H1N1: The Flu and You

Main Menu

Open the lesson file at the main menu.

Introduce the lesson. Ask students to raise their hands if they have ever had the flu or if they know someone who has the flu now.

Say: You have probably all heard a lot about the flu recently. Today you're going to learn some facts about what causes the flu. You'll also learn about things you can do to stay healthy and to prevent the flu from spreading.





When you are ready to begin Section 1, click the green arrow in the top box to display screen 1.1, "What causes the flu?"

Section 1 – Causes: What causes the flu?

Screen 1.1 – What makes you sick?

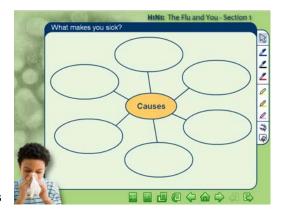
Point to the word *Causes* at the center of the idea web and say the word aloud. Solicit students' ideas about the causes of illness and disease.

How this screen works:



As students offer ideas, use one of the pen tools to write them in the blank ovals of the web.

(Possible responses: germs, bad food, poisons or chemicals in the air and water, passed down from parents)



Say: There are many different illnesses and diseases and many different causes of illness and disease.



When you are ready to move on, click the next screen arrow in the lower right to display screen 1.2, also titled "What makes you sick?"

Section 1 – Causes: What causes the flu?

Screen 1.2 – What makes you sick?

How this screen works:



With the Select Tool, click on Zoom 1, 2, or 3. Move the lens over the image to reveal the germs contained in the spray.



Click the page reset button to turn the microscope function off.

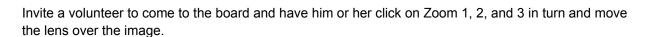
Read aloud the text on screen.



Vocabulary: Review the meaning of **germs** or click on the word and teach it now using the Glossary page. To return to the slide from the Glossary page, click on the word in the list on the right.

Ask: What is happening in this picture? (the boy is sneezing)

Say: Let's have a closer look at what he's sneezing out.

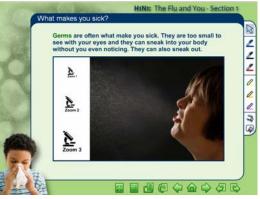


Ask: What does the microscope reveal? (germs)



When you are ready to move on, click on the next screen arrow in the lower right to display screen 1.3, "Where are germs?"

Section 1: Causes





Section 1 – Causes: What causes the flu?

Screen 1.3 – Where are germs?

Read aloud the text on screen.

Say: Look at each one of these pictures. We know that germs are everywhere. In each picture, where would a person most likely come into contact with germs?

How this screen works:



With the Select Tool, click on the image of the magnifying glass in the lower right corner to toggle it on and off.



Move the lens over the images to reveal the germs.

Invite a student to the board and have him or her move the magnifying glass over the images to reveal the germs on the objects.

Ask: How do you think the germs got on these things? (Possible responses: from the air; from animals; from a sick person)







When you are ready to move on, click the next screen arrow in the lower right to display screen 1.4, "How do germs travel?"

© 2010 ePublishingPartners, Inc. Section 1: Causes Page 4 of 9

Section 1 - Causes: What causes the flu?

Screen 1.4 – How do germs travel?

How this screen works:

- Click the play button in the video pane to start the video.
- While the video is running, you can click the pause button to stop it at any point.
- You may also start the video over using the back-to-start button
- Click the stop button to stop the video and reset it at the beginning.



Read aloud the text above the video pane.



Vocabulary: Review the meanings of **virus, H1N1 influenza**, and **swine flu** or click on the words and teach them now using the Glossary page. To return to the slide from the Glossary page, click on the word in the list on the right.

Say: Now, watch this video and see if you can tell what is happening.

Play the video twice. During the second run-through, when the virus-laden droplet fills the screen, pause the video for several seconds before allowing it to play out.

Ask: Who can describe what happened in the video?

Ask a volunteer to describe what occurs in the video. Call on other students to add further details.

