EDUCATION WEEK 2013
SEMAINE DE L'ÉDUCATION

OCTOBER 6-12, 2013

RESOURCE BOOK

ROOTED IN EDUCATION, GROWING FOR THE FUTURE

ENRACINÉ DANS L´ÉDUCATION, SE DÉVELOPPER POUR L´AVENIR

A Message to Teachers from NLTA President Jim Dinn

Dear Colleague,

Education Week has always been about celebrating education and the importance of learning. This year's theme is "Rooted in Education, Growing for the Future • Enraciné dans l'éducation, Se développer pour l'avenir". The theme was selected from submissions through a teacher contest. The winning entry was submitted by Megan Wamboldt with the Labrador District School Board.

Education Week can be an enriching experience for students, teachers and parents. We encourage primary and elementary teachers to continue their practice of observing this week with their students. We especially encourage intermediate and high school students to become involved in the week as it presents an exciting opportunity to promote school spirit. Our students have much to contribute and would grow and learn from their involvement in Education Week activities.

Our sincere thanks to all those who have assisted in planning the Education Week Resource Kit. We value the input of our fellow educators and assure you that your efforts are appreciated.

We trust you will find this resource to be useful and that your activities during Education Week and every week of the school year are truly a celebration of education. Have a great week!

Sincerely yours,

Jim Dinn
President

Table of Contents

Using this Booklet

This Education Week resource booklet has been designed to provide a list of suggested activities, as well as some pages that can be photocopied and used in class or given to students to take home.

The activities listed on the following pages are meant to provide ideas only – use any you feel might work, modify as you think best, or develop your own. The appropriate grade levels for each activity are indicated.

Attention French teachers!

The majority of the activities listed in the booklet can be adapted for French, English, or ESL students.

Pour les professeurs de français

La plupart des activités proposées dans ce livret peuvent être adaptées pour les élèves en français, en anglais et même en anglais langue seconde.

The NLTA website contains a section about Education Week.
It is located at www.nlta.nl.ca.

Suggestions for Planning an Opening/Closing Ceremony

Opening Ceremonies

- Plan an assembly for your school.
- Have your school choir or singing group sing the Education Week song or a medley of songs about the Education Week theme.
- Invite schools in your district to come together to plan an Opening Ceremony.
- Invite community members, retired teachers, parents, etc. to take part in the Opening Ceremonies.
- Set up a mural in each classroom or one for the entire school to display various activities completed during the opening and theme days throughout the week.
- Have your Teacher Librarian set up a display of materials related to the Education Week theme.
- Select a book or poem that you could read to the class on the day of the Opening Ceremonies.

Closing Ceremonies

- Have a closing assembly and put together a program of songs, dances, skits, role-plays etc. which students worked on throughout the week.
- Invite parents to the celebration. Students can design their own invitations.
- Set up displays (in your classroom or the school gymnasium) of the projects completed during the week and invite parents to come and view them.
- Visit other classes in the school or visit another school in your area to see how others celebrated Education Week.
- Throughout Education Week, have someone do a video tape or take pictures of various activities completed during the week. Have a popcorn party and view the tape or pictures.

 Name: _____

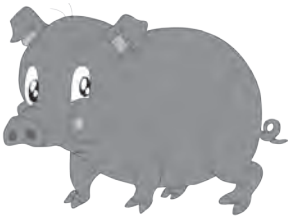
Autumn Is Awesome!

A	C	R	N	B	C	O	L	O	R	S	A
W	B	A	C	O	R	N	A	P	P	W	U
I	O	P	O	N	F	A	L	L	X	E	T
N	F	P	O	F	S	W	T	E	R	A	U
D	R	L	L	I	C	O	L	A	Q	T	M
C	E	E	P	R	A	K	E	F	L	E	N
S	C	A	R	E	C	R	O	W	D	R	Z

Find these words in the puzzle. Words are hidden → and ↓.

ACORN
APPLE
AUTUMN
BON FIRE
COLORS
COOL
FALL
LEAF
RAKE
SCARECROW
SWEATER
WIND

The Potbelly Pig (K-3)



Simon wants to make a pen in the shape of a rectangle for his pig. Use your 16 squares to make as many different rectangles for his pig as you can. Use the lines on the grid paper to draw pictures of the rectangles you make.

Draw your rectangles here. For each rectangle:
· write the number of squares on each side
· write the total number of squares you used

Physical Education Activities (K-3)

Tree Tag

Materials: Hoola hoops

Procedure: Set up hoola hoops throughout a certain boundary (make sure they are just about arms width apart from each other). Students stand inside the hoola hoops and try to tag the other students moving in between them with their "branches" (arms). Once a tagger tags another person, they have to yell "You're a tree!" and they switch places. The tagger then moves in between the hoola hoops and the person who was tagged now acts as a tree and goes into the hoola hoop.

http://lessonplanspage.com/petreetaghoolahoopgamek2-htm/

Squirrels In The Trees

- Have the class form a large circle and count off in three's. Have two students, one being a fox and the other a squirrel outside the circle.
- Have the one's and three's join hands forming an arch (or tree) with the number two's in the middle as squirrels.
- To start the activity, the fox chases the squirrel outside the tree. The squirrel runs into a tree to get away.
- The squirrel in that tree must now run out of the tree and is chased by the fox. If the squirrel is caught, he becomes the fox.
- Have all the squirrels squat down when they run into a tree so that all squirrels have a chance.
- Have the other students that are trees change places with the squirrels so that everyone has a turn running.

www.priceless-teaching-strategies.com/elementary-physical-education-activities.html

Tradtional Tag Game

It's best played with lots of places to hide. The person who is the counter (or seeker) stands next to a designated tree and closes their eyes while counting to _____. The rest of the players run and hide. When the seeker is done counting, they call out "Ready or not, here I come!" and begin searching for everyone else. The goal for those hiding is to get back and touch the tree before being tagged. Those who are tagged before touching the tree are also "It" and join the seeker. The last one to reach the tree or be tagged is the seeker for the next game.

www.kidactivities.net/category/games-outside-play.aspx

Physical Education Activities (cont'd)

Creative Dance – Movement Stories
Have students create a dance that would simulate the movement of trees on various weather days from rainy to sunny, windy to calm, foggy to bright, etc.

www.education.alberta.ca/media/318470/dpa4.pdf

Trees in the Wind
Legs wide and parallel – both arms to one side – twist to one side then the other.

Adding a hurricane wind makes the trees twist and bend
(left knee to ground as arms are twisted to right side – vice versa).

www.sasksport.sk.ca/cis/pdf/movement.pdf

Samples of Skills, Games and Activities (Intermediate)
www.ed.gov.nl.ca/edu/k12/curriculum/guides/physed/intermediate/appendix_e%E2%80%93samples_of_skills_games_and_activities.pdf

All About Fall (K-3)

Name _____ Date _____

Fall is the season between summer and winter.

Fall is also called autumn.

The weather gets cooler.

Leaves fall off the trees.

Farmers harvest their crops.

Many students go back to school.

Pumpkins are ripe and ready to pick.

All About Fall (cont'd)

Name _____ Date _____

Answer the questions about ***FALL***

1. Fall is also called
    a. spring
    b. summer
    c. autumn
    d. winter

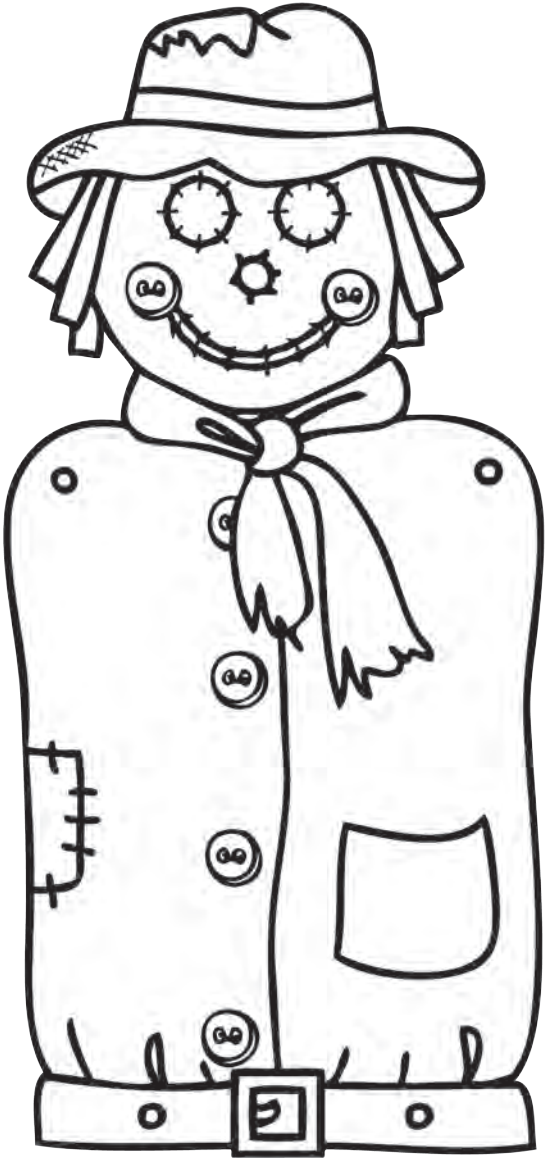
2. Leaves fall off the
    a. houses
    b. trees
    c. pumpkins
    d. none of the above

3. Many children go back to
    a. school
    b. vacation
    c. camp
    d. the mall

(K-3)

Make a Scarecrow

With Arms and Legs that Move

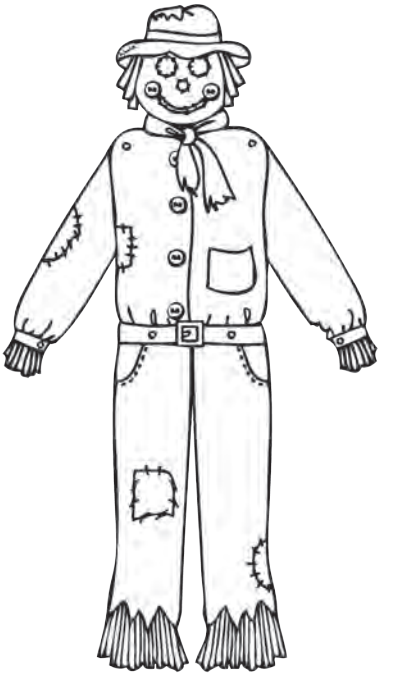


Step 1: Color Scarcrow's parts.

