

Colored Springs

Estimated Time for Activity: ~5 minutes

Optional Objectives:

The students will:

- Understand the concept of the restoring force
- Understand the meaning of the spring coefficient
- Gain insight into simple harmonic motion

Materials:

- Ring stand
- Assortment of springs
- Masses

Optional Vocabulary:

- Spring constant
- Restoring force
- Newton

Procedures:

- Spring constant
 - Place two different springs on the ring stand and let the students know the spring constant.
 - *Optional:* Ask the students if the same mass was placed on each spring, which will stretch more?
- Harmonic motion
 - Place mass on spring, let it drop, and watch the mass oscillate up and down.
 - Optional: Ask about period frequency.