Read aloud the text below the video pane.

Say: This video shows one way that a virus can travel from one person to another. Can you think of other ways that viruses might make that journey?

Lead students to understand the most common route of virus transmittal: An infected person coughs or sneezes, leaving virus-laden droplets on a nearby surface. A second person touches the surface and picks up still-living virus particles on their hands. Then, before washing their hands, they touch their mouth, nose, or eyes, through which the virus enters the body.



When you are ready to move on, click the next screen arrow in the lower right to display screen 1.5, "How does the flu virus spread?"

Section 1 – Causes: What causes the flu?

Screen 1.4 – How does the flu virus spread?

Say: You've learned that the flu virus can travel easily from one person to another, and you know that it can travel in spray from coughs and sneezes. Let's see how the flu virus spreads through a population.

Point to the image at the center of the screen.

Say: This is Marvin. He's been sneezing and coughing. He has the flu, but he doesn't know it.

Click on the image. Four new images will appear.

Say: Four people who ate lunch in the cafeteria with Marvin picked up the flu virus from him. Now they're coughing and sneezing, too.

Click on the image of Marvin again and continue in this way until the screen is populated with "flu sufferers."

Say: You can see that, if left unchecked, the flu virus could overtake an entire school. It could spread through a town, a city, or a state. Fortunately, there are things that can protect us from the flu.







When you are ready to move on, click the next screen arrow in the lower right to display screen 1.6, "How does your body protect you from the flu?"

Section 1 - Causes: What causes the flu?

Screen 1.6 – How does your body protect you from the flu?

How this screen works:



With the Select Tool, click on an image to hide the mask and reveal the text. Begin with the upper left.

Read aloud the text on screen: Most viruses that get into your body never have a chance to make you sick.

Ask: Does anyone know why this statement is true? (Possible responses: your immune system; because you have already had that virus)

Solicit and discuss students' responses.

Reveal the text under the image at the upper right.

Read aloud the text on screen: That is because your blood has antibodies that attack the virus and keep it from multiplying.



Vocabulary: Review the meaning of antibodies or teach the word now using the Glossary page. To return to the slide from the Glossary page, click on the word in the list on the right.



Reveal the text under the image at the lower left.

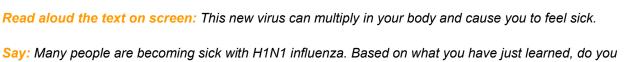
Read aloud the text on screen: Sometimes a new virus comes along that your body doesn't recognize.

Ask: What do think might happen if a new virus gets into your body? (Possible response: It will make you sick.)

Solicit and discuss students' responses.

Reveal the text under the image at the lower right.

Say: Many people are becoming sick with H1N1 influenza. Based on what you have just learned, do you think H1N1 influenza is a new virus or an old virus? (new)



Extend

Explain: The H1N1 virus, or a virus almost exactly like it, has actually been around for a long time. But people have not come in contact with it for many years – since before you were born. Some people over 60 did come in contact with it when they were young. Their bodies recognize this virus and can fight it off. Your bodies do not recognize H1N1, and it could make you sick.

This concludes Section 1. You may either use the available assessment items, or move on to Section 2.



To use the assessment items now, click on the Assessment icon at the bottom of the screen to display the Section 1 Review & Assessment items.



To move directly to Section 2, click on the Next Section icon at the bottom of the screen.

Section 1 – Causes: What causes the flu?

Assessment

Use questions 1-3 to test comprehension of information in this section of the lesson.

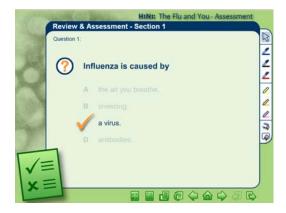
How the assessment screens work:



To display the correct answer for each assessment item, click on the question mark icon.



To proceed to the next item, click on the next screen icon at the bottom of the screen.



