

5+
= 3 8 2
3 ÷ 2

KS2 Maths. Statistics, Data, Mathematical Operations

Cycling Detectives

Data collection, use of averages, percentages, interpreting, presenting and presenting data using graphical methods

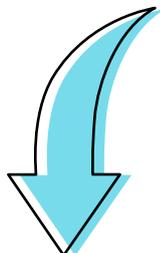
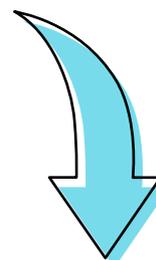
READY CURRICULUM LINKS & SESSION OUTCOMES

Maths: Statistics: interpret, present and or construct data using appropriate graphical methods, including bar charts, pictograms, tables and/or time graphs.

Averages, percentages, mathematical operations

This learning resource supports pupils to:

- Plan and design appropriate data collection methods
- Interpret and present data
- Understand the cycling habits of the school population and contribute to school Active Travel Plans where appropriate



SET WHAT YOU WILL NEED

→ Cycling Detectives. Question ideas. Teacher prompt.

PEDAL WHAT TO DO

- Introduce the learning activity and agree the information about cycling habits in the school community to be collected.
- Discuss and plan data collection methods (questionnaire/hands up/face to face interviews).
- Pupils can use the data collected to meet learning objectives i.e. calculation of averages, distances, conversions, percentages, use of addition, subtraction, division and multiplication.
- Pupils discuss and agree effective data presentation methods i.e. line graphs, bar charts, pictograms and pie charts.
- Pupils share data with key staff in school such as Active Travel coordinator, Eco Council, Head Teacher etc).

TO MAKE THIS LEARNING ACTIVE



Encourage pupils to **stand and draw** the mountain/landscape in the air using their Magic 'Bicycle-Pencil with a fine pincer grip, creating **large exaggerated movements**, stretching high and wide and moving from side to side where needed.

DID YOU KNOW?



There are companies who create 'eco-friendly' bike oil, it is biodegradable and non-toxic to avoid water pollution, free from palm oils and comes in recyclable bottles. Good job!



KS2

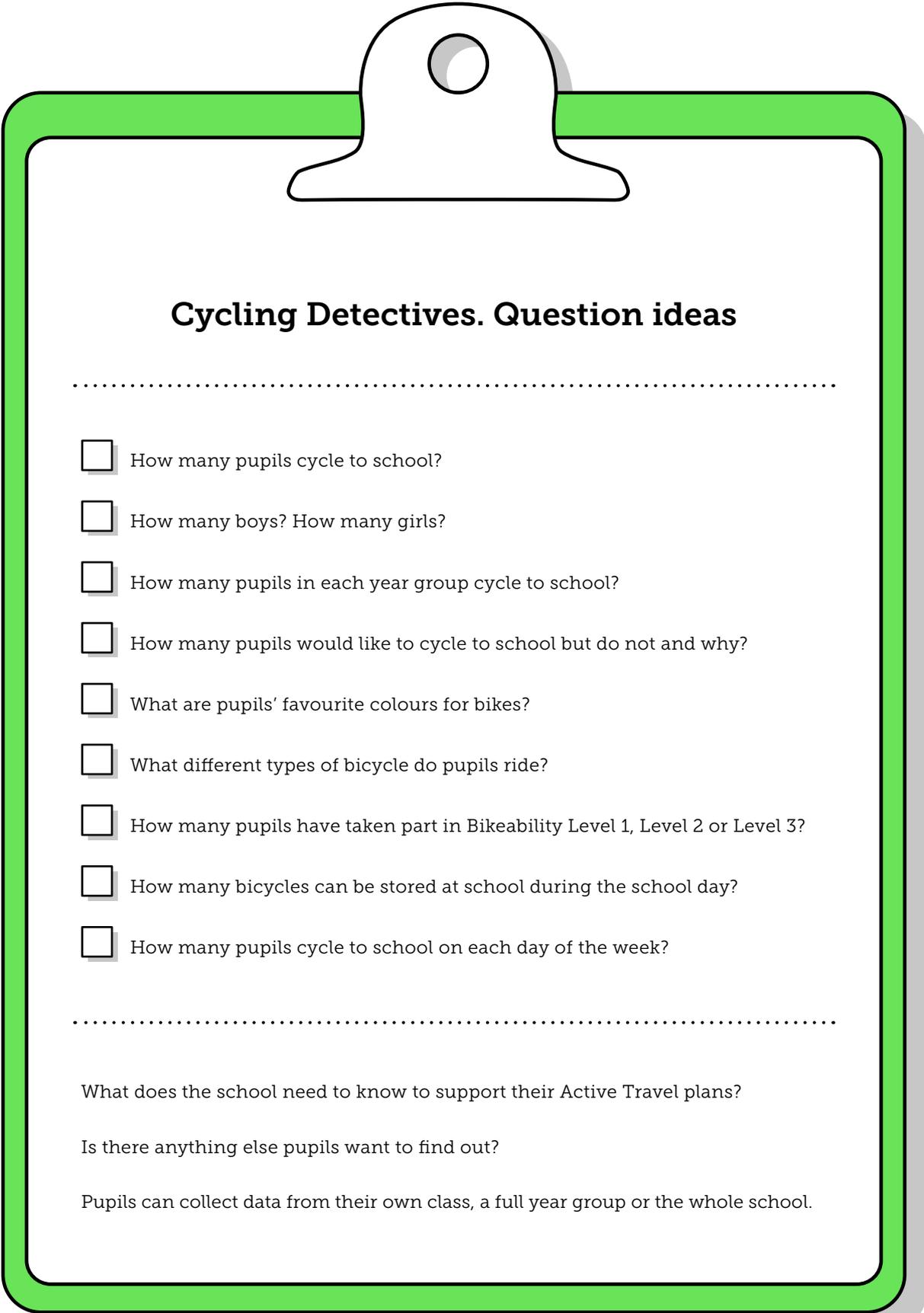
**Maths.
Statistics, Data,
Mathematical
Operations**

**Teacher
Prompt**



**TOOLS for
SCHOOLS**

 Department
for Transport



Cycling Detectives. Question ideas

.....

- How many pupils cycle to school?
- How many boys? How many girls?
- How many pupils in each year group cycle to school?
- How many pupils would like to cycle to school but do not and why?
- What are pupils' favourite colours for bikes?
- What different types of bicycle do pupils ride?
- How many pupils have taken part in Bikeability Level 1, Level 2 or Level 3?
- How many bicycles can be stored at school during the school day?
- How many pupils cycle to school on each day of the week?

.....

What does the school need to know to support their Active Travel plans?

Is there anything else pupils want to find out?

Pupils can collect data from their own class, a full year group or the whole school.

.....