

**Supplemental Fig S1. PIP-seq protocol schema.** Shown is an illustration of the PIP-seq assay protocol as previously described (Li et al. 2013). In short, cells are cross-linked with formaldehyde and treated with potassium permanganate. They are then lysed and sonicated to fragment sizes between 200-500 bp. An Illumina-compatible adapter is then ligated to the ends after end-repair and A-tailing. The sample is then eluted from the antibody and crosslinks arereversed. Piperidine is then used to cleave oxidized thymines. Strands are denatured and a primer is annealed to the adapters, followed by second-strand synthesis (primer extension). A second adapter is subsequently ligated to the piperidine-cleaved end, via A-tailing. The resulting library is then quantified and sequenced.