10.1071/CH20029_AC

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Australian Journal of Chemistry 2021, 74(4), 221-229

Supplementary Material

Selective Identification of Phenylalanine Using Cucurbit[7,8]uril-Based Fluorescent Probes

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Figure S2 Nonlinear fitting curves obtained for the changes in the fluorescence intensity observed at pH = 4.5 for TB (20 μ M) in the presence of different concentrations of Q[7]. (b) The fluorescence intensity observed at pH=4.5 for TB (20 μ M) in the presence of different concentrations of Q[8]...Error! Bookmark not defined.

Figure S3, The effect of amino acids (50 equiv. wrt host guest complex) on the relative fluorescence response of (a) TB@Q[7] (1:1, 20 μ M) (λ em = 667 nm) at pH = 2, (b) TB@Q[8] (2:1, 20 μ M) (λ em = 643 nm) at pH = 2, (c) TB@Q[7] (1:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ em = 649 nm) at pH = 12 and (d) TB@Q[8] (2:1, 20 μ M) (λ

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Figure S1. Fluorescence spectra of TB (20 μM) upon increasing the amount of Q[7] from 0 to 40 μM at pH 3(a), pH 4(b), pH 5(c), pH 6(d) and pH 7(e); Fluorescence spectra of TB (20 μM) upon increasing the amount of Q[8] from 0 to 20 μM at pH 3(f), pH 4(g), pH 5(h), pH 6(i) and pH 7(j), respectively.



Figure S2. Non-.linear fitting curves for changes in the fluorescence intensity at pH=4.5 of TB (20 μ M) in the presence of different concentrations of Q[7];(b) fluorescence intensity at pH=4.5 of TB (20 μ M) in the presence of different concentrations of Q[8].



Figure S3. The effect of amino acids (50 equiv. of host-guest complex) on the relative fluorescence response of (a) TB@Q[7] (1:1, 20 μ M) (λ em =667 nm) at pH=2; (b) TB@Q[8] (2:1, 10 μ M) (λ em =643 nm) at pH=2;(c) TB@Q[7] (1:1, 20 μ M) (λ em =663 nm) at pH=12;(d) TB@Q[8] (2:1, 10 μ M) (λ em =643 nm) at pH=12.



Figure S4. Non-linear fitting curves for changes in the fluorescence intensity at pH=4.5 of TB@ Q[7] (20 μ M) in the presence of different concentrations of Phe,(b) fluorescence intensity at pH=4.5 of TB@ Q[8] (10 μ M) in the presence of different concentrations of Phe.