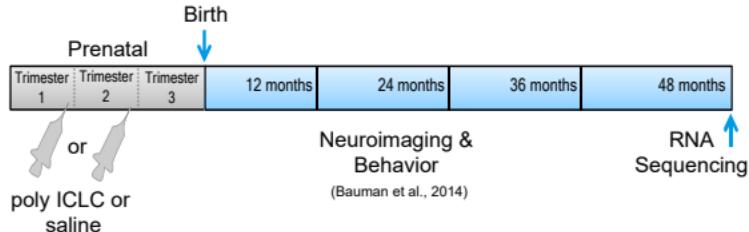
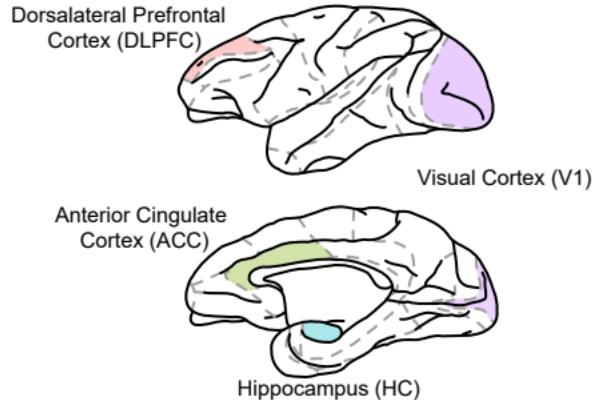


A

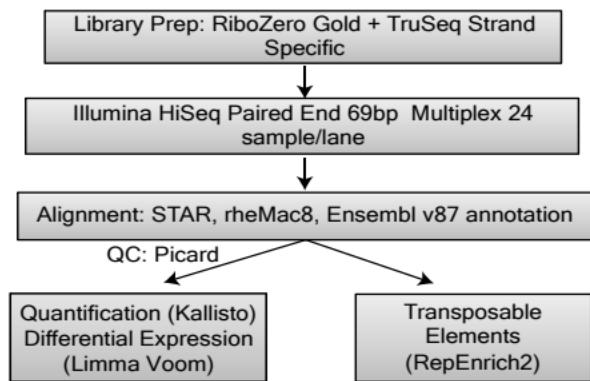
Experimental Timeline

**B**

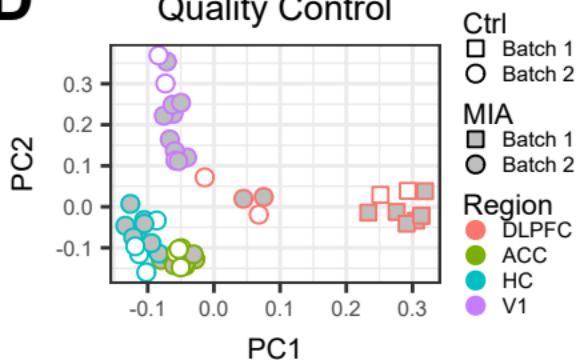
Brain Regions Profiled

**C**

RNA-Sequencing Pipeline

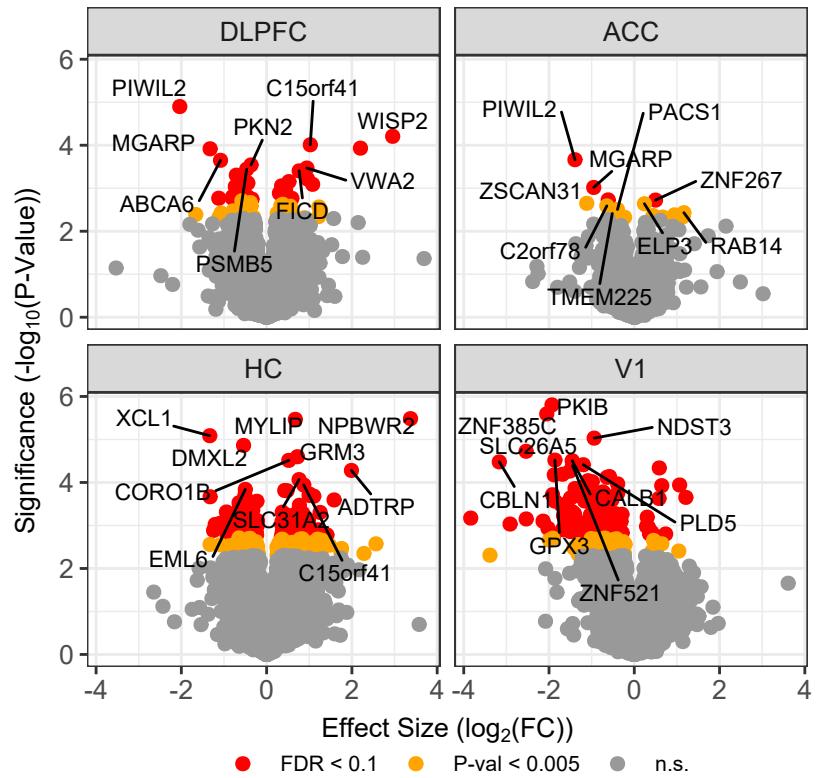
**D**

Quality Control

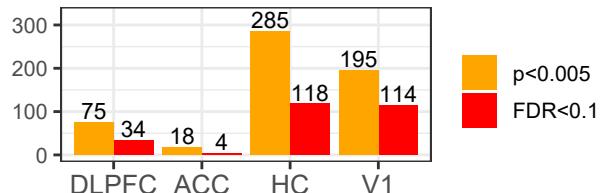


(Figure 1)

