

ELECTRONIC SUPPLEMENTARY INFORMATION

Supramolecular organic frameworks (SOFs) of tetrakis(4-hydroxyphenyl) porphyrin with efficient guest inclusion

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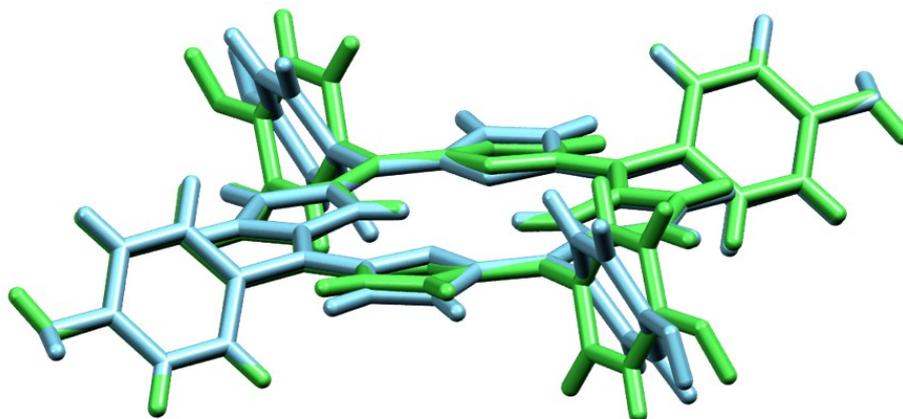


Fig. S1. The superposition of the two porphyrin molecules in **1**, the porphyrin depicted in green shown is the more ruffled one; the blue-coloured porphyrin is nearly planar.

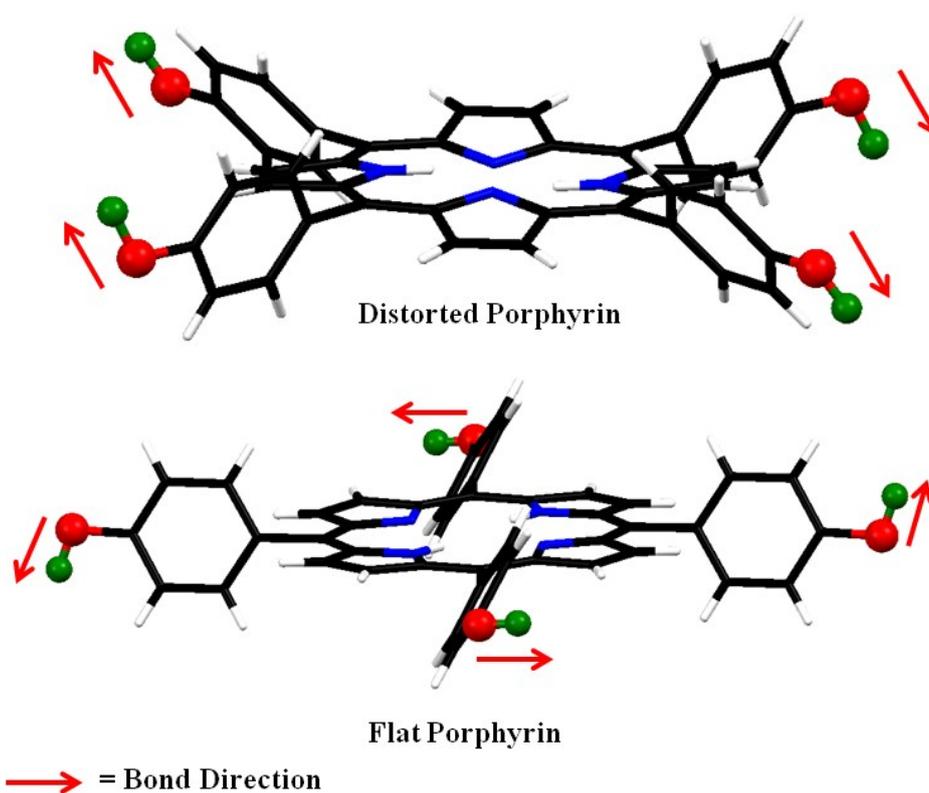


Fig. S2. A schematic representation of both distorted and flat porphyrins in **1**. The distorted porphyrin is showing a chair like conformation of the up and down directed $-OH$ functions. The relative orientation of the hydroxyl functions are highlighted by red arrows, while the oxygen and hydrogen atoms are depicted as red and green spheres, respectively.

