Time	Audio	Visual
0:00-0:03	No audio	"Respiratory Hygiene: Snot Gun Runway"
0:04-0:33	We are going to explore the importance of proper respiratory hygiene, teaching students to catch it, bin it, and kill it using our highly popular snot gun activity. This is available in the key stage one, two and three lesson plans on respiratory hygiene available at <u>www.e-Bug.eu</u> . The lesson plans contain some useful discussion points that can encourage students to explore what they know about respiratory hygiene.	Teacher is stood at the front of a classroom, involving the students in a class discussion. Students are contributing to the discussion by raising their hands and answering questions.
0:34-0:46	"Say we cough then the germs from our throat would come out and it'd be everywhere, unless you cough into a tissue, folded it and throw it away and then wash your hands. Then there wouldn't be much trace of germs."	One student is speaking directly to the camera
0:47-0:56	"If you have a tissue or you sneeze into your sleeve, then it won't get as far as if you just let it, you just sneeze without protecting it with anything"	Another student is speaking directly to the camera
0:57-1:05	To set up this activity, join tables together to form a runway, and cover them with flipchart paper. Place rulers along one side of the runway.	The teacher sets up the activity by laying down a large sheet of paper across joined up tables to make a runway, and the students are lined up either side of the runway
1:06-1:17	Fill a pump action spray bottle with water, and a drop of green food colouring to make your snot. You can cover the spray bottle with a character mask to represent the sneezer.	The teacher is holding a spray bottle filled with water, with a Shrek mask placed over the top of the nozzle through the mouth hole so that the water can be sprayed through.
1:18-2:03	While teaching students about the importance of covering coughs and sneezes, this lesson also incorporates elements of scientific working by asking students to make predictions, record observations and compare measurements. To start the activity, introduce the concept of coughs and sneezes to students. Coughing and sneezing is a way in which our body tries to get rid of any harmful microbes and particles.	The teacher is explaining the activity to the students whilst setting up the equipment, and the students are engaging and asking questions.

<ul> <li>Harmful microbes can cause disease.</li> <li>When we sneeze we can spread microbes, including harmful ones, to others. Introduce the character or spray bottle as the sneezer.</li> <li>Ask students to discuss how far they think its sneeze might travel, making predictions on both the length and width of the sneeze.</li> <li>2:04-2:13 These can be recorded on the worksheet provided with each of the sneeze son plans. Students can also place a sticky note on the runway to show their guess for where the sneeze will travel, they are discussing their choice with each other.</li> <li>2:14-2:28 Ask one student to act as the sneezer multing the trigger on the spray bottle, whilst the rest of the class observes how far the sneeze travelled when it is not covered. "It went on mine" "It went on mine"</li> <li>2:29-2:37 Students can neasure how far the sneeze travelled when it is not covered. Students can measure how far the sneeze is now covered in snot. Students can now make a new prediction of how far and how wide the snot spray reached and record their observations.</li> <li>2:38-2:45 The students can now make a new prediction of how far and how wide the snot spray reached and record their observations.</li> <li>2:46-2:59 The students should observe that the hand blocked the sneeze from traveling so far, however, they should also observe that the hand covering the sneeze is now covered in snot. Students can discuss the fact that microbes in the snot are now on their hand blocked the sneeze from things they touch</li> <li>3:00-3:07 Students can discuss the fact that microbes in the snot are now on their hand s and can now spread to other things they touch</li> <li>3:00-3:14 "Look what's happening, it's spreading everywhere to everybody. She hasn't washed her hands yet."</li> <li>The student places the snotty hand all over the orts sixty hands and can now spread to other sticky notes signed sticky notes signed sticky notes is not snot. Students hasn't washed her hands yet."</li> <li>The student places the snotty ha</li></ul>			
<ul> <li>worksheet provided with each of the lesson plans. Students can also place a sticky note on the runway to show their guess for where the sneeze will land.</li> <li>2:14-2:28 As one student to act as the sneezer will and.</li> <li>2:14-2:28 As one student to act as the sneezer will the runway with the spray bottle, whilst the rest of the class observes how far the sneeze travelled when it is not covered. "It went all the way back there!"</li> <li>2:29-2:37 Students should notice that some of their sticky notes are covered in snot. Students can measure how far the sneezer its works and spray reached and record their observations.</li> <li>2:38-2:45 The students should observe that the hand blocked the sneeze from travelling so far, however, they should also observe that the hand blocked the sneeze from travelling so far, however, they should also observe that the hand covering the sneeze is now covered in snot.</li> <li>3:00-3:07 Students can new spread to other things they touch</li> <li>3:08-3:14 "Look what's happening, it's spreading everywhere to everybody. She hasn't washed her hands yet."</li> <li>3:15-3:30 In the final part of the experiment,</li> </ul>		When we sneeze we can spread microbes, including harmful ones, to others. Introduce the character or spray bottle as the sneezer. Ask students to discuss how far they think its sneeze might travel, making predictions on both the length and width of the sneeze.	