Question 1:

Influenza is caused by

- A. the air you breathe.
- B. sneezing.
- C. a virus.
- D. antibodies.

Question 2:

Which statement is true?

- A. Viruses are the cause of all illnesses.
- B. Your body can protect you from many viruses.
- C. Viruses can be seen with the naked eye.
- D. Viruses do not spread easily from one person to another.

Question 3:

H1N1 Influenza is also known as

- A. bird flu.
- B. Asian flu.
- C. swine flu.
- D. seasonal flu.

If you administer assessment items between sections, when you are ready to teach the next section:



Click on the Main Menu icon at the bottom of the screen and then click on the green arrow for the next section you wish to present.

Alternatively:



If you are administering all assessment items for the entire lesson, use the next screen icon to proceed to the items for Section 2.

Section 2 – Symptoms: Is it a cold or is it the flu?

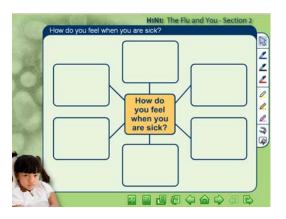
Screen 2.1 – How do you feel when you are sick?

Point to the text at the center of the idea web.

Read aloud the question on screen: How do you feel when you are sick?

Invite students to come to the board one at a time, identify an illness they had, state one symptom they experienced, and write it in a blank area of the Idea Web.

Alternatively, write responses as students offer them from their desks.



HINI: The Flu and You - Section :

Symptoms

How this screen works:



Use one of the pen tools to write the students' responses in the blank spaces of the web.

If students have a hard time identifying symptoms, ask questions to prompt responses:

- When you have a cold/the flu, what else happens in your body?
- Has anyone ever had poison ivy/measles/chickenpox? What were the symptoms?



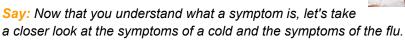
Once the idea web has been filled in, using the Select tool, click on the center box to hide the mask and reveal the word "Symptoms".

Say: These are all symptoms.



Vocabulary: Review the meaning of symptom or teach the word now using the Glossary page. To return to the slide from the Glossary page, click on the word in the list on the right.

Say: Now that you understand what a symptom is, let's take





When you are ready to move on, click the next screen arrow in the lower right to display screen 2.2, "Is it a cold or is it the flu?"

2

4

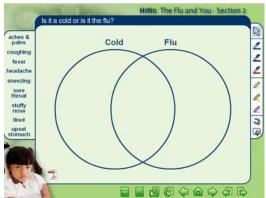
Section 2 – Symptoms: Is it a cold or is it the flu?

Screen 2.2 - Is it a cold or is it the flu?

Say: Colds and the flu are caused by different viruses. They are different illnesses. But they share some of the same symptoms. In fact, the symptoms are so much alike, it can be easy to confuse these illnesses. We can use this Venn diagram to show the symptoms that colds and the flu do and do not share.



Vocabulary: Review the meaning of **fever** or click on the glossary icon and teach the it now using the Glossary page. To return to the slide from the Glossary page, click on the word in the list on the right.



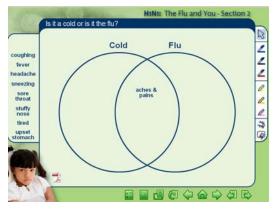
Explain that cold symptoms should go in the left section of the diagram, flu symptoms in the right section, and shared symptoms in the middle section.

How this screen works:



Demonstrate: With the Select Tool, click on the first symptom in the list on the left of the screen (aches and pains), hold and drag it to the middle section of the Venn diagram, and release.

Say: I get aches and pains when I have a cold and when I have the flu. I'm going to put aches and pains in the middle section under both Cold and Flu.



Invite students to the board one at a time to place a symptom from the list in the diagram. Discuss each student's choice as a class to arrive at a consensus about the correct placement.

Ask: Based on our diagram, which symptoms make the flu different from a cold? (fever, headache, sore throat, upset stomach)

Lead students to the understanding that, if they have cold like symptoms but also have a fever, headache, sore throat, and/or upset stomach, they may actually have the flu.