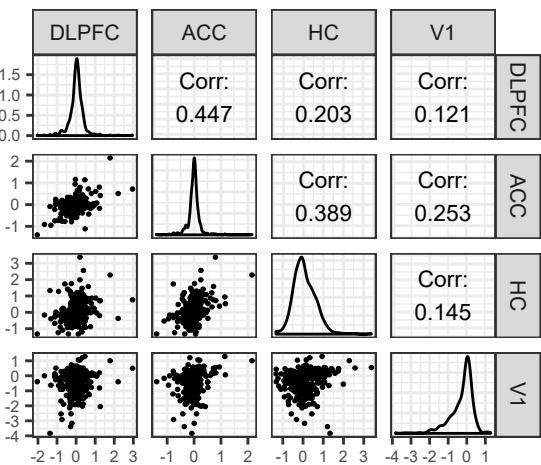
A Regional Differential Gene Expression



B # DE Genes by Region

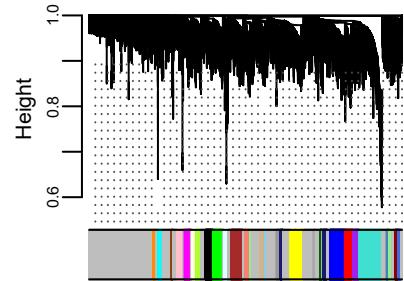


C p < 0.005 Genes logFC Correlation



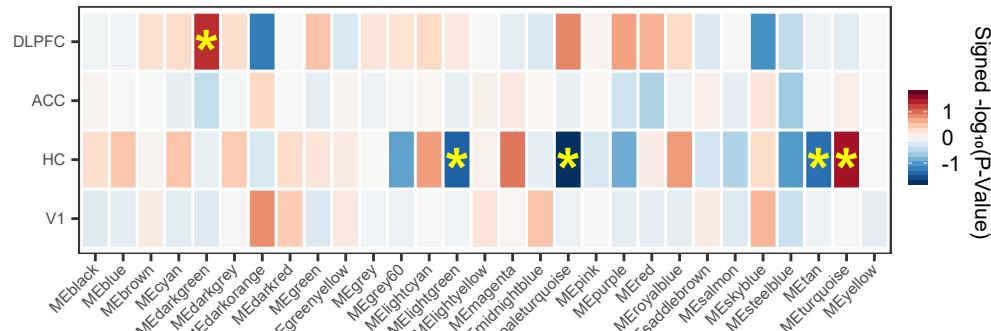
D

WGCNA



E

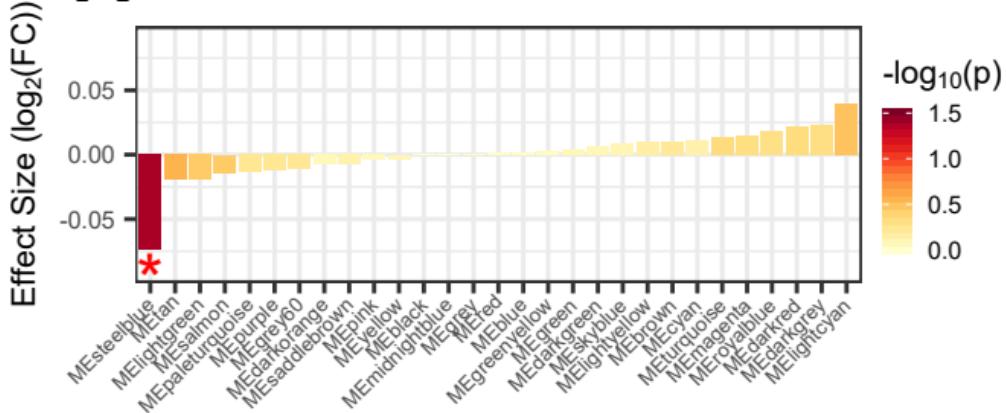
Module Differential Expression



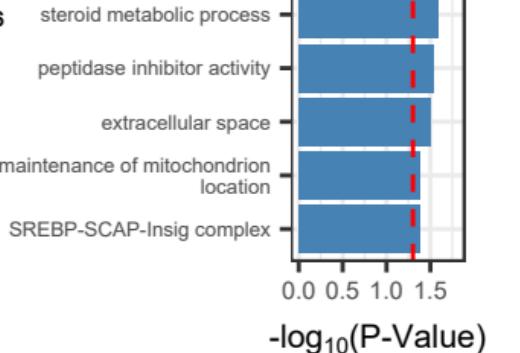
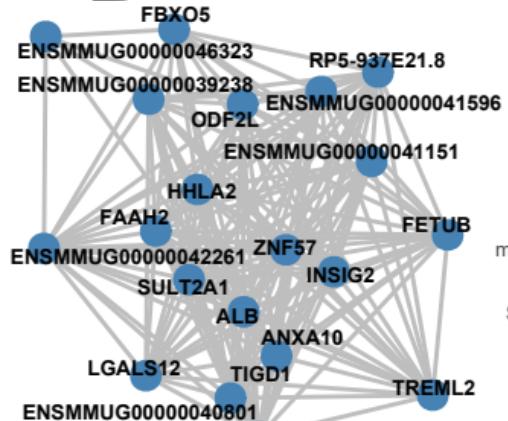
(Figure 2)

