One Bottle's Journey

Trace a local problem to regional and global effects

8.P.1.1.C "Use information to analyze how a specific problem can manifest itself in regional and global issues, describing options for solutions."

NAME _____ DATE _____

1 READ AND MARK

Read it twice

YOUR JOB Underline the path plastic can take from a city street to the ocean. Circle one regional effect and one global effect, and label them R and G.

Where Does Street Litter Go?

1. After a crowded soccer match, empty plastic drink bottles lie beside a city street. Rain pushes some bottles into storm drains, which often empty into nearby streams without passing through a trash filter. A stream can carry bottles into a river shared by several towns. Bottles trapped along its banks can block drainage channels, adding to local flooding during heavy rain. Other bottles break into smaller pieces as sunlight and movement wear them down. A bottle left on one street can become a problem far beyond that street.

2. Downstream towns may spend money removing litter from riverbanks and protecting water intakes. Fish and birds can swallow small plastic pieces or become tangled in larger debris. When a river reaches the ocean, some of its plastic joins waste carried there by rivers in many countries. Ocean currents can move floating debris across national borders, while some pieces sink or wash onto distant shores. This makes plastic pollution both a regional issue for communities along one river and a global issue that no single town can solve alone.

3. Different actions target different points in this chain. A city can place covered bins near busy streets and collect trash before rain carries it away. River towns can coordinate cleanups and install devices that catch litter at selected drain outlets, but those devices need regular emptying. Countries can agree on ways to reduce disposable packaging and improve waste collection, which cuts pollution before it enters waterways. Ocean cleanups can remove some floating debris, but they cannot collect every tiny fragment or replace efforts upstream.

2 ANSWER WITH EVIDENCE

Use the passage

1. How can bottles left after the match create a problem for towns along the same river? Trace their route and name one regional effect.

2. Why is this a global issue, not just a regional one? Use two details about where the plastic goes.

3. Which two actions could stop litter before it reaches a river? Explain how each acts at a different point in its path.

4. Why would river towns that install litter-catching devices still need other solutions? Name one limit of the devices and one additional action from the passage.

3 YOUR TURN

Your own words

A weekend fair beside a creek uses throwaway food containers, and a storm is forecast. In one paragraph, explain one regional and one possible global effect of container litter, then propose two actions at different scales and explain a limit of one action.

ANSWER KEY

One Bottle's Journey

GRADE 8 · 8.P.1.1.C

PART 1 · READ AND MARK

Underline the path plastic can take from a city street to the ocean. Circle one regional effect and one global effect, and label them R and G. Accept any marking that follows this job and points at the right text.

PART 2 · ANSWERS

#	QUESTION	ANSWER
1	How can bottles left after the match create a problem for towns along the same river? Trace their route and name one regional effect.	**Rain can wash bottles into storm drains, streams, and a river shared by several towns. Downstream towns may have to remove litter from riverbanks.**
2	Why is this a global issue, not just a regional one? Use two details about where the plastic goes.	**Rivers in many countries carry plastic to the ocean, and ocean currents can move floating debris across national borders.**
3	Which two actions could stop litter before it reaches a river? Explain how each acts at a different point in its path.	**Covered bins and trash collection can remove litter from streets. Devices at drain outlets can catch litter before it enters waterways.**
4	Why would river towns that install litter-catching devices still need other solutions? Name one limit of the devices and one additional action from the passage.	**The devices need regular emptying and catch litter only at selected outlets. Reducing disposable packaging could keep more plastic out of waterways.**

PART 3 · YOUR TURN (SAMPLE ANSWER)

Rain could wash containers from the fair into the creek and then into a river shared by nearby towns. Towns downstream might have to clear litter from their riverbanks. If the river reaches the ocean, floating plastic could cross national borders and add to global pollution. Fair organizers could use covered bins and collect the waste before the storm. Towns along the river could also coordinate cleanups. Those cleanups might miss pieces that have already reached the ocean, so keeping containers out of the creek matters.

Accept other passage-supported regional effects, global effects, and solutions. For the open task, look for a plausible path from creek to region and ocean, actions at two different scales, and a realistic limit.