Supplemental Information

Recent Advancement of Inorganic-Organic Hybrid Resist Thin Films Deposited via Molecular Atomic Layer Deposition for Dry EUV Resist Platforms

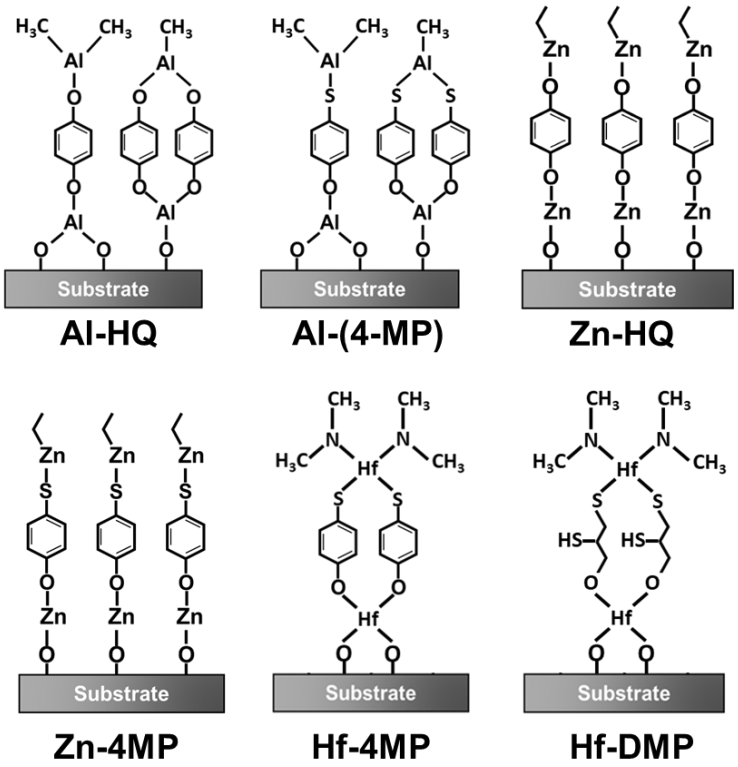

Figure 1. Ideal molecular structures of inorganic-organic hybrid thin film systems using various combinations of inorganic and organic sources.

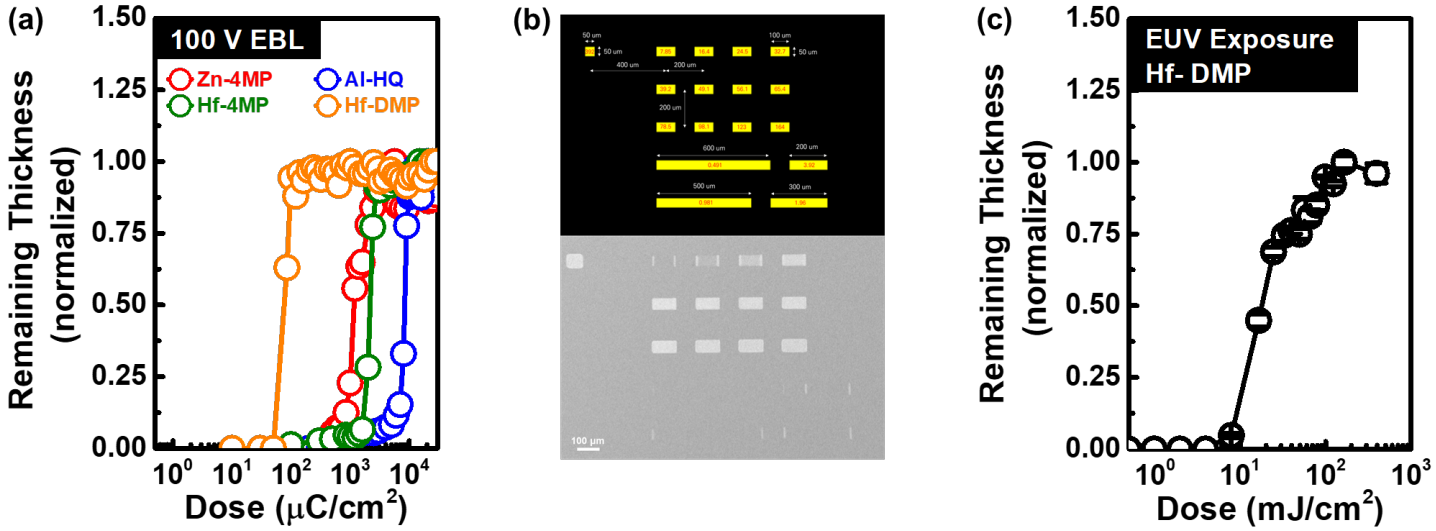

Figure 2. (a) The normalized responsive dose curve of various inorganic-organic hybrid thin films achieved in this study using 100 V EBL. (b) EUV exposure dose template and SEM image of the EUV exposure dose matrix (post-development) of Hf-DMP hybrid resist thin films. (c) The normalized responsive EUV dose curve of the hybrid resist thin films. The remaining thickness was determined using AFM. The thickness equivalent to 1 is ~34.5 nm.