



Figure S4 Spd1 protects cells from division and mutation during dNTP imbalance (refer to Figure 7). **A.** On YES medium, *spd1 Δ* cells withstand high doses of EdU and BrdU. DMSO is a vehicle control for EdU. Note that wild-type (*wt*) *hsv-tk⁺ hENT⁺* cells were also resistant to 50 μ M thymidine on rich media. **B.** Strains (FY 2317, 3454, 6427, 5030, 5031, 5150, 5149, 5148) were streaked onto supplemented EMM with thymidine, BrdU or EdU to assess growth on plates. *spd1 Δ hsv-tk⁺ hENT⁺* cells formed some large colonies, but also a background of small colonies, also seen for *cds1 Δ hsv-tk⁺ hENT⁺*. **C.** Immunofluorescence of *spd1 Δ hsv-tk⁺ hENT⁺* cells, after 2h BrdU treatment for nuclei (DAPI), BrdU incorporation, phospho-histone H2A (p-H2A), and merged BrdU/p-H2A. Scale 10 μ m. **D.** Addition of 2 mM thymidine over prolonged periods in non-incorporating wild-type (*wt*), *wt* and *spd1 Δ hsv-tk⁺ hENT⁺* cells (Inc). The 1C and 2C DNA content peaks are indicated; G1 arrest causes a shift toward the 1C peak.