

New Semiconducting Coordination Polymers from Zinc Sulfide Clusters and Chains

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Figure captions:

Figure S1. IR spectrum of **1**.

Figure S2. IR spectrum of **2**.

Figure S3. TGA curve of **1** in N₂ with a heating rate of 10 °C.

Figure S4. TGA curve of **2** in N₂ with a heating rate of 10 °C.

Figure S5. Experimental and simulated XRD patterns of **1**.

Figure S6. Experimental and simulated XRD patterns of **2**.

Figure S7. (a) A view of the left-handed helical chain in crystal **1b**. In comparison, crystal **1a** with opposite handedness possesses right-handed helical chain (b). Phenyl groups are omitted for clarity. Color code: Zn, green; S, yellow; N, blue; C, gray.

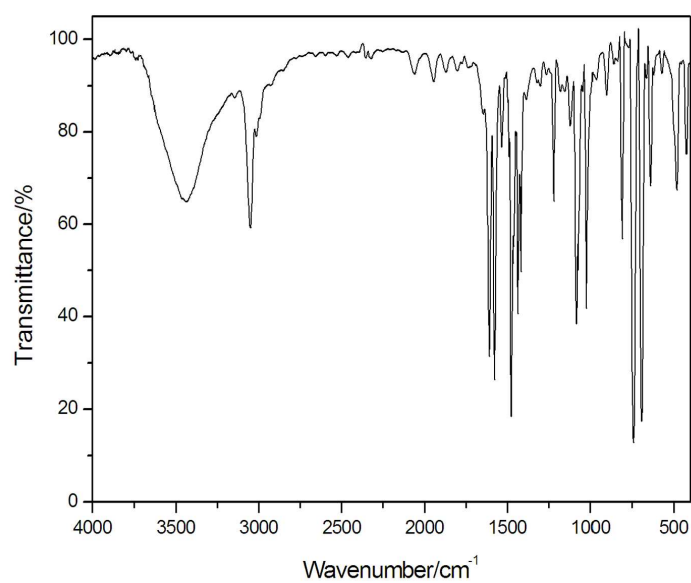


Figure S1

FTIR data (cm⁻¹): 3051 (m, ν (=CH)), 1610 (s, δ (C=C)), 1577 (s, δ (C=C)), 1477 (vs, δ (C=C)), 1436 (s, δ (C=C)), 1219 (m, ν (C-C)), 1084 (s, ν (C-S)), 1024 (s, ν (C-S)), 810 (m, δ (=CH)), 742 (vs, δ (=CH)), 692 (vs δ (=CH))

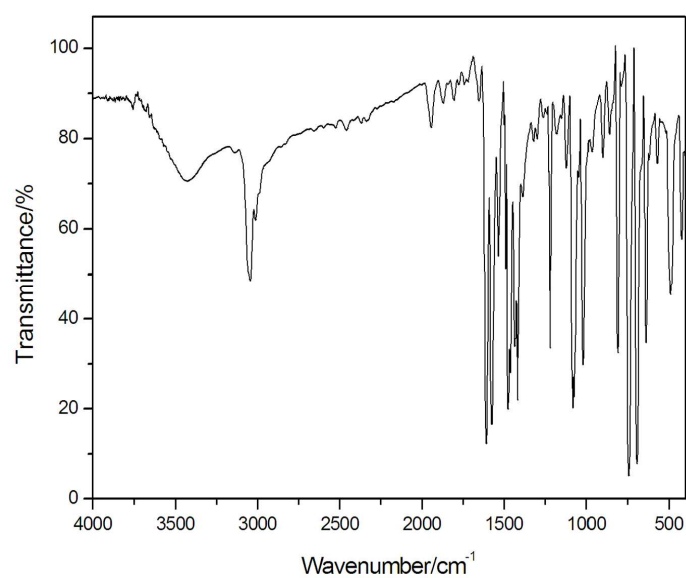


Figure S2

FTIR data (cm^{-1}): 3049 (m, $\nu(\text{=CH})$), 1608 (s, $\delta(\text{C=C})$), 1576 (s, $\delta(\text{C=C})$), 1475 (vs, $\delta(\text{C=C})$), 1417 (s, $\delta(\text{C=C})$), 1219 (m, $\nu(\text{C-C})$), 1080 (s, $\nu(\text{C-S})$), 1018 (s, $\nu(\text{C-S})$), 810 (m, $\delta(\text{=CH})$), 744 (vs, $\delta(\text{=CH})$), 694 (vs, $\delta(\text{=CH})$).

