Magnetic Force on Armature (Formulas Combines):

Calculating Force On The Armature

Reference: [How much electric current would you need to use a railgun to launch a package up to the ISS? (uio-ccse.github.io)](https://uio-ccse.github.io/computational-essay-showroom/essays/exampleessays/railgun_TOO/Railgun_V1_9.html)

Cross Sectional Area of a Wire

Calculating Resistance In Circuit:

Calculating Amperage In Circuit:

Therefore, the amperage of the circuit will be: