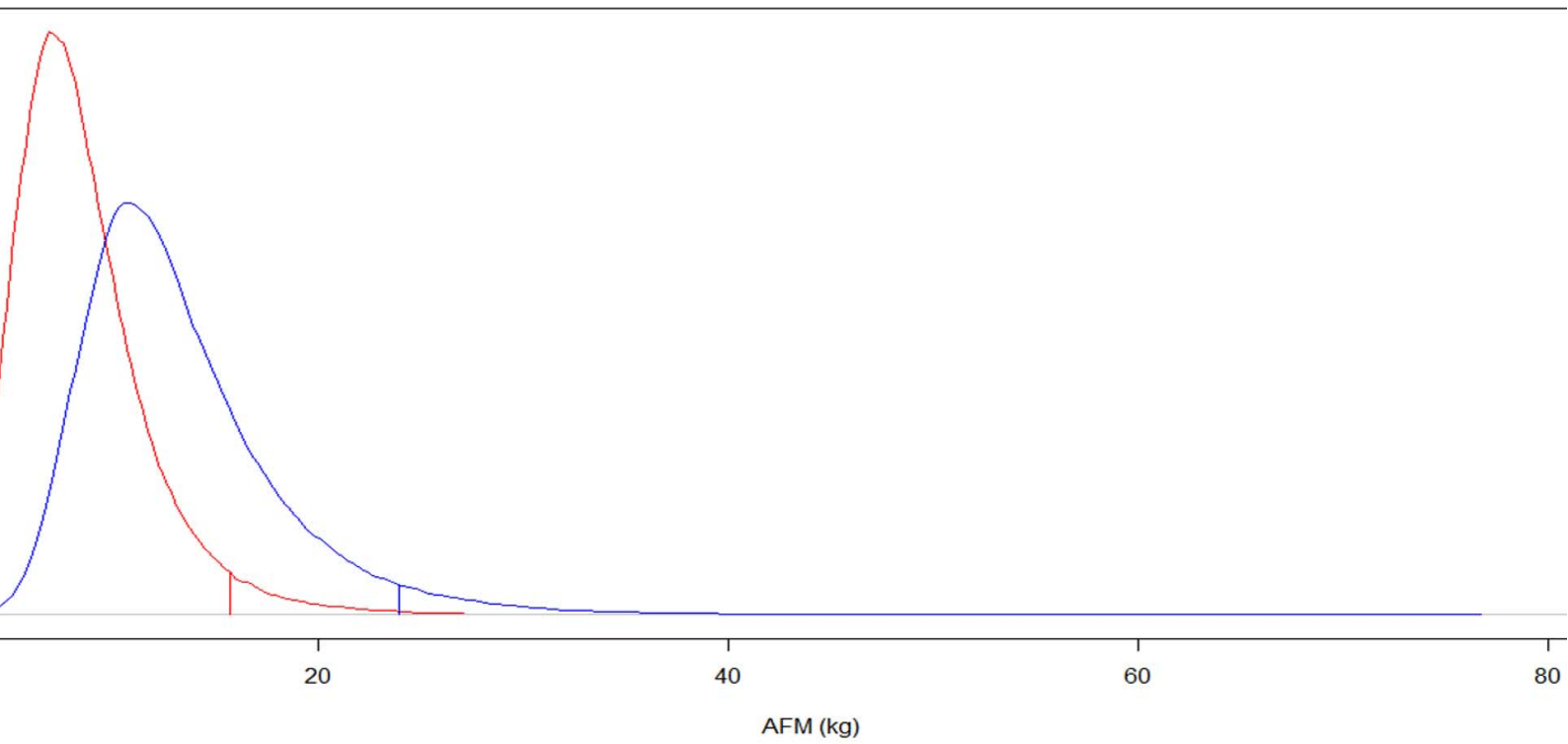
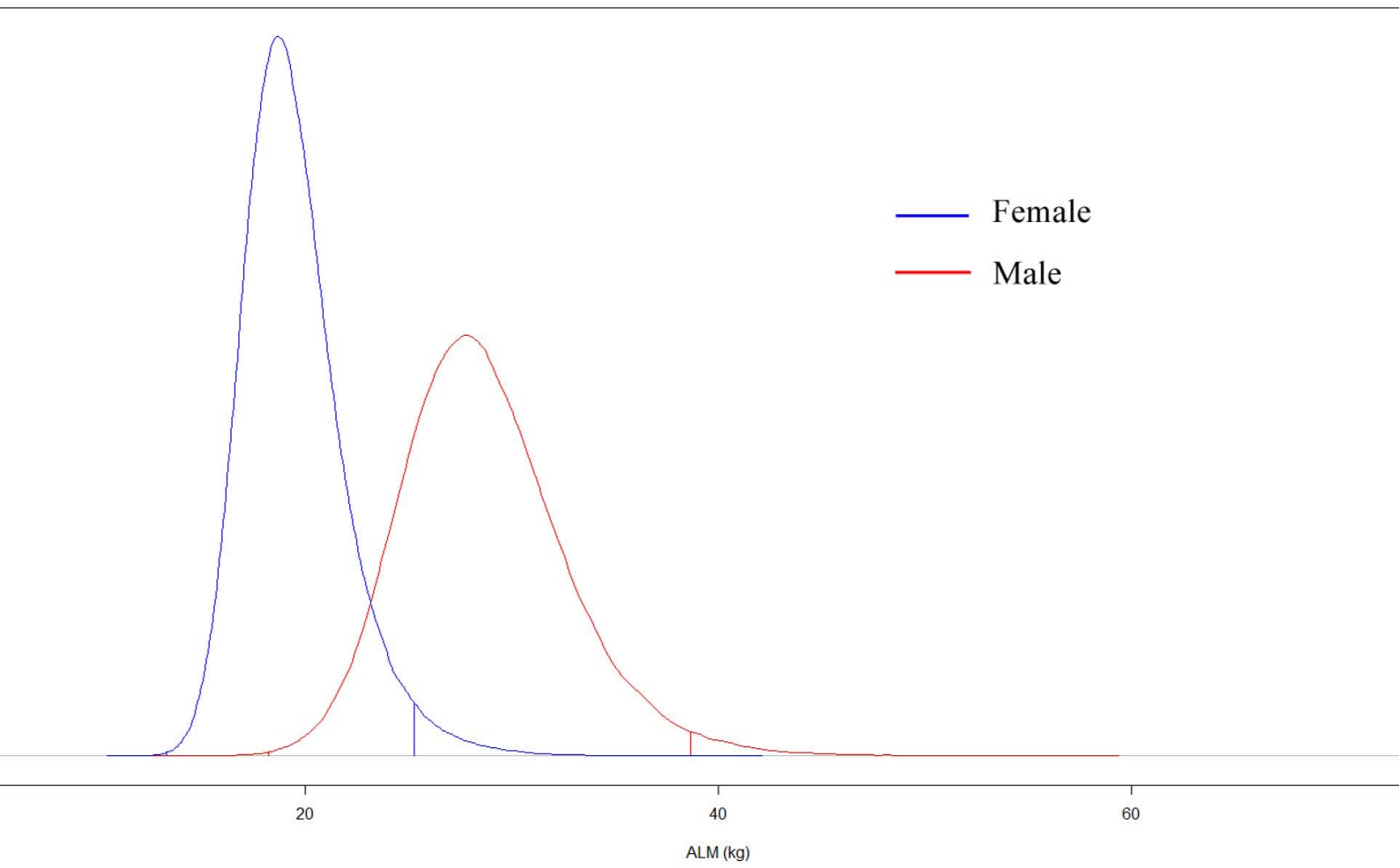
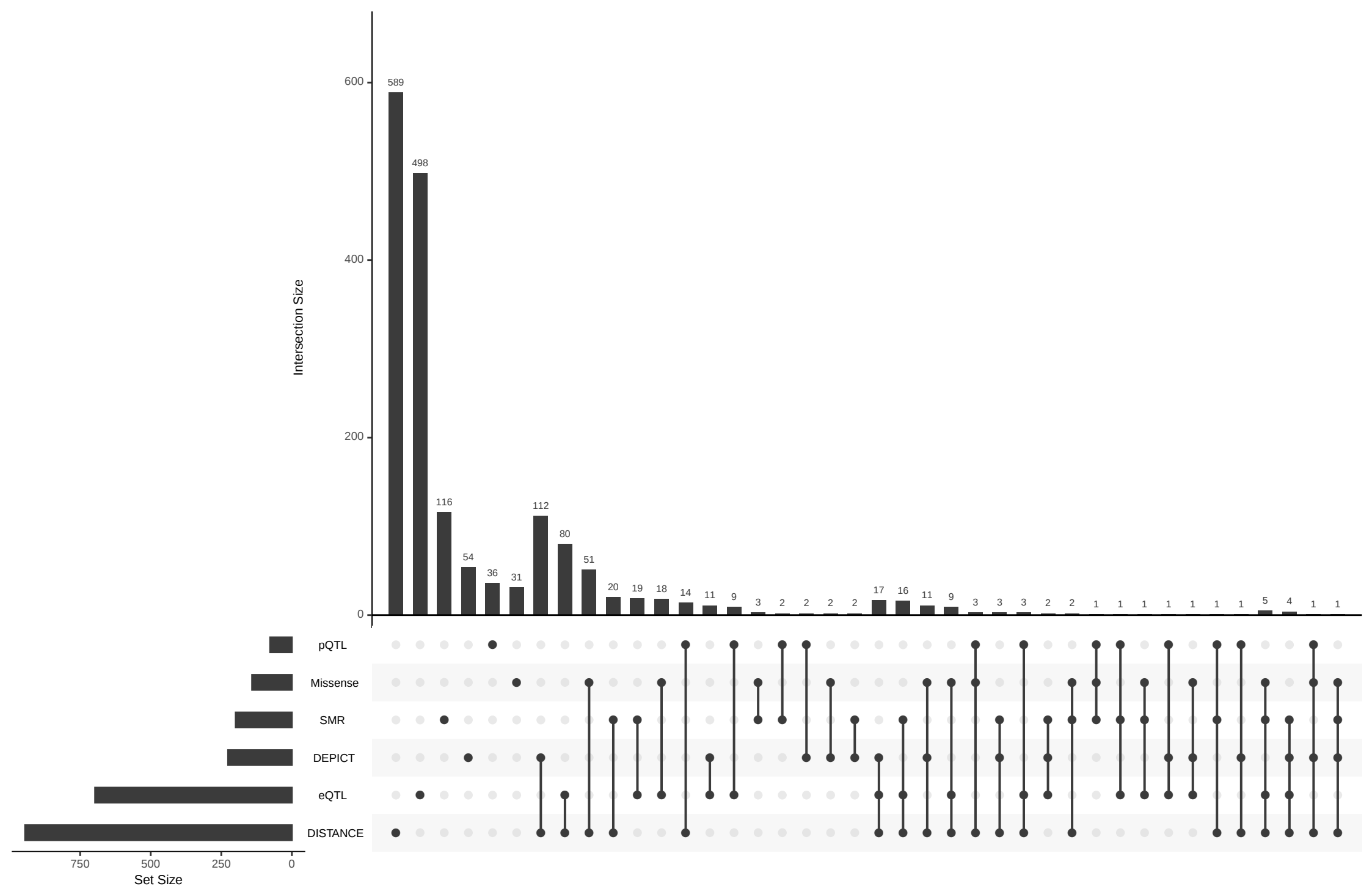




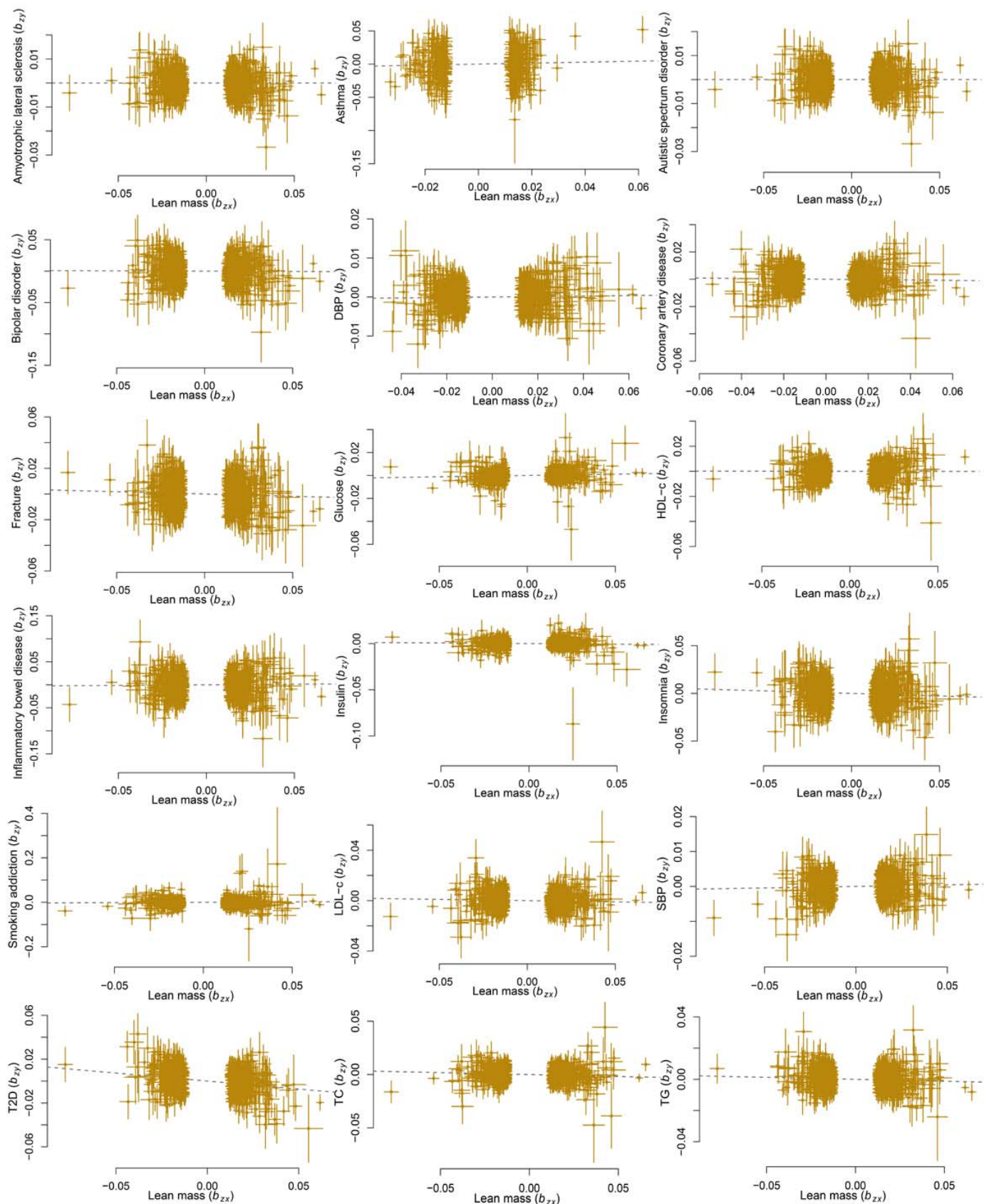
Supplementary Figure 1. Distribution of ALM and AFM

The distribution of ALM (upper) and AFM (lower) in female (blue colour) and male (red colour) participants of the UKB cohort was plotted. Vertical lines represent the phenotypic outlier thresholds defined by the Tukey ($k=1.5$) method.



Supplementary Figure 2. Intersection of genes prioritized from different sources

A total of 6 sources were used, including distance to the lead CRV, eQTL activity, pQTL activity, containing a missense CRV, DEPICT prioritization and SMR prioritization. Each row at the bottom represents one source of information. Black dots in each row indicate the presence of that source, and the co-occurrence of black dots in each vertical column indicates the intersection of the respective sources. The number of genes for each set of sources being intersected is displayed in the top panel.



Supplementary Figure 3. Scatter plot of the MR analysis of the 18 traits

The x-axis represents the regression estimate of the SNP effect on ALM_{adj} . The y-axis represents the regression estimate of the SNP effect on the outcome. The horizontal and vertical lines of each cross represent 95% confidence intervals for the exposure (ALM_{adj}) and the outcome, respectively.