

Layered organic conductors based on BEDT-TTF and Ho, Dy, Tb chlorides

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Supplementary Materials

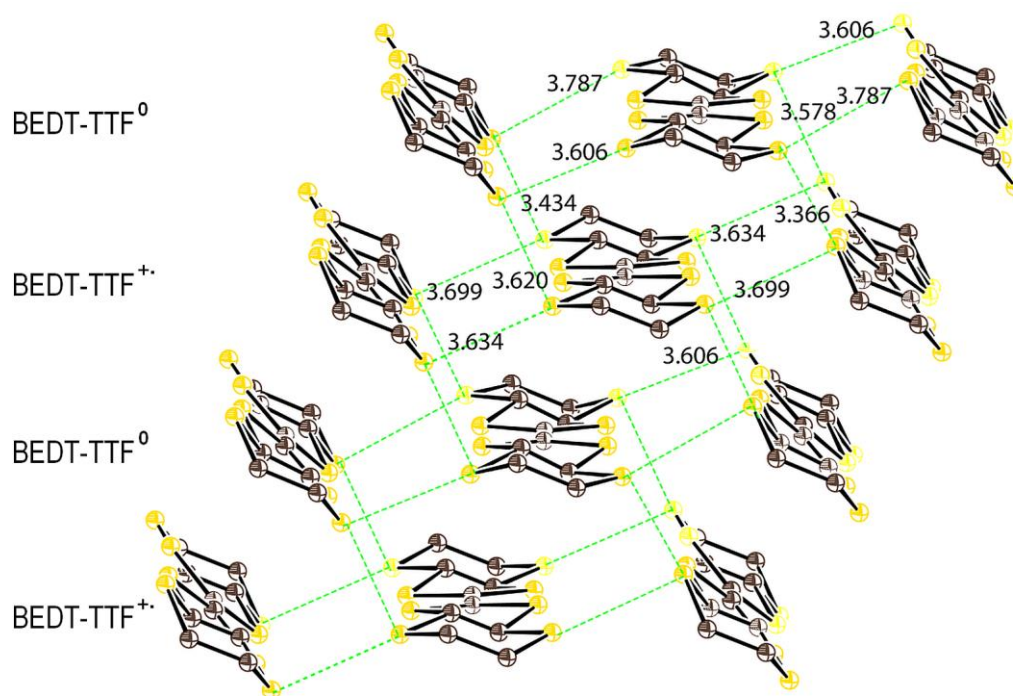


Figure S1. Formation of Van der Waals contacts in cation (BEDT-TTF^{+·}) and neutral (BEDT-TTF⁰) chains, and between them for option (c) of the organic layer of compound **1**

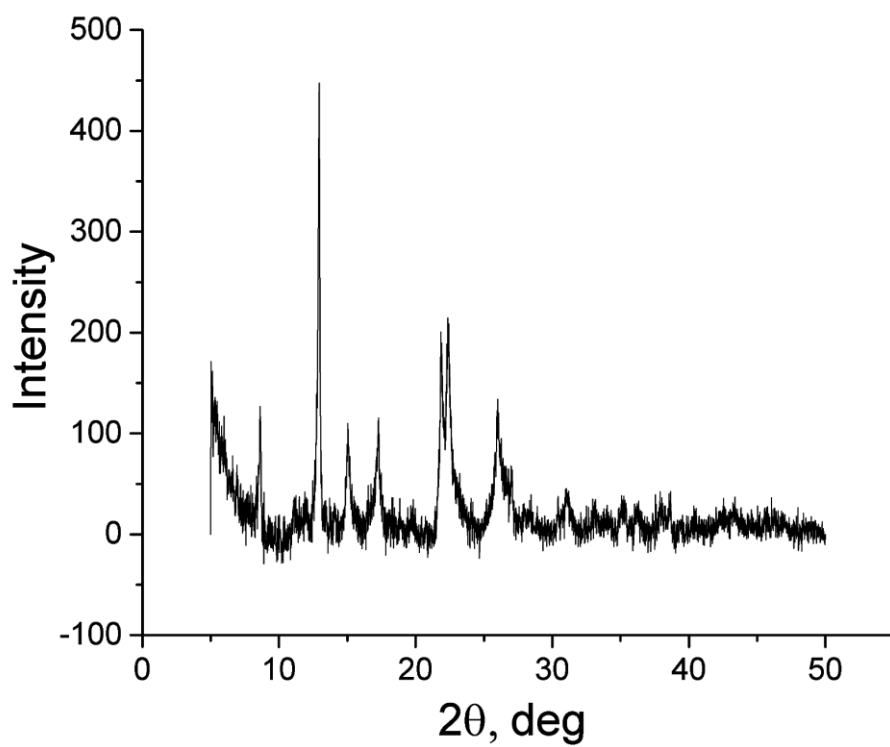


Figure S2. X-ray powder diffractogram for **2**.

