Grade 4 – CEH-4 Community/ Environmental Health Virginia 2020 SOLs



### Grade 4 Sample Lesson Plan: Helping Our Environment (Planting Trees)

#### **Objectives/Goals**

- The student will understand the importance of trees to our health and well being.
- The students will understand that planting trees is one way to reduce air pollution.

#### **Materials**

- Tree seedlings provided by <u>www.nwf.org/Trees-for-Wildlife/Request-Trees</u>
- Gardening tools including shovels, gloves, and spades.
- Coloring sheet: "Plant a Tree"
- Planting Guide poster.

#### **Steps**

Step 1

• A month prior to the tree planting you will order tree seedlings through The National Wildlife Assoc. web-site. Other possible sources for seedlings are listed below. Also have parent volunteers lined up to help with the planting. Local hardware stores may donate supplies such as soil, tools, and gloves.

#### Step 2

• A quick review of the concepts we have learned in the Air Pollution unit. Discuss what trees need to grow: sun, water, and soil. Go over planting guide poster.

#### Step 3

• Demonstrate how to dig a sufficient hole, place the seedling in, and fill dirt around it. Have students work in groups of 3 to dig holes with plenty of space between them. This will work best around the perimeter of the school. Once all of the trees have been planted, designate 1 person in each group to water the trees in their group. Take pictures of the trees so that they can monitor their growth. Take pictures and have them measure the growth throughout the year.

#### Step 4

• Have the students return to the classroom and hand out coloring sheet: "I planted a Tree!

#### References

- Tree seedlings provided by www.nwf.org/Trees-for-Wildlife/Request-Trees
- Coloring sheet: "Plant a Tree" Arbordayfoundation.org
- Possible sources for tree seedlings: Arbor Day Foundation, USDA Forest Service,
- Nancy Lewis, 2018

#### Handout

The next page includes a handout for the lesson. The handout is designed for print use only.







## FOLLOW THESE STEPS FOR SUCCESSFUL TREE PLANTING





STEP 2

Dig a hole



STEP 3



STEP 4



Plant your tree where it will get lots of sunshine and has room to grow!

Planting Ilustrations by L. Pohlod

10" deep by 8" wide. Find your tree's root collar, a spot located just above the roots where the stem changes color or becomes fatter. Plant your tree at this depth. Make sure your tree's roots hang freely in the planting hole and are not bent or twisted.



Replace the loose soil gently around your tree's roots. Be sure to give your tree a good drink of water. You may want to place mulch (woodchips, grass, leaves) around the base of the tree to help hold in moisture.



REMEMBER TO WATER YOUR TREE WEEKLY TO KEEP THE SOIL MOIST!

# Alien insects invade Wisconsin trees!

Insects that recycle wood and nibble on leaves are vital parts of the food web. Native forest pests are eaten by predators, weakened by parasites, and killed by diseases. Their populations are usually kept under control.



The same cannot be said for tree-eating insects that have come from other parts of the world. When they left their homelands, they left behind all their predators, diseases, and parasites. With nothing to control their populations here, they are free to reproduce. They can spread way too fast!



Emerald ash borer, a wood-boring beetle native to Asia, is



responsible for killing millions of ash trees in the United States. Emerald ash borers and other harmful tree pests and diseases can move around on firewood.

### What can YOU do to STOP insect invaders?

- > Don't move firewood.
- $\succ$  Buy your firewood where you plan to use it.
- > Burn up all your firewood before you move.

Я	П	v	v	т	М	т	М	7.	N	R	Δ	Л	т	R
							A							
F							S							
-						$\sim$								
J	V	S	G	W	Z	Ц	Α	А	Q	Ц	E	Х	S	V
Κ	Κ	D	Ε	С	Ε	D	D	Х	Ρ	Q	Ν	S	V	0
J	Ι	V	V	С	Е	R	М	Ζ	Т	Ρ	Х	В	Ζ	Y
F	Κ	М	F	R	Т	М	Ι	Ρ	Α	Η	В	М	Т	J
Т	S	Е	Ρ	Ρ	Х	Ρ	Q	F	Κ	Т	Е	0	R	Α
Е	М	Е	R	А	L	D	Е	Q	0	С	Т	D	Ν	Т
I	G	Η	В	W	Ζ	Ρ	Κ	V	Η	F	I	С	Η	Κ
М	Ρ	F	S	В	М	W	Y	W	V	С	S	R	W	Т
F	С	Ν	0	А	D	F	Т	Q	R	W	Α	Α	J	F
Ρ	F	R	Е	Е	U	0	L	0	Κ	Y	R	Α	W	0
Κ	Е	С	0	Т	С	Κ	Q	Y	Q	Ν	А	G	G	Κ
R	Ρ	D	Е	V	Ι	S	А	V	Ν	Ι	Ρ	М	Η	F

#### Find These Words

INVASIVE	EMERALD
ALIEN	ASH
INSECT	BORER
PEST	FIREWOOD
PREDATOR	PARASITE

Find Out More!

Have any insect invaders spread to trees near you? Find out by visiting these Web sites:

Just For Kids



- www.arborday.org
- http://dnr.wi.gov/eek/earth/aliens. htm
- www.treemusketeers.org
- www.dnr.wi.gov keyword "invasives"
- http://dnr.wi.gov/eek/cool/lurkers.htm

#### For Teachers & Adults

- www.treesaregood.com
- www.leafprogram.org
- www.dnr.wi.gov keywords "urban forest"