A

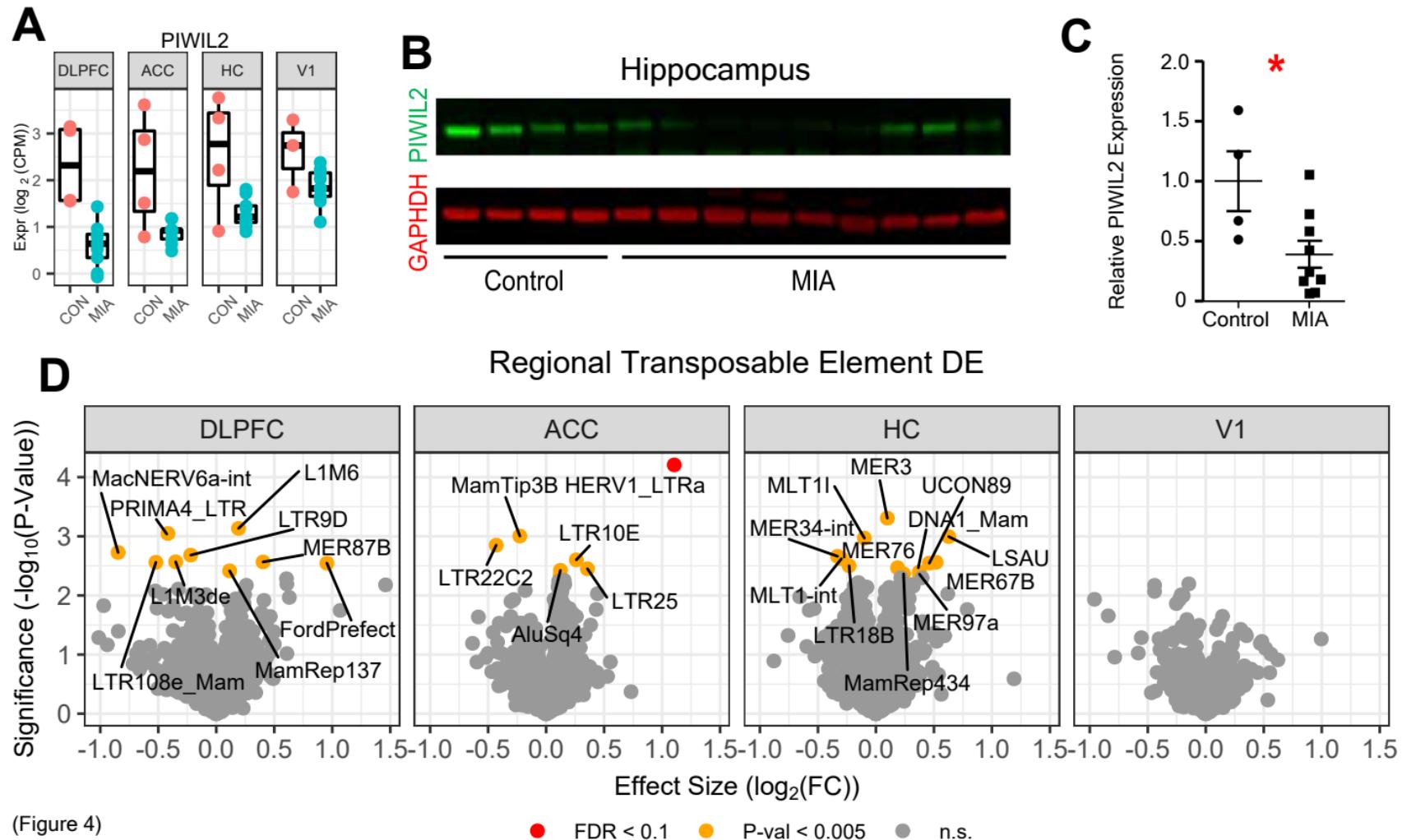
Combined Module DE

**B****C**

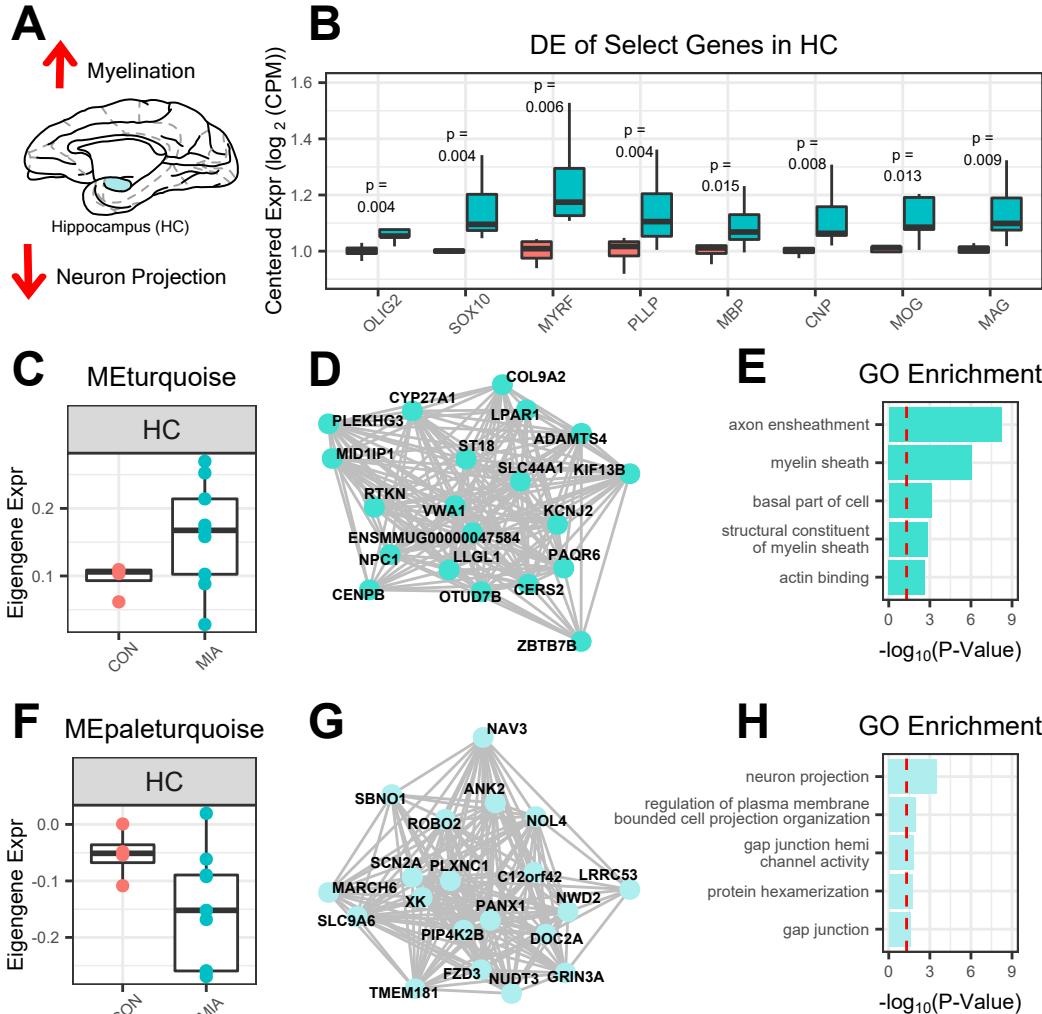
GO Enrichment



(Figure 3)



(Figure 4)

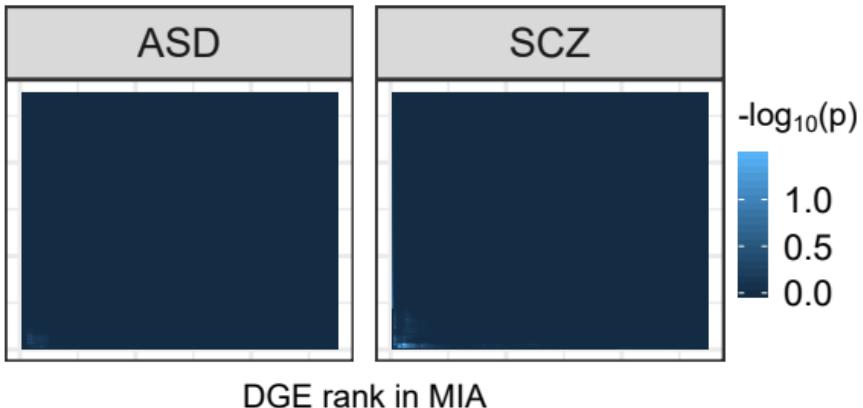


(Figure 5)

A

Disease MIA Overlap

DGE rank in Disease

**B**

Disease Enrichment

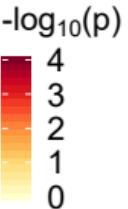
SFARI_ASD_Candidate

SCZ_UP

SCZ_DOWN

ASD_UP

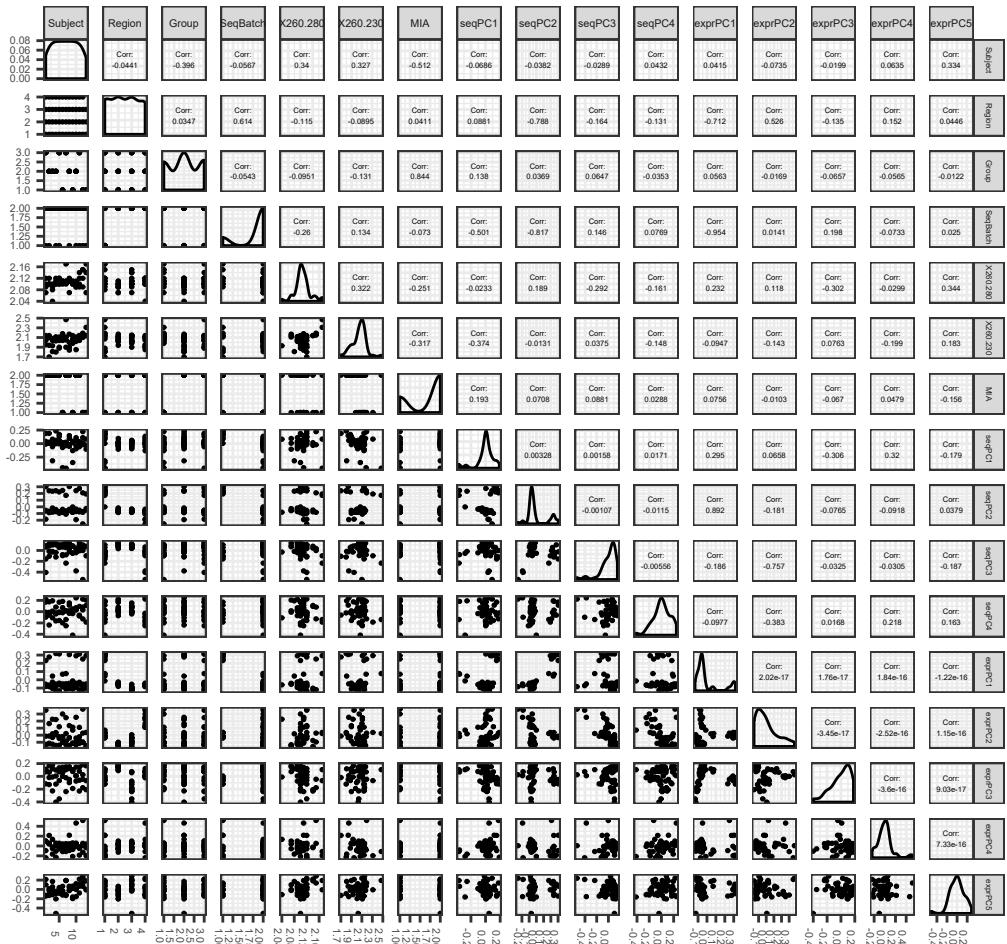
ASD_DOWN

DLPFC_UP
DLPFC_DOWN
ACC_UP
ACC_DOWN
HC_UP
HC_DOWN
V1_UP
V1_DOWN

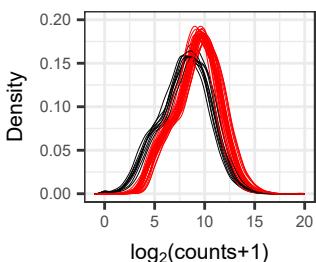
(Figure 6)

