Supplementary Information (SI) for RSC Advances.

Direct Ink Writing of High Explosive Composites Containing Metal–Organic Frameworks

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KEYWORDS *Direct ink writing (DIW), 1,3,5-trinitro-1,3,5-triazinane (RDX), metal–organic frameworks (MOFs), explosion*

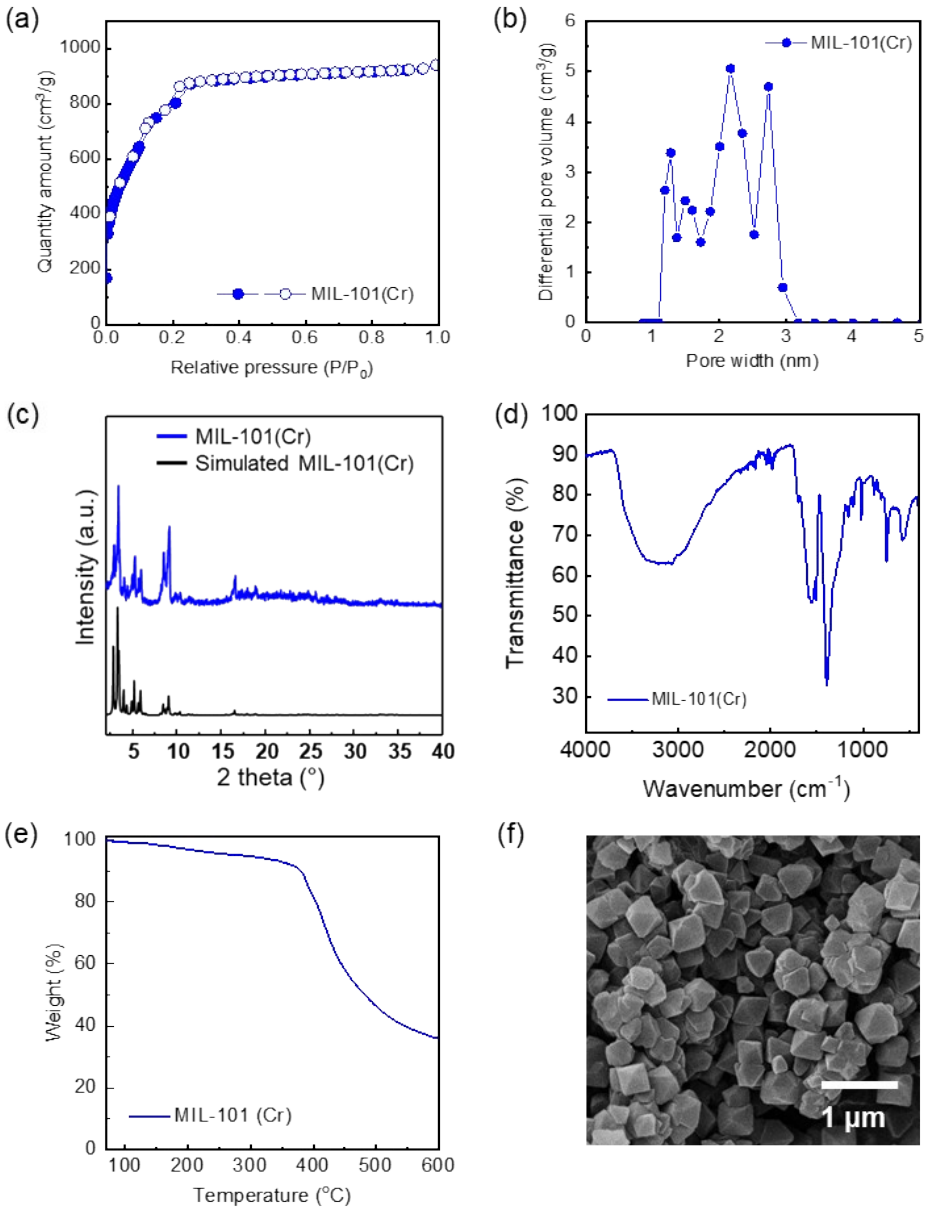

Fig. S1 (a) N_2 isotherm, (b) pore size distribution, (c) XRD peak, (d) IR spectrum, (e) TGA data, and (f) FESEM image of MIL-101(Cr)

