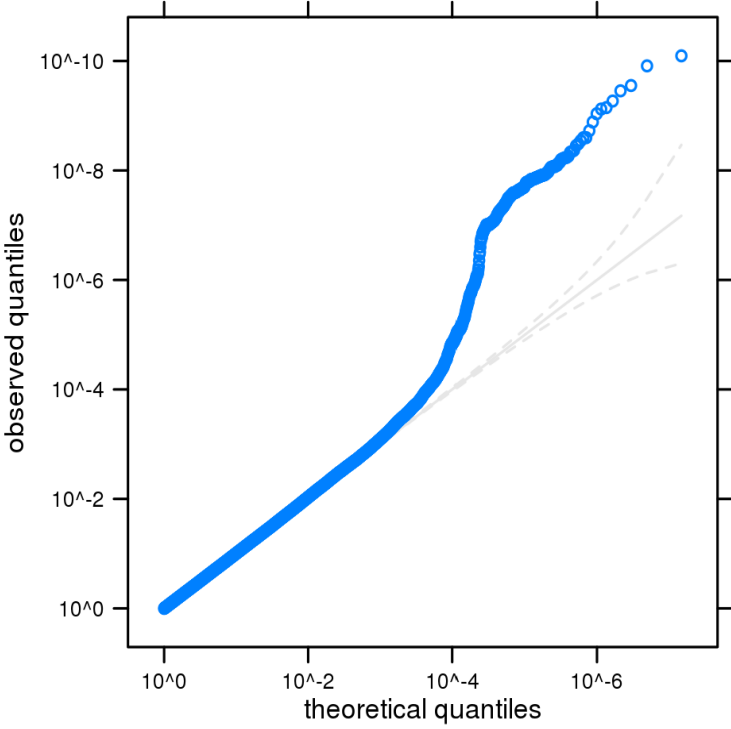**Supplementary Figure 1.** Quantile-quantile plot of p-values from the discovery group plotted on a logarithmic scale. Gray line indicates expected p-value distribution under the null hypothesis. Blue dots indicate observed p-values. Dashed lines represent a 95% confidence envelope assuming the test results are independent.

Supplementary Table 1. Quality statistics for the discovery group GWAS.
a) Quality statistics describing the two significant SNPs in 23andMe customers of European ancestry. Both SNPs were imputed. R^2=observed variance in imputed dosages as a fraction of the expected variance (a measure of imputation quality).
b) Average imputed dosage of the alphabetically second allele in rosacea cases and controls.

a

SNP	Average R^2	Minimum R^2	Dosage of minor allele
rs763035	0.8806	0.7749	0.8613
rs111314066	0.6893	0.6350	0.0167

b

SNP	Controls Average imputed dosage of minor allele	Rosacea Cases Average imputed dosage of minor allele
rs763035	0.8514	0.8813
rs111314066	0.0162	0.0256