When you are ready to move on, click the next screen arrow in the lower right to display screen 2.3, "Is it a cold or is it the flu?"

Section 2 – Symptoms: Is it a cold or is it the flu?

Screen 2.3 - Is it a cold or is it the flu?

Materials: Students will need pen or pencil and paper to complete the activity.

Say: You've learned about the symptoms of a cold and the symptoms of the flu. Now let's put your knowledge to use.

Read the heading aloud: Is it a cold or is it the flu?

Say: Corrie and Jamal are both sick. Let's see if we can identify their symptoms and diagnose their illnesses.





Vocabulary: Review the meaning of **diagnose** or click on the glossary icon and teach the word now using the Glossary page.

Say: First, we'll listen to Corrie's story. Listen to identify Corrie's symptoms. When you hear a symptom, write it down on your paper.



With the Select Tool, click on the picture of the boy on the left to play the related audio.

When the audio has finished playing, invite students to the board one at a time.



Have each student use a pen tool to check off one symptom from his or her list on the clipboard on the left.

Ask: Based on Corrie's symptoms, what illness do you think he has? (flu)



Switch back to the Select tool to click and drag the "diagnosis?" box down to reveal the correct diagnosis for Corrie. Then click on the [check the symptoms] link to reveal a correctly completed checklist for Corrie.

Repeat the activity for Jamal.

Extend

Explain: Doctors do not rely on symptoms alone to diagnose illnesses. Many illnesses and diseases besides flu and cold share symptoms and can be confused. Doctors have many tests and tools to help them make diagnoses. It is important to know exactly what illness or disease a person has because the treatment for one illness may be bad for another one.



When you are ready to move on, click the next screen arrow in the lower right to display screen 2.4, "What should you do if you get the flu?"

Section 2 – Symptoms: Is it a cold or is it the flu?

Screen 2.4 – What should you do if you get the flu?

Read aloud the text on screen.

Say: You have learned what causes the flu and how to recognize the flu if you have it. Now you'll learn about the proper treatment for the flu.



Vocabulary: Review the meaning of **treatment** or click on the glossary icon and teach the word now using the Glossary page. To return to the slide from the Glossary page, click on the word in the list on the right.



Say: Look at each of these pictures. Each picture shows part of the treatment for the flu. I will ask volunteers to say what a picture shows and how this can help you if you have the flu.

Call on a student to describe the first picture and share his or her idea about the treatment it represents.

How this screen works:



With the Select Tool click on the picture to hide it and reveal the text.

Read aloud the text on screen or have the student read it to the class. As a class, compare the student's response to the information in the text. Students may suggest ideas that do not match the text but that are sensible. For instance, taking a bath helps to relieve a sore throat as the text states, and it can also be restful.



Repeat for the remaining pictures. You may wish to expand upon the provided text for the following two images:



Say: Medicines like Tylenol can help to reduce a fever and relieve aches and pains. Some medicines, like Tamiflu, are made specifically to treat the flu and require a prescription from a doctor. It is a good idea to always get a doctor's advice before you take any medicines.



Explain how to gargle: Stir one-half teaspoon of salt in a cup of warm water. Take a mouthful of the salt water but do not swallow it. Tilt your head back and push air from your throat up through the salt water to make it bubble. Do this for about 10 seconds. Then spit the water out. Repeat three or four times.

This concludes Section 2. You may either use the available assessment items, or move on to Section 3.



To use the assessment items now, click on the Assessment icon at the bottom of the screen to display the Section 2 Review & Assessment items.



To move directly to Section 3, click on the Next Section icon at the bottom of the screen.

Section 2 – Symptoms: Is it a cold or is it the flu?

Assessment

Use questions 4-7 to test comprehension of information in this section of the lesson.