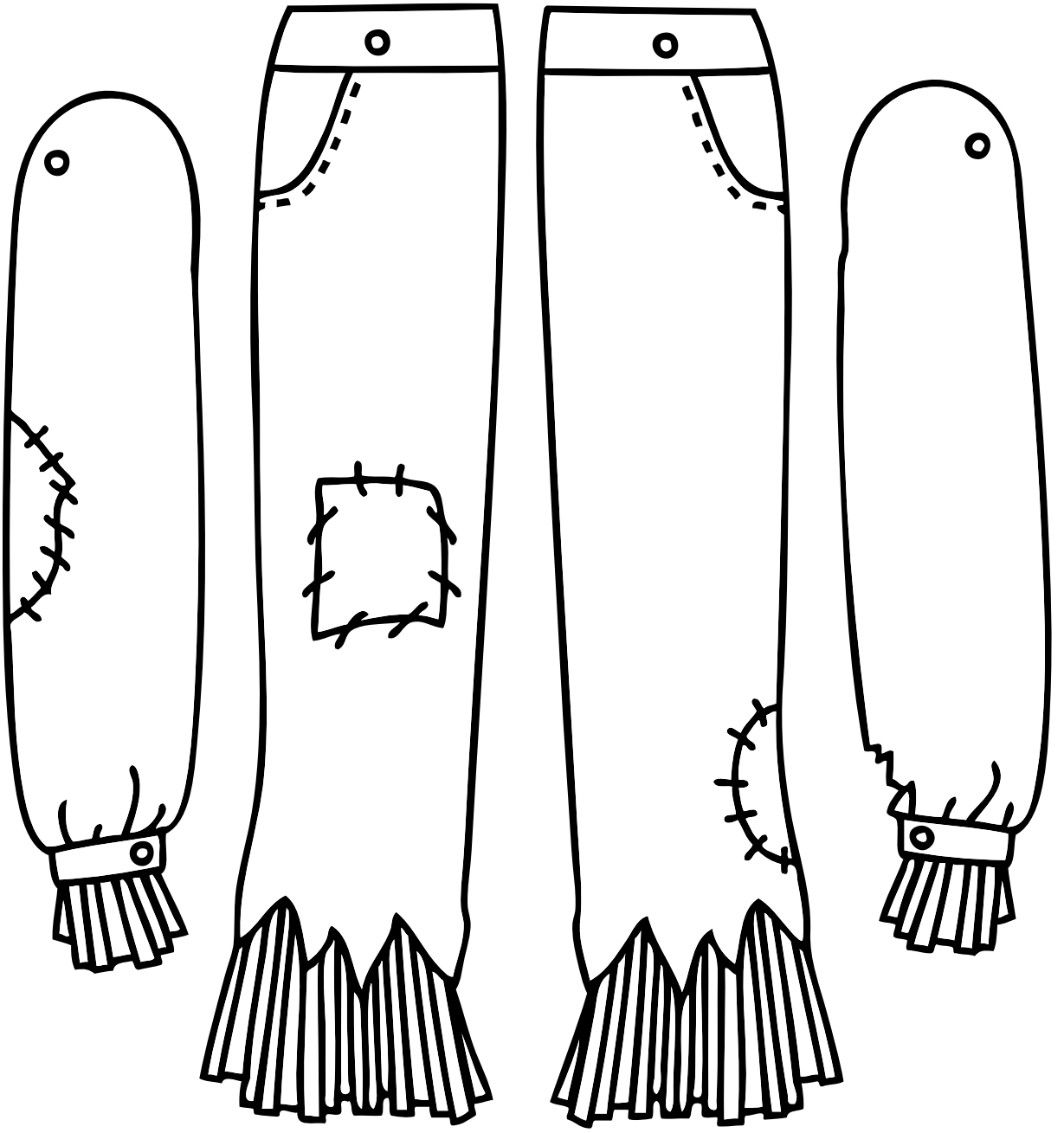
Step 2: Cut out the body, arms, and legs.

Step 3: Attach the arms and legs with brass paper fasteners.

Finished Scarecrow will look like this:



Super Teacher Worksheets - *www.superteacherworksheets.com*



(K-3)

Color By Number "Raking Ruckus"

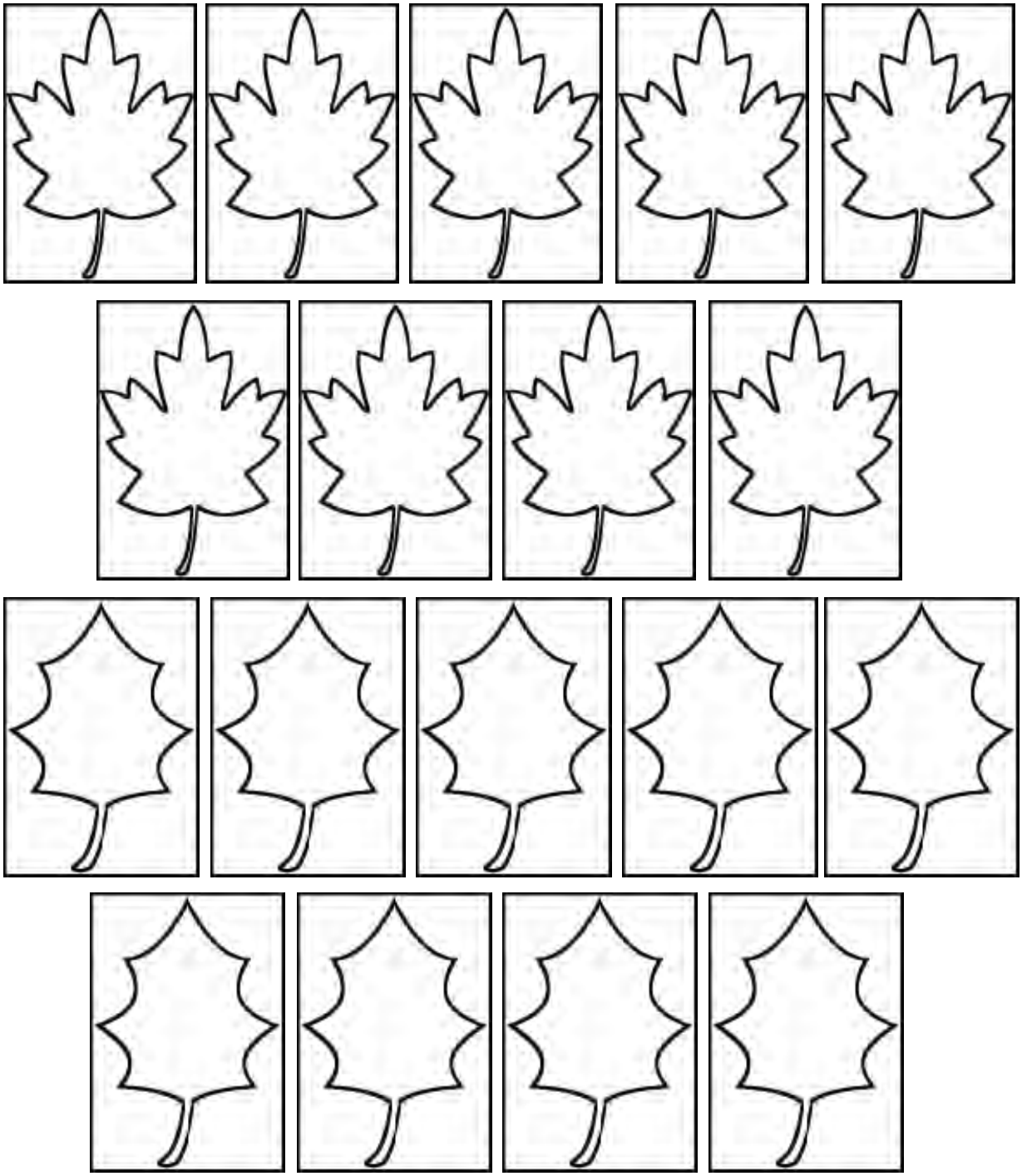
Name

(K-3)

1= red
2= yellow
3= blue
4= green
5= purple
6= brown
7= orange
8= pink
9= black
10= white
(Blank Areas Your Choice)

Tic Tac Toe Gameboard (K-3)

Tic Tac Toe Gameboard (cont'd)



Fall Fun (4-6)

When fall arrives, it brings a cool breeze.
Leaves start to shed from the shivering trees.

From yellow to orange to brown and red,
The pretty leaves cover the ground instead.

Grab a rake and make a pile.
Watch your friends begin to smile.

Playing in leaves is fun to do,
But cleaning them up is wonderful, too.

Big pumpkin bags work great for storing.
Place them around your yard for adoring.

Always remember to keep a few,
So you can create a picture or two.

When all is done, and snow has begun,
Pictures remind you of all the fall fun.

Fall Fun Vocabulary

Read each sentence from the poem, "Fall Fun." Then, choose the best meaning for the underlined word in each sentence.

