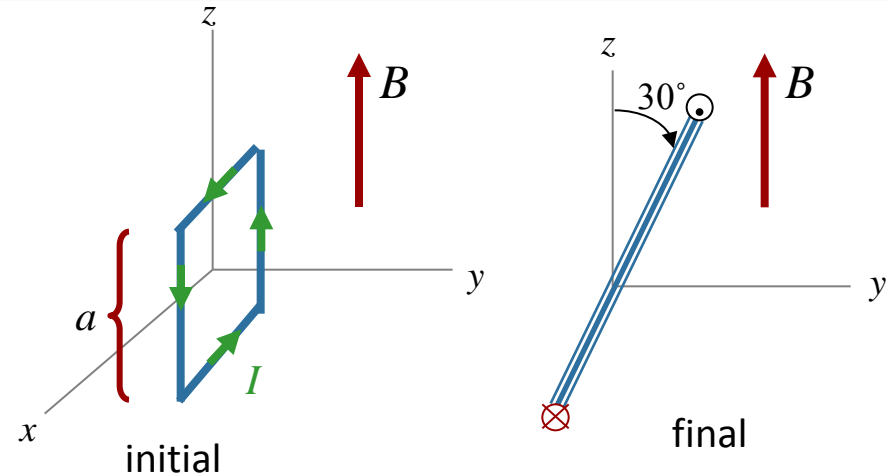# *Calculation*

A square loop of side a lies in the $x{-}z$ plane with current I as shown. The loop can rotate about x axis without friction. A uniform field B points along the $+z$ axis. Assume a, I, and B are known.

initial

final

What is the direction of the torque on this current loop in the initial position?

A) $+x$ B) $-x$ C) $+y$ D) $-y$