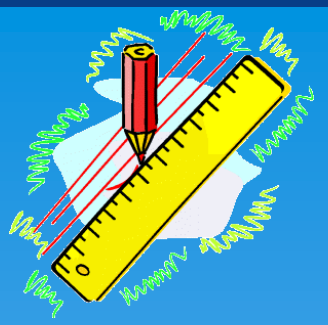
STARTER QUESTIONS



Q1. Calculate 64×10000

Q2. If 1 bar of chocolate costs 65p. How much will 1000 bars cost. Give your answer in £'s.

Q3. Round to 1 decimal place

(a) 4.56 (b) 7.254 (c) 9.244

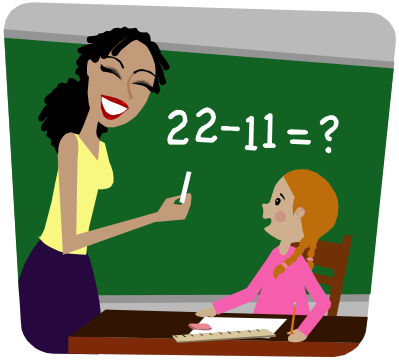
Q4. Convert to 24 hrs clock

(a) Half past 4 in the afternoon.

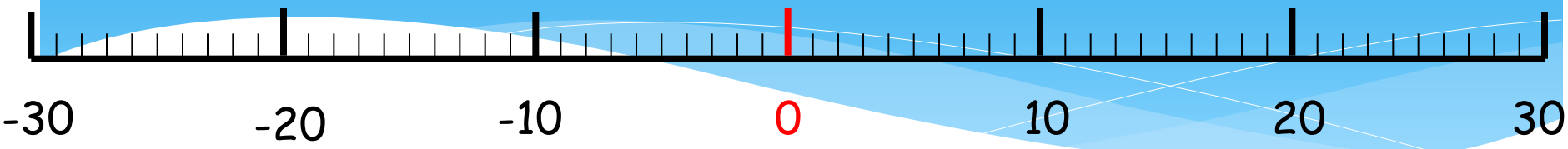
(b) Quarter to eight in the morning.

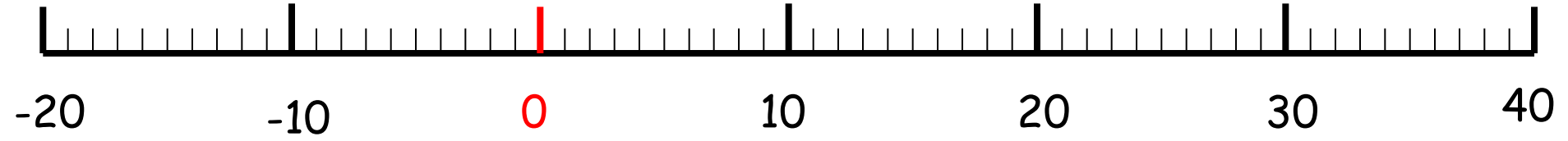
Learning Objective

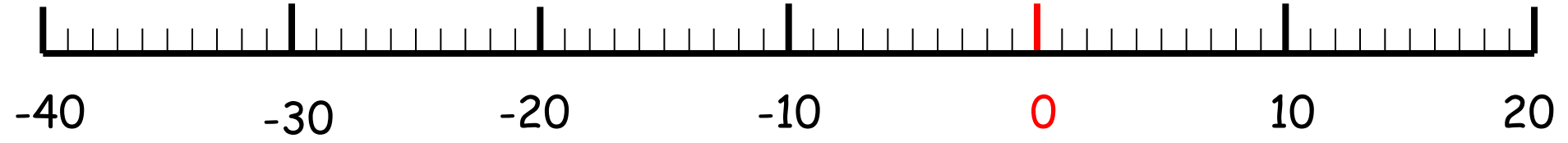
Revision:
Continue negative number sequences.
Place negative number on a number line.