1. Big pumpkin bags work great for <u>storing</u>.
   a. playing b. decorating c. keeping d. coloring

2. Leaves start to <u>shed</u> from the shivering trees.
   a. to turn brown b. to come off of c. to blow around d. place to store garden tools

3. Leaves start to shed from the <u>shivering</u> trees.
   a. pretty b. huge c. growing d. shaking

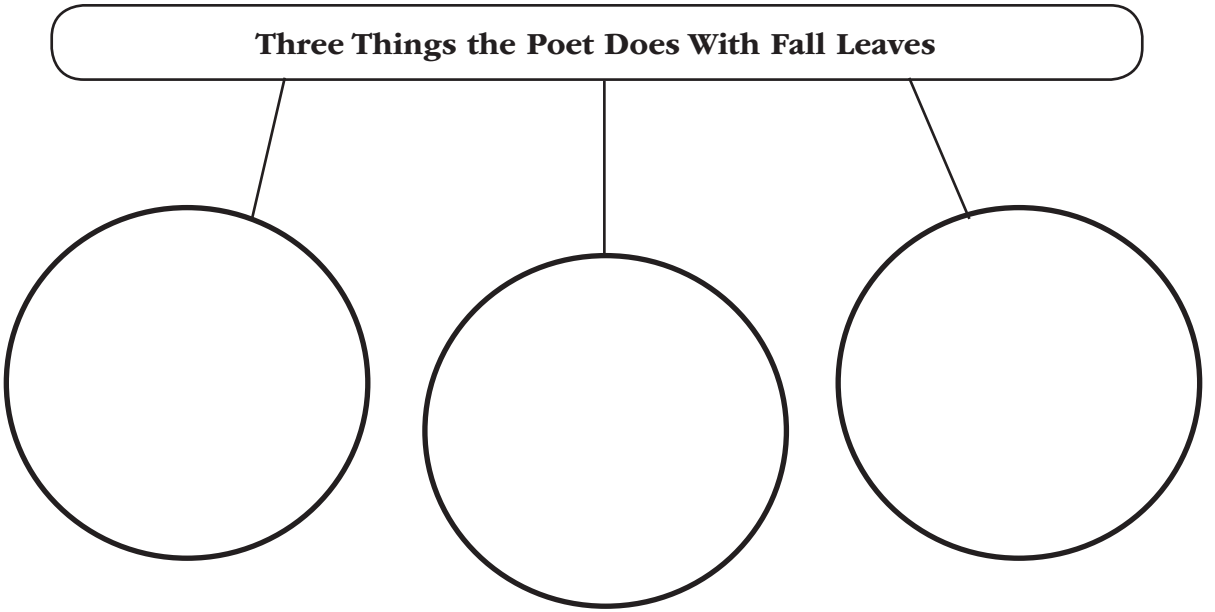
4. Place them around your yard for <u>adoring</u>.
   a. keeping safe b. jumping in something soft c. playing with d. looking at something nice

5. When fall arrives, it brings a cool <u>breeze</u>.
   a. soft wind b. cool weather c. loud noise d. colored leaves

Fall Fun Vocabulary (4-6)

1. Why does the poet keep some of the fall leaves?
   a. so she can play in them during the winter
   b. so she can make a picture out of them
   c. so she can rake them into a pile
   d. so she can give them to friends

2. Complete the web by filling in the empty circles.



3. Name one other thing you can do with fall leaves that is **not** mentioned in the poem.

_____

Leaf Races (4-6)

Kendall sighed as she dragged the rake across the fallen leaves. “I’m never going to finish this.”

“Hey,” Eli called over the fence. “What are you doing?”

“Raking.”

“Cool. You want help?” Eli climbed the fence and hopped over.

“Really?” Kendall couldn’t imagine anyone volunteering for something so boring.

“Yeah. Leaves are almost as much fun as snow.” Eli grabbed another rake from the shed and started making a pile. “Check this out.” He ran and jumped right in the center of the pile. “Try it.”

“But now we have to rake all those leaves again.” Kendall shook her head. They’d never finish if he kept doing that.

“Just try it.” Eli raked the leaves into another pile, but bigger this time. He set the rakes aside and took Kendall’s hand. “Ready? Go!”

Kendall allowed him to pull her along, and they jumped onto the pile. “Hey, that was kind of fun.” She looked around. “Only, we’re creating more work for ourselves.”

Eli smiled. “Okay, then let’s try leaf races.”

“What’s a leaf race?”

Eli handed Kendall a rake and led her back to the fence. “First one to the other side of the yard wins. You have to drag the rake along the ground to rake leaves while you run. If you pick up your rake at any point, you have to start over. Got it?”

Kendall nodded and put her rake flush on the ground. “Ready.”

“On your mark. Get set. Go!”

They took off across the yard, their rakes trailing behind them. Eli reached the other side first and hooted in delight. “Yeah! I won!”

“Okay, I want a rematch. It was my first time.”

Eli held open a big garbage bag, and they scooped their piles into it. Then they raced back down to the fence for a rematch.

“This time I get to start the race,” Kendall said.

“Go ahead, but I’m still going to win.”

Kendall yelled a quick, “Ready, set, go!” and took off.

“Hey, no fair!” Eli called, running after her.

They raced back and forth until the yard was clear.

“We’re done already?” Kendall said, trying to catch her breath.

“Yup. See, I told you leaves were fun.”

“Want to dump some out of the bags and jump in them again?” Kendall asked.

“We’ll have to rake them afterward.”

Kendall shrugged. “I don’t mind.”

Leaf Races Worksheet #1 (4-6)

Name: _____

1. When does this story most likely take place?
   a. in Kendall's backyard
   b. in Eli's backyard
   c. before winter has begun
   d. after winter has ended

2. Why did Eli help Kendall rake leaves?
   a. Kendall asked for help.
   b. Eli didn't have any other friends to play with.
   c. Kendall's mother asked Eli to help.
   d. Eli thinks raking leaves is fun.

3. Explain how to play the leaf race game. What are the rules of the game?

_____

_____

_____

4. After they had raked and bagged all of the leaves, what did Kendall and Eli decide to do?

_____

_____

_____

5. What lesson can be learned from this story?
   a. If you help others with their work, they will help you someday.
   b. Chores can be fun if you make them into a game.
   c. When you do your chores quickly, you have more time for fun activities.
   d. Hard jobs become easier if you use the right tools.

Leaf Races Worksheet #2 (4-6)

Name: _____

Match each vocabulary word on the left with the definition on the right.

1. _____ rake	a. a game played for the second time
2. _____ shed	b. dragging along the ground
3. _____ fence	c. feeling of enjoyment or pleasure
4. _____ rematch	d. cheered
5. _____ scooped	e. small building for storing outdoor yard tools
6. _____ trailing	f. picked up and moved
7. _____ hooted	g. tool for moving leaves or soil
8. _____ delight	h. barrier made of wood, plastic, or metal for marking the edge of a yard

Now try this: Find each of the words above in the story and highlight them.

Leaf Races Worksheet #3 (4-6)

Name: _____

In the story, "Leaf Races," Kendall does not enjoy raking leaves until Eli shows her how to make a game of it. Describe another chore that could be made into a game. Tell how you would play the game and list the rules.

The Scariest Scarecrow (4-6)

Ben couldn't wait to go to Uncle Darrell's farm. Uncle Darrell had the best corn, apples, and pumpkins ever. And since Ben was going to be spending the weekend, he'd get to help Uncle Darrell pick them all.

Ben said a quick goodbye to his parents and ran from the car. He knew Uncle Darrell would be in the field tending to the crops. But when Ben got there, he saw Uncle Darrell wasn't the only one in the field. There were big black crows everywhere.

"What's going on?" Ben asked.

Uncle Darrell shooed the crows away and turned to Ben. "Hey, Benny. I'm just getting rid of these crows. They're trying to steal my crops."

"Where's the scarecrow?" Ben asked. Uncle Darrell usually had a giant scarecrow to keep the birds away.

"It was ruined in the last storm, and now every time I leave the field, the crows start attacking my crops. I don't have time to make a new scarecrow right now."

Ben looked around the field. The crows were already coming back. "I'll make a scarecrow for you."

"You will? But I thought you wanted to pick pumpkins and go for a hayride."

"I do, but this is more important." Ben spotted a medium-sized pumpkin, perfect and round, about five feet away. "Besides, I need to pick a pumpkin to make the scarecrow."

"You do?" Uncle Darrell narrowed his eyes.

"Yup. And I need some overalls and a flannel shirt."

"There are plenty of those in the house. Help yourself."

Ben ran into the house and found an old pair of overalls with holes in the knees. He grabbed a flannel that looked two sizes too small for Uncle Darrell. Then he raced back outside and picked the pumpkin he'd eyed earlier.

Uncle Darrell was putting hay bales into the back of his truck.

"Any extra hay I can use?" Ben asked.

"Sure. Anything else you need?"

"Yeah, a big stake. One that can run the whole length of the scarecrow."

Uncle Darrel helped Ben find a stake and together they fastened the pumpkin on the top of it.

"I can take it from here," Ben said. He stuffed hay in the clothes and attached them to the stake, too. Then Ben drew the scariest face he could imagine on the pumpkin.

"Whoa, that is one scary scarecrow," Uncle Darrell said. "Let's see if the crows think it's scary."

Ben and Uncle Darrel shooed the crows away and placed the scarecrow in the middle of the field. Then they backed away and waited to see if the crows came back. None did.

"It works!" Ben cheered.

"Yes, Ben. It's the scariest scarecrow ever."

The Scariest Scarecrow Worksheet #1 (4-6)

Name: _____

1. Name three crops that were grown on Uncle Darrell's farm.

_____

_____

2. Why didn't Uncle Darrell have a scarecrow in his field?

_____

_____

3. When Ben went inside to choose clothes for the scarecrow, how did he decide which ones to use?
   a. He chose the scariest clothes he could find.
   b. He looked for the biggest clothes he could find.
   c. He chose clothes with bright colors so the birds could see his scarecrow.
   d. He chose cloths that Uncle Darrell probably wouldn't want any more.