A

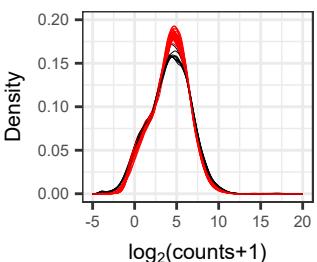
Trait Correlations -- |Pearson's rho|

**B**

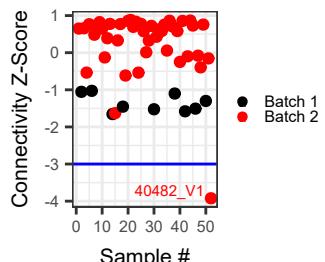
Pre-Normalization

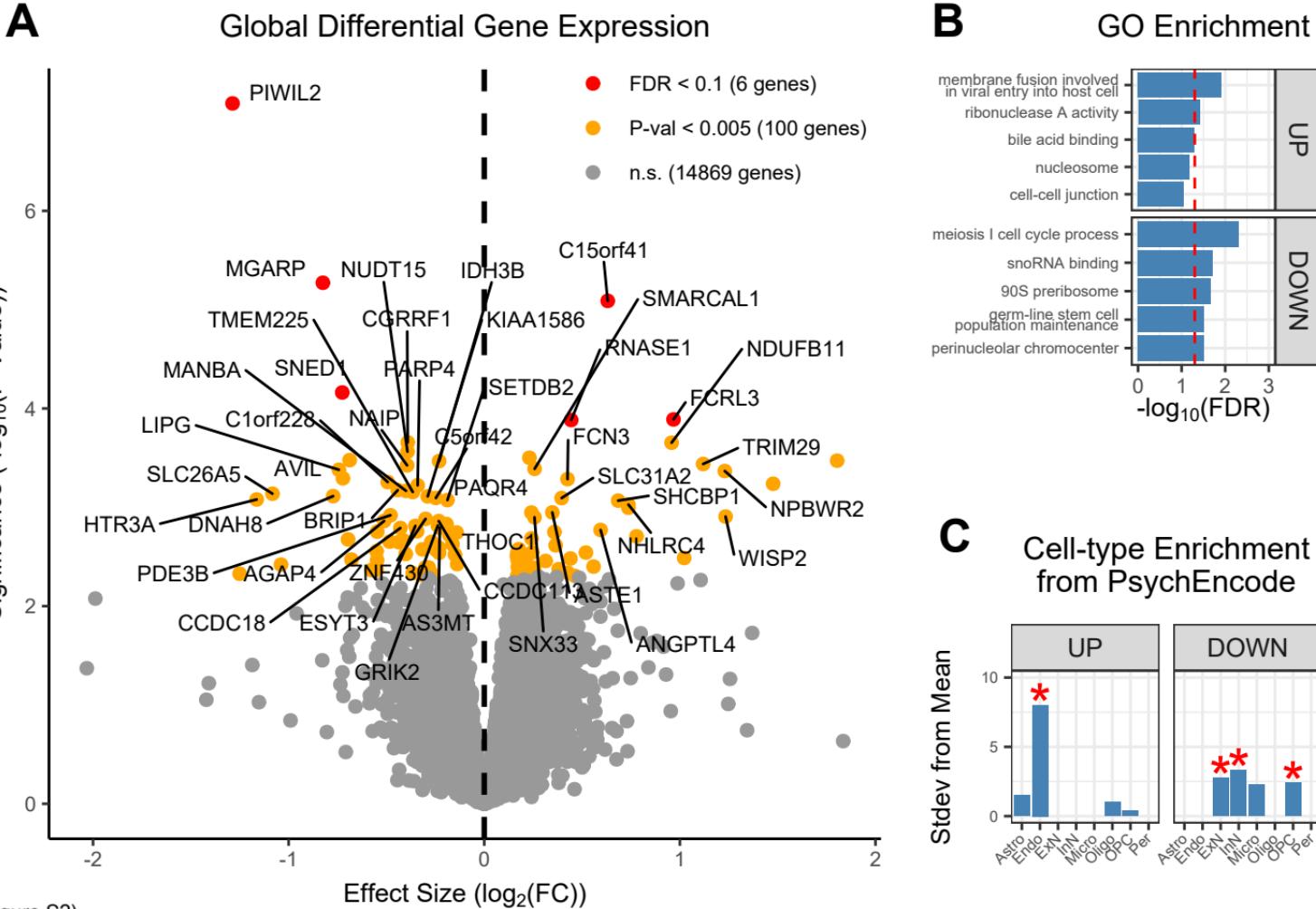
**C**

Post-Normalization

**D**

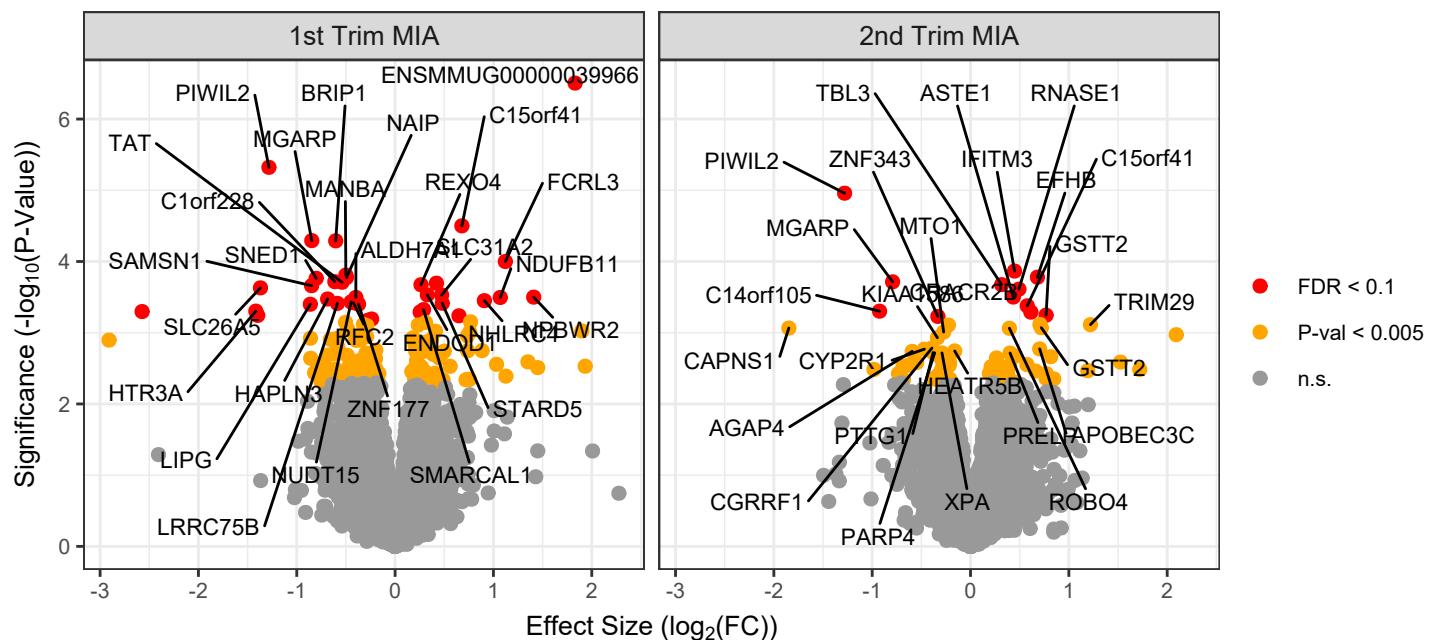
Outlier Removal



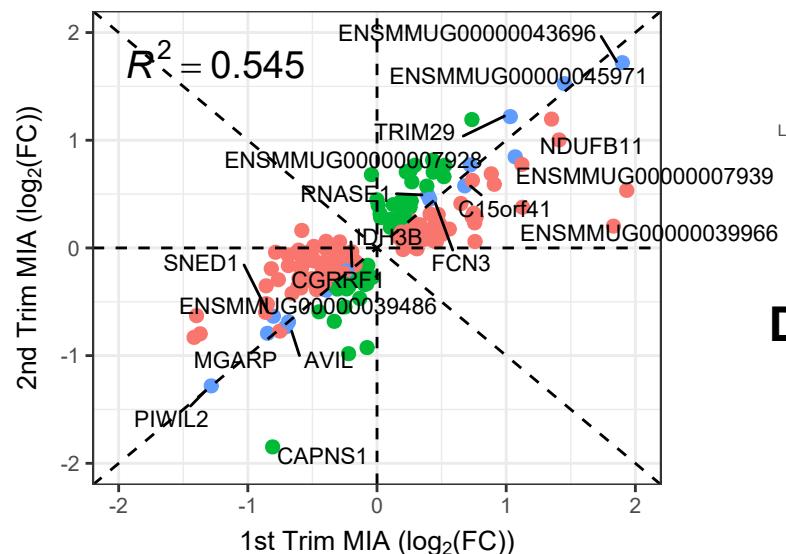


