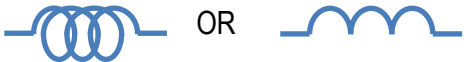
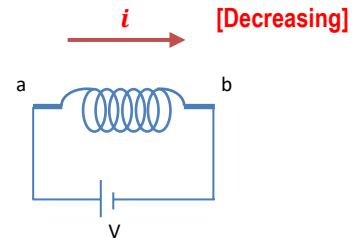
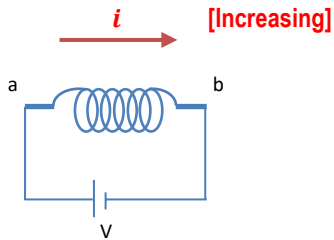
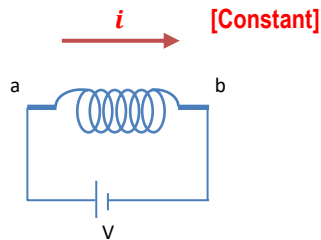


CONCEPT: INDUCTORS IN CIRCUITS

- A coil of wire placed in a circuit is known as an INDUCTOR →  OR
- Because inductors are circuit elements, we use Kirchhoff's Rules on them as we go around in a circuit.

- Remember: Inductors only do something if the current is [**CONSTANT** | **CHANGING**] → $\mathcal{E}_L = \underline{\hspace{2cm}}$



- Use Lenz's Law to find the **direction** of the induced EMF.
 - If the direction of the induced EMF points along your Kirchhoff Loop, the voltage is [+ | -]

EXAMPLE: Write out Kirchhoff's Loop rule for the following circuit, assuming the battery's voltage is increasing.

