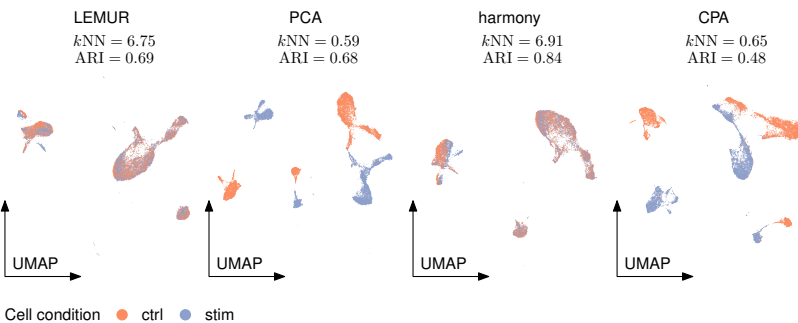
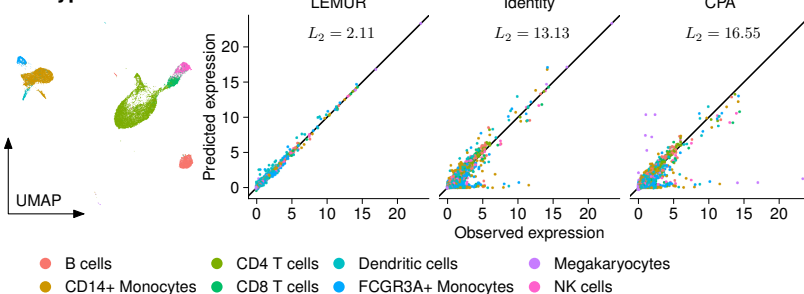


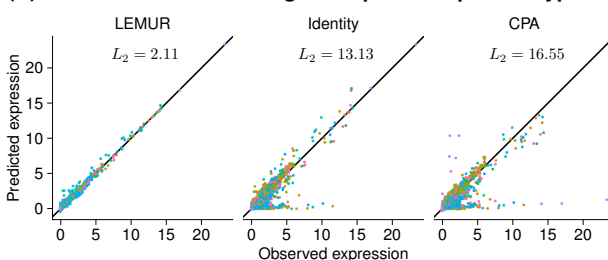
(A) Latent space (Z) of Lupus patient samples treated with IFN- β (Kang)



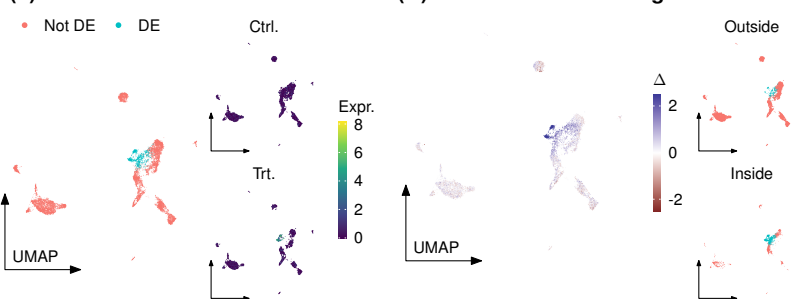
(C) Z colored by cell type



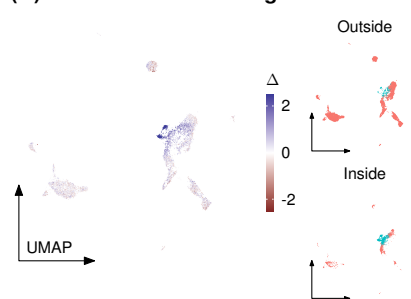
(D) Predicted vs. observed gene expression per cell type



(F) Simulated DE

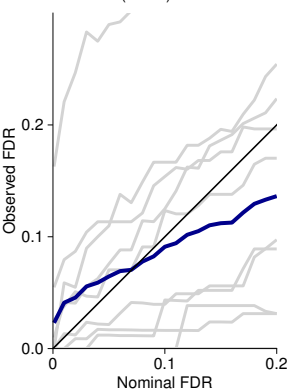


(G) Predicted DE with neighborhood



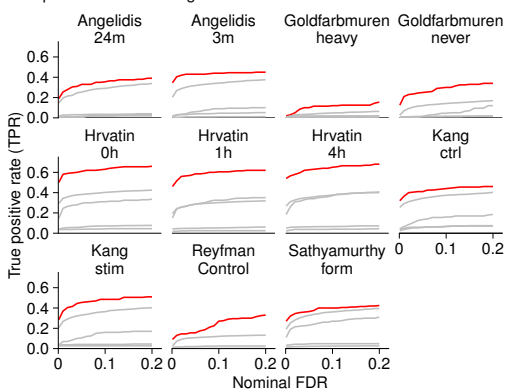
(I) FDR control

Eleven datasets (mean)

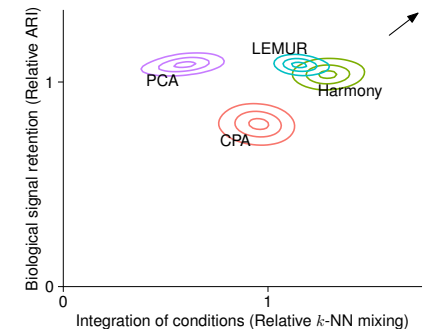


(J) DE-test Power

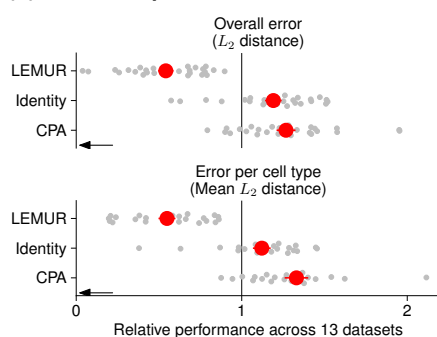
Comparison of LEMUR against four other DE. methods



(B) Integration Performance

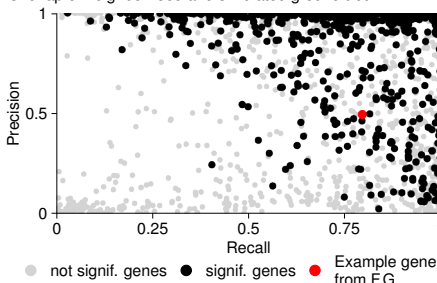


(E) Prediction performance



(H) Neighborhood Precision and Recall

Overlap of neighborhood and simulated ground truth



(K) Power by no. cell with expr. change

Fraction of simulated genes (grey) with min FDR $_g$ < 0.1 (blue)