(Figure S2)

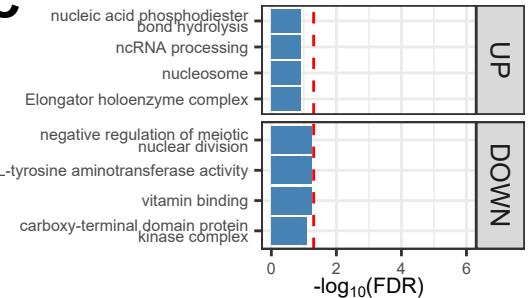
A Differential Gene Expression



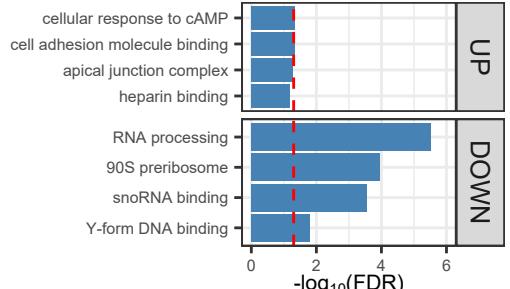
B Correlation of DE Genes

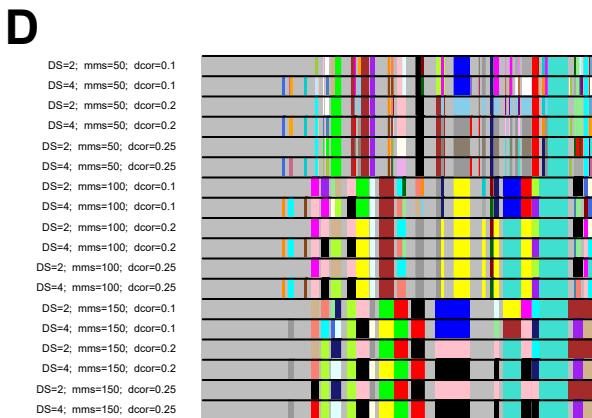
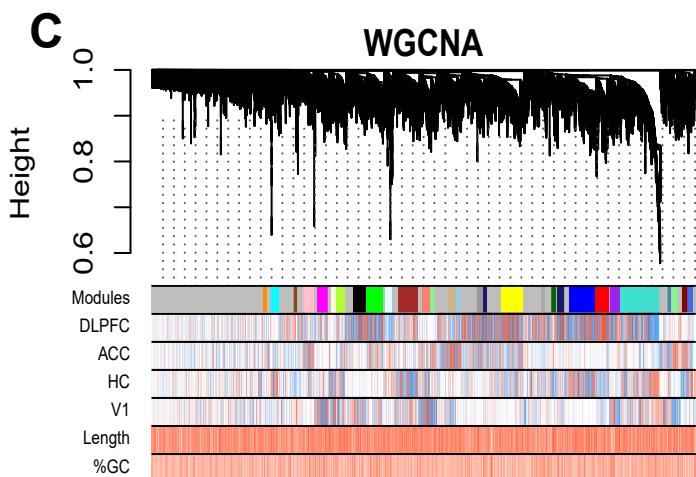
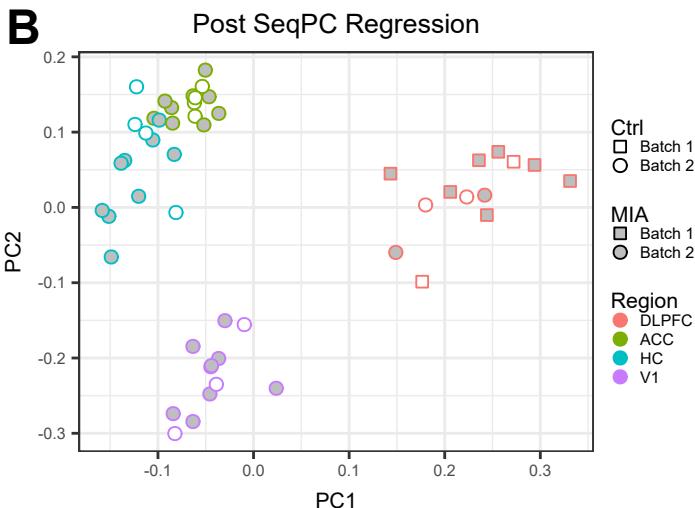
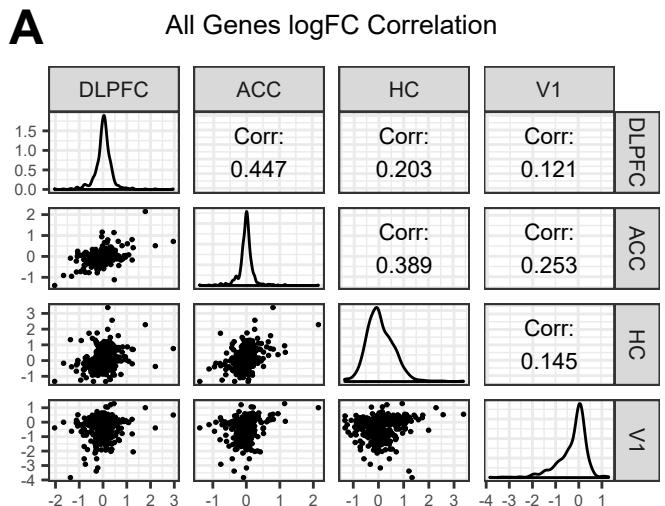


