



**Figure S5 Mrg-binding motif is required for Cap-H2-mediated axial compaction.** (A-E) Kc cells transiently expressing EGFP (A), Cap-H2-EGFP (B), Cap-H2-MBM-EGFP (C), Cap-H2- $\Delta$ C23-EGFP (D), or Cap-H2- $\Delta$ C23-MBM-EGFP (E) labeled with FISH probes for two chromosome 2L loci, chromosome 2L probe 1 (2L1, red) and chromosome 2L probe 2 (2L2, green). Scale bar, 2.5  $\mu$ m. (F) Pairwise distances were measured for 2L1-2L2 FISH probes ( $n = 60$ ). \* $p < 0.05$ , \*\* $p < 0.01$ , two-tailed student's t test. P-values correspond to statistical significance relative to control, except where indicated by horizontal lines. Asterisks located above horizontal black line indicate significance between cells expressing Cap-H2-EGFP or Cap-H2- $\Delta$ C23-EGFP and the corresponding MBM mutant. Error bars, s.e.m.