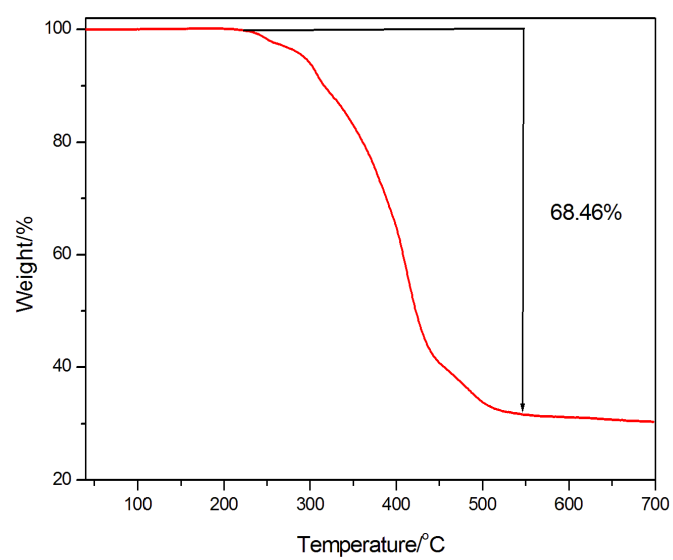


Figure S3

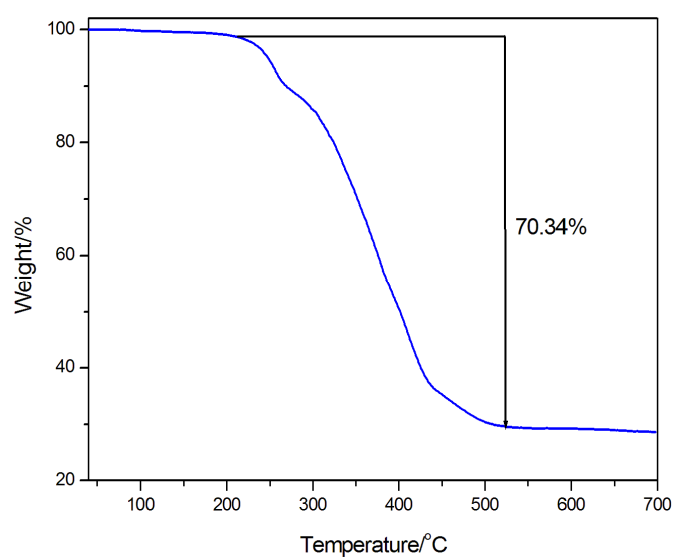


Figure S4

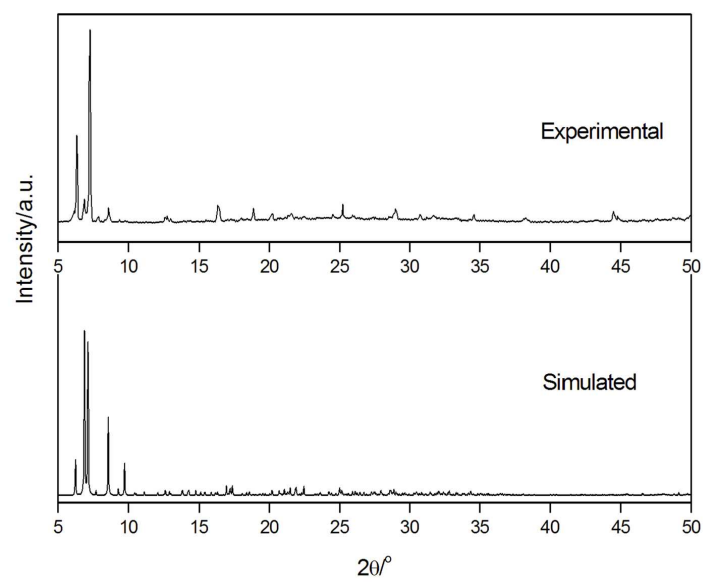


Figure S5

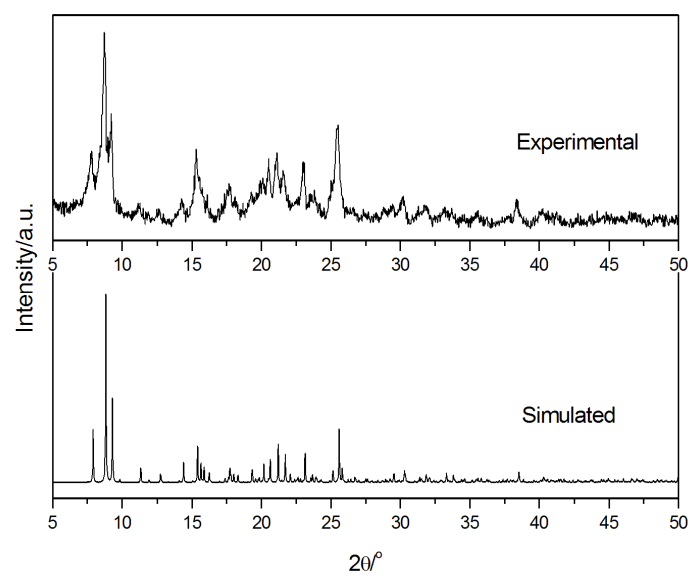


Figure S6

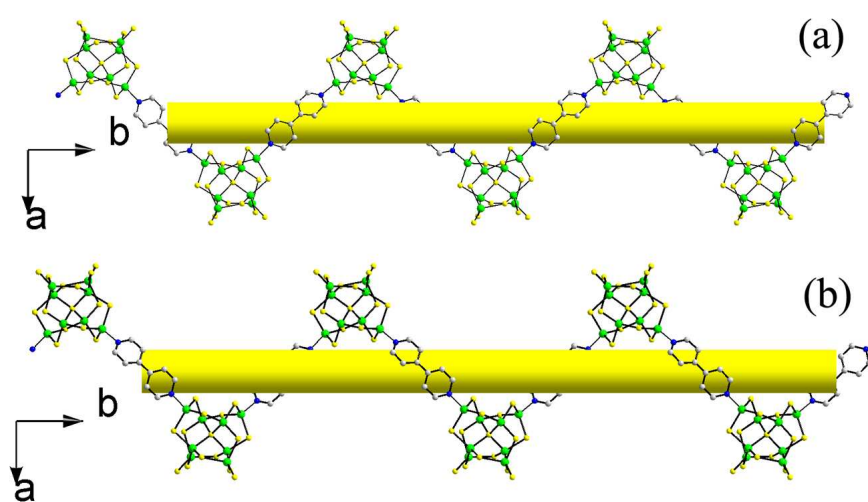


Figure S7