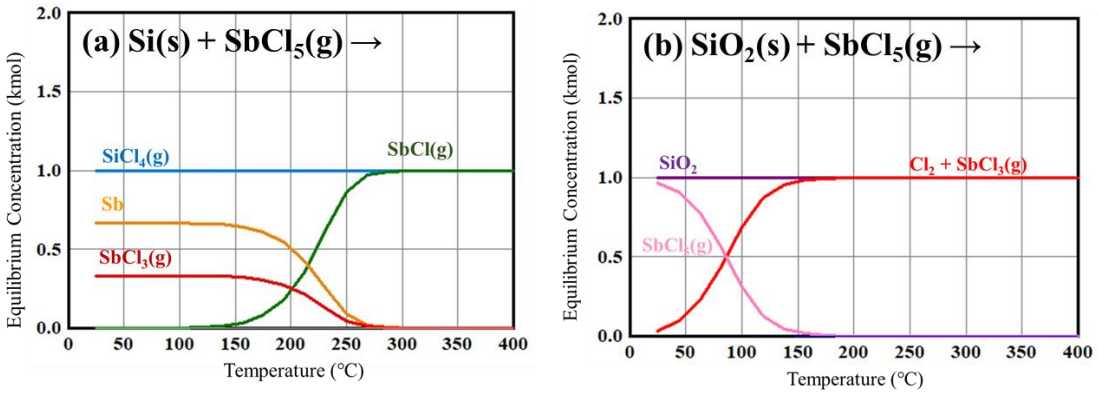

Figure 1. (a) Thermodynamic calculation (HSC Chemistry 7.1 software) of the expected equilibrium species concentrations from 25 to 400 °C at 1 Torr for a reaction of (a) 1 mol of Si (s) + 1 mol of $SbCl_5$ (g), and (b) 1 mol of SiO_2 (s) + 1 mol of $SbCl_5$ (g). At 100 °C, Si is reacted with $SbCl_5$, forming volatile $SiCl_4$ (g), whereas SiO_2 has no reaction with $SbCl_5$.

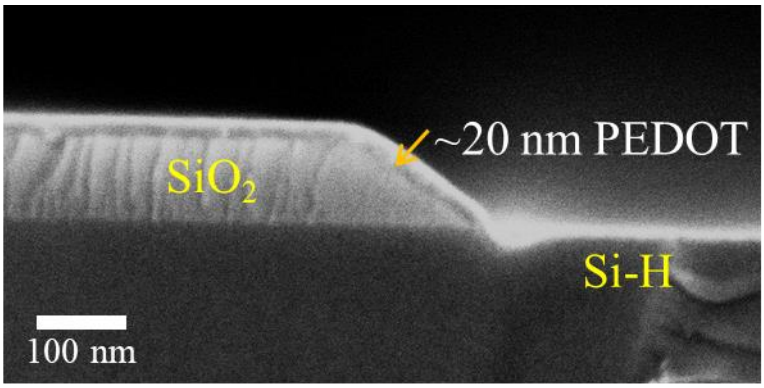

Figure 2. Cross-sectional SEM image of PEDOT ASD on SiO_2/Si-H patterned substrates at 100 °C for 200 MLD cycles.

[1] Atanasov, S. E.; Losego, M. D.; Gong, B.; Sachet, E.; Maria, J. P.; Williams, P. S.; Parsons, G. N. "Highly Conductive and Conformal Poly(3,4-Ethylenedioxythiophene) (PEDOT) Thin Films via Oxidative Molecular Layer Deposition", Chem. Mater. **2014**, 26 (11), 3471–3478.