

Figure 1. AFM of (a). In_2Se_3 layer grown via selenium passivation of $\text{InP}(111)\text{B}$ substrates at a temperature of $T_{\text{sub}}=480$ °C with a rms = 0.4 nm . AFM of Bi_2Se_3 layers grown at a substrate temperature of: (b). $T_{\text{sub}}=240$ °C with rms = 1.0nm and (c). $T_{\text{sub}}=295$ °C with rms of 0.6 nm. (d) AFM of Sb_2Te_3 layer grown at , $T_{\text{sub}}=230$ °C, and (e) AFM of $\text{Sb}_2\text{Te}_3/\text{Bi}_2\text{Se}_3$ superlattice grown at $T_{\text{sub}}=240$ °C with rms = 3.45 nm.

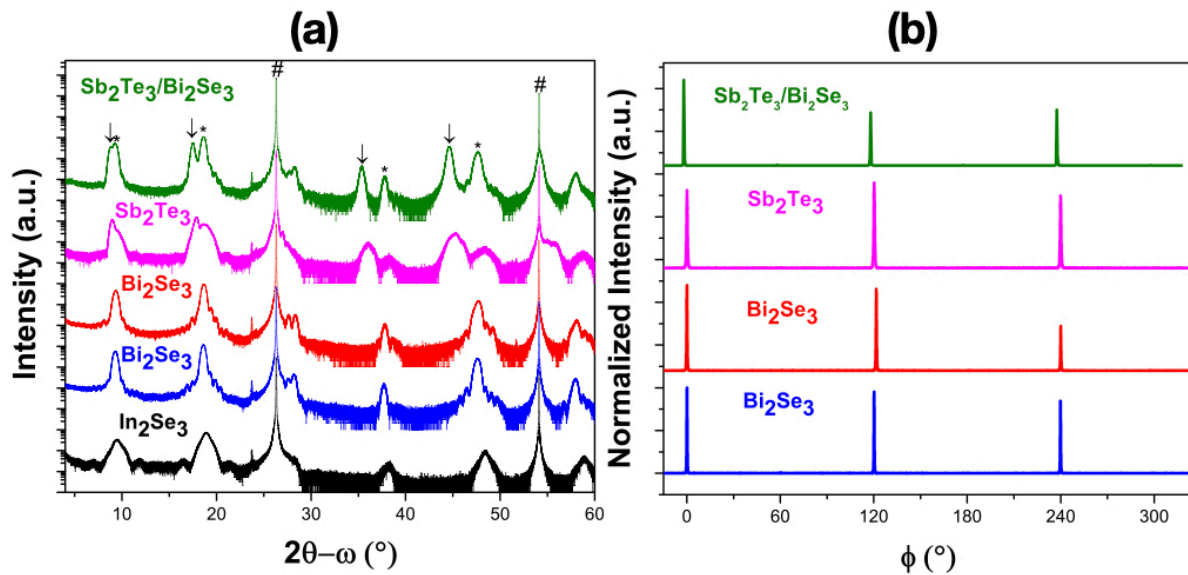


Figure 2. (a) HR-XRD of In_2Se_3 , Bi_2Se_3 , Sb_2Te_3 and $\text{Sb}_2\text{Te}_3/\text{Bi}_2\text{Se}_3$ superlattice of the samples shown in the AFM. Bi_2Se_3 is grown at a substrate temperature of $T_{\text{sub}}=240$ °C, Bi_2Se_3 is grown at a substrate temperature of $T_{\text{sub}}=295$ °C, and $\text{Sb}_2\text{Te}_3/\text{Bi}_2\text{Se}_3$ grown at a substrate temperature of $T_{\text{sub}}=240$ °C. The '#', '↓', and '*' indicate the substrate peak, Sb_2Te_3 peak, and Bi_2Se_3 peak respectively. (b). Φ scans of the (015) plane shows complete suppression of twin domains.