



Figure S4: Desthiobiotinylated nucleotides provide an alternative purification method involving elution from the streptavidin beads. At high concentrations, the magnetic streptavidin beads used for library enrichment can inhibit PCR. To overcome this, desthiobiotinylated nucleotides that could be eluted from the beads were tested as an alternative to biotinylated nucleotides. Desthiobiotin is an elutable biotin derivative with reduced affinity for streptavidin. Desthiobiotinylated DNA was eluted by resuspending beads in 10 μ L of 0.11 mg/mL biotin in water. After 20 minutes, supernatant with desthiobiotinylated DNA was collected from the beads. **A)** Desthiobiotin-aminoallyl-dCTP (TriLink Biotechnologies) did not provide as good library enrichment as biotin-dUTP. **B)** Desthiobiotin-aminohexyl-dATP (Jena Bioscience) provided slightly better library enrichment than biotin-dUTP.