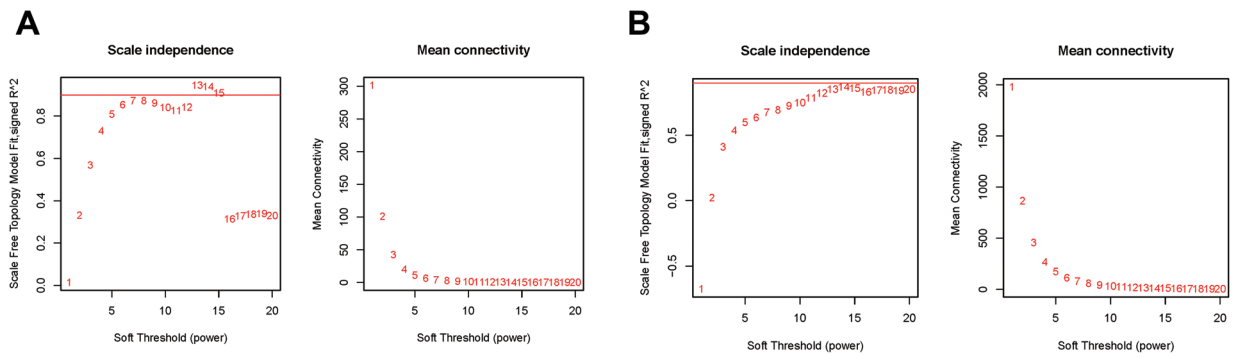


**Figure S1** The PCA plot before and after batch effect removal. Two types of samples [(A) AF and (B) SR] from two different datasets are shown on this figure. PCA, principal component analysis; AF, atrial fibrillation; SR, sinus rhythm.



**Figure S2** Soft threshold selection for WGCNA in AF GSE115574, GSE31821, GSE79768, GSE41177, and GSE14975 (A) and CD GSE112366 and GSE75214 (B) dataset. WGCNA, weighted gene co-expression network analysis; AF, atrial fibrillation; CD, Crohn's disease.