C p<0.05 in 1st Trim MIA & logFC<0.2 in 2nd Trim MIA

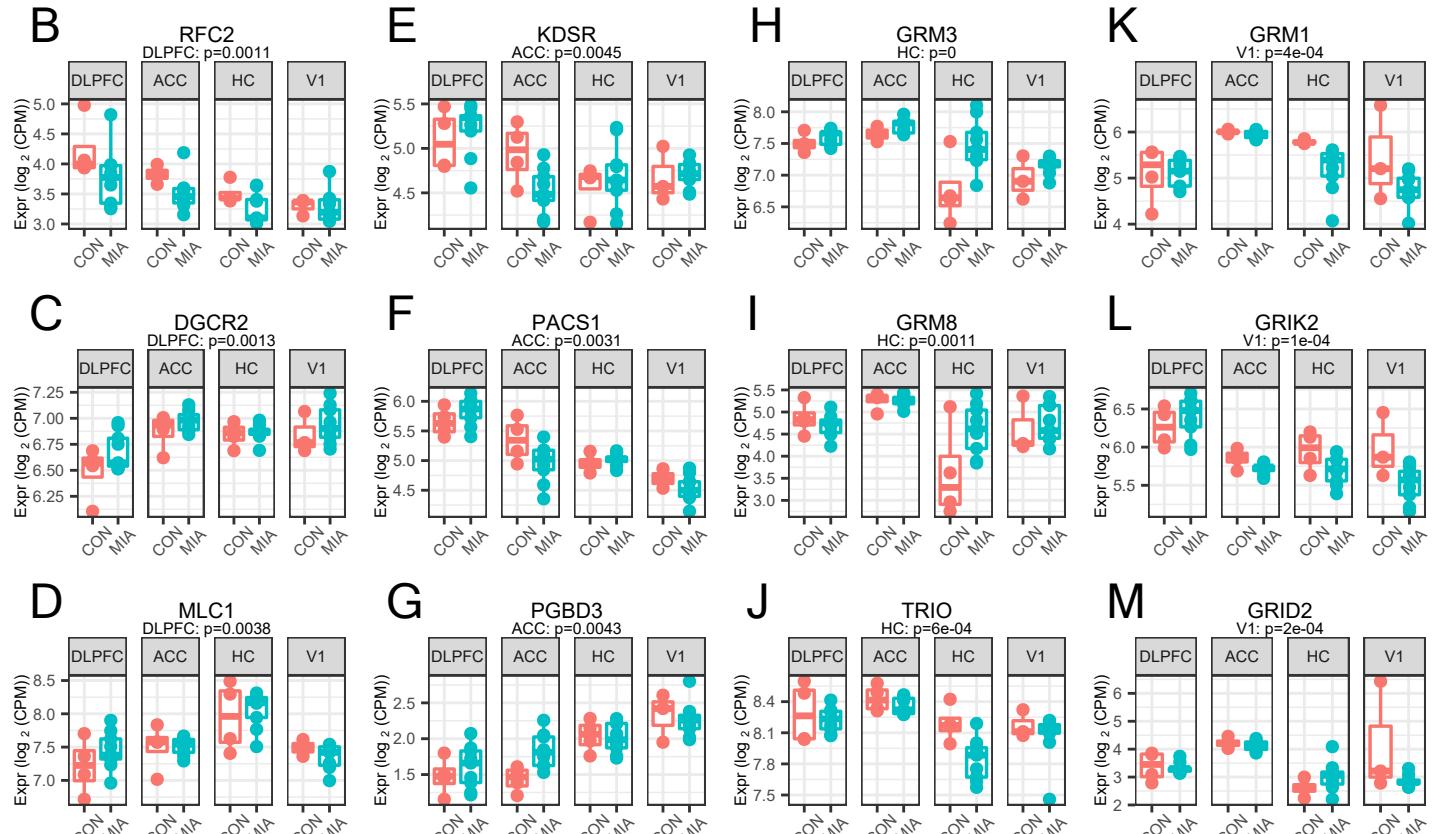
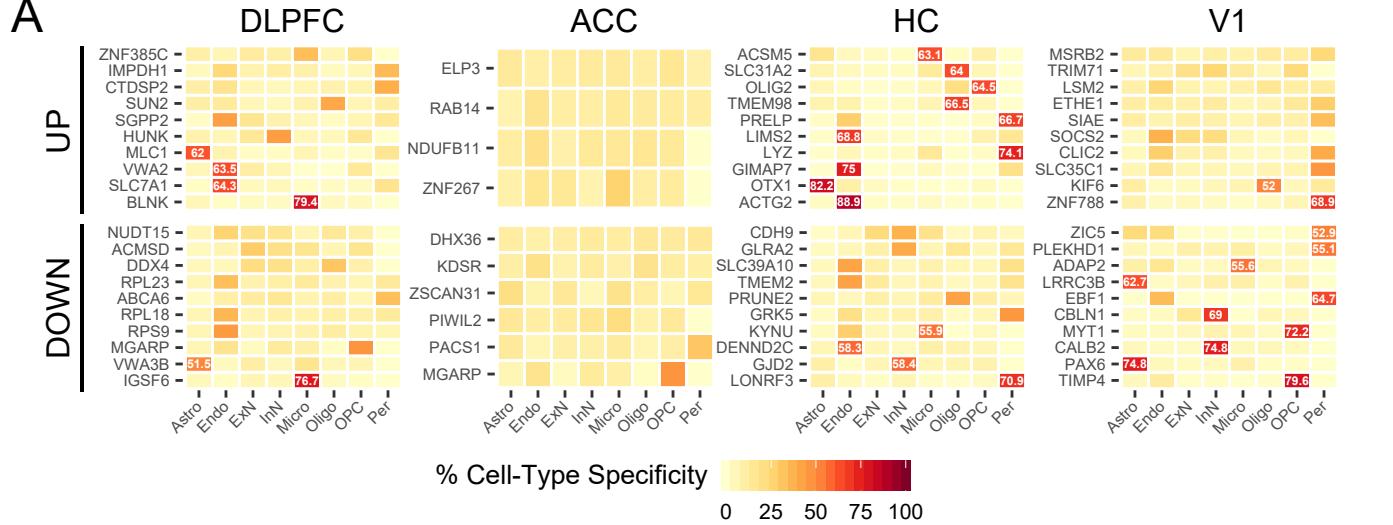


D p<0.05 in 2nd Trim MIA & logFC<0.2 in 1st Trim MIA





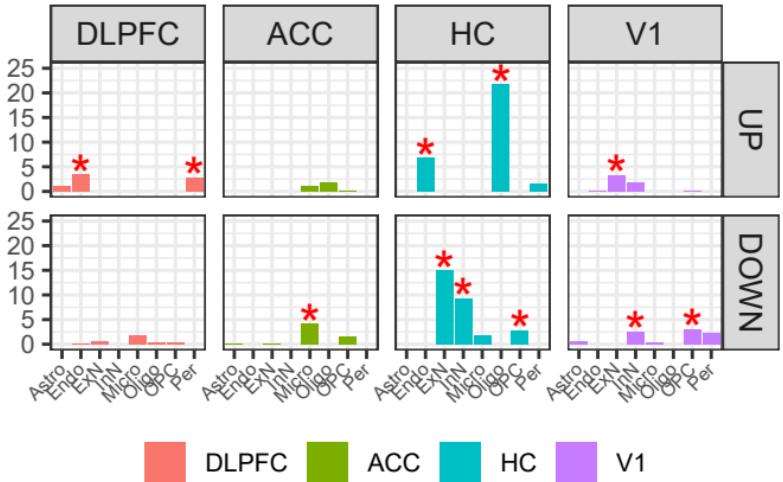
(Figure S4)



