



**Supplementary information, Figure S5** Smek increases binding of HDAC1 to Tcf protein.

(A) ESCs were transiently transfected with Flag-Smek1, Flag-Smek2, HA-Tcf3, or control plasmids, and lysates were immunoprecipitated with anti-HA antibody and probed by Western blot with anti-HDAC1, Flag, and HA antibodies. (B) ESC lines expressing control or *Smek1/2* shRNA were transiently transfected with plasmids encoding HA-Tcf3. Nuclear extracts were immunoprecipitated with anti-HA antibody. HDAC activities in HA-Lef1 immunoprecipitates were measured using a fluorescence-producing substrate with or without TSA and normalized to the activity of anti-HDAC1 immunoprecipitate. Data are presented as the mean  $\pm$  S.D. of three independent experiments.