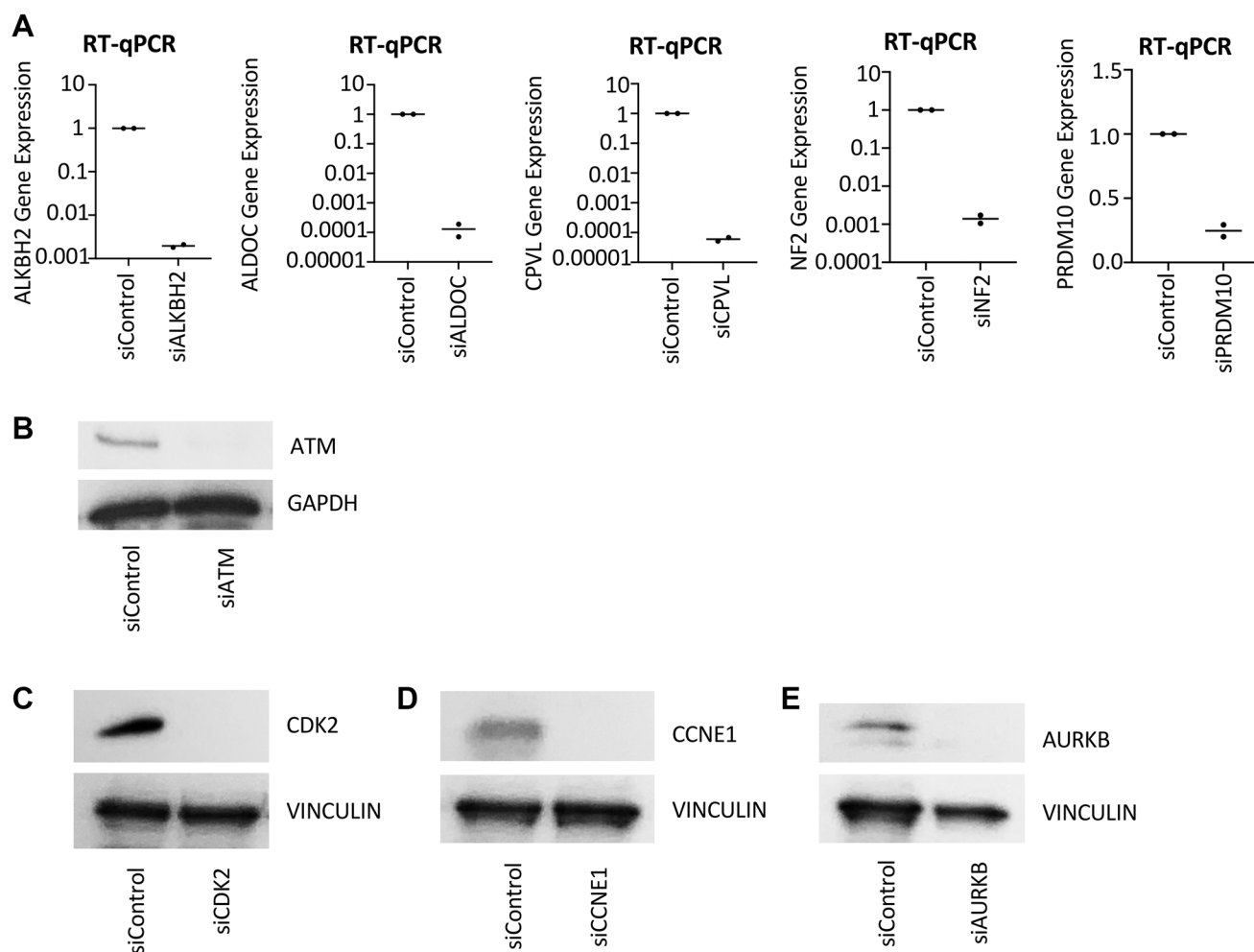


## Complementary CRISPR genome-wide genetic screens in PARP10-knockout and overexpressing cells identify synthetic interactions for PARP10-mediated cellular survival

### SUPPLEMENTARY MATERIALS



**Supplementary Figure 1: Confirmation of gene knockdowns.** (A) RT-qPCR experiment showing reduction in mRNA levels for ALKBH2, ALDOC, CPVL, NF2 and PRDM10 upon siRNA-mediated knockdown. The average of two technical replicates is shown. (No antibody was available to us for verifying the depletion by Western blot.) (B–E) Western blots showing the depletion of ATM (B), CDK2 (C), CCNE1 (D) and AURKB (E) upon siRNA treatment in HeLa cells.

**Supplementary Table 1: MAGeCK analyses of the CRISPR screens identifying genes necessary for proliferation of PARP10-overexpressing MCF10A breast epithelial cells.** Supplementary Table 1

**Supplementary Table 2: MAGeCK analyses of the CRISPR screens identifying genes necessary for proliferation of PARP10-knockout HeLa cells.** Supplementary Table 2

**Supplementary Table 3: The source data underlying each of the figure panels, including: the values plotted in graphs, the exact *p*-values, and the uncropped blots.** Supplementary Table 3