<ul> <li>pulling the trigger on the spray bottle, whilst the rest of the class observes how far the sneeze travelled when it is not covered.</li> <li>"It went on mine"         <ul> <li>"It went all the way back there!"</li> </ul> </li> <li>2:29-2:37 Students should notice that some of their sticky notes are covered in snot. Students can measure how far the snot spray reached and record their observations.</li> <li>2:38-2:45 The students can now make a new prediction of how far and how wide the snot might go when the sneeze is covered by a hand.</li> <li>2:46-2:59 The students should observe that the hand blocked the sneeze from travelling so far, however, they should also observe that the hand blocked the sneeze from travelling so far, however, they should also observe that the hand covering the sneeze is now covered in snot.</li> <li>3:00-3:07 Students can discuss the fact that microbes in the snot are now on their hands and can now spread to other things they touch</li> <li>3:08-3:14 "Look what's happening, it's spreading everywhere to everybody. She hasn't washed her hands yet."</li> <li>3:15-3:30 In the final part of the experiment,</li> </ul>	2:04-2:13	worksheet provided with each of the lesson plans. Students can also place a sticky note on the runway to show their guess for where the sneeze will	note on the paper based on how far they think the sneeze will travel, they are discussing their
<ul> <li>their sticky notes are covered in snot. Students can measure how far the snot spray reached and record their observations.</li> <li>2:38-2:45 The students can now make a new prediction of how far and how wide the snot might go when the sneeze is covered by a hand.</li> <li>2:46-2:59 The students should observe that the hand blocked the sneeze from travelling so far, however, they should also observe that the hand covering the sneeze is now covered in snot.</li> <li>3:00-3:07 Students can discuss the fact that microbes in the snot are now on their hands and can now spread to other things they touch</li> <li>3:08-3:14 "Look what's happening, it's spreading everywhere to everybody. She hasn't washed her hands yet."</li> <li>3:15-3:30 In the final part of the experiment,</li> </ul>	2:14-2:28	pulling the trigger on the spray bottle, whilst the rest of the class observes how far the sneeze travelled when it is not covered. "It went on mine"	the runway with the spray bottle, and sprays the liquid over the paper. The students discuss the
<ul> <li>prediction of how far and how wide the snot might go when the sneeze is covered by a hand.</li> <li>2:46-2:59 The students should observe that the hand blocked the sneeze from travelling so far, however, they should also observe that the hand covering the sneeze is now covered in snot.</li> <li>3:00-3:07 Students can discuss the fact that microbes in the snot are now on their hands and can now spread to other things they touch</li> <li>3:08-3:14 "Look what's happening, it's spreading everywhere to everybody. She hasn't washed her hands yet."</li> <li>3:15-3:30 In the final part of the experiment,</li> </ul>	2:29-2:37	their sticky notes are covered in snot. Students can measure how far the snot spray reached and record their	a student and stuck to the paper, have drops of water over them
<ul> <li>hand blocked the sneeze from travelling so far, however, they should also observe that the hand covering the sneeze is now covered in snot.</li> <li>3:00-3:07</li> <li>Students can discuss the fact that microbes in the snot are now on their hands and can now spread to other things they touch</li> <li>3:08-3:14</li> <li>"Look what's happening, it's spreading everywhere to everybody. She hasn't washed her hands yet."</li> <li>3:15-3:30</li> <li>In the final part of the experiment,</li> </ul>	2:38-2:45	prediction of how far and how wide the snot might go when the sneeze is	signed sticky note along the runway, and a new student has the spray bottle ready to be the
<ul> <li>microbes in the snot are now on their hands and can now spread to other things they touch</li> <li>3:08-3:14 "Look what's happening, it's spreading everywhere to everybody. She hasn't washed her hands yet."</li> <li>3:15-3:30 In the final part of the experiment,</li> </ul>	2:46-2:59	hand blocked the sneeze from travelling so far, however, they should also observe that the hand covering	glove, holds their hand over the nozzle of the spray bottle to simulate catching a sneeze in their hand, whilst the sneezer
<ul> <li>spreading everywhere to everybody. She hasn't washed her hands yet."</li> <li>hand all over the other sticky notes on the runway, simulating the microbes spreading from person to person.</li> <li>3:15-3:30 In the final part of the experiment,</li> </ul>		microbes in the snot are now on their hands and can now spread to other	holds their hand out to show it
<b>3:15-3:30</b> In the final part of the experiment, A new student places a tissue	3:08-3:14	spreading everywhere to everybody.	hand all over the other sticky notes on the runway, simulating the microbes spreading from
	3:15-3:30	In the final part of the experiment, students observe the effects of	A new student places a tissue over the nozzle of the spray bottle

	sneezing into a tissue. Again, ask for volunteers amongst your students for one to act as the sneezer and for the other to hold a tissue against the mask.	whilst it is sprayed by the sneezer.
3:31-3:38	In this condition, they should notice that the sneeze is completely contained within the tissue, but that the tissue is now covered in snot.	The student holds the wet tissue with the sneeze contained.
3:39-3:53	Ask the students what to do with the snotty tissue and explain that it should be disposed of in the bin and the students should wash their hands. Finish by reiterating the importance of the phrase catch it, bin it, kill it.	The snotty tissue is shown to all of the students by the teacher, before being passed back to the student.
3:54-4:12	Students can record their observations on the worksheets provided. The resources also contain additional extension activities that can be used for this lesson, including quizzes and wordsearches, or students may want to create their own posters or catchphrases to emphasise the key messages.	All students are sat at their desks completing the worksheets within the lesson plan
4:13-4:32	Closing discussion points are included to consolidate the student's learning. "The hand caught most of it, not as much as the tissue, but it definitely caught more and it stopped it from going as far" "Even if you don't have a tissue and you just – using your hand isn't enough, you should always just wash your hands after"	Students are sat discussing the experiment outcomes around their table.
4:33-4:50	All of the resources, including a step by step guide for this experiment, worksheets, suggested extension activities, and discussion points can all be downloaded for free from our website. Visit <u>www.e-Bug.uk</u> to find out more.	"For the full lesson plan, extension activities, work sheets, answers, and much more visit the e-Bug website: <u>www.e-Bug.eu</u> "
4:51-4:57	No audio	"With thanks to Frith Manor Primary School, Ms. Abigail Symons and Magenta Class"