Find Your Pace
Activity Guide

GLOBE Observer

From **The GLOBE Program**, Investigation Instruments, Determining Your Pace

Overview
Each participant discovers the length of her or his own individual pace (while one pace equals two steps) by taking ten paces three times and finding the average of those three trials. Then participants count paces to experience the distance of 50 meters.

Purpose
For participants to develop a personal sense of the length of 50 meters, which is one side of the area to be observed using GLOBE Observer's Land Cover protocol

Time
15 minutes

Materials
- Tape measures (50 meters or 164 feet) - one for every three or four participants
- Pacing Record - one copy for each participant
- Masking tape

Note to Educators
This activity can be done by pairs of participants: one person doing the pacing and the other person helping with measurements.

Background
When app users conduct a GLOBE Observer Land Cover classification, they will need to identify a space for observation that has 50 meters of clearance in each direction. When implementing the protocol, they may not always have an opportunity to measure the 50 m area with a tape measure. Becoming familiar with how far 50 m is by pacing can help them in successful implementation of the protocol.
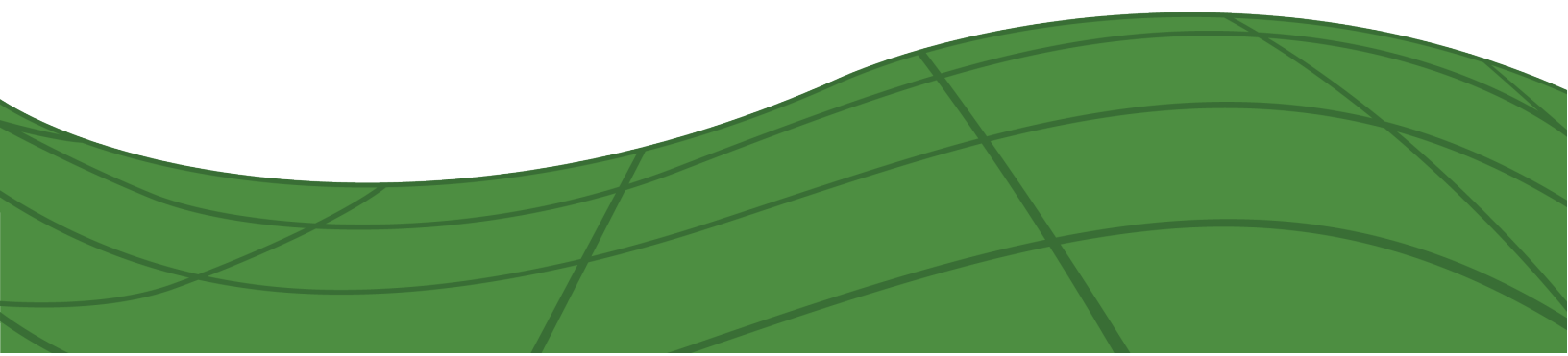
A pace is equal to two steps.

Preparation

- Identify an open flat space such as a hallway or parking lot where participants can pace (walk) about 30 ft.
- Mark the starting point for pacing by putting a piece of masking tape across the floor.
- Make enough copies of the Pacing Record for each learner to have one.

Steps

1. Explain the activity, letting participants know that they will be finding the length of their own individual pace, which is two steps. Distribute the Pacing Record sheets.

2. Ask each participant to walk in a normal, comfortable manner for ten paces (20 steps). They should begin their pacing with their toes on the center of the starting point (marked by masking tape).

3. They should then mark the end point of the ten paces with masking tape, measure the distance from the center of the starting point masking tape to the center of the end point masking tape, and record the distance they have walked on their Pacing Record.

4. Have them repeat the pacing and measuring two times so they will have three trials, three sets of measurements.

5. Ask each participant use their Pacing Records to determine their average pace.

6. Have participants determine how many paces it will take to go 50 m, and take that number of paces. The number of paces required to go 50 m will be 50 divided by their average pace.

Pacing Record and Worksheet

You can estimate distances by finding your average pace (two steps). To find your pace length, walk 10 paces (20 steps) and measure the distance that you walk. Then divide this number by 10. Repeat this process 3 times and find the average of your calculations.

Once you know your average pace, you can find an unknown distance by counting your paces and then multiplying by your pace length. To walk a known distance, divide the distance by your pace length. The resulting number is how many paces you need to take in order to walk that distance.

Example
Finding Your Average Pace Length

Trial	Distance Achieved in 10 Paces		Distance Divided by 10
1	7.01 m (23 ft)	÷ 10	0.7 m (2.3 ft)
2	6.2 m (20.3 ft)	÷ 10	0.62 m (2.03 ft)
3	6.8 m (22.3 ft)	÷ 10	0.68 m (2.23 ft)

Total	2 m (6.56 ft)
	÷ 3
Your Average Pace Length	0.67 m (2.19 ft)

Finding the Number of Paces in 50 Meters

Known Distance	50 m
Your Average Pace	÷ 0.67 m
Number of Paces to Reach 50 Meters	74.63

If your average pace length is 0.67 m (2.19 ft), you would need to walk about 75 paces to reach 50 meters.

Your Turn
Finding Your Average Pace Length

Trial	Distance Achieved in 10 Paces		Distance Divided by 10
1		÷ 10	
2		÷ 10	
3		÷ 10	

Total	
	÷ 3
Your Average Pace Length	

Finding the Number of Paces in 50 Meters

Known Distance	50 m
Your Average Pace Length	÷
Number of Paces to Reach 50 Meters	