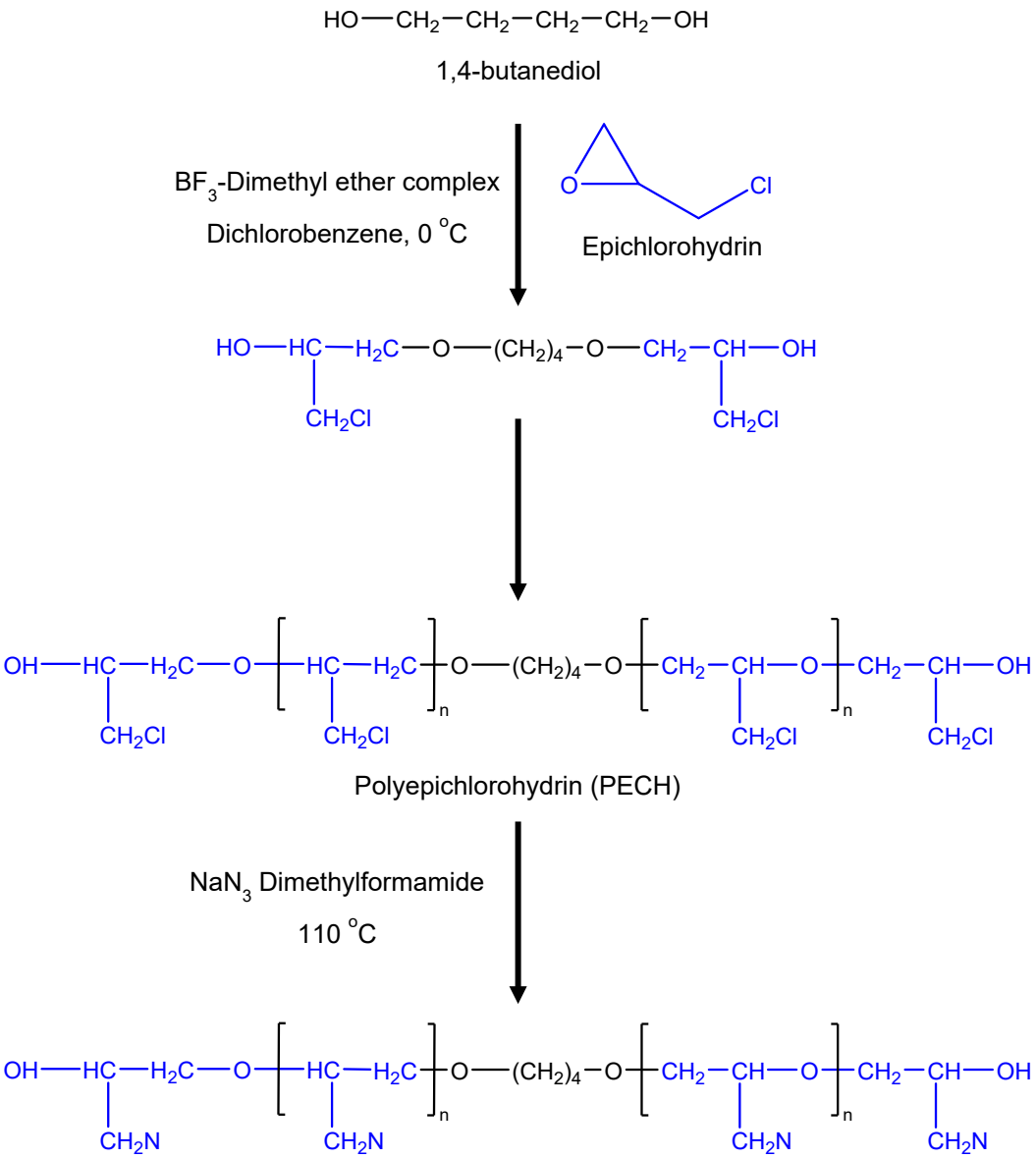

Fig. S2 Synthesis of glycidyl azide polymer (GAP)

