Science - Year 4

Living Things & their Habitats – Block 4LvH
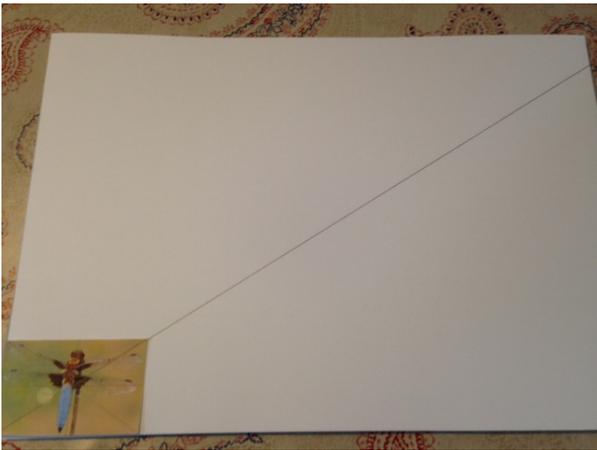
Name That Living Thing!

Session 5

Resource Pack

How to expand an image.

1. Choose a close-up image of an insect. Draw 4 straight lines – diagonally corner to corner, vertically through the centre point and horizontally through the centre point.

2. Place the image in the corner of a large piece of drawing paper (the bigger the better). Using a large ruler, continue the diagonal line until you come to the edge of the large paper.
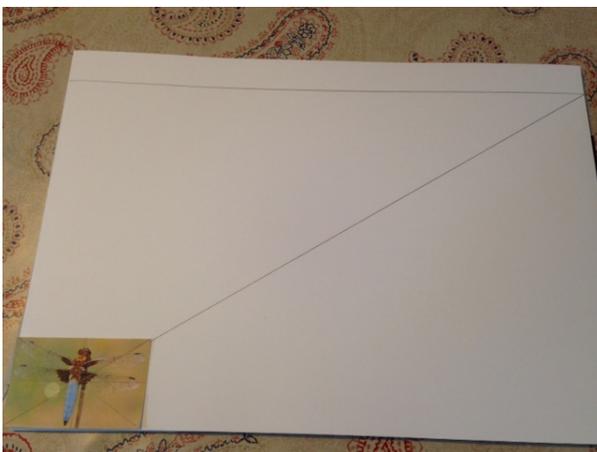
3. As shown, draw a line from the end of the diagonal line across the paper to create a new edge.
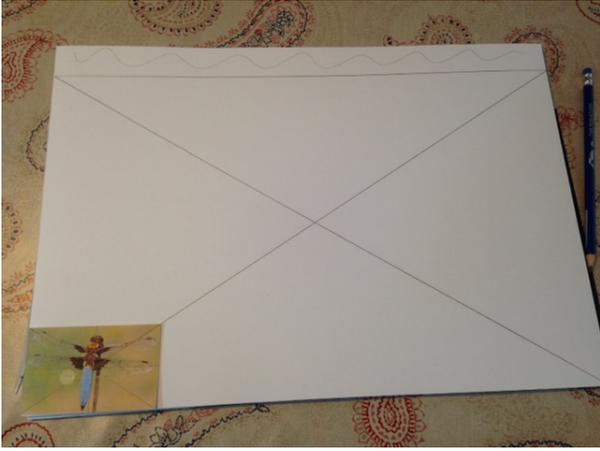
4. Faintly draw the other lines on the large sheet.

5. Cut along all of the lines to create 8 triangles. Mark them on the back to indicate their position. Give each triangle to a different child. They will need to coordinate with the other children who have the surrounding triangles to make sure they cross the joins at the same place. Chn carefully draw the details of the insect within their triangle.

6. Encourage chn to choose how to colour the details in. Join the triangles and display the large insect.

7. Alternatively, chn can work independently to create their own large scale image. They should follow steps 1-4, then draw the details of each triangle independently.
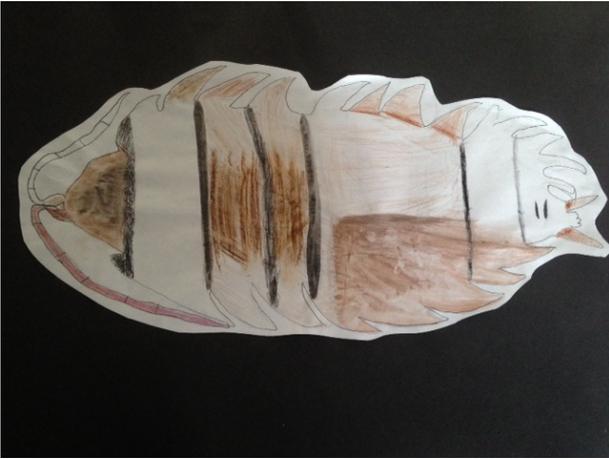
<u>Guided activity with teaching support:</u>

We are going to recap the use of a dichotomous key using liquorice allsorts (or dolly mixtures)! Use actual sweets or pictures *from resource.*

Choose 6 different examples and explain that you are going to ask 5 questions to which the answer will always be yes or no, to help children sort the sweets. Read through an example in *session resources*. These sweets could also be separated using different questions. Ask children to suggest another starting question, e.g. is it blue? Which lettered sweets would go on the 'Yes' side and which on the 'No' side? In this case: Yes – B, No – A, C, D, E. F. This has separated out one of the sweet types straight away. Divide the class into groups and give them the chance to choose 6 sweets and pose 5 questions of their own. They can write the questions on sticky labels and number them 1 to 5. Each group gives their five questions and 6 sweets to another group. They stick question 1 at the top of a sheet of paper & write Yes (on the left) & No (on the right) underneath (joined to the question with a line). They then place the sweets in the relevant place. Then they stick Question 2 under Yes (or under No if there is only one sweet under Yes) and sort the sweets again, and so on.

Remind the children that this is called a branching database or dichotomous key. It can also be written as a series of questions & answers as in *session resources*. Point out that if each of the sweets were named instead of being given a letter, it would be possible to say, e.g. Yes: it is a black ridged stick of liquorice, instead of Yes: it is E.

Classification Key
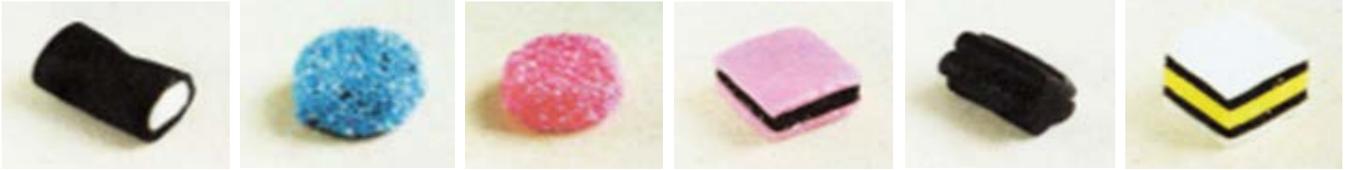
A B C D E F

Is it square?

Yes — No

Is it pink?

Yes — No

D F

Is it blue?

Yes — No

B

Is it black?

Yes — No

C

Is it ridged?

Yes — No

E A

Written out as questions and answers:

| A | B | C | D | E | F |

1. Is it square?   Yes: Go to 2.

No: Go to 3.

2. Is it pink?   Yes: It is **D**.

No: It is **F**.

3. Is it blue?   Yes: It is **B**.

No: Go to 4.

4. Is it black?   Yes: Go to 5.

No: It is **C**.

5. Is it ridged?   Yes: It is **E**.

No: It is **A**.