



# INVESTIGATIONS

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## THE GRUFFALO

Read *The Gruffalo* by Julia Donaldson and Axel Scheffler to your class, and play The Gruffalo Game (all ages). Teachers of older students (Years 2 and up) might also wish to launch The Deep Dark Wood Investigation.

### THE GRUFFALO GAME

Before playing The Gruffalo Game, it is helpful to make sure that your students are familiar with Rock, Paper, Scissors.

In the story, the mouse is scared of the fox, owl and snake, these other animals are all scared of the Gruffalo (and don't seem particularly scared of each other), and the Gruffalo is scared of the mouse.

Invent hand signals for each of the characters and play 20 games of the Gruffalo version of rock-paper-scissors. Record your results and compare them with classmates. How many times did each animal win, lose or draw a round? What might be the reasons for these results?

#### ENABLING PROMPT

Is there one character who seems to perform better than other characters? What would you do if your opponent played this character every time?

#### EXTENDING PROMPT

To make the game more complex, you might also assume:

- The fox is scared of the snake
- The snake is scared of the owl
- The owl is scared of the fox

Play the game another 20 times.

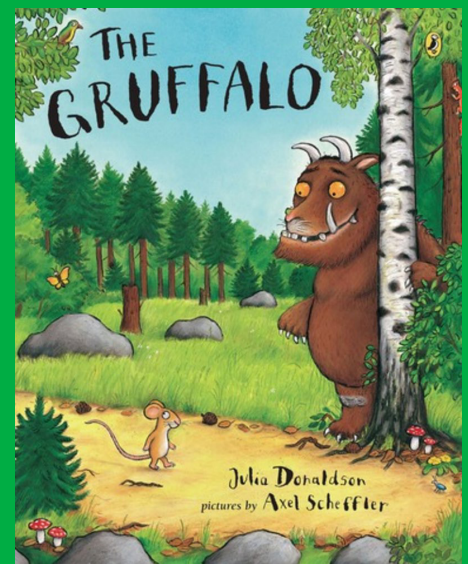
How does this modified version compare to your original results?

### THE DEEP DARK WOOD

The Gruffalo lives in the centre of the Deep Dark Wood, surrounded by thick trees, which is why none of the other animals have ever met it. Using all the information in the story, draw a map of the Deep Dark Wood (on graph paper), labelling all of the animals homes. On your map, can you trace the path the Little Brown Mouse travelled. Make sure your map makes sense with the order events take place in the story.

#### EXTENSION

Can you create a scale for your map of the wood? (Eg 1cm equals 10 metres). According to your map, how far did the mouse walk through the entire story? How far away does the Gruffalo live from the Snake, its closest neighbour in the story? What is the approximate area of the Deep Dark Wood? A typical wood might have between 1000 and 2500 trees per hectare. How many trees might be in your wood?



How did students in your class approach the above investigation? Share your class's experience with the *Prime Number* editorial team (james.russo@monash.edu), for the opportunity to have it published in *Prime Number* as a resource to share with other teachers and students. If possible, try and include photographs of work samples, as well as of students engaging in the task.