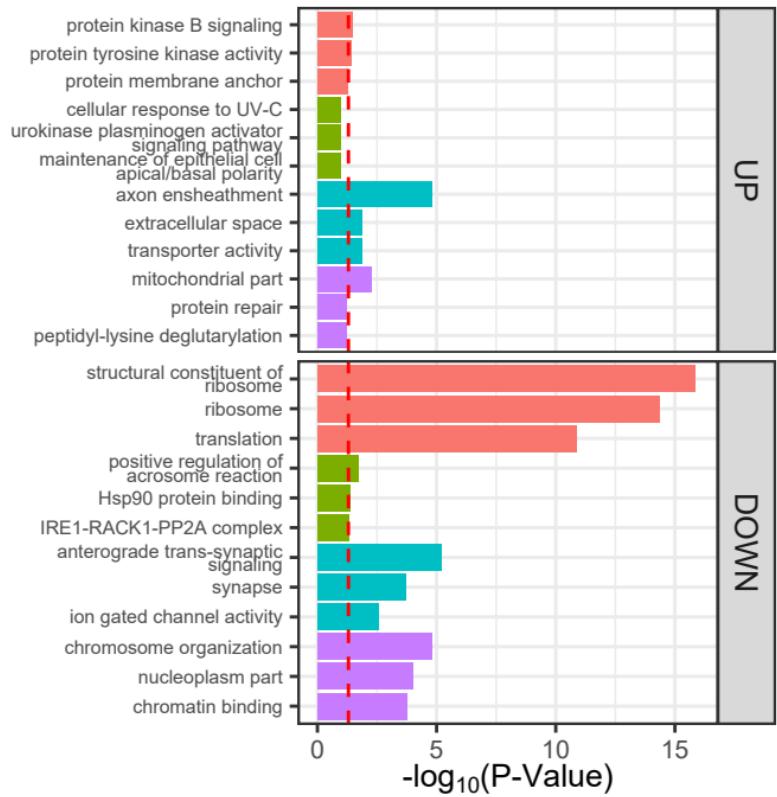
(Figure S5)

A

Cell-type Enrichment from PsychEncode

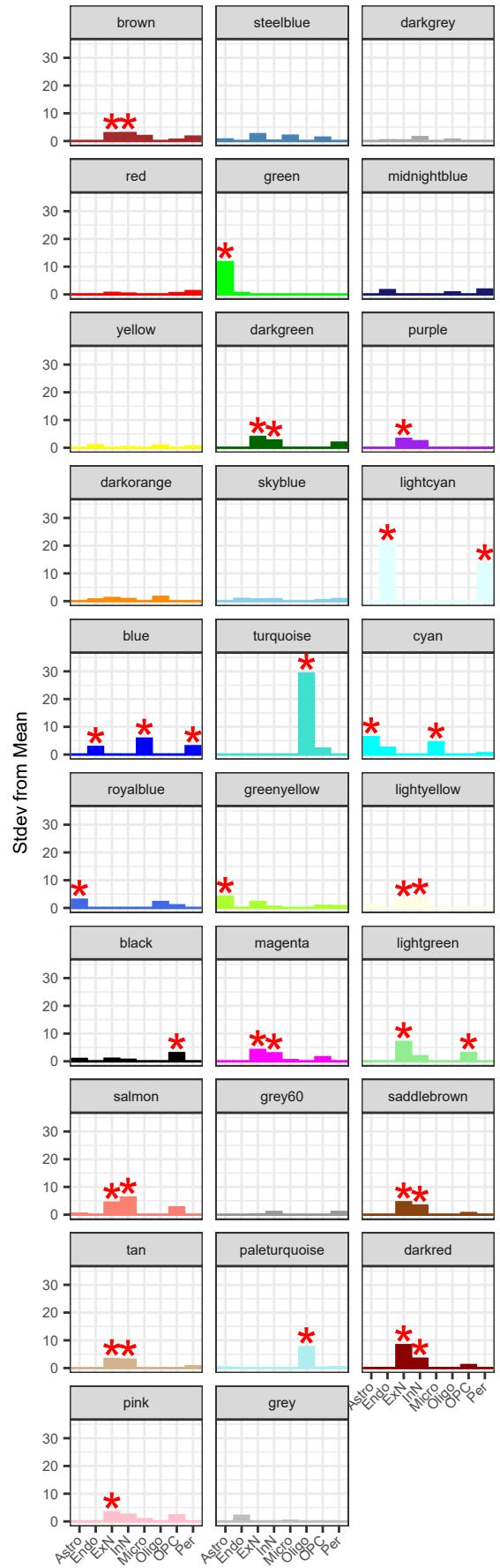
**B**

GO Enrichment



(Figure S6)

A Cell-type Enrichment from PsychEncode

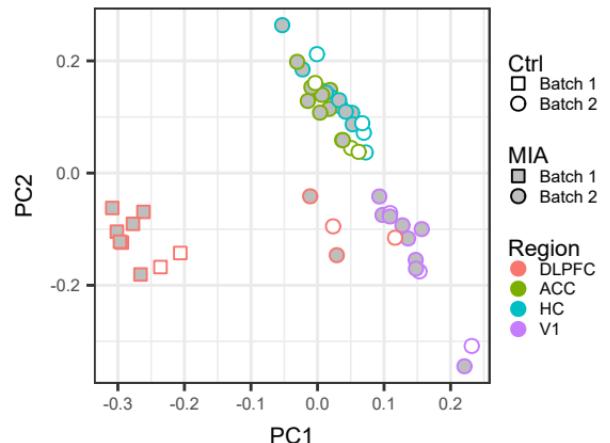


B GO Enrichment

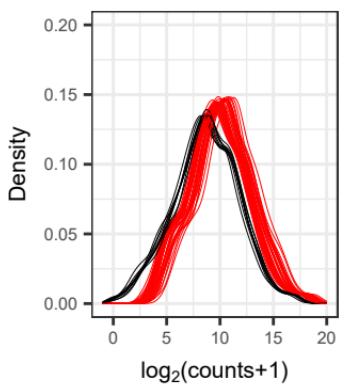


(Figure S7)