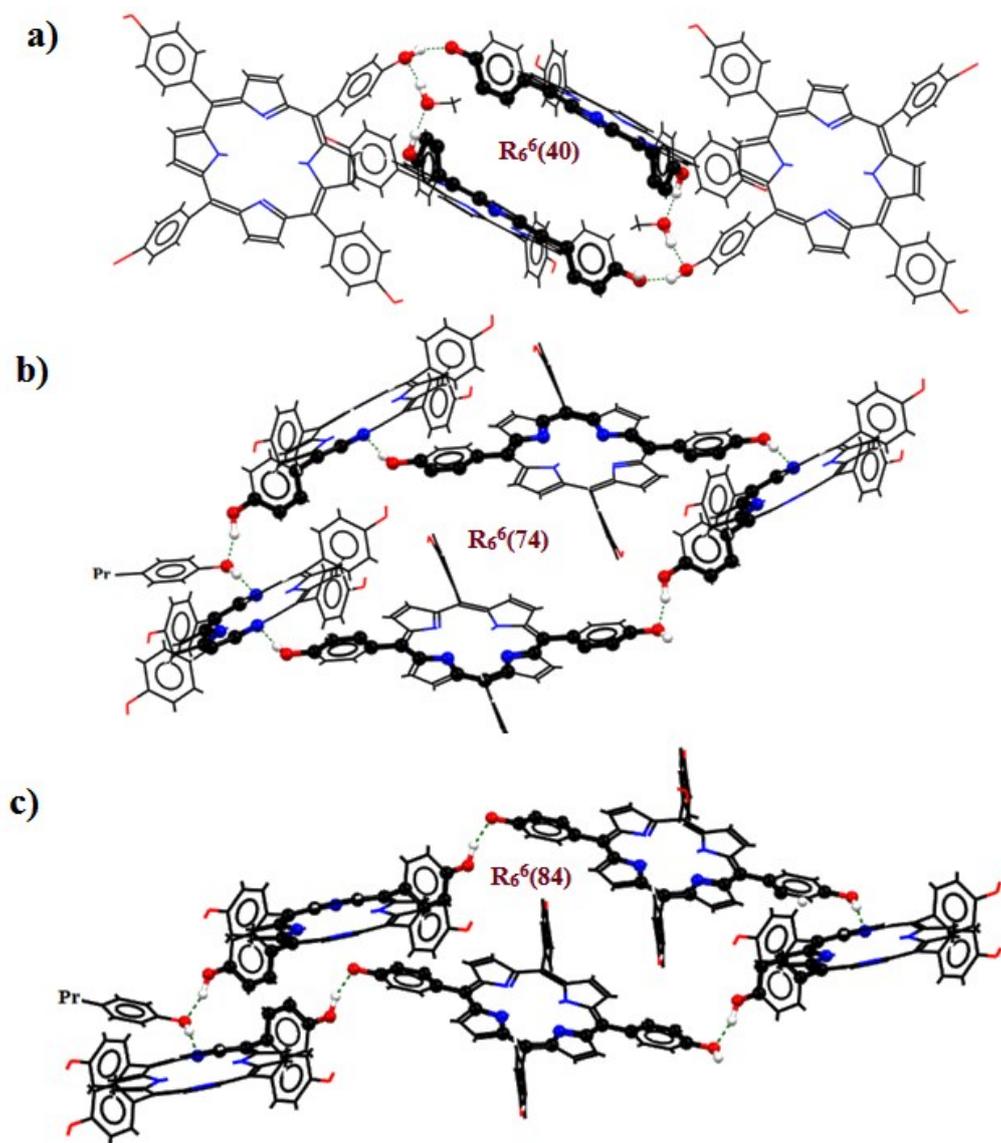


Fig. S3. The graph sets of the main hydrogen bonding rings observed in **1**, when (a) is part of the 1D hydrogen bonded chain, (b) is a part of the 2D network and (c) is the hydrogen bonded ring formed extracted from the 3D hydrogen bonded network.