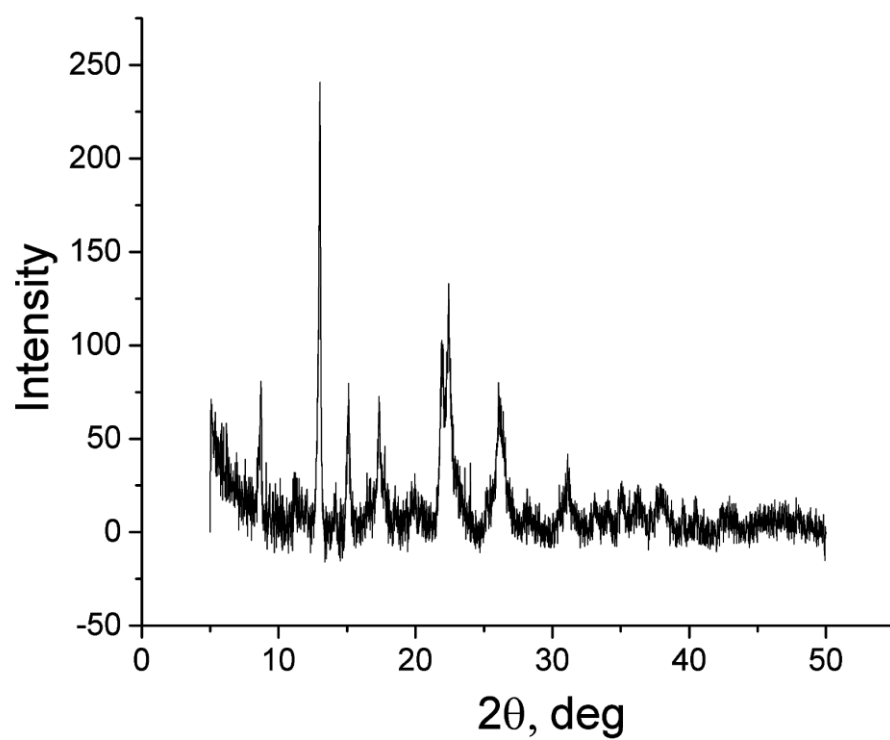


Figure S3. X-ray powder diffractogram for **3**.

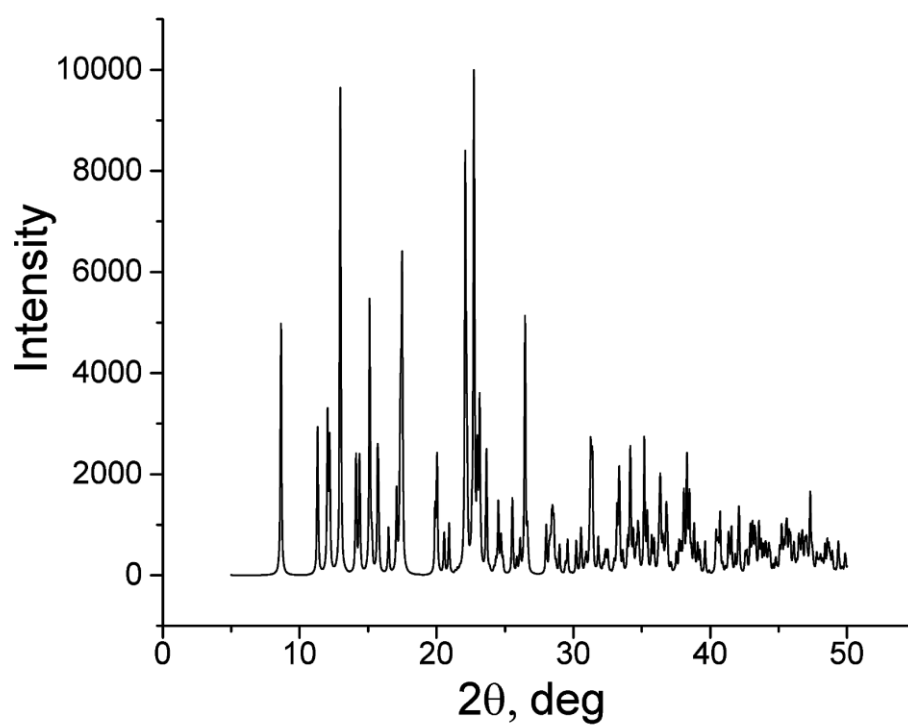


Figure S4. Simulated X-ray powder diffractogram for **1**.

