

# EDUCATOR GUIDE

## STEP 5: BE A SCIENTIST MARINE DEBRIS TRACKER



1

Say, **“We recently learned about the scientific method. Do you remember the four steps?”** As students share their answers, use the anchor chart to review each step.

I presume that each lesson will take place on a different day. If not and if they’re one after the other, you can use “just”. Otherwise, use “recently”.

**TEACHER NOTE:** Follow the steps outlined here to set up the Marine Debris Tracker before starting this lesson.

Select a safe place to take your students to collect data on and pick up trash. You will need some trash bags and gloves.

You might set up students in small teams. This lesson can be done in one day or over the course of 2 days. The longer students can spend documenting and collecting trash the more they will get out of the experience.

2

“Scientists use the scientific method to discover new things and solve problems. **Today, you will use the scientific method** and help one scientist, Dr. Jenna Jambeck, along the way.

3

**Provide each student with a *Marine Debris Tracker: Student Activity Sheet*.** **Read together,** “Dr. Jenna Jambeck is a scientist from the University of Georgia. She is studying plastic pollution using an app called Marine Debris Tracker, and she needs your help! You can help by tracking the litter you find in your community. This data can aid scientists in understanding the most common litter and where it is found.”

4

Say, **“We are going to learn a little more about Dr. Jambeck and Marine Debris Tracker”**. Watch this two-minute introduction: [What is Debris Tracker?](#) Ask students, “What inspired Dr. Jambeck’s study? Why is the Marine Debris Tracker important? How can you help? Can someone summarize what will happen with the information we collect today?”

5

**Ask students to answer the question** in their activity sheets: “What do you think the most common type of litter or trash left on the ground is?” Students can share their answers with the class.

# SETTING UP MARINE DEBRIS TRACKER

**Steps 6-9 should be done by you or another adult.**

You can track as an entire class or individual students. If you choose for the students to work individually, an adult must create the account. Only one account can be created for each email address.

6

To have students begin tracking litter, download the app “Marine Debris Tracker” or go to <https://debristracker.org/>

7

Click on “create an account” and create an account with your information. Click “Submit”.

8

Once you have logged in, you will see your name, recent tracking session, and actions.

9

Under actions, click “Select an organization”, find **“The Paper Girls Show Jr. Scientist Program”**, and click continue.

# TRACKING POLLUTION

10

Students are now ready to track pollution! **Take students to a safe place to explore.** If you are not physically with the students, have them go to a safe place with an adult. This could be their front yard, backyard, front steps, park, etc.

11

Have the students work through making observations about the litter in their area.

12

After they have completed their initial observation, have students complete **asking questions and solving problems** and share their questions about their space.

13

Ask students to **use the Marine Debris Tracker sheet** to document their data. Please remember the safety rules for picking up pollutants, such as wearing gloves, using a tool to pick up the litter, and washing your hands afterward. You or another adult may use the app to enter the data as you go, or you may upload it manually to a computer later. Follow the instructions below to enter the data into the app.

- a. To input an item, use the search bar at the top of the screen to find items quickly. Once you find the item you're looking for, just click "Add".
- b. You can use the up or down arrows to change the quantity or tap directly on the number to type in how many you've found.
- c. When you are ready to submit your items, click "Continue".
- d. On the "Upload Session" page, you'll see an overview of what you've tracked.
- e. Click "Continue" to return to the home screen.

# LOOKING AT DATA

14

Log into [debristracker.org](http://debristracker.org). Select “Data”.

15

Under “Filter”, select “My Data”. Click “The Paper Girls Show Jr. Scientist Program” to choose the organization. Select the **exact date** that you collected data. Click “Search”. A map and analysis of the items collected will appear.

16

Have students complete their data questions.

17

**Ask them to complete their communication questions and share their answers with the class.** This can lead to a great discussion about an action plan that students could implement.

