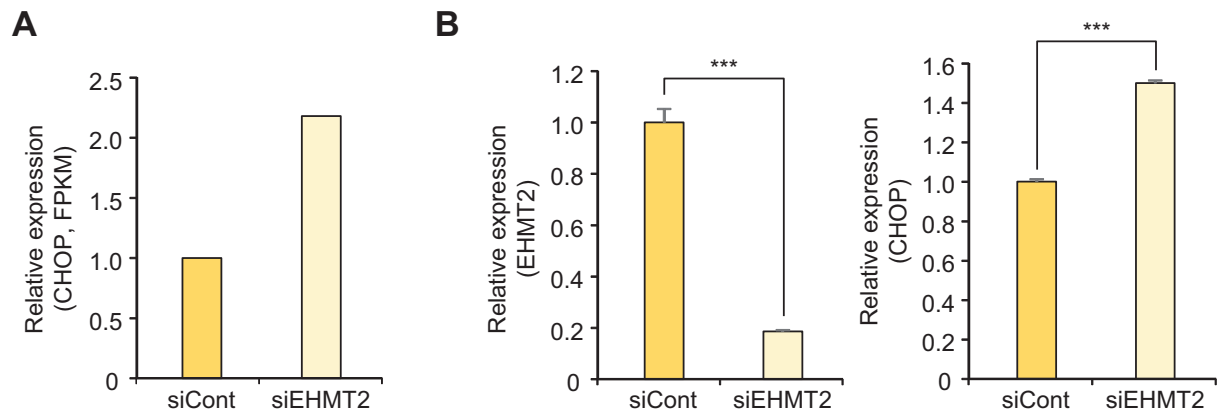
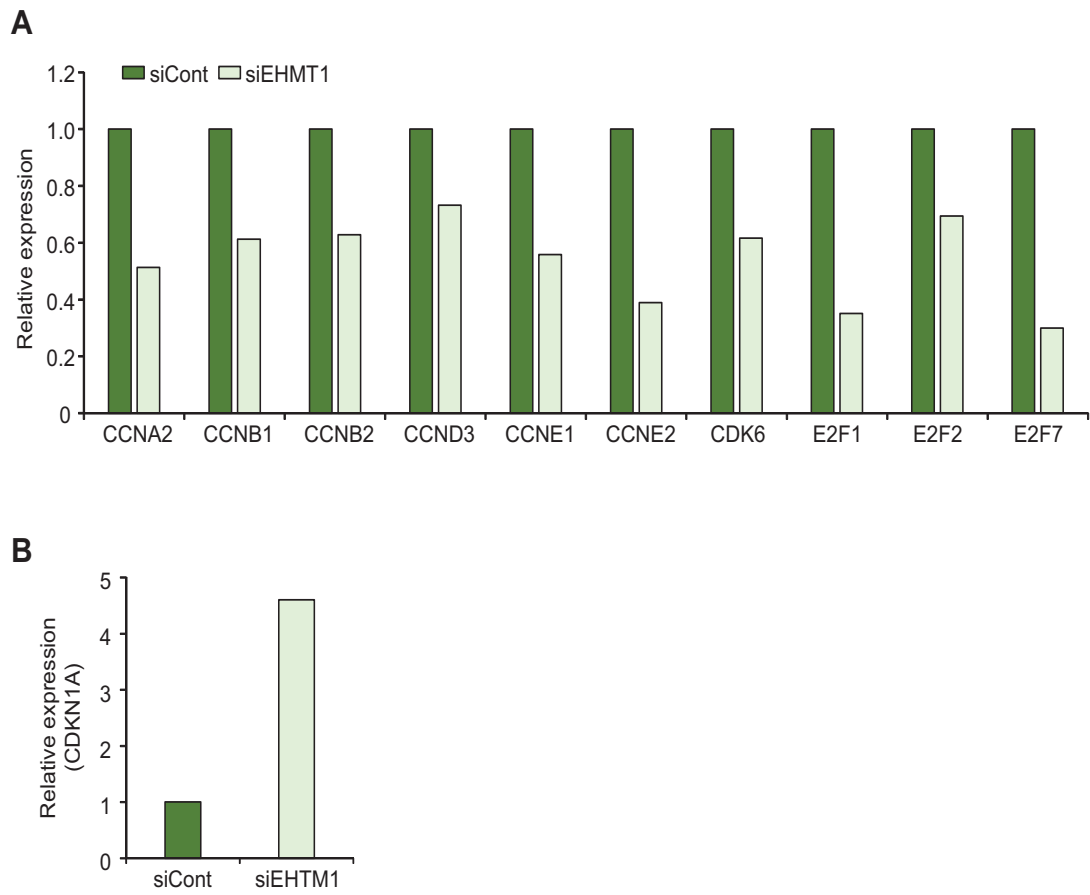


**Supplementary Fig. S1. EHMT1 knockdown did not upregulate the ER stress-related markers GRP78 and ATF4.** (A and B) qRT-PCR analysis of GRP78 (A) and ATF4 (B) after treatment with siEHMT1 in HCT116 (left) and HT-29 (right) cell lines. The mean  $\pm$  SD of three independent experiments is shown. *P* values were calculated using Student's *t*-test (\*\**P* < 0.01; \*\*\**P* < 0.001; n.s., not significant).



**Supplementary Fig. S2. EHMT2 knockdown upregulates CHOP expression in HCT116 cell lines.** (A) RNA-seq analysis of CHOP after treatment with siEHMT2 in HCT116 cell lines. (B) qRT-PCR analysis of EHMT2 (left) and CHOP (right) after treatment with siEHMT2 in HCT116 cell lines. The mean  $\pm$  SD of three independent experiments is shown. *P* values were calculated using Student's *t*-test (\*\*\*)  $P < 0.001$ .



**Supplementary Fig. S3. EHMT1 knockdown regulates cell cycle related genes in HCT116 cell lines.** (A) RNA-seq results of CCNA2, CCNB1, CCNB2, CCND3, CCNE1, CCNE2, CDK6, E2F1, E2F2, and E2F7 after treatment with siEHMT1 in HCT116 cell lines. (B) RNA-seq results of CDKN1A after treatment with siEHMT1 in HCT116 cell lines.