

# Physics 1214 - General Physics II

## Quiz #14 - 2013.02.22

### Solutions

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1. If the inductance  $L$  of an inductor is increased for a given fixed current, will the inductor store more or less energy, and why?

Since  $U = \frac{1}{2}LI^2$ , if  $L$  is made larger, then  $U$  is as well (assuming  $I$  is fixed).

2. Where is the energy stored in an inductor?

Energy is stored in the magnetic field within the conductor.