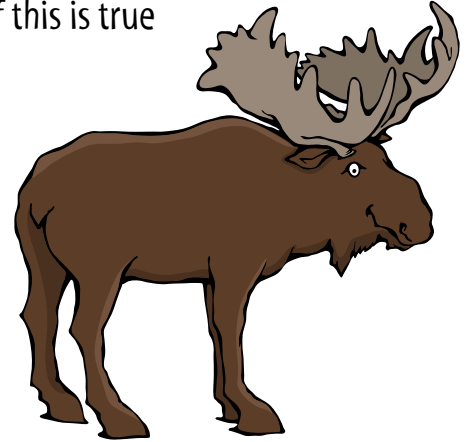


Moose Freezing Race

What you'll need!

- Several different sized plastic containers with lids:
(i.e.: a film canister; prescription vial; chip dip container; yogurt container; 2 liter pop bottle)
- Freezer or a cold winter day

Moose are large animals that live almost half their lives in freezing temperatures. Bigger animals do not lose body heat as quickly as smaller ones, so they are more efficient in cold temperatures. Find out if this is true for other things as well.



What you do:

1. Fill each container with water. The water temperature should be the same.
2. Set all the containers outside on a freezing winter day, or put in your freezer.
3. Make sure there is as little air as possible left in the containers and seal them.
4. Check them every half hour or hour to watch for changes.



Ask yourself

- Which containers freeze first, second, etc?
- Why do you think this is?
- Place the containers in the order of when they freeze solid.
- What do you notice once they are all lined up?
- Why is the moose such a large animal?

Moose Freezing Race

What did you find out?

You will notice that the smaller containers will freeze first and burst their lids long before the larger containers do. This happens because a larger volume of water, or any other substance, is better at retaining heat than a smaller one. That is why northern animals tend to be larger than southern ones. Moose know this, and now so do you!

Specific Learner Expectations (SLE)

Grade 1 Topic E: Needs of Animals and Plants.

SLE 9: Recognize that some plants and animals must adapt to extreme conditions to meet their basic needs: e.g., arctic and desert plants and animals.