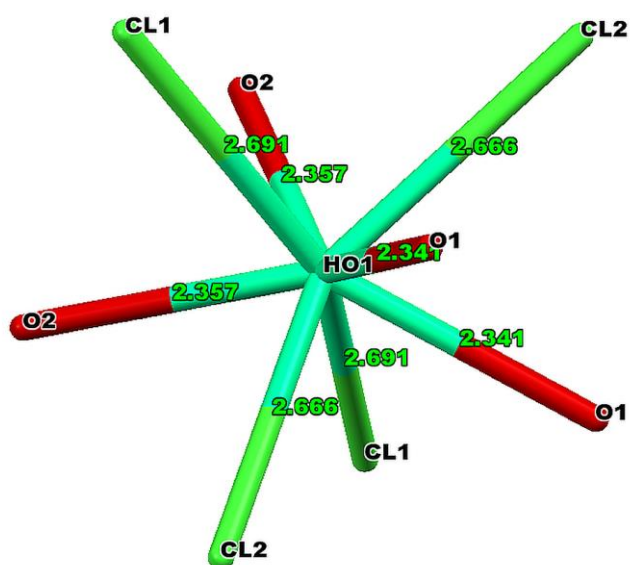


Figure S5. Structure of $[\text{HoCl}_4(\text{H}_2\text{O})_4]^-$ anion in **4**.

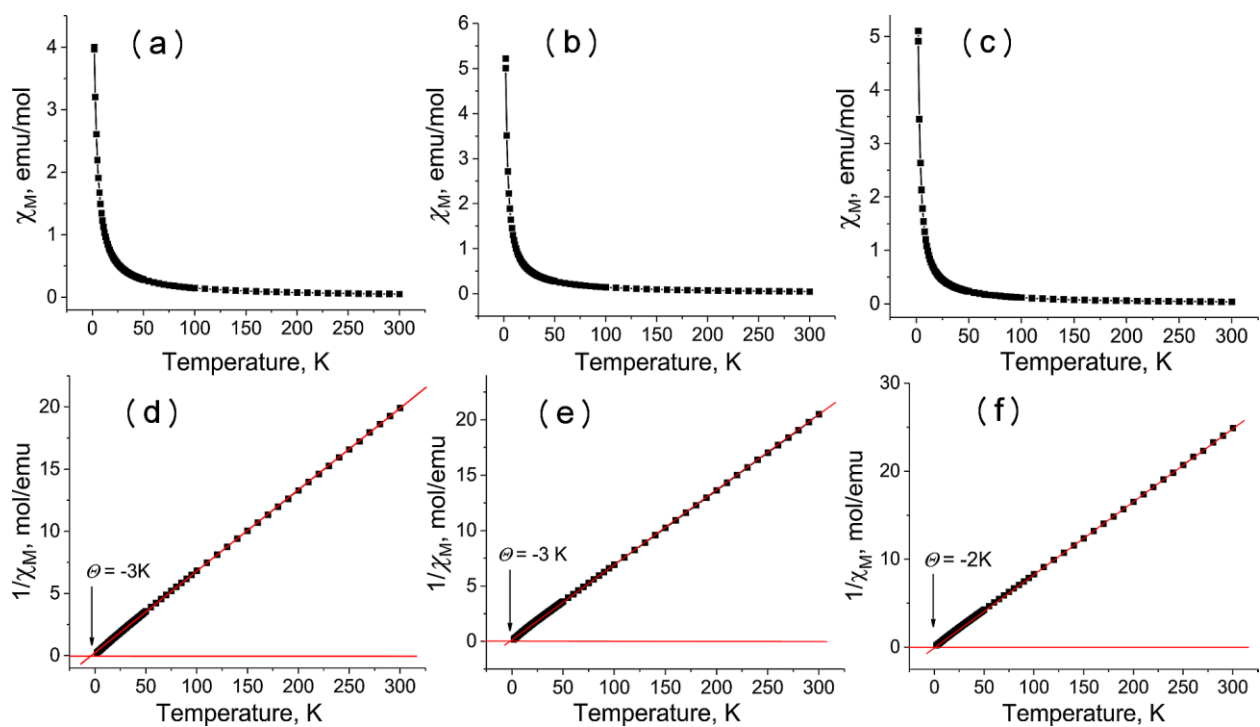


Figure S6. Temperature dependence of molar magnetic susceptibility (S6a, S6b, and S6c) and reciprocal molar magnetic susceptibility (S6d, S6e, S6f) for **1**, **2** and **3**.

