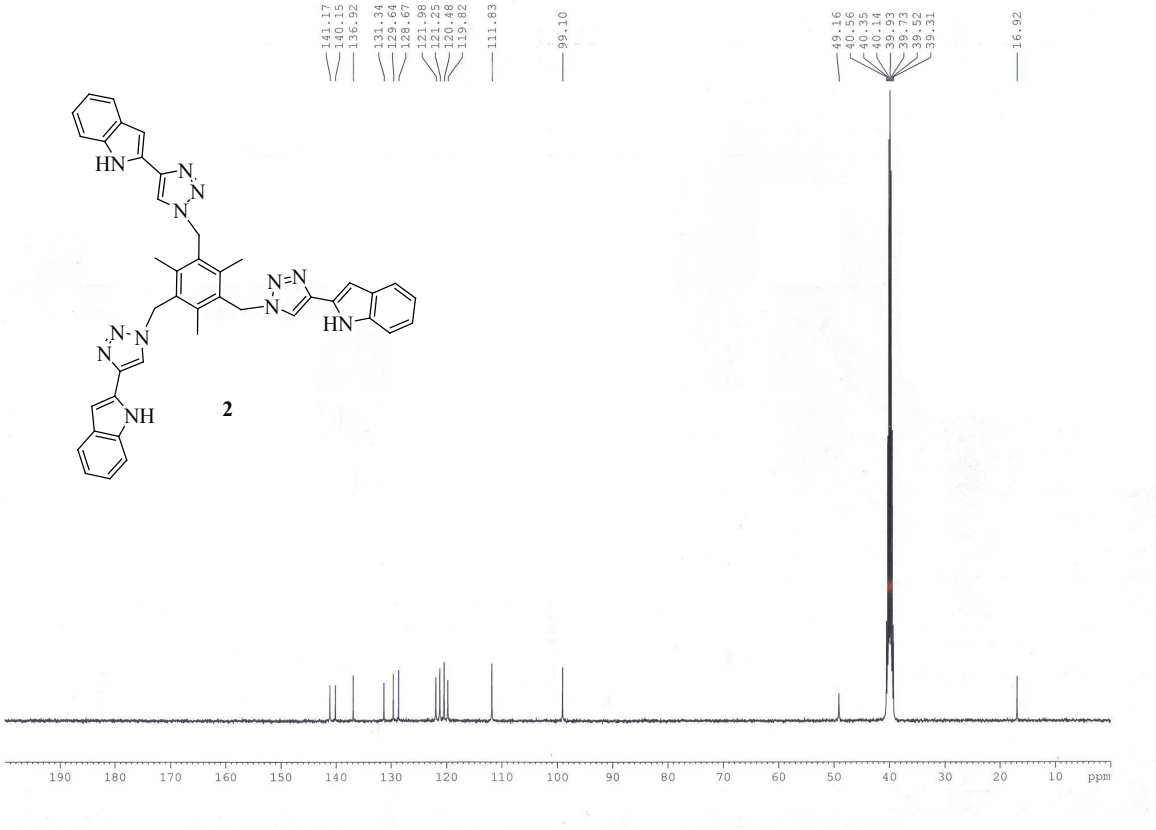


^{13}C NMR (100 MHz, d_6-DMSO)



Mass