

Tree scale: 1

Colored ranges

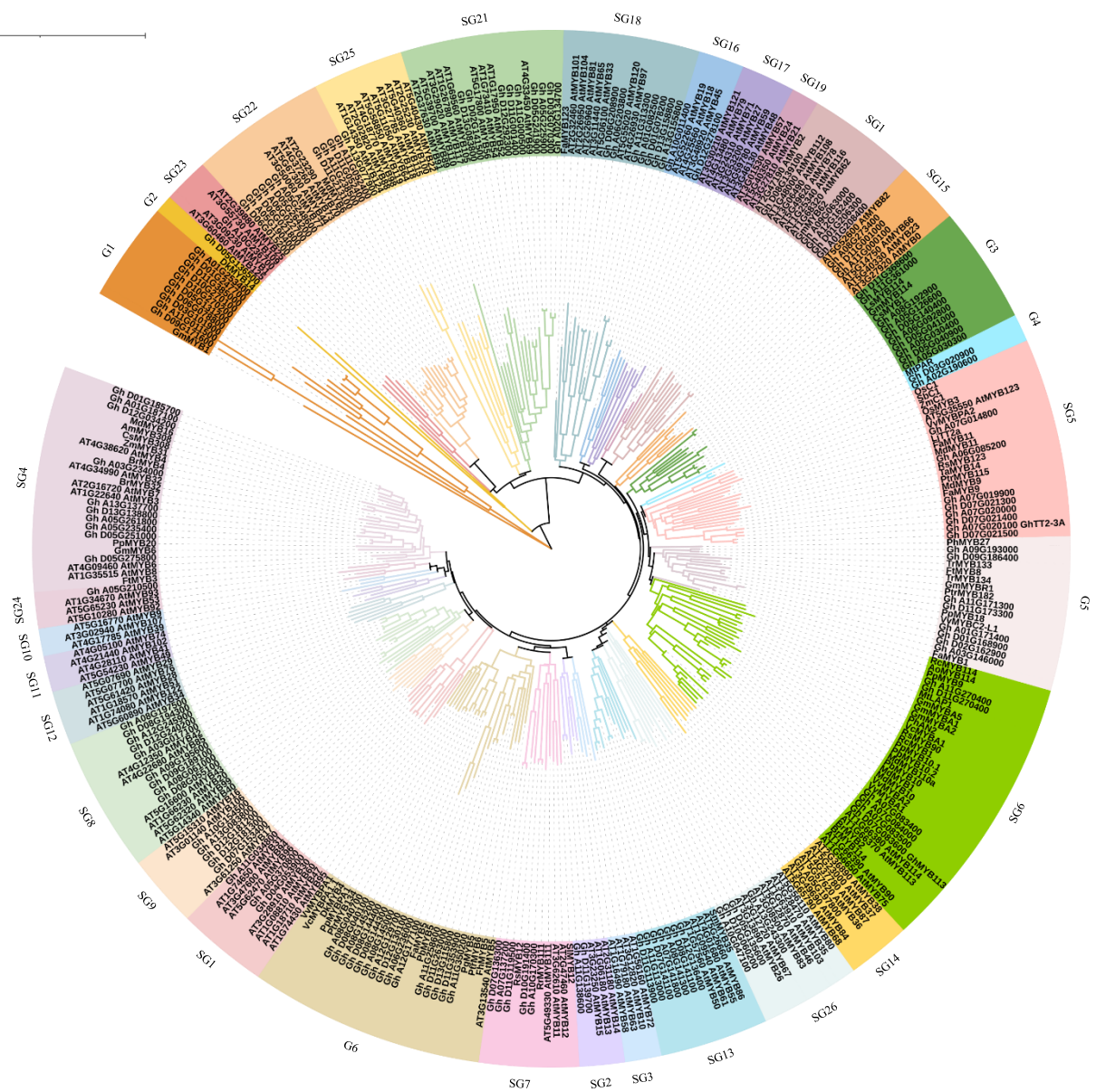


Fig. S1 Phylogenetic analysis of cotton (*Gossypium hirsutum*) GhMYB transcription factors and anthocyanidin/proanthocyanidin (PA)-related MYB proteins from other representative plant species. Based on the established subgroup classification system of MYB transcription factors in *Arabidopsis thaliana*, phylogenetic clustering and kinship visualization were performed for the target MYB proteins from the aforementioned species. The phylogenetic tree was constructed using the Neighbor-Joining (NJ) method implemented in MEGA-X software, and the reliability of branches was evaluated by 1000 bootstrap replicates. Different colors correspond to different protein groups (subgroups SG1-SG26 and groups G1-G6), with subgroup nomenclature referring to previously published research results reported. GenBank accession numbers of all MYB proteins are provided in [Supplemental Dataset S2-S3](#), and the scale bar indicates the branch length.