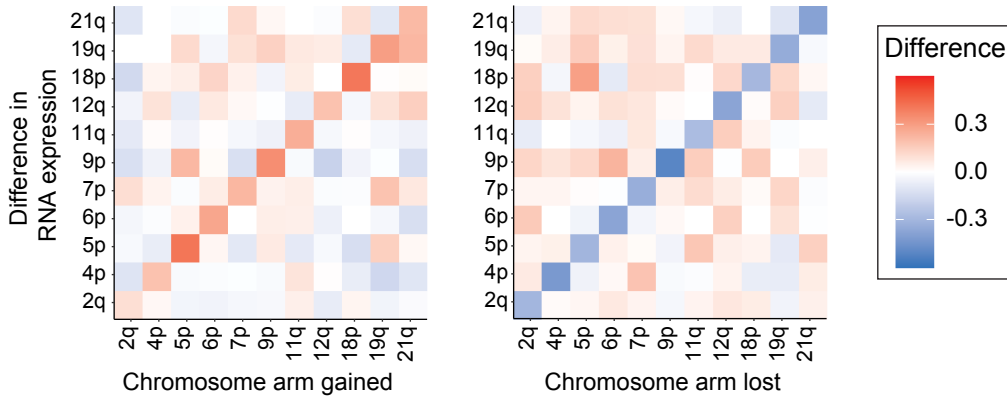# Supplemental Figure S9

A

TCGA Ovarian cancer gene differences
Difference in RNA expresssion upon

chromosome arm gain   chromosome arm loss
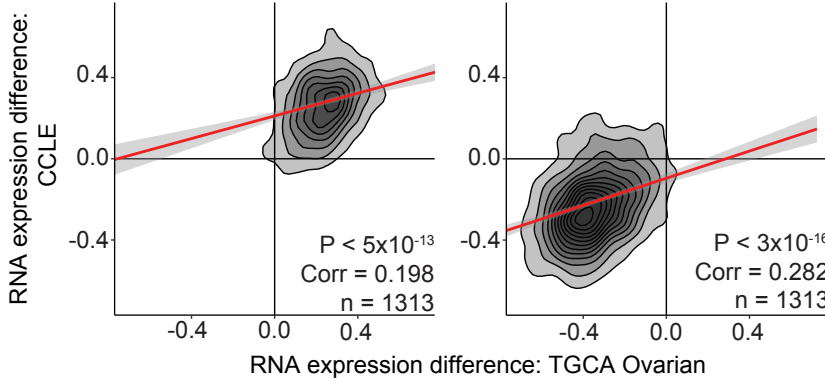
B

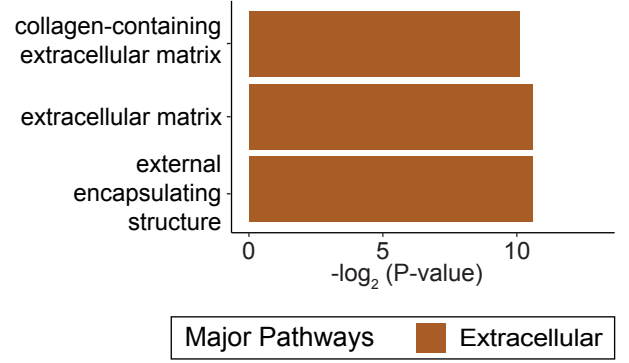Correlation between TCGA and CCLE RNA expression differences

