

# Let's All Do The Wave!

## Student Version

### Materials, Preparation, and Procedures

#### Materials and Preparation:

- Access to the internet. You will be referencing at least one video:  
[Arthropod Locomotion: Engineering](#) [Under Topics click on Other Topics, click on Arthropod Locomotion: Engineering. (7:15 minutes)]
- Access to graph paper or even better a white board or set of white boards.

#### Procedure:

1. Watch the video [Arthropod Locomotion: Engineering](#) (or other video showing wave-like motion in animals).
2. Get into small groups to discuss benefits of this type of motion from an evolution and survivability standpoint.
3. Come up with characteristics to compare and analyze the motion of animals and share with the class.
4. Decide as a group what type of animal you want to analyze (example: up down motion of inchworms, slithering of snakes, etc.).
5. Research the characteristics of one animal of the chosen movement type.
6. Calculate chosen comparison characteristics and post data onto a data table.
7. Plot the data on a piece of graph paper and on a whiteboard to display for the class.
8. Analyze the plotted results and come together as a class to determine if there is a correlation between the comparison characteristics.
9. Discuss the possible uses of this analysis in the creation of technology that requires locomotion.