4. Re-read the following sentence from the story:
   Uncle Darrel helped Ben find a <u>stake</u> and together they fastened the pumpkin on the top of it.
   Choose the best definition for the underlined word.
   a. type of meat
   b. type of knife for carving pumpkins
   c. large stick that can be pushed into the ground
   d. top of a scarecrow

5. What is the setting of this story?
   a. at Uncle Ben's farm, in the summer
   b. at Uncle Ben's farm, in the fall
   c. at Ben's uncle's farm, in the spring
   d. at Ben's uncle's farm, in the fall

The Scariest Scarecrow Worksheet #2 (4-6)

Name: _____

Fill in the missing letters to create a word from the story. Then, write the full word on the line. Be sure you spell each word correctly.

1. ___ u i ___ ___ 1. _____

   clue: fast

2. ___ ___ m p ___ ___ n s 2. _____

   clue: large, orange, round fruits that grow on a vine

3. ___ ___ y r ___ d ___ 3. _____

   clue: a ride in a trailer filled with hay

4. ___ l ___ n ___ e l 4. _____

   clue: soft woven cloth, made of wool or other material

5. ___ t t ___ ___ h e d 5. _____

   clue: fastened

6. r ___ c ___ d 6. _____

   clue: hurried

The Scariest Scarecrow Worksheet #3 (4-6)

Name: _____

In the story, "The Scariest Scarecrow" you read about a boy who visits his uncle's farm. He helps build a scarecrow to keep the crows away from the crops. Have you ever been to a farm? If you have, describe the farm and what you saw there. If you haven't been to a farm, describe what you imagine it would be like.

Nature's Rainbow (4-6)

Jayden read the assignment and shook his head. "No way can we find all these colors in nature."

Ms. Snyder smiled. "If you look hard enough, you will." She motioned for Jayden to follow the tour guide down the nature trail.

Jayden looked around. Some of the colors were easy to spot. The grass was green. The dirt was brown And since it was fall, the leaves were all sorts of oranges, yellows, and reds. But where was he going to find purple and blue?

"How many colors did you find," Allie asked him.

"Five. How about you?"

"Six."

"Did you find blue yet?" Jayden tried to peek at Allie's paper.

"Hey, no copying." Allie walked away.

Jayden sighed as the tour guide talked about the different kinds of trees. He wasn't the least bit interested. He just wanted to finish the assignment.

"How are you doing, Jayden?" Ms. Snyder asked.

"Okay, I guess. But what in nature is blue or purple?" He shrugged. "My pen has blue ink. Does that count? I'm outside using it."

"Sorry, Jayden. Keep looking."

"I am. All I see are two blank spots on my paper because I can't think of the answers."

"You'd find more colors if you spent less time focusing on your paper and more time looking around you." Ms. Snyder walked away, leaving Jayden thinking this was one assignment he wasn't going to get an A on.

The tour guide started talking about fish, and Jayden picked his eyes up from his paper. He heard the tinkling of a small stream flowing next to him. "The water looks blue," he said, not realizing he was talking out loud.

"Yes, it reflects the color of the sky," the tour guide said.

The sky! Why didn't he think of that sooner? The sky and the stream were blue. He wrote both answers on his paper, hoping he'd get extra credit for it since he still couldn't find purple.

They continued their nature walk through a more dense part of the woods. Leaves littered the ground. Jayden saw Allie up ahead and rushed over to her. "I found six colors, but I still can't find purple."

"You aren't looking hard enough."

"Yes, I am."

"Really?" She lowered her eyes to the ground. Reddish leaves surrounded them.

Jayden picked one up. "These are red, not—" He stopped when he saw the back of the leaf. "The back is purple."

"Yup." Allie walked away.

"So, Jayden," Ms. Snyder said, "did you find all the colors?"

"Yeah. But I bet there are even more. I'm going to look." He continued turning over leaves, trying to find even more colors in nature's rainbow.

Nature's Rainbow Worksheet #1 (4-6)

Name: _____

1. Where does this story take place?
   a. in the woods behind Jayden's house b. behind the school
   c. on a class field trip to a local farm d. on a class field trip to the woods

2. When does this story take place?
   a. in the spring b. in autumn c. during winter d. during summer
   Tell why you chose the answer above.

_____

_____

3. Describe the assignment that Jayden was trying to complete.

_____

_____

_____

4. Explain why Jayden thought he could count his pen as an object in nature.
   a. because he was outside when he was using it
   b. because it was green, like the grass
   c. because it was made from things in nature
   d. because he thought the teacher wouldn't notice

5. What two blue items did Jayden have on his list?
   _____ and _____

Nature's Rainbow Worksheet #2 (4-6)

Name: _____

Match each vocabulary word on the left with the definition on the right.

1. _____ assignment	a. creek; brook; small river of water
2. _____ peek	b. thick
3. _____ focusing	c. color that has a red tint to it
4. _____ stream	d. hurried
5. _____ reflects	e. paying attention to
6. _____ dense	f. shows an image of something else; mirrors
7. _____ rushed	g. to look quickly without being noticed
8. _____ reddish	h. task given by a teacher

Now try this: Find each of the words above in the story and highlight them.

Nature's Rainbow Worksheet #3 (4-6)

Name: _____

In the story, "Nature's Rainbow," Jayden tried to find things in nature for each color. Which colors are the easiest to find in nature? Which colors are the hardest to find in nature? Explain your answers.

Nature's Rainbow Worksheet #4 (4-6)

Go on a nature walk. Find one or more things in nature for each color listed below.

red _____

orange _____

yellow _____

blue _____

purple _____

brown _____

white _____

black _____

www.superteacherworksheets.com

Fall Things Acrostic (K-6)

Name_____ Date_____

Write an acrostic poem about fall things. Begin each line with a word or phrase that starts with the letter on that line.

F_____

A_____

L_____

L_____

T_____

H_____

I_____

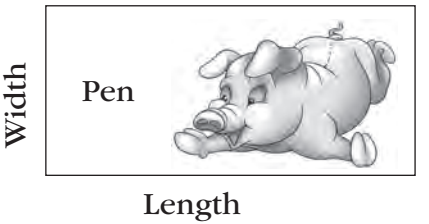
N_____

G_____

S_____

The Potbelly Pig (4-6)

Simon wants to build a rectangular pen in his backyard for his potbelly pig, Smiley. Simon has 28 metres of fencing to enclose the pen. He wants the greatest possible area for the pen.

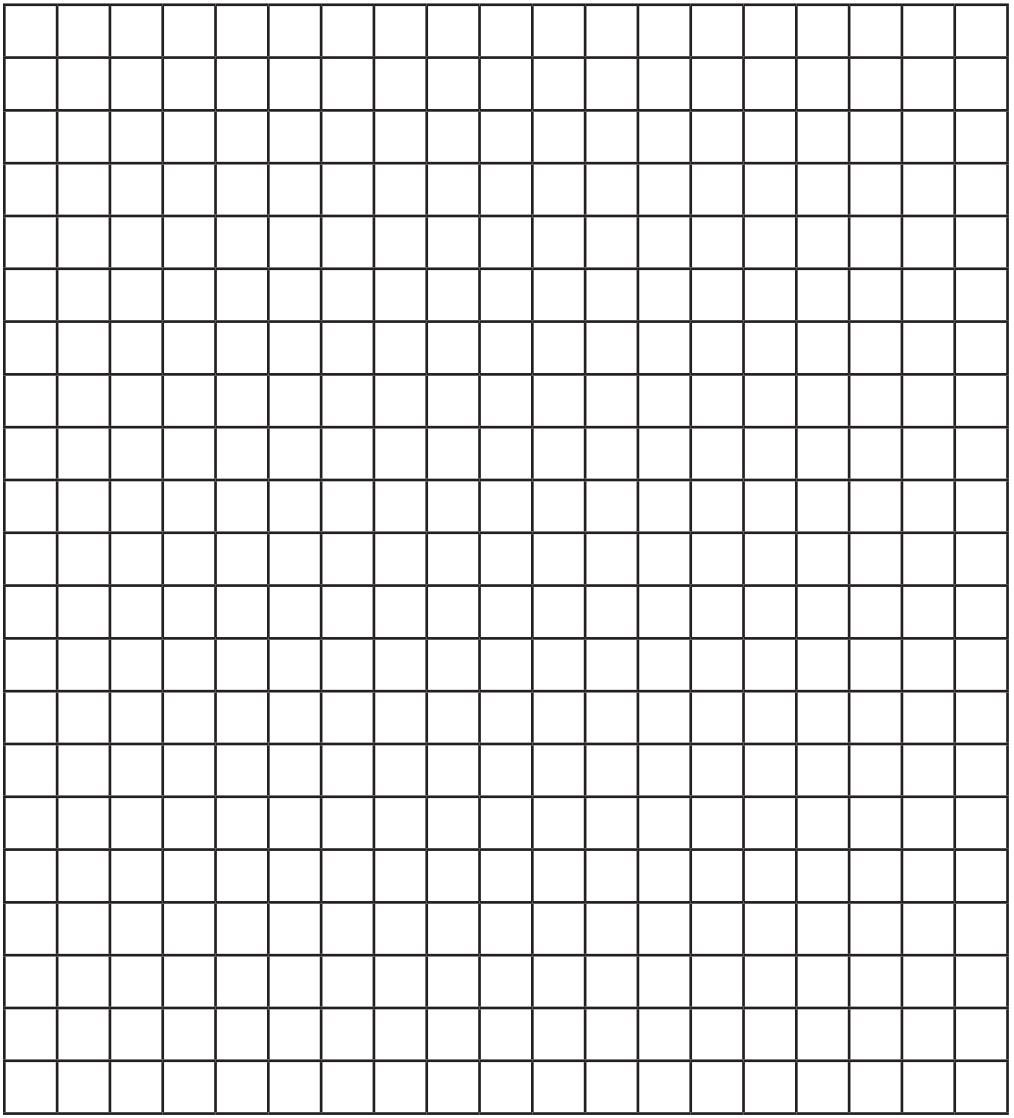


- Use a geoboard to make models of as many possible rectangles as you can.
- Draw each rectangle on grid paper.
- Find the area of the pen.
- Find the perimeter of each pen.
- Use the information to fill in the table below.