C

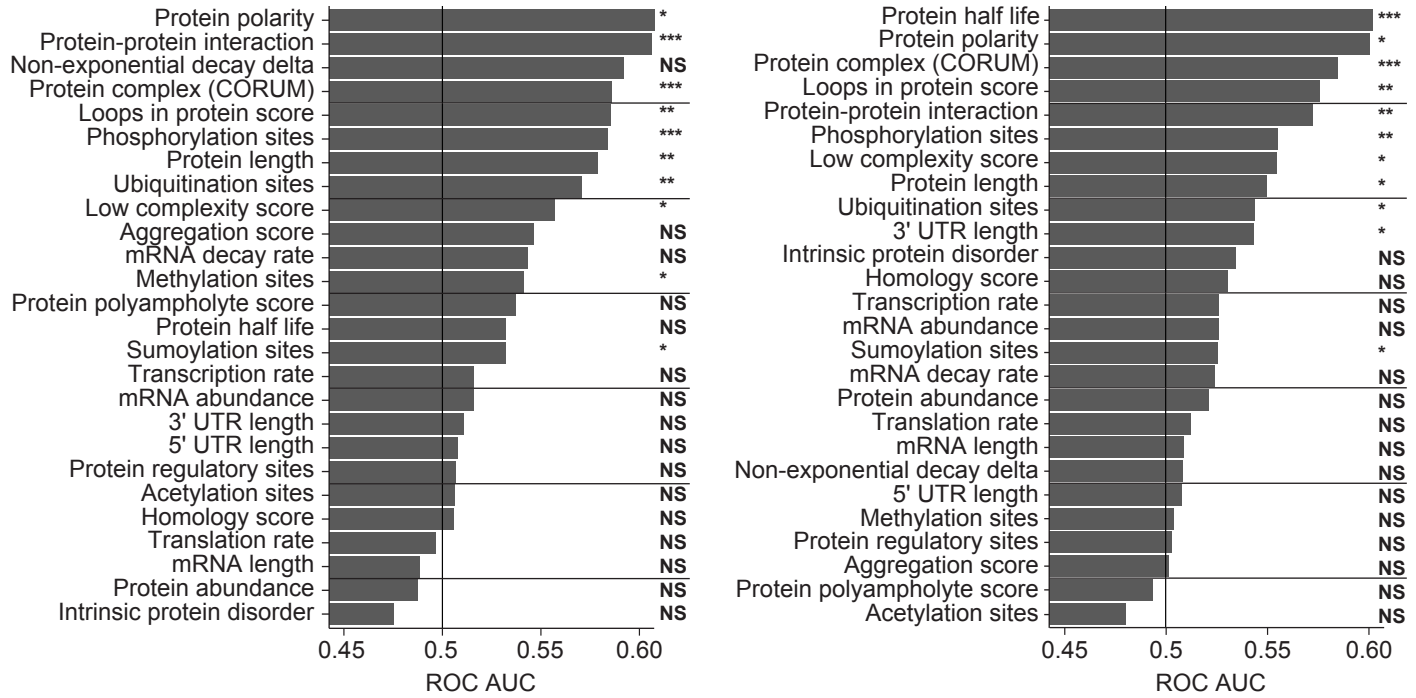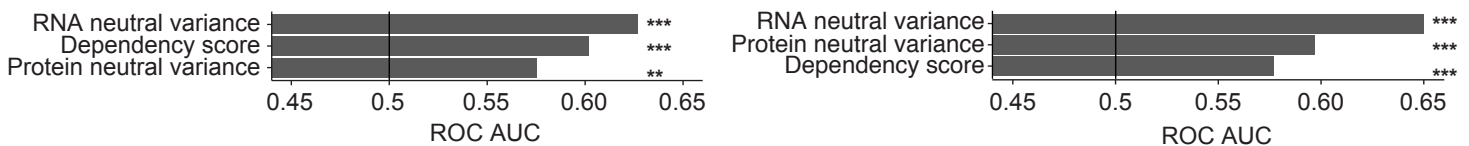Biological terms enriched among buffered RNA, upon chromosome loss

D

ROC AUC for buffering factors in ovarain tumors upon...

ROC AUC for buffering factors in ovarain tumors, CCLE dataset factors

Supplemental Figure S9. Analysis of RNA expression differences and protein buffering factors in ovarian tumors

A) Heatmaps displaying the difference in RNA expression between ovarian tumors with a chromosome arm gain (left) or chromosome arm loss (right) compared to tumors with neutral ploidy for that arm. The mean RNA expression differences per chromosome arm are displayed. Not all chromosome arms had sufficient data for mean expression difference analysis.

B) Density plots comparing the difference in CCLE and ovarian tumor RNA expression differences upon the gain (left) or loss (right) of the chromosome arm the gene is located on. Pearson correlation coefficient and p-value are displayed. Linear regressions (red) with 95% confidence intervals are displayed.

C) Bar graphs displaying the biological terms enriched in ovarian tumor RNA buffered upon chromosome loss, categorized by the major overarching pathway. No terms were significantly enriched for buffered RNA upon chromosome gain.

D) Bar graphs displaying ROC area under the curve values for each independent factor upon chromosome gain or loss. Genes classified as "buffered" upon chromosome gain or loss were set as the true positive fraction. Significance was calculated by performing 10,000 random permutations and bootstrapping p-values, where * <0.05. ** <0.005 and ***<0.0005.