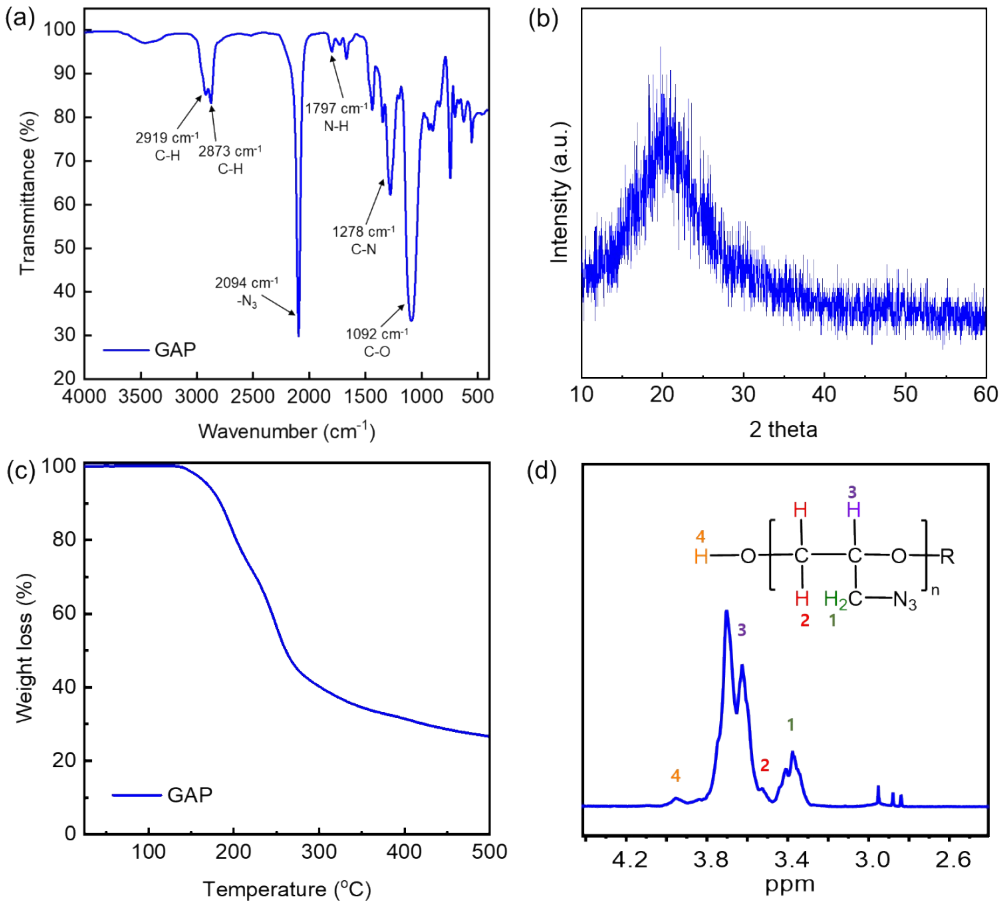

Fig. S3 (a) IR spectrum, (b) XRD pattern, (c) TGA data, and (d) NMR peak of GAP

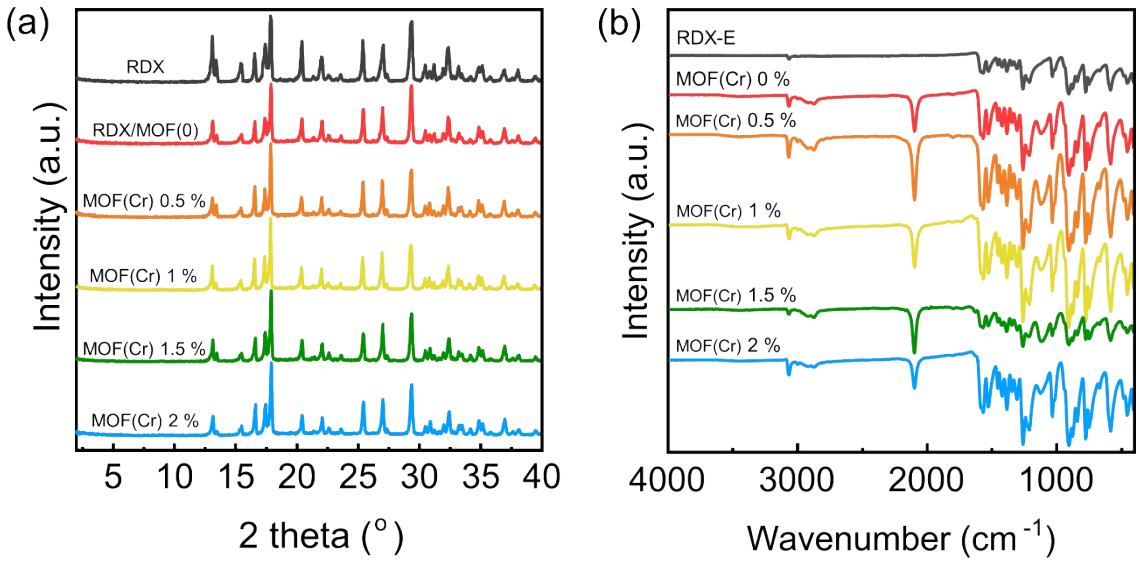

Fig. S4 (a) PXRD peaks and (b) IR spectra of RDX-based ink

Table S1. The viscosity of RDX/MOF composites

Sample	RDX/MOF(0)	RDX/MOF(0.5)	RDX/MOF(1)	RDX/MOF(1.5)	RDX/MOF(2)
Viscosity [cp]	2.3	2.6	3.0	3.3	4.0