Length	Width	Area	Perimeter

The Potbelly Pig (cont'd)

Draw each pen on this grid. Record your information in the chart.



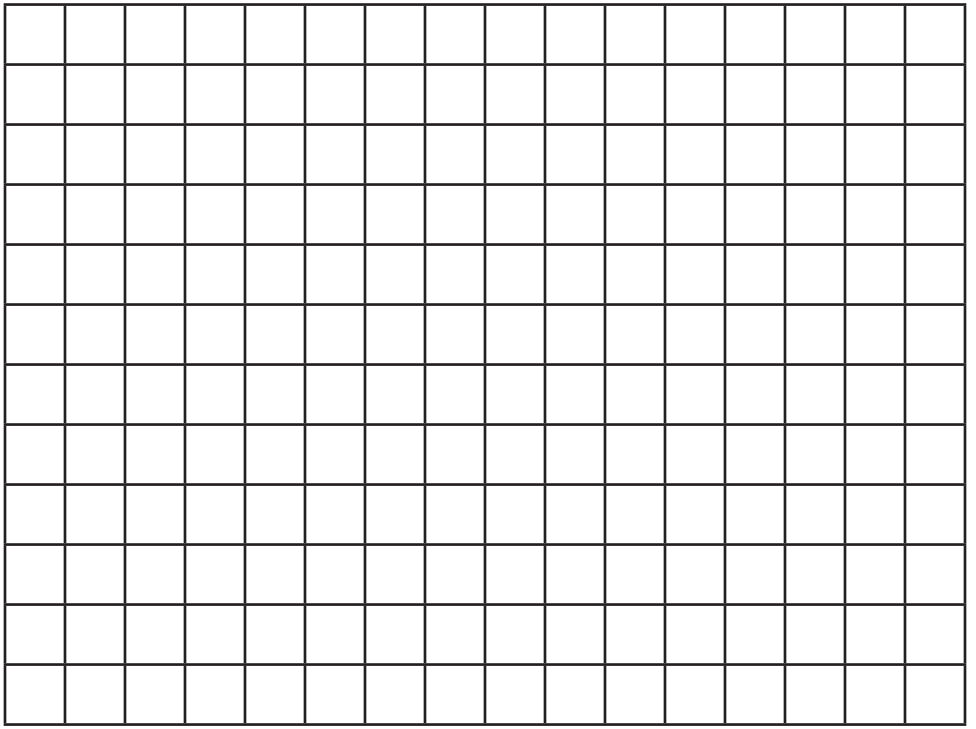
The Potbelly Pig (cont'd)

1. Which pen has the greatest area? How do you know?

2. What is true about the perimeter of each pen? Explain why this is so.

Further Exploration

3. a) On the grid, draw 3 shapes which would have a perimeter of 10.
At least one should not be a rectangle.



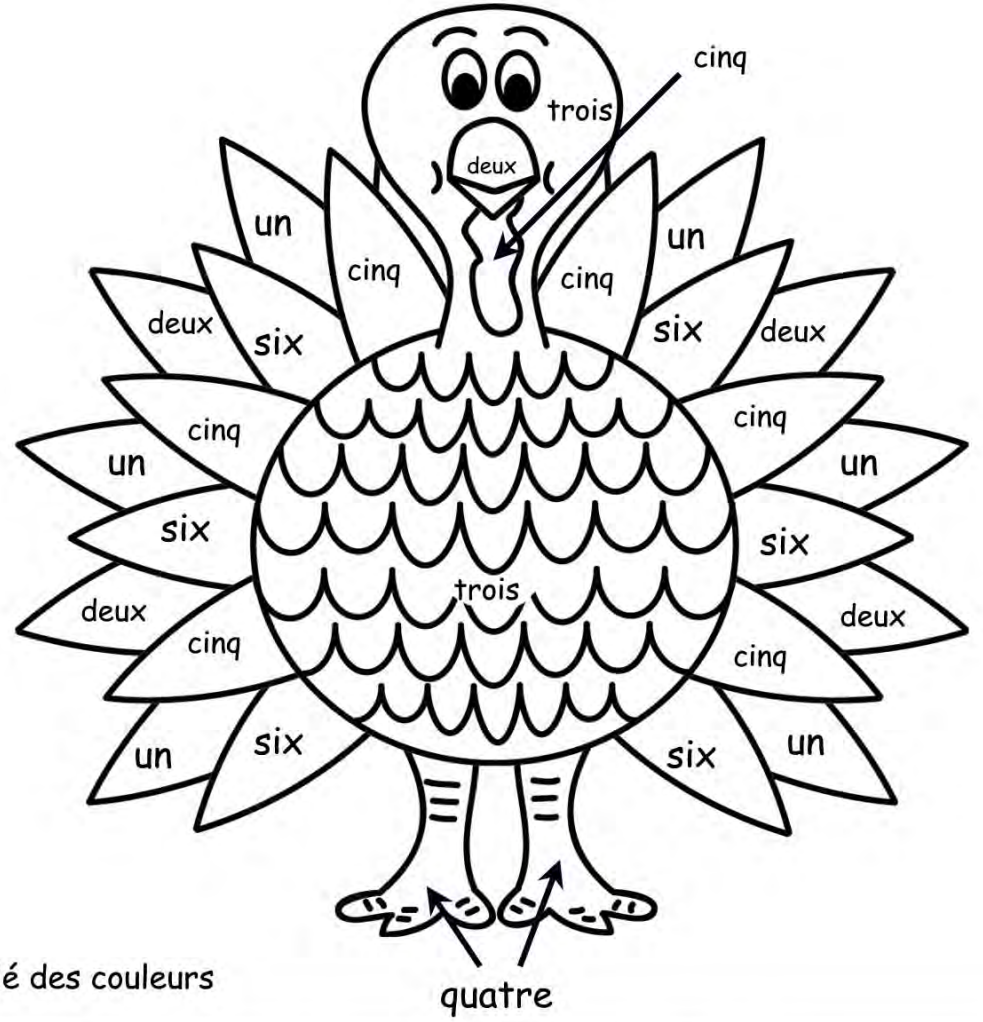
b) How do you know that all the perimeters are 10?

c) What are the areas of the three figures you drew?

d) If two figures have the same perimeter, do they have to have the same area?
Explain how you know.

e) If two different figures have the same area, do they have to have the same perimeter?
Explain how you know.

Colorer d'après les chiffres (K-6)



Clé des couleurs

un	orange	quatre	noir
deux	jaune	cinq	rouge
trois	marron	six	marron clair

Our Fall Wall (K-6)

The arrival of the fall season brings us lots of changes. Shorter days, cooler weather and dazzling colored leaves are just a few examples. Here's an idea that can translate these concepts and more into your classroom in a fun, visual way!

Start by copying the "Heading" and "Scene" patterns onto a transparency. Use an overhead to project and transfer these images (using a black marker) onto a large piece of white butcher paper that has been taped to a wall.

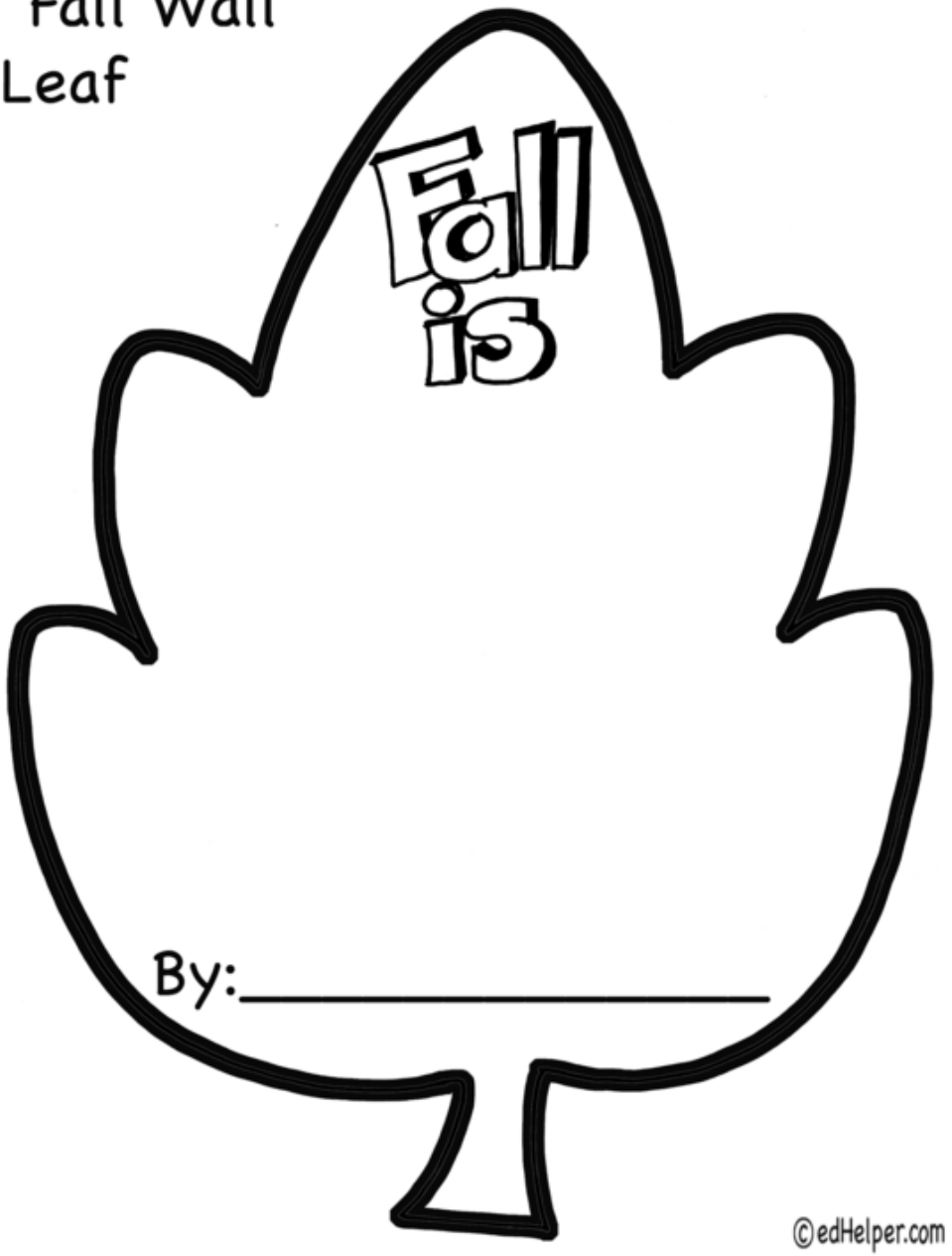
Once that step has been accomplished, take your drawing down. Call on groups of students to color it during periods of "free time". (Ask them to leave the tree hole white). Cut the scene out following the thick outline. Return the now colored picture to the wall. Copy the "Leaf" pattern onto orange, yellow, brown and red paper. Distribute one to each child. Ask them to write or dictate what fall means to them on it! When they are done, they should cut their leaves out and return them to you.