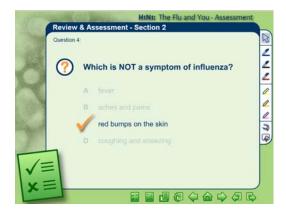
How the assessment screens work:



To display the correct answer for each assessment item, click on the question mark icon.



To proceed to the next item, click on the next screen icon at the bottom of the screen.



Question 4:

Which is NOT a symptom of influenza?

- A. fever
- B. aches and pains
- C. red bumps on the skin
- D. coughing and sneezing

Question 5:

People might confuse a cold and the flubecause

- A. the flu usually starts with a cold.
- B. they are caused by the same virus.
- C. they both make people sick only in the winter.
- D. they have similar symptoms.

Question 6:

Imagine that you are sick, and you call your doctor. What will the doctor most likely do first?

- A. ask you what symptoms you have
- B. tell you that you probably have the flu
- C. decide what medicine you should take
- D. tell you that you will be fine

Question 7:

If you have the flu, which is NOT something you should do?

- A. take baths or showers
- B. get lots of exercise
- C. drink plenty of fluids
- D. keep tissues nearby

If you administer assessment items between sections, when you are ready to teach the next section:



Click on the Main Menu icon at the bottom of the screen and then click on the green arrow for the next section you wish to present.

Alternatively:



If you are administering all assessment items for the entire lesson, use the next screen icon to proceed to the items for Section 3.

Section 3 – Prevention: How do you avoid getting sick?

Screen 3.1 - What can you do?

Say: You are all going to become Flu Busters. A Flu Buster has three goals:

- 1) to avoid getting the flu;
- 2) to avoid spreading the flu to others if you have it; and
- 3) to spread the word about how to avoid getting or spreading the flu.





When you are ready to move on, click the next screen arrow in the lower right to display screen 3.2, "Goal #1 – Avoid Getting the Flu".

Section 3 – Prevention: How do you avoid getting sick?

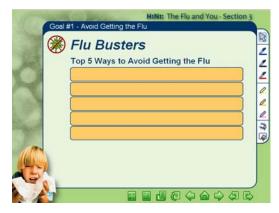
Screen 3.2 - Goal #1 - Avoid Getting the Flu

Materials: Students will need paper and pen or pencil to complete the activity.

Read the heading aloud: Top 5 Ways to Avoid Getting the Flu.

Say: Your first goal as a Flu Buster is to avoid getting the flu. I could uncover this list of the top five ways to avoid getting the flu. But, instead, you're going to think about what you already knew about the flu and what you have learned about it today to come up with lists of your own.

Explain: The class will divide into five numbered groups. Each group will talk it over and compose a list of five preventive measures, or ways to avoid getting the flu. Groups will take turns: a spokesperson from each group will read aloud one item from his or her group's lists. If there is a match in the list on the board, it will be revealed. A match scores 10 points. A valid and sensible way to avoid getting the flu that does not appear on the board scores 5 points. The game will continue until all items on the board have been revealed or until students have offered all of their preventative measures.





Give groups five minutes to compose their lists. Check in with each group. If students are struggling to come up with five measures, provide sentence frames as prompts:

- You can catch the flu from someone who has it. Therefore _____
- The flu virus can get into your body through your eyes, nose, and mouth. Therefore _____.
- The flu virus can travel on hands. Therefore ______.
- A healthy body can fight off the flu. Therefore ______.

Once all groups have finished their lists, proceed with the game. If a group gets a match, you may reveal it as described below. You may use the pen tool to record non-matching ideas as well.

How this screen works:



Use the Select Tool to click on the mask covering the item to hide it and reveal the text.



Use the Pen Tool to write the group's number next to the item and to keep a list of measures offered by students that do not appear on the list, writing the group's number next to each one.

If students have offered all of their measures and failed to come up with one that appears on the board, discuss as a class. Ask leading questions to help students arrive at the measure.