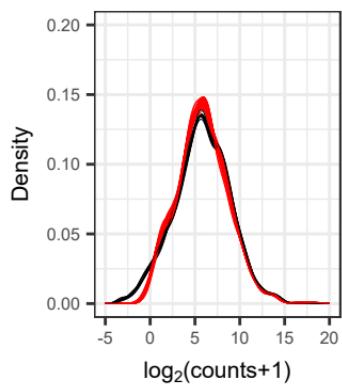
A TE Quality Control



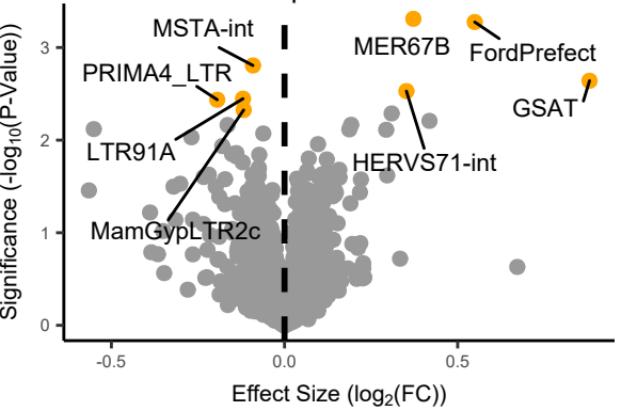
B Pre-Normalization



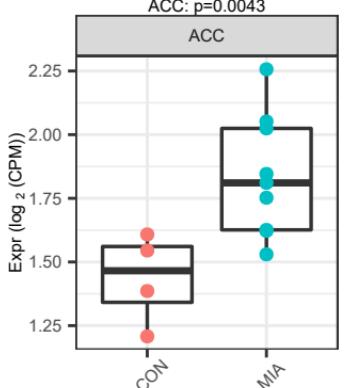
C Post-Normalization



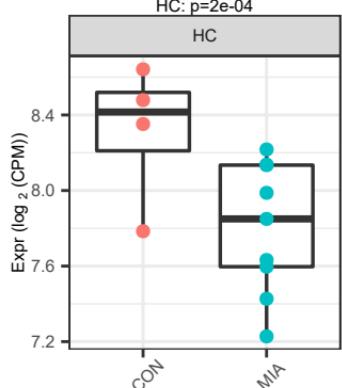
D Global Transposable Element DE



E PGBD3

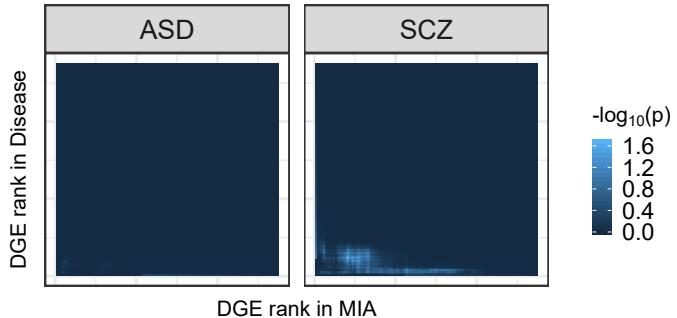


F PGBD5

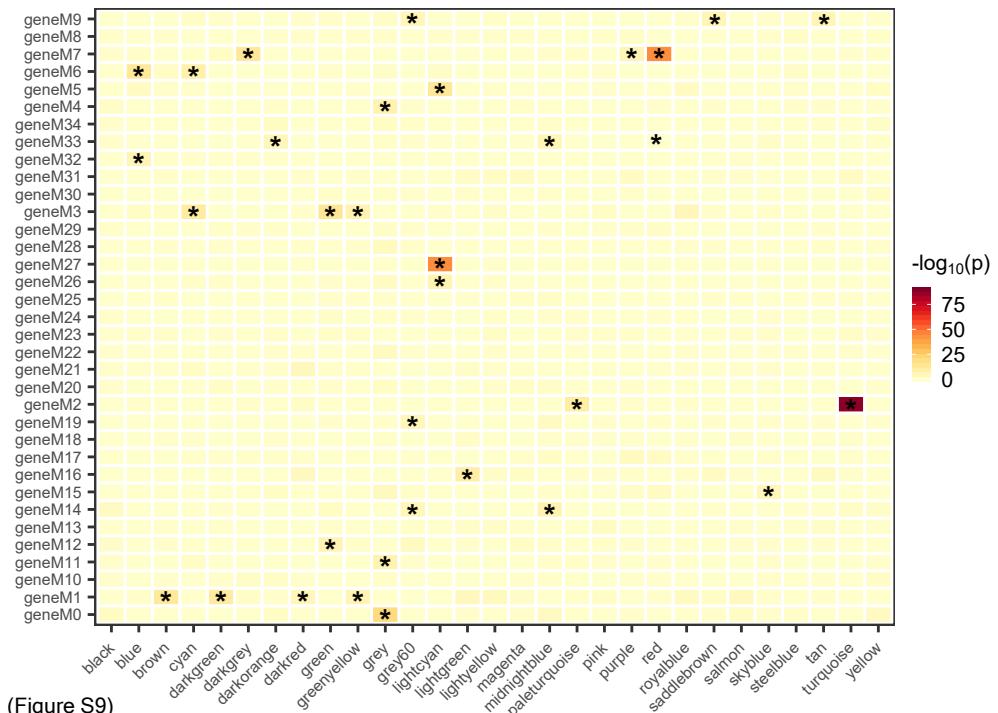


(Figure S8) ● P-val < 0.005 (8 TEs) ● n.s. (1287 TEs)

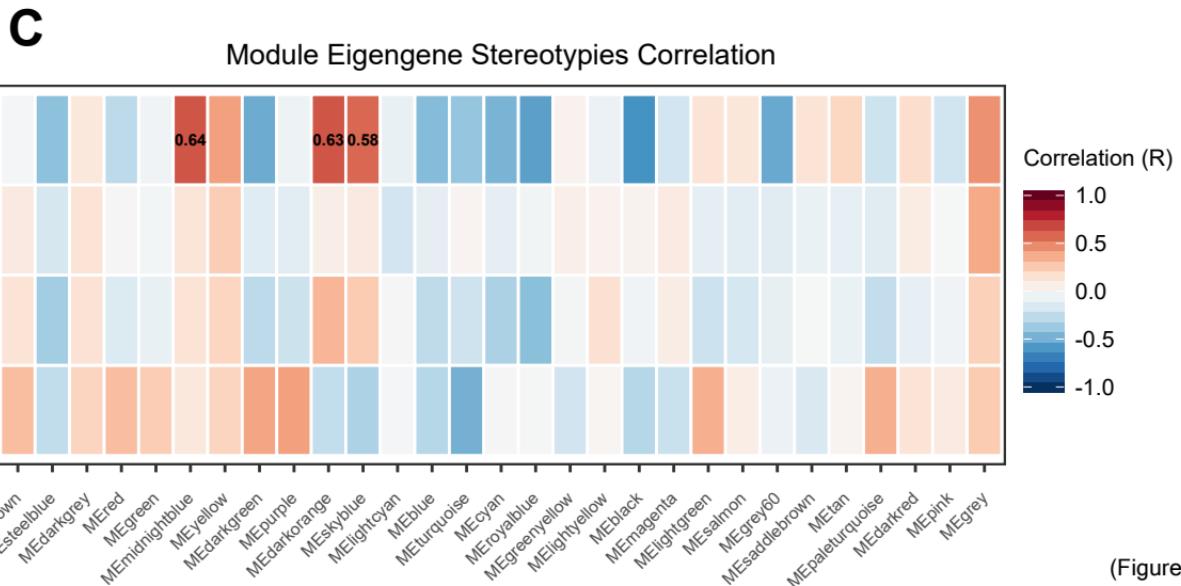
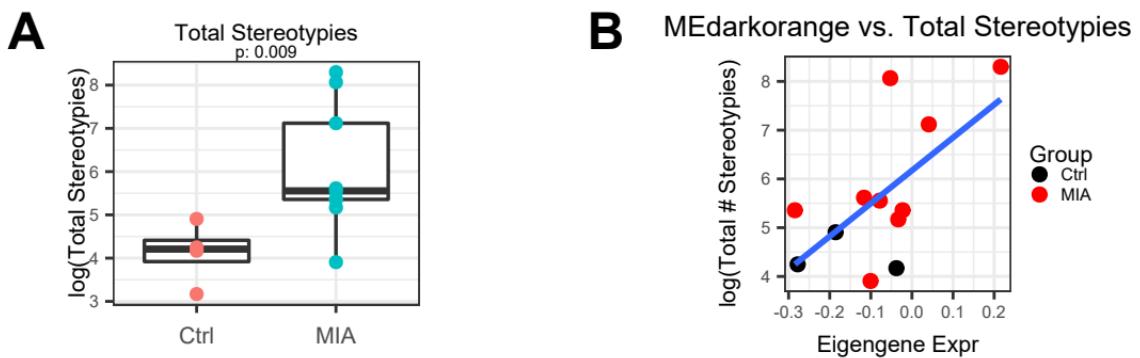
A DLPFC Disease MIA Overlap



B PsychEncode Module Overlap



(Figure S9)



(Figure S10)