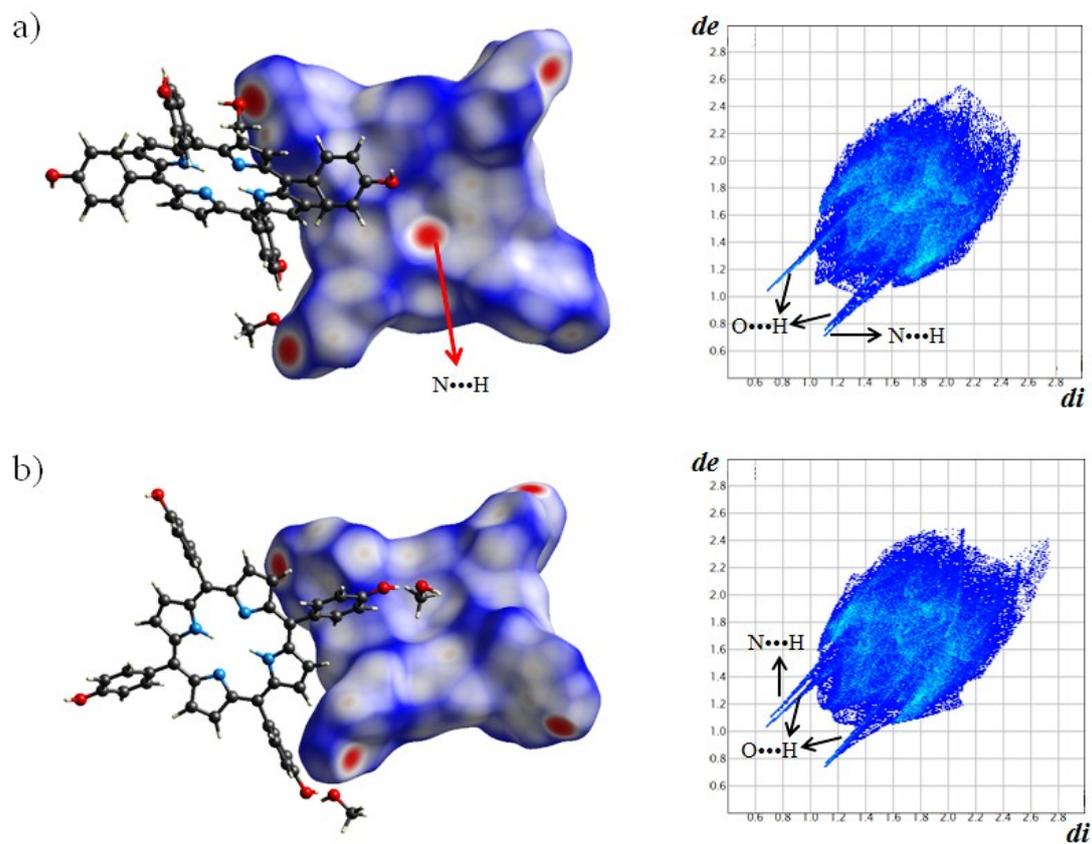


Fig. S4. Hirshfeld isosurfaces and 2D fingerprint plots of the distorted (a) and flat (b) porphyrins in crystal structure of **1**. The tips of the spikes on the rightmost graphs in this Figure are associated with coordinates di and de , where $di+de$ represents the shortest distance between atoms inside the molecular surface and outside the surface, correspondingly.