The contents of the screen are as follows:

Top 5 Ways to Avoid Getting the Flu

- 1. Wash your hands with soap and water frequently.
- 2. Stay away from people who are sick.
- 3. Avoid touching your eyes, nose, and mouth.
- 4. Stay strong and healthy get plenty of sleep, exercise, and eat right.
- 5. Get a flu shot.



When you are ready to move on, click the next screen arrow in the lower right to display screen 3.3, "What is a flu shot and why does it help?"

Section 3 – Prevention: How do you avoid getting sick?

Screen 3.3 – What is a flu shot and why does it help?

Read aloud the question on screen: What is a flu shot and why does it help?

Solicit ideas from students and discuss their ideas as a class.



Click on the blue arrow below the question to reveal the next portion of text.

Read aloud the text on screen.



Vocabulary: Review the meaning of **vaccine** or click on the word and teach it now using the Glossary page. To return to the slide from the Glossary page, click on the word in the list on the right.



Click on the blue arrow to reveal a second paragraph.

Read aloud the text on screen.



Click on the blue arrow to reveal a third paragraph.

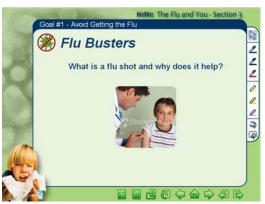
Read aloud the text on screen.

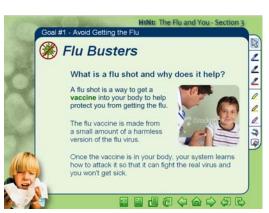
Extend

You may choose to present facts specifically pertaining to the H1N1 influenza vaccine. This may be a sensitive topic in some classrooms as parents of some students may have shared negative ideas regarding this vaccine with those students and elected not to have them vaccinated.



When you are ready to move on, click the next screen arrow in the lower right to display screen 3.4, "Goal #2 – Don't Spread the Flu to Others".





Section 3 - Prevention: How do you avoid getting sick?

Screen 3.4 – Goal #2 – Don't Spread the Flu to Others

Read aloud the heading: Goal #2 – Don't Spread the Flu to Others



Vocabulary: Review the meaning of **prevention** or click on the Glossary icon to teach the word now using the Glossary page.

Say: Remember that your second goal as a Flu Buster is to prevent the flu from spreading.

Direct student's attention to the tabs on the left-hand side of the screen.

Explain: Each of these tabs shows something you should or shouldn't do if you have the flu. We need to decide if each one is a Do or a Don't.



Demonstrate: With the Select Tool, drag the top tab to the right to reveal the text.

Read the text aloud: Sneeze or cough into your arm if you don't have a tissue.

Ask: If you have the flu, is this a Do or a Don't? (Do)

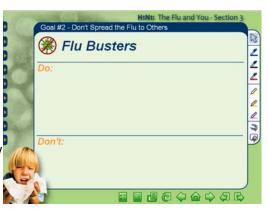


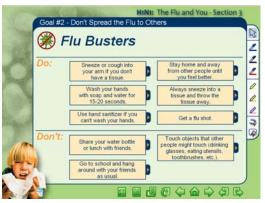
Using the select tool, drag the tab to the Do field.

Invite volunteers to come to the board one at a time. Have each volunteer pull a tab, read the text aloud, place the tab in the **Do** or **Don't** field, and explain their choice. Ask the class to give a thumbs up if they agree with the placement or a thumbs down if they disagree.

For your reference, the contents of the draggable tabs are as follows:

- (Do) Sneeze or cough into your arm if you don't have a tissue.
- (Do) Wash your hands with soap and water for 15-20 seconds.
- (Do) Use hand sanitizer if you can't wash your hands.
- (Don't) Go to school and hang around with your friends as usual.
- (Do) Stay home and away from other people until you feel better.
- (Do) Always sneeze into a tissue and throw the tissue away.
- (Don't) Touch objects that other people might touch (drinking glasses, eating utensils, toothbrushes, etc.).
- (Don't) Share your water bottle or lunch with friends.
- (Do) Get a flu shot.