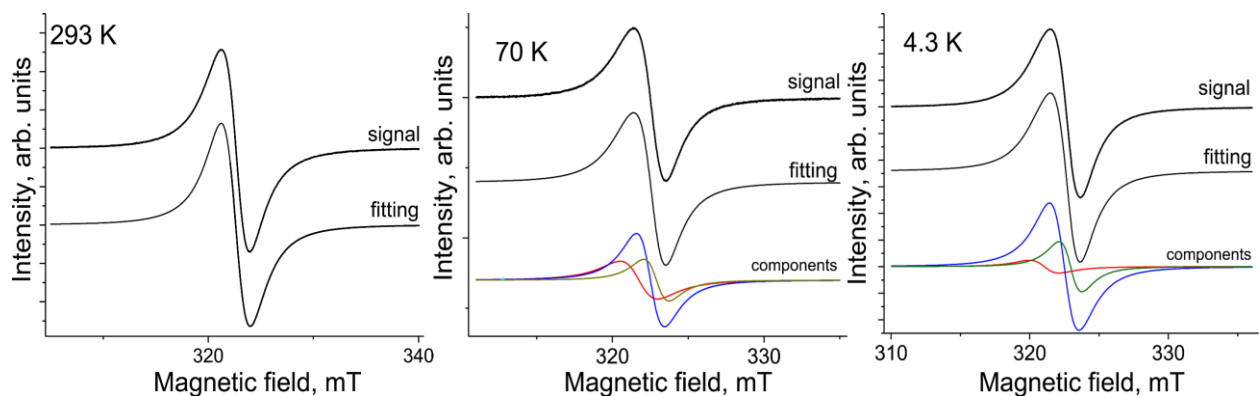


Figure S7. EPR signal from **2** at 293, 70 and 4.3 K. The approximation of the signal by one and three orange lines is shown at the bottom of the figures.

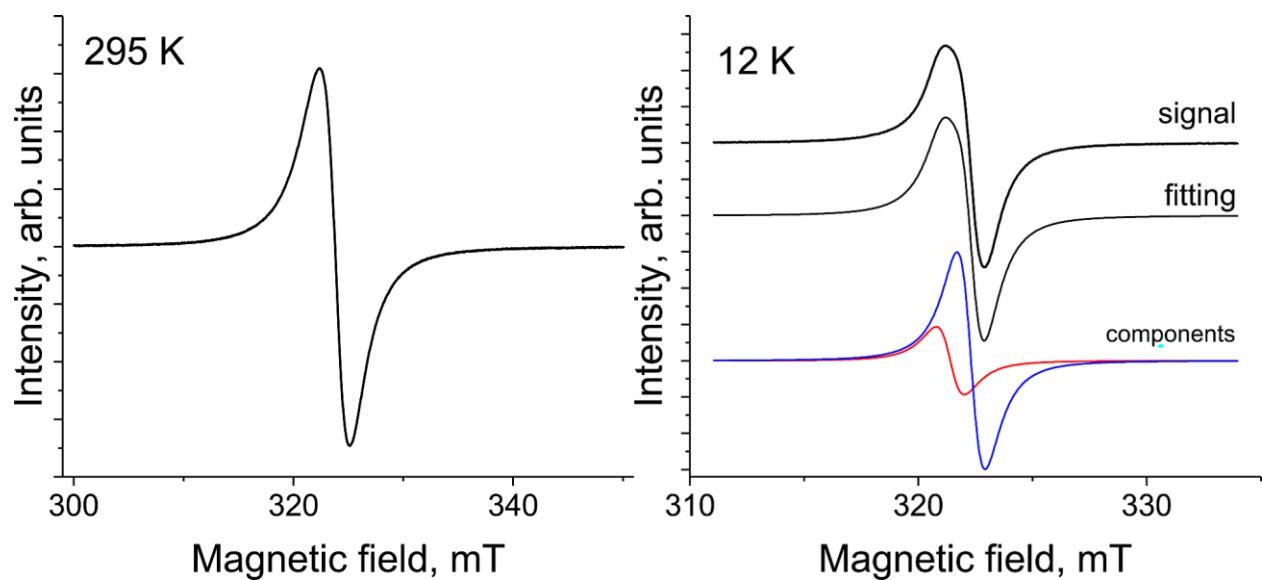


Figure S8. EPR signal from **3** (with terbium) at 12 and 295 K. The approximation of the signal at 12K by two Lorentz lines is shown at the bottom of the figure.

