



New York-New Jersey Harbor Estuary Education Program A New York-New Jersey Harbor Estuary Program Stewardship Project

STUDENT ACTIVITY: PROTECT-IT Pictionary Harbor Estuary Pictionary Game

WHAT YOU WILL NEED: Set of **PROTECT-IT Pictionary cards, (included in this lesson plan, chalk or white board, chalk or markers.**

PROCEDURE: Students are placed in teams of 2 to 4 students. One team at a time, each team will come to the front of the group and draw a card (see pages 2 - 4) from the pile. Each card describes an action we can take to protect the Harbor Estuary. The card explains the action and how it helps the Estuary. The team who is “up” then draws a picture on the board about the action on their card. They will be allowed two minutes to make their drawings. They may not write words or talk to the other teams about what they are drawing. As the team who is “up” is drawing, the rest of the class must try to guess what action the team is drawing. Students should discuss their guesses quietly with their team members. To make a guess, one member from the remaining teams must raise his or her hand and be recognized by the designated moderator (I.e., classroom teacher). The moderator will choose those team members who follow instructions, remain quiet and then go in order of who raised their hand first.

When a correct guess is made, the team who made the drawing and the team who guessed correctly win one point each. Then the team who guessed the drawing correctly must try to figure out how this action effects and helps protect the Estuary. There may be several effects for each action. One point is given for every effect that is guessed correctly. If the team that answered the drawing correctly does not know any or all of the effects, the other teams in the class may try to guess to win their points.

Point System: One point is given to the team who is drawing only if a correct guess is made about their drawing. If no one is able to make a correct guess they will lose one point, so it's a good idea to make good drawings! One point is given to the team who makes a correct guess about the drawing. One point is given to for each effect that is guessed correctly. In other words, if a team makes a correct guess about the drawing, and knows one way the action would affect the estuary they would get 2 points. If they know the two effects they would gain a total of 3 points. If they cannot name all or any of the effects, the other teams have the chance to answer and win the point(s). If no team has the answer then the team that did the drawing reads the answer on the card and no points are given or lost.

PROTECT-IT Pictionary CARDS:

PROTECT-IT Pictionary

Action: Plant trees, shrubs, OR flowers



Effect:

1. Plants help hold soil together, preventing erosion of soil into the Estuary.
2. Plants use up extra nutrients from other sources preventing the extra nutrients from polluting the Estuary's water.

PROTECT-IT Pictionary

Action: Throw away trash in a proper receptacle (trash can, dumpster, etc.)



Effect:

1. This keeps our Estuary's animals safe from entanglement and other dangers.
2. It also keeps beaches and riverfront parks clean.

PROTECT-IT Pictionary

Action: Drive less. Walk, bicycle or use public transportation.



Effect:

1. This would improve air quality because less exhaust from cars or trucks would enter the air.
2. It would also lessen oil and grease from leaky cars and trucks from entering the Harbor Estuary's waterways.

PROTECT-IT PICTONARY

Action: Reduce (or eliminate) use of fertilizers, pesticides and herbicides.



Effect:

1. This prevents too many nutrients from entering the water when it rains. Too many nutrients cause algae blooms that use up the oxygen fish and other animals need to breathe underwater.
2. Prevents harmful chemicals from entering the water that can harm animals and humans.

PROTECT-IT PICTONARY

Action: Clean up pet waste



Effect:

1. This keeps fecal coliform and other bacteria from entering the Estuary. Fecal coliform poses health risks to humans and animals and is often the reason for temporary beach closures.
2. Makes the Harbor Estuary area a desirable place to visit and vacation. (Visitors spend money at local stores!)

PROTECT-IT PICTONARY

Action: Keep leaves and other debris out of street gutters and storm drains--these outlets drain directly to waterways that lead to the Estuary

Effect:

1. Prevents water quality from degrading as leaf litter and debris decay.
2. Prevents streets from flooding from clogged storm drains.



PROTECT-IT Pictionary

Action: Dispose of used oil, antifreeze, paints, and other household chemicals properly--not down storm sewers!



Effect:

1. Prevents toxic chemicals from entering the water that could kill or harm wildlife.
2. Prevents streets from flooding from clogged street gutters and storm drains.

PROTECT-IT Pictionary

Action: Tell your family, friends and others about how great the Harbor Estuary is and what they can do to protect it!



Effect:

1. More people will realize what a great resource the Harbor Estuary is and want to protect it.
2. The Harbor Estuary will continue to be a wonderful place to visit and cherish forever!

PROTECT-IT Pictionary

Action:

Effect: