**Why Cockroaches Survive**

The success of the cockroach has been attributed to a variety of innate characteristics including:

* Adaptability. It is an incredibly adaptive insect, having adjusted to the changes of the earth and its inhabitants for these hundreds of millions of years. Most recently, not only adjusting to life with humans, but using our homes, businesses, and food as their own.
* Diet. Cockroaches will eat just about anything. They prefer food sources such as starches, sweets, grease and meat products, but they will also eat cheese, beer, leather, glue, hair, starch in book bindings, flakes of dried skin or decaying organic matter (plant or animal) - even wallpapers and stamps, primarily because of the glues on them.
* Size. Because cockroaches are so small - especially the German cockroaches - they can hide and make their homes in the tiniest of cracks, or squeeze through these to build a vast population behind a wall. They may be found under refrigerators, stoves, false bottoms in kitchen cabinets, in the backs of cabinets and in crevices between baseboards and floors or cabinets and walls. They may also be found behind pictures or within electronic equipment.
* Nocturnal. Cockroaches spend the daylight hours in these dark, secluded sites then venture out at night in search of food and water. Thus, populations can build to large numbers before they are sighted.
* Reproduction. Cockroaches produce their eggs in capsules which they then carry or carefully place. Each capsule can contain up to 40 eggs and produce up to 400 offspring in one year, depending on the species. The hatched eggs then have a relatively short time to maturity and their own ability to reproduce and carry on the population.
* Variation. While most cockroaches prefer sites close to moisture, some species, such as the [brown-banded cockroach](https://www.thespruce.com/cockroaches-could-be-in-your-home-2656705) can live for many days without water, thus it can often be found in dry areas where others rarely venture.

All that said, because cockroaches cannot exist entirely without water and most need daily consumption, according to a University of Rhode Island fact sheet, the availability of water is the single most important factor in determining the cockroach's survival.

Information taken from: <https://www.thespruce.com/why-cockroaches-survive-2656706>

**What does it take to Survive Project!**

This quarter, you will be learning about different people who had to survive. Europeans, Africans, and Native Americans had to fight to survive as their worlds came together. You will apply the lesson you learn in class and as you read at home to your own life.

**The project:** This quarter, you will be writing a Middle School Survival Guide for 7th graders.

**This guide must include:**

* + At least 15 tips to survive Middle School (Each tip should take 3-4 sentences to explain)
  + At least SEVEN of your tips have to connect to something you learned this quarter (These seven should have more sentences)
  + Your guide should be typed up
  + You can receive extra credit if your guide includes pictures

Due Date: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_