As you review them, keep track of the words and phrases that are repeatedly used. Tape the leaves around the scene in a pleasant, floating arrangement (as shown below). As a group discuss the words, etc. that you had noted earlier. Use them to add onto the "Fall is" (inside the tree hole) to make a simple, descriptive sentence. An example: "Fall is crunchy leaves and apples, and a time to wear sweatshirts." Enjoy this marvelous mural for the duration of autumn!

"Fall Wall" Heading

"Fall Wall" Scene

"Fall Wall"
Leaf



Field Trip Nature Walk (K-12)

Materials:
- pencil
- paper
- crayon (with the paper peeled off, for rubbings)
- clipboard (or other surface for writing)
- plastic bag

Activities:
- Look for signs of fall.
- Collect seeds, acorns, leaves, pine cones etc. in the plastic bag.
- Use your crayon and paper and make rubbings of leaves, bark, etc. Label the rubbings so you remember what they are.
- Fill in the chart below.

Things I See	Things I Hear	Things I Smell

The Factors Game (7-9)

Directions: Player 1 chooses any number below and circles it using a colored pen. Player 1 gets that many points. Player 2 then uses a different colored pen to circle all of the uncircled factors of that number, and player 2 gets all of those points.

The players then switch turns: player 2 chooses an uncircled number and gets those points, and player 1 circles all of the factors of that number that are not already circled and gets those points. If a player chooses a number that has no uncircled factors left, the player gets those points, but the other player gets 2 turns in a row.

Play continues until there are no uncircled numbers that have any uncircled factors left.

1	2	3	4	5	6
7	8	9	10	11	12
13	14	15	16	17	18
19	20	21	22	23	24
25	26	27	28	29	30

Autumnal Equinox (7-9)

Name_____ Date_____

You know that we have four seasons: spring, summer, fall, and winter. Do you know why we have them?

The Earth tilts on its axis. Its angle to the sun slowly changes as it orbits the sun. Where the Earth tilts away from the sun, the days are shorter than the nights. Sunlight is weaker. Weather gets colder. This causes winter. Where the Earth tilts towards the sun, days are longer and sunlight is stronger. It is summer.

Because of the way the Earth tilts, a season in the northern half of the Earth – the Northern Hemisphere – is always the opposite of that in the Southern Hemisphere. When the north tilts away from the sun and has winter, the south tilts towards the sun and has summer.

A **solstice** is when the angle of the Earth to the sun is at its greatest or least. This happens in December and June. The winter solstice has the shortest day and longest night. The summer solstice has the longest day and shortest night.

Twice a year, the days and nights are the same length everywhere on Earth. This is called an **equinox**. On this day, the day and the night are an equal length, 12 hours. There is a March equinox and a September equinox.

In the Northern Hemisphere, the September equinox, which happens around September 22nd, is called the **autumnal** equinox, because it marks the beginning of fall for that hemisphere. In the Southern Hemisphere, the autumnal equinox happens in March.

After the autumnal equinox, days continue getting shorter as the Earth tilts farther away from the sun. The shorter days and weaker sunlight mean the weather gets colder until, about three months later, we have winter.

Choose the best answer to the questions below.

1. Summer in the Northern Hemisphere is winter in the Southern Hemisphere. Why?
   a. It is warmer in the North.
   b. When the Northern Hemisphere tilts towards the sun, the Southern Hemisphere tilts away and vice versa.
   c. There are more beaches in the Northern Hemisphere.
   d. The oceans are colder in the Southern Hemisphere.

2. How long is the day on the autumnal equinox?
   a. 8 hours
   b. 10 hours
   c. 12 hours
   d. 14 hours

3. The autumnal equinox marks the beginning of what season?
   a. Spring
   b. Summer
   c. Fall
   d. Winter

Autumnal Equinox (cont'd)

4. In the Northern Hemisphere, the autumnal equinox occurs in what month?
   a. March
   b. June
   c. September
   d. December

5. Many cultures traditionally mark the solstices and equinoxes with holidays. Can you think of any holidays or celebrations that take place around the autumnal equinox or in the fall?

Use complete sentences to answer the questions below.

1. Describe a situation when it is important to know when the autumnal equinox is.

2. Tell about something in the story that reminds you of something you or your family has done.

3. After reading the story what do you think is meant by equinox?

4. What did you learn about equinoxes and solstices that you did not know? How might you use that new information?

Rules, Rules, Rules (7-9)

Part 1 (5 minutes)

Team Name: _____

There are many rules that fit the information in the In-Out table below:

In	Out
5	16

For example, 3(5) + 1 is a rule that produces 16. Another might be $(5)^2 - 9$.

What You Will Do
Find as many rules as you can that fit the information in the In-Out table. You can use any operations you want as many times as you want in the same rule.

Record your rules in this table

Rules, Rules, Rules (cont'd)

Part 2 (10 minutes)

What You Will Do
Find as many rules as you can that fit BOTH rows of this table.

In	Out
1	2
2	5

Record your rules in this table

Judges Use Only

Points

Effort/Enthusiasm	20 points	Team Name:
Part 1	2 points per rule	Total Points:
Part 2	5 points per rule	

Understanding Mean, Median and Mode (7-9)

Name _____ Date _____

Materials: ball of string, scissors, meter stick or yardstick

Please work together in groups of at least four members.

Directions:

1. Use string to measure the length of a person's outstretched arm, from the tip of the middle finger to the shoulder. Mark the string. Beginning from the mark you just made from the end of the first person's arm length, measure the length of another group member's outstretched arm. Mark the string and repeat the process until everyone's arms have been measured on the same string.

2. Cut the string at the last mark. You now have one length of string that is equal to the combined lengths of all the arms in your group. Measure and record the entire length of the string.

3. Cut the string into equal-length sections so that there are as many sections as there are members of your group. Measure and record the length of one section.

Questions:

1. What does the length of one section represent? Explain.

2. Use a metre stick and measure the length of one section. Length_____

3. Does it matter which student gets measured first and which last? Explain.

4. If you add a new person to your group and repeat the steps, will your equal-length section be longer or shorter than your original equal-length section? Explain.

Understanding Mean, Median and Mode (cont'd)

5. What calculations can you do to find the mean of any set of numbers?

6. How would you cut the string to find the median arm length? the mode of the arm lengths? Explain.

7. Which is most representative of the arm lengths in your group – the mean, median or mode? Explain.

8. What would have to be true about the arm lengths in your group in order for the mean, median and mode to be the same number? Explain.

Extension
If time permits, measure everyone's arm with the metre stick or measuring tape. Add the values together and divide by the number of members in the group. Do you get the same value as your answer to #2? Why does this happen?

Adapted from ***Understanding the Mean*** (www.teachervision.com)

Connect Four (7-9)

Rules for Connect Four

Each pair of players needs two paper clips and about 10 counters in each of 2 colors for a total of about 20 counters. Alternatively, they can mark directly on the game board, with each player using a different color of pencil or one person using X's and the other using O's.

The player that starts, places the paper clips on two numbers on the strip of numbers below the game board. That player then uses one of his/her colored counters to cover the sum of those two numbers on one square of the game board. The second player moves exactly one of the paper clips to make a second sum. The second player then places his/her counter on the sum of the two numbers on the game board. Play alternates until one player connects four of his/her own color either horizontally, vertically, or diagonally.

Of course, players will want to block each other so there can be a lot of strategy involved in playing the game.

Connect Four – Adding Integers

1	4	2	5	3	-9	12
10	-1	-4	-2	-5	-11	11
-10	6	7	8	-7	-3	3
-9	0	4	-3	-4	2	0
-2	10	1	-8	-9	-1	9
-8	5	0	8	-12	-10	-6

-6	-5	-4	-3	-2	-1	1	2	3	4	5	6

Connect Four (cont'd)

Multiplying Integers

1	4	2	5	3	-36	24
36	-1	-4	-2	-5	-24	30
-30	6	25	20	-18	-25	18
-24	16	15	-3	-16	-20	12
-12	10	30	12	-9	-15	9
-8	12	24	8	-12	-10	-6

-6	-5	-4	-3	-2	-1	1	2	3	4	5	6

The Human Circle Graph (7-9)

Directions:

- You will be given a strip of paper the same color as your eye color – brown, green, or blue; if you have any other eye color, you will be given a strip of white paper.
- You will stand in a circle with your classmates, arranged according to your eye color.
- Hold your strip of paper and tape it to the paper of the person on each side of you. Continue to hold your paper.
- The persons at the end of each eye color section will hold a length of string between them at one end. The other end will be held by someone (not normally part of the class) standing at the centre of the circle.
- Someone will take a digital picture of the "human circle graph".
- When the activity is finished, answer the questions below.