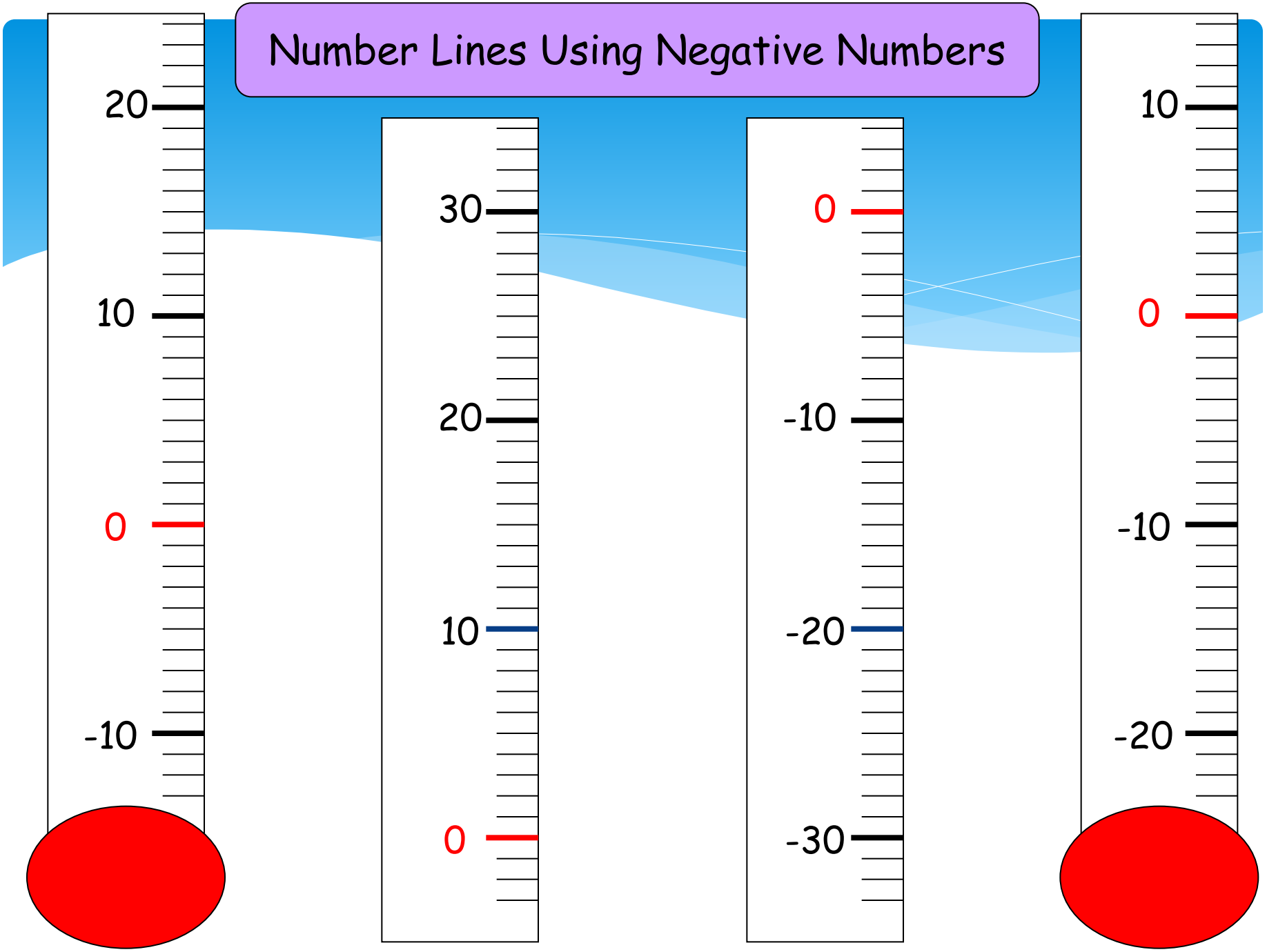
Number Lines Using Negative Numbers