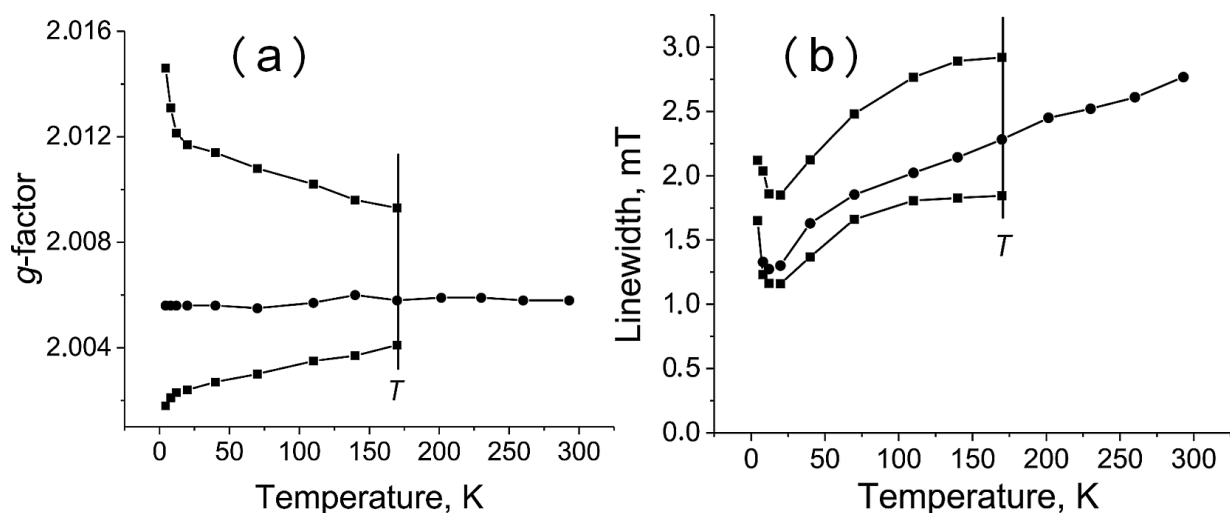


Figure S9. Temperature dependencies for parameters of EPR signal from **2** (with dysprosium): (a) g -factor and (b) the linewidth. “T” marks the temperature for splitting of EPR signal into three Lorentzian lines.

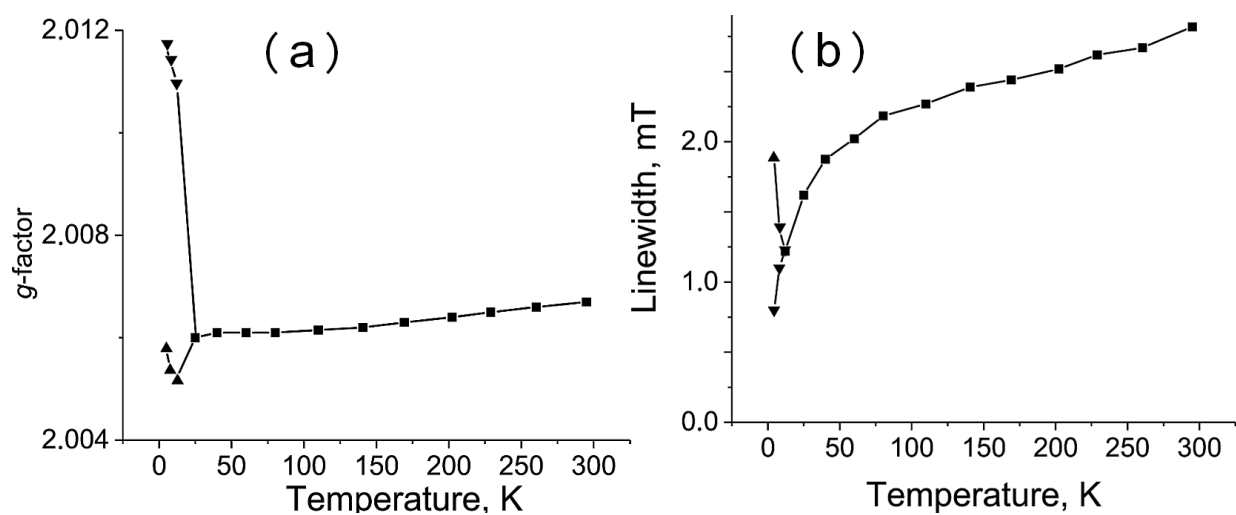


Figure S10. Temperature dependencies for parameters of EPR signal from **3**: (a) g -factor and (b) the linewidth.