Questions:

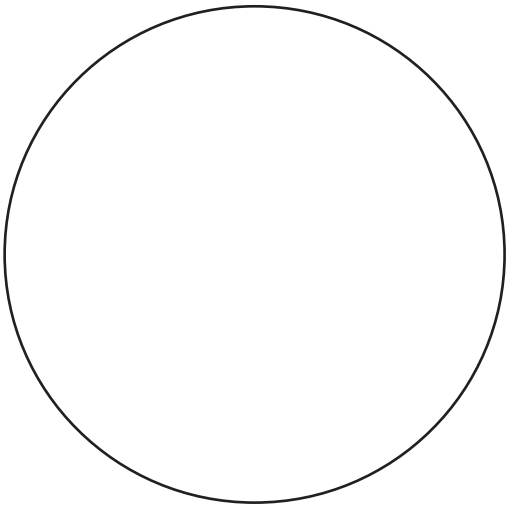
1. Create a sketch of the human circle graph below. Include the strings from the centre, and place the number of people for each eye color in each section.

2. How many people were in the circle (not including the person in the centre)?

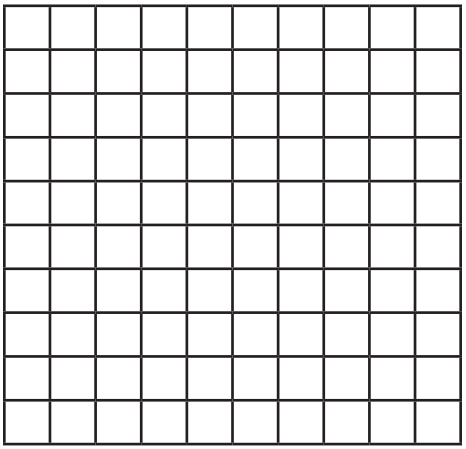
3. How many people were in each eye color section?
   Blue eyes: Green eyes: Brown eyes: Other Color:

4. Show your calculations and work for each of the following questions. If you cannot remember how to find percent, remember that one way is to use a 10 by 10 grid to determine how much of the whole group is represented by 1%.

   What percentage of the group had:
   a) blue eyes? b) green eyes? c) brown eyes? d) eyes of another color?



10 by 10 grid if needed for your percent calculations



Autumn Leaf Suncatchers (7-9)

Materials Needed:
- wax paper
- colorful dry leaves
- old crayons or colored candles
- yarn or ribbon
- iron
- scissors

Directions:
1. Pick out several different colorful leaves and press between the pages of a book or magazine to flatten for a day or two.

2. When flattened out, place leaves on the waxed side of a piece of wax paper. Shave bits of crayon or colored candle (adult supervision needed to make crayon shavings) over the leaves and wax paper.

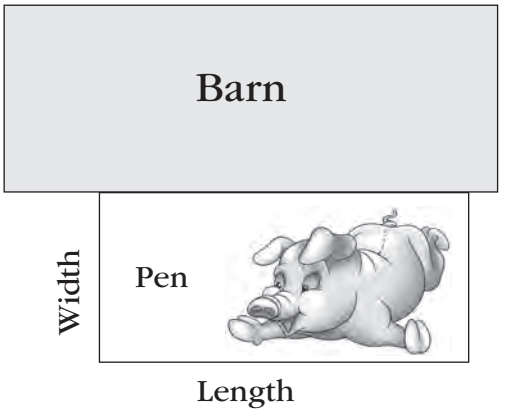
3. Cover with another sheet of wax paper, waxed side down. Set iron on low setting, place an old cloth on ironing board or table to protect it. (Adult supervision for ironing)

4. Carefully iron the wax paper for a few seconds until all the wax is melted. Let cool.

5. Cut out shapes and hang them individually with a piece of ribbon or yarn in a window as sun catchers or make a mobile using a hanger.

The Potbelly Pig (7-9)

Simon owns a potbelly pig. He needs to enclose a rectangular pen using 28m of fencing, but one side of the barn will be used as a side of the pen. All the fencing will be used. Your task will be to determine the largest possible area for the pen.



1. Think about some possible widths. Complete the columns for Width and Length, using widths that make sense.

Width (m)	Length (m)	Area (m^2)	As you complete the table, answer each of the following questions:
			a) Are there any widths which are not possible? Why or why not? Fully explain.
			b) Are all the possible widths whole numbers, or are there other possibilities? Explain with the aid of examples.
			c) Once a width has been chosen, how is the length determined?
			d) Write a formula to show how the length can be determined once the width is known. Use ***w*** for width and ***l*** for length.

The Potbelly Pig (cont'd)

2. Using a scale of 1 unit = 1 metre, sketch some of your possibilities for length and width on the graph paper provided.

   a) Although the total amount of fencing used is always the same, what happens to the area as the width is varied?

   b) What do you think is the largest area? Why do you think so?

3. Complete the column for Area in the table. Plot the points (Width, Area) on the grid provided.

   a) Is this a linear or some other type of relationship ?

   b) How is this relationship seen in the graph?

   c) Predict the largest possible area for the corral using

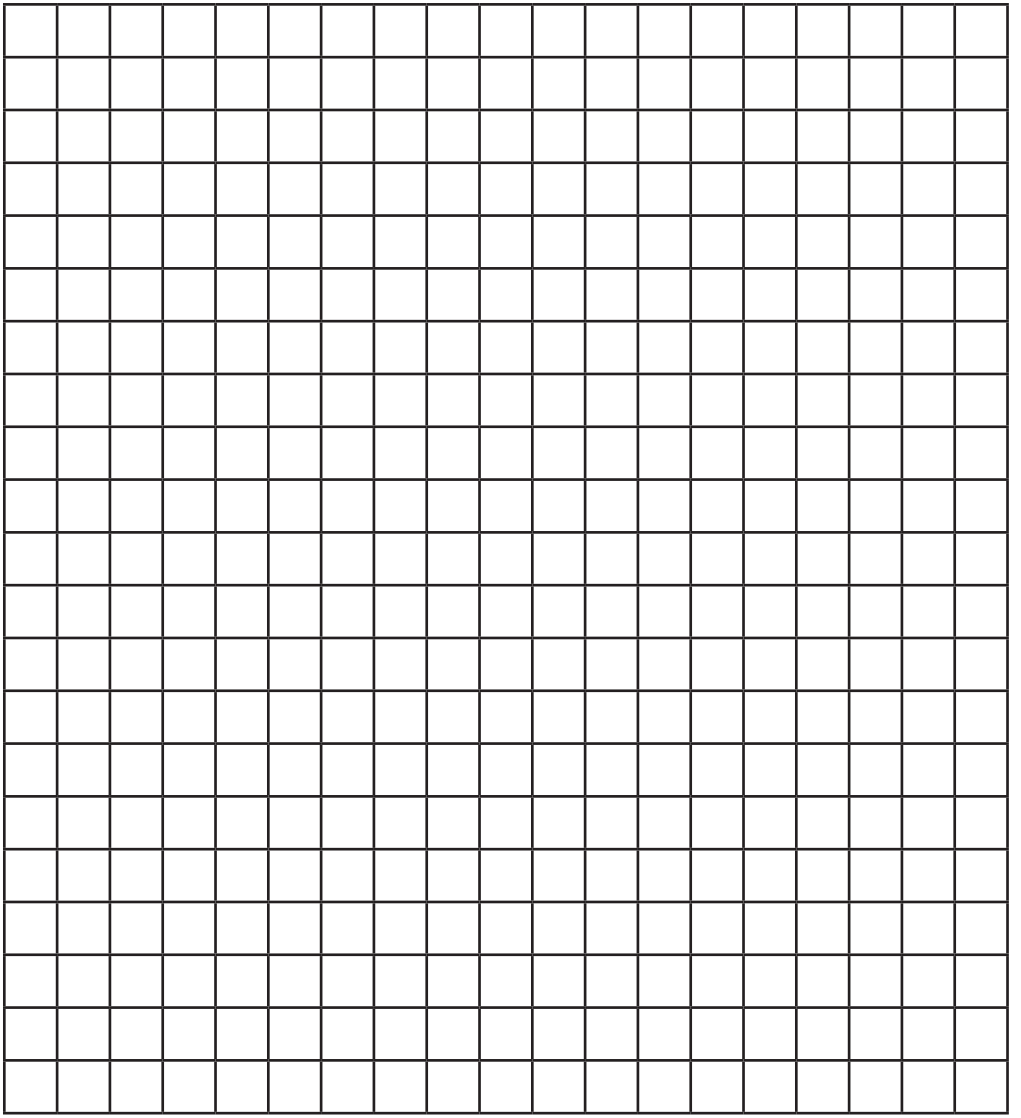
      i) the graph. Explain how you know.

      ii) the table. Explain how you know.

   d) What width should be used to give the maximum possible area?

The Potbelly Pig (cont'd)

Draw each pen on this grid. Record your information in the chart.



Sing it, Say it, Do it (7-12) (20 minutes working time)

Team Name: _____

What You Will Do: Create a song, poem, or short skit about mathematics.

Materials: paper, pen or pencil

Rules
The song, poem or skit should help the audience understand or better remember a topic from mathematics. For example, you might have a song about the first fifteen square numbers and how they represent a parabolic pattern. You will be asked to perform your creation. **The maximum performance time will be one minute!**

Theme Suggestions
The choices are wide open, but here are some possible suggestions:

Mental Math (or estimation)	I'm a real number	The Facto-ring
Linear relationships	Grade 9 math in the world	Tri-a-little-nomial
Geometric shapes	Problem solving	Solving Equations
Volume versus area	Parabolic relationships	Fractions, Decimals
Data management	It's hip to be square	Order of Operations
Graphing	Patterns	Pythagorean Theorem
Probability	The Transformation	Congruence versus Similarity
Square roots	Measurement	Math is Logical
Rational numbers	Poly-the-nomial	Ten Commandments of Mathematics

Judges Use Only

Points

Effort/Enthusiasm	30 points	Team Name:
Math Content	50 points	
Presentation	20 points if performed by group member(s) and stay within time limit **Or** 15 points if performed by group member(s) and does not stay within time limit **Or** 10 points if group convinces someone else to perform and stay within time limit. **Or** 10 points if group convinces someone else to perform and does not stay within time limit.	Total Points:

Popcorn Challenge (10-12) (30 minutes working time)

Team Name: _____

The Story
Popcorn Betty sells popcorn for $1.95 in a cone-shaped container. She makes these containers herself. Now she wants to also make containers that hold exactly three times as much popcorn as the cone-shaped containers. She will sell these containers of popcorn for $3.50.