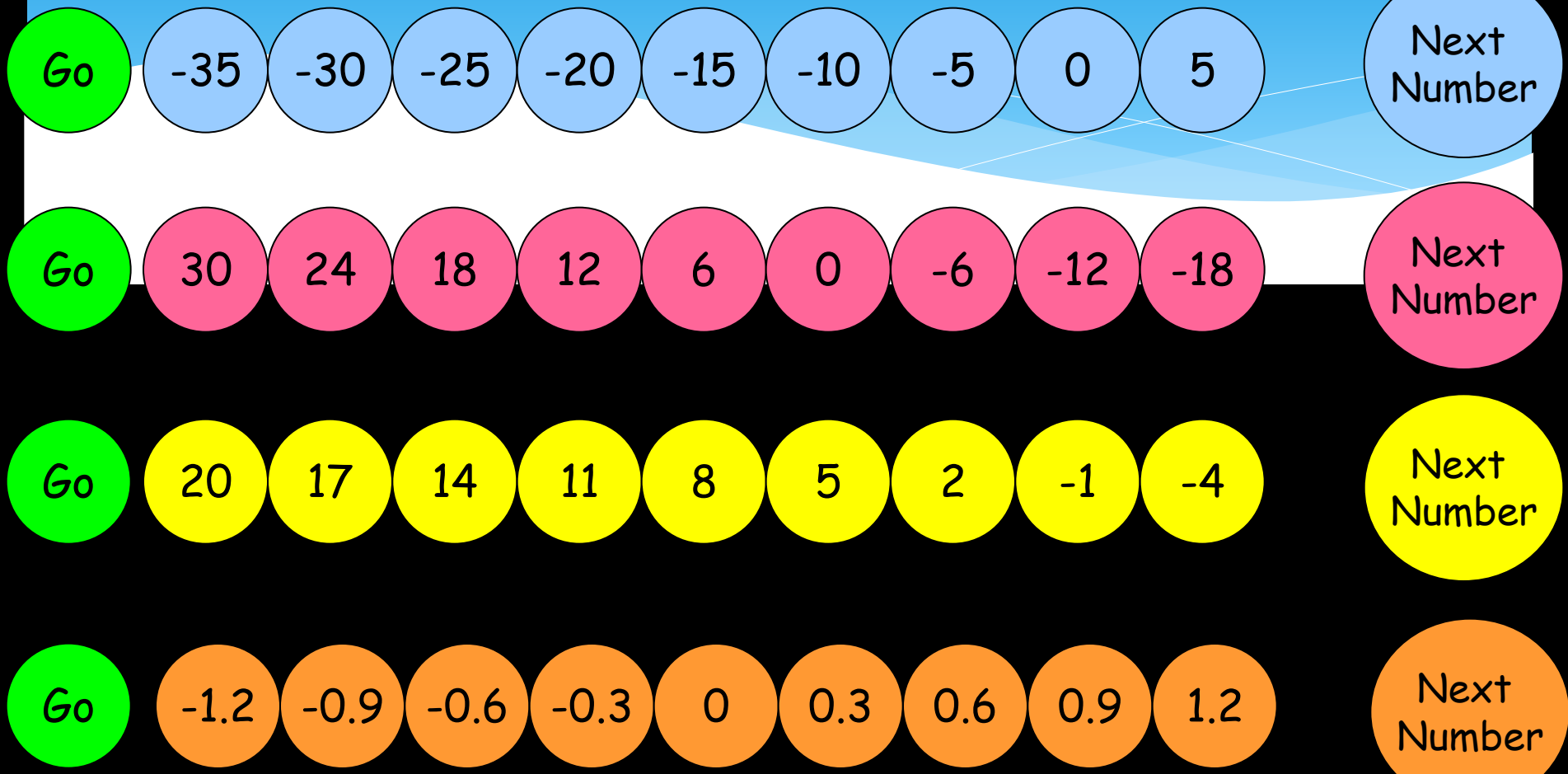
Number Lines Using Negative Numbers