Learner Response System

If your classroom is equipped with a Learner Response System, you may choose to have students vote on each item.

Reveal a tab and read the text aloud.

Ask: Is this a Do or a Don't?

Have students vote Yes (Do) or No (Don't).

Note the outcome of the response.

Discuss the item as a class, asking volunteers to explain why they voted as they did.

Finally, place the tab in the correct field.



You may also reveal the correct placement by clicking on the small question mark icon on the bottom of the page.



When you are ready to move on, click the next screen arrow in the lower right to display screen 3.5, also titled "Goal #2 – Don't Spread the Flu to Others".

Section 3 – Prevention: How do you avoid getting sick?

Screen 3.5 – Goal #2 – Don't Spread the Flu to Others

Say: You have learned how the flu virus can travel from one person to another.

Read aloud the boxed text: Jayda has the flu. She sneezes into her hand.

Click on the blue arrow to reveal a second box.

Read the text aloud.

Continue revealing and reading text until the progression is complete. (There are 5 text boxes.)

Clicking on the blue arrow in the last box will reveal a question for the class to discuss.

Read the question aloud: What would have kept Tyler from getting sick?



Click on the question mark next to the question to reveal the titles "Jayda could have" and "Tyler could have"





Solicit responses from volunteers and discuss as a class. Write responses in the space below the three dashes under the Jayda title, or below the single dash under the Tyler title.

Clicking on either of the titles will reveal suggestions. Have students compare their own suggestions with those revealed.



When you are ready to move on, click the next screen arrow in the lower right to display screen 3.6, also titled "Goal #2 – Don't Spread the Flu to Others".

© 2010 ePublishingPartners, Inc. Section 3: Prevention Page 7 of 10

Section 3 – Prevention: How do you avoid getting sick?

Screen 3.6 -

; cU', & Ë'8 cbffnGdfYUX'h, Y': `i 'hc'Ch, Yfg'

Read aloud the question on screen. How can a flu shot help prevent the flu from spreading?

Click on the blue arrow below the question to reveal Marvin.

Say: Do you remember Marvin? Marvin has been sneezing and coughing. He has the flu.

Click on the image. Four new images will appear.

Read aloud the text on screen.

Repeat three times until the screen is populated with all of Marvin's friends and family, each time reading the text aloud.

Click [compare] in the lower left corner of the slide to toggle between the scenario in which no one has received a vaccine and that in which some people have been vaccinated.









When you are ready to move on, click the next screen arrow in the lower right to display screen 3.7, titled "Goal #3 - Spread the Word".

Section 3 – Prevention: How do you avoid getting sick?

Screen 3.7 – Goal #3 – Spread the Word

Read aloud the text on screen.

Say: You are all now officially Flu Busters. Congratulations!



This concludes Section 3, and the Lesson.



If you have been administering Assessment items after each section, click on the Assessment icon at the bottom of the screen to display the Section 3 Review & Assessment items.



To administer the Assessment items for the entire lesson, use the main page icon to navigate back to the main menu, then click on the link for Review & Assessment in the lower left.

Section 3 – Prevention: How do you avoid getting sick?

Assessment

Use questions 8-9 to test comprehension of information in this section of the lesson.

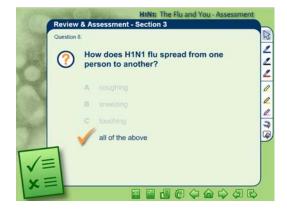
How the assessment screens work:



To display the correct answer for each assessment item, click on the question mark icon.



To proceed to the next item, click on the next screen icon at the bottom of the screen.



Question 8:

How does H1N1 flu spread from one person to another?

- A. coughing
- B. sneezing
- C. touching
- D. all of the above

Question 9:

True or False: Your body must learn to recognize a virus before it can fight it.

- A. True
- B. False

This concludes the Assessment items for the Lesson.



Click on the Main Menu icon at the bottom of the screen to return to the main page and access any other features you may want to display.