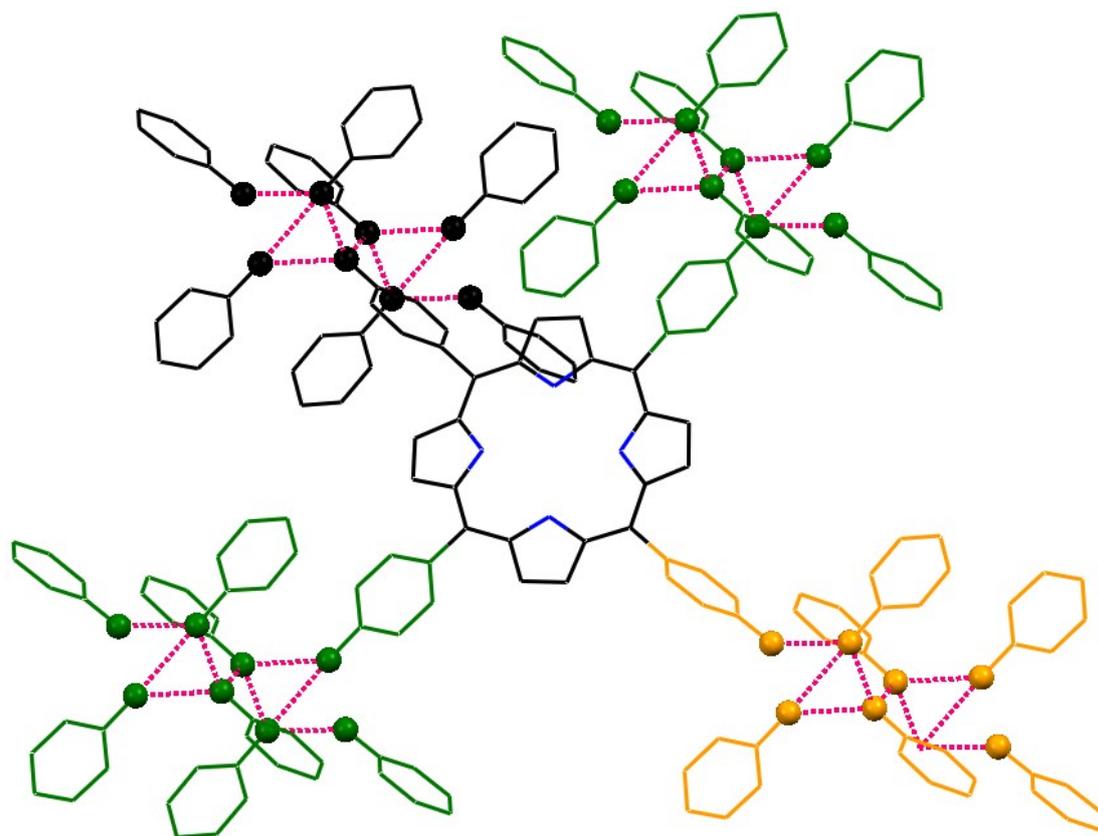


Fig. S5. The inter-porphyrin hydrogen bonding pattern in **2**. The hydrogen bonded chain is divided into three main parts involving different porphyrin arms, when the green groups are the triangular intermolecular part of the synthon, orange the terminal side of the chain, and the black arm presents the bridging part between the triangular rings.

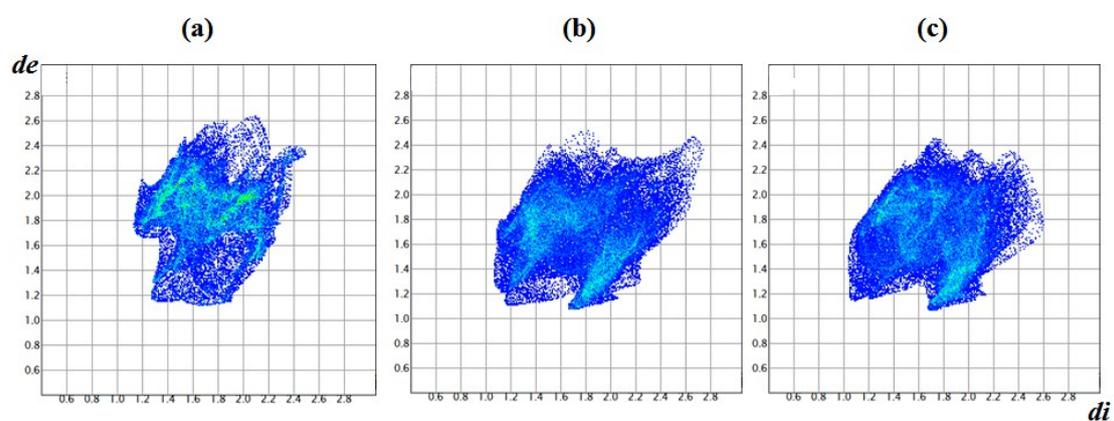


Fig. S6. Fingerprint plots of sandwich stacked pyr (a), perpendicular arrangement of pyr (b), and the tilted position of pyr (c) with respect to the porphyrin plane in **2**.

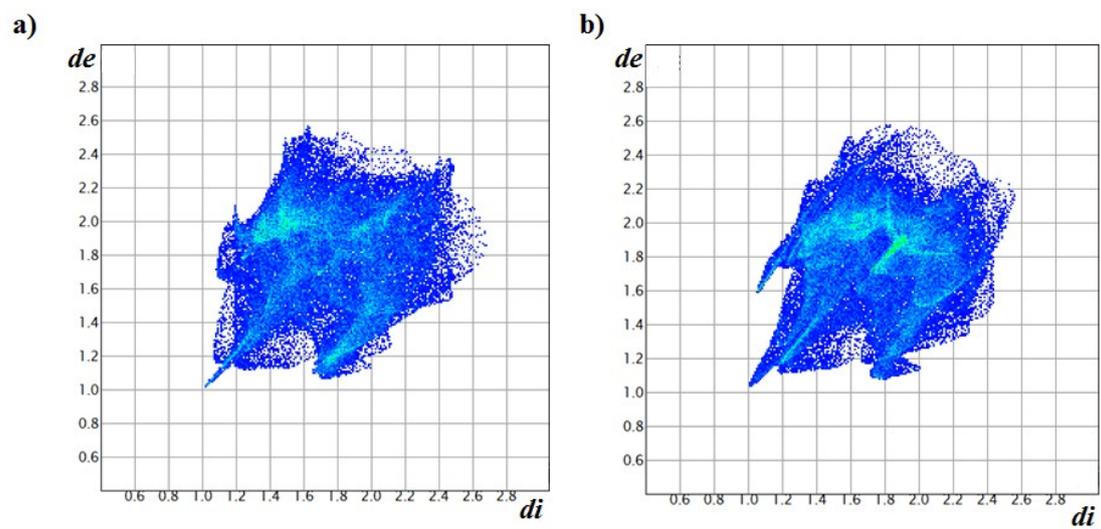


Fig. S7. The fingerprint plots of (a) pyr and (b) prl in crystal structures, **3** and **4**, respectively.