What you will do: Design the new container for Betty.

Rules
- The new container must have at least one curved surface.
- The container you create CANNOT be a cone.
- Your container must contain EXACTLY three times as much popcorn as the cone.
- Your container must have at least one measurement in common with the cone.

Materials: bristol board, scissors, measuring tape, duct tape, popcorn, sample paper

Popcorn Challenge – Recording Sheet

Cone Measurements	New Container Measurements (*indicate any that are the same as those for the Cone*)
Bonus - Calculate the price of popcorn in the new container per square cm of material used.	Show necessary measurements and calculations here.

Popcorn Challenge (cont'd)

Judges Use Only

Points

Effort/Enthusiasm	20 points	Team Name:
Measurements in common with the cone	10 points per measurement	
At least one curved surface	20 points	
2.75 to 3.25 cones fills container	40 points	Total Points:
Creativity (decoration of container)	10 points	
Bonus – for calculating the price of popcorn in the new container per square cm of material used.	40 points	

A Little Extra Pi (9-12)

Team Name: _____

The Story
The number π is irrational, meaning that its decimal representation never terminates and does not have a repeating pattern. Most calculators only show ten digits in their display, but they actually calculate values much more precisely.

What you are going to do:
You will have to find the digit in 11th place to the right of the decimal point using the calculator provided.

Materials:
- Calculator with ten-digit display and a π button
- Scrap paper

How you did it (you can add or delete rows in the chart as necessary):

Keys we pressed:	What was displayed on the calculator:

Answer: Digit in 11th place to the right of the decimal point is…

Judges Use Only

Valid attempt at solving the problem	20 points	Team Name:
Correct process	50 points	Total Points:
Correct Answer	10 bonus points	

Free Apps for iPod Touch, iPhone and iPad

Apps for Early Learning
- My First Words (great for vocabulary development and categorization)
- Kid Klok (or help with telling time)
- Peek a Boo (different apps for vocabulary, concepts; fun for younger kids)
- Photo Touch Concepts (free version is limited. Photos for concept development)
- ABC Magic (phonics from Preschool University)
- ABC Magic Reading short vowel (from Preschool University)
- Sentence Reading Magic (from Preschool University)
- Pocket Pond (great for sensory; calming; break)
- Dusty D Dawg (story about emotions)
- I Like Books (37 different books, e.g. I like Fall, with this free app (grasshopper apps)
- Actions (pictures of different actions; great for teaching verbs/vocab development)
- Emotions (pictures portraying different emotions (alligator apps)

AAC Apps
- Type n Talk; basic type and speak
- MyVoice has voice out, and text to speech feature
- VideoModelling communication skills: functional skills systems; 80 videos – e.g. Answering the Door

Apps to aid with written output
- Dragon Apps voice input; voice to text (great for those experiencing difficulties with writing)
- TikiNotes word prediction on an alternate access keyboard

Apps for Articulation, Oral Motor, Phonological Awareness/Reading Skills
- ArticPix Free portion includes "th" sound in all word positions
- ABC Magic Phonics from Preschool University
- ABC Magic Reading short vowel from Preschool University
- Sentence Reading Magic from Preschool University
- Reading Skills from Preschool University
- Spelling Magic from Preschool University
- SmallTalk: Phonemes free sample of different sounds
- SmallTalk Oral Motor a number of oral motor exercises are demonstrated
- SmallTalk has 13 free apps, small talk daily activities and so on
- Reading A-Z for leveled readers, interactive, no audio output

Apps for Math
Fraction Reduction
Algebra (free demo)

Suggested Web Sites

Bully Prevention Websites:

www.pinkshirtday.ca

www.youtube.com/watch?v=OzfYL51e3HI

www.bullying.org/htm/main.cfm?content=1113

www.stopabully.ca/bullying-resources/anti-bullying-videos

www.cyberbullying.ca

www.prevnet.ca

Science Websites:

www.science-sparks.com/2012/10/31/science-based-activity-ideas-for-autumnfall/

www.kidactivities.net/category/seasonal-fallautumn-sciencenature.aspx

www.eduplace.com/monthlytheme/september/fall.html

www.scholastic.com/teachers/collection/autumn-lesson-plans-and-ideas

urbanext.illinois.edu/fallcolor/education.cfm

Math Websites:

www.aplusmath.com/games/matho/MultMatho.html

www.aplusmath.com/Games/Concentration/Multiplication_Concentration.html

www.gamequarium.com/multiplication.html

www.aplusmath.com/games/picture/MultPicture.html

www.playkidsgames.com/games/Tunnel/MULTIPLY.HTM#

Social Studies Websites:

www.pearsoned.ca/highered/divisions/text/wright/data/Activity_Ideas.pdf

www.linktolearning.com/grade6ss.htm

www.kbteachers.com/social-studies/

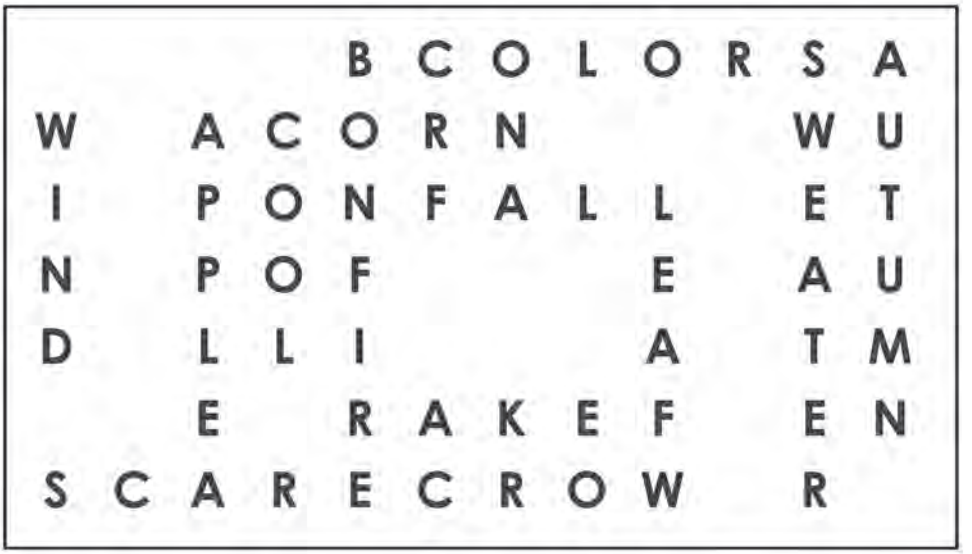
www.edu.gov.mb.ca/k12/cur/socstud/foundation_gr6/blms/

www.carcpd.ab.ca/social/classroomResources/gradeLevelSites.html

www.discoveryeducation.com/teachers/free-lesson-plans/index.cfm

Activity Sheet Answers

Autumn is Awesome (page 4)



All About Fall (page 9)
1. c
2. b
3. a

Fall Fun Vocabulary (page 16)
1. c – keeping
2. b – to come off of
3. d – shaking
4. d – looking at something nice
5. a – soft wind

Fall Fun Vocabulary (page 17)
1. b – so she can make a picture out of them
2. - rakes them into a pile
   - cleans them up and puts them in pumpkin bags
   - makes pictures out of them
   Also accept: plays in them
3. Answers will vary

Leaf Races Worksheet #1 (page 19)

1. When does this story most likely take place? c
2. Why did Eli help Kendall rake leaves? d
3. Two players begin at one side of the yard and drag their rakes to the other side. The rake must touch the ground at all times so they pick up leaves. The first player to the other side of the yard wins.
4. They dumped some leaves out of the bags so they could jump in them again.
5. What lesson can be learned from this story? b

Leaf Races Worksheet #2 (page 20)

1. rake – g
2. shed – e
3. fence – h
4. rematch – a
5. scooped – f
6. trailing – b
7. hooted – d
8. delight – c

Scariest Scarecrow Worksheet #1 (page 23)

1. pumpkins, apples and corn
2. It was ruined in a storm
3. d. He chose cloths that Uncle Darrell probably wouldn't want any more.
4. c. large stick that can be pushed into the ground
5. d. at Ben's uncle's farm, in the fall

Scariest Scarecrow Worksheet #2 (page 24)

1. quick
2. pumpkins
3. hayride
4. flannel
5. attached
6. raced

Nature's Rainbow Worksheet #1 (page 27)

1. d. on a class field trip to the woods
2. b. in autumn
   The third paragraph of the story says it's fall and there are colored leaves all around.
3. He was given a list of colors. He needed to find something in nature for each color.
4. a. because he was outside when he was using it
5. water and the sky

Nature's Rainbow Worksheet #2 (page 28)

1. assignment – h
2. peek – g
3. focusing – e
4. stream – a
5. reflects – f
6. dense – b
7. rushed – d
8. reddish – c

Autumnal Equinox (pages 42-43)

Multiple-choice:

1. b
2. c
3. c
4. c
5. Answers will vary but may include the following: Thanksgiving, Halloween, All Souls' Day, All Saints Day, Columbus Day, Labor Day, Yom Kippur, Harvest Fairs

Short-answer:

1. Answers will vary. Accept logical, realistic answers.
2. Answers will vary. Accept logical, realistic answers.
3. Equinox = day when day and night are of equal length.
4. Answers will vary. Accept logical, realistic answers.

13-008Sept/2013