Names (pair) _____ Date _____

Unit Fractions

PART 1 How many white rods fit?

1 Work in pairs. **Student A** puts a rod on the drawing. **Student B** lays white rods on it and counts them. Write the number and the fraction, then swap roles.

WHOLE (ROD OR TRAIN)	NUMBER OF WHITES	ONE WHITE IS
red	2	EXAMPLE $\frac{1}{2}$ of the whole
light green	_____	$\frac{\square}{\square}$ of the whole
purple	_____	$\frac{\square}{\square}$ of the whole
yellow	_____	$\frac{\square}{\square}$ of the whole
dark green	_____	$\frac{\square}{\square}$ of the whole
black	_____	$\frac{\square}{\square}$ of the whole
brown	_____	$\frac{\square}{\square}$ of the whole
blue	_____	$\frac{\square}{\square}$ of the whole
orange	_____	$\frac{\square}{\square}$ of the whole
orange + white	_____	$\frac{\square}{\square}$ of the whole
orange + red	_____	$\frac{\square}{\square}$ of the whole

Names (pair) _____ Date _____

Remember

When we divide a whole into **n equal parts**, one part is $\frac{1}{n}$ of the whole.

Fractions with 1 above the line are called **unit fractions**: $\frac{1}{2}$ $\frac{1}{3}$ $\frac{1}{4}$ $\frac{1}{5}$ $\frac{1}{6}$ $\frac{1}{7}$ $\frac{1}{8}$ $\frac{1}{9}$ $\frac{1}{10}$ $\frac{1}{11}$ $\frac{1}{12}$. The number below the line tells how many equal parts the whole is divided into.

PART 2 One whole, different parts

2 Make a train from an **orange and a red** rod. This is the whole. Find rods of one colour that cover it **exactly**. Lay them on an empty outline, colour them and write what part of the whole one rod is.



1 whole

One rod is $\frac{\square}{\square}$ of the whole

One rod is $\frac{\square}{\square}$ of the whole

One rod is $\frac{\square}{\square}$ of the whole

One rod is $\frac{\square}{\square}$ of the whole

One rod is $\frac{\square}{\square}$ of the whole

3 Order from the biggest part to the smallest.

$\frac{\square}{\square} > \frac{\square}{\square} > \frac{\square}{\square} > \frac{\square}{\square} > \frac{\square}{\square}$

4 Fill in: the bigger the number below the line, the bigger / smaller one part is.

5 Can you cover this whole with 5 equal rods? Why?

Names (pair) _____ Date _____

PART 3 Pair game: Guess the fraction

6 **Student A** secretly picks a whole (a rod or a train) and a rod that covers it exactly a few times, then shows both. **Student B** says which unit fraction it is and checks by laying the rods. Write it down and swap roles.

	WHOLE	PART	FRACTION
1.			$\frac{\square}{\square}$
2.			$\frac{\square}{\square}$
3.			$\frac{\square}{\square}$
4.			$\frac{\square}{\square}$
5.			$\frac{\square}{\square}$
6.			$\frac{\square}{\square}$

7 The whole is the same. Compare and write **<** or **>**.

$\frac{1}{2} \bigcirc \frac{1}{4}$ $\frac{1}{8} \bigcirc \frac{1}{6}$ $\frac{1}{10} \bigcirc \frac{1}{12}$ $\frac{1}{3} \bigcirc \frac{1}{7}$ $\frac{1}{5} \bigcirc \frac{1}{9}$

★ Challenge

8 Which rod is the whole? Check with rods.

The yellow rod is $\frac{1}{2}$ of the whole. The whole is: _____

The red rod is $\frac{1}{4}$ of the whole. The whole is: _____

The light green rod is $\frac{1}{3}$ of the whole. The whole is: _____

The purple rod is $\frac{1}{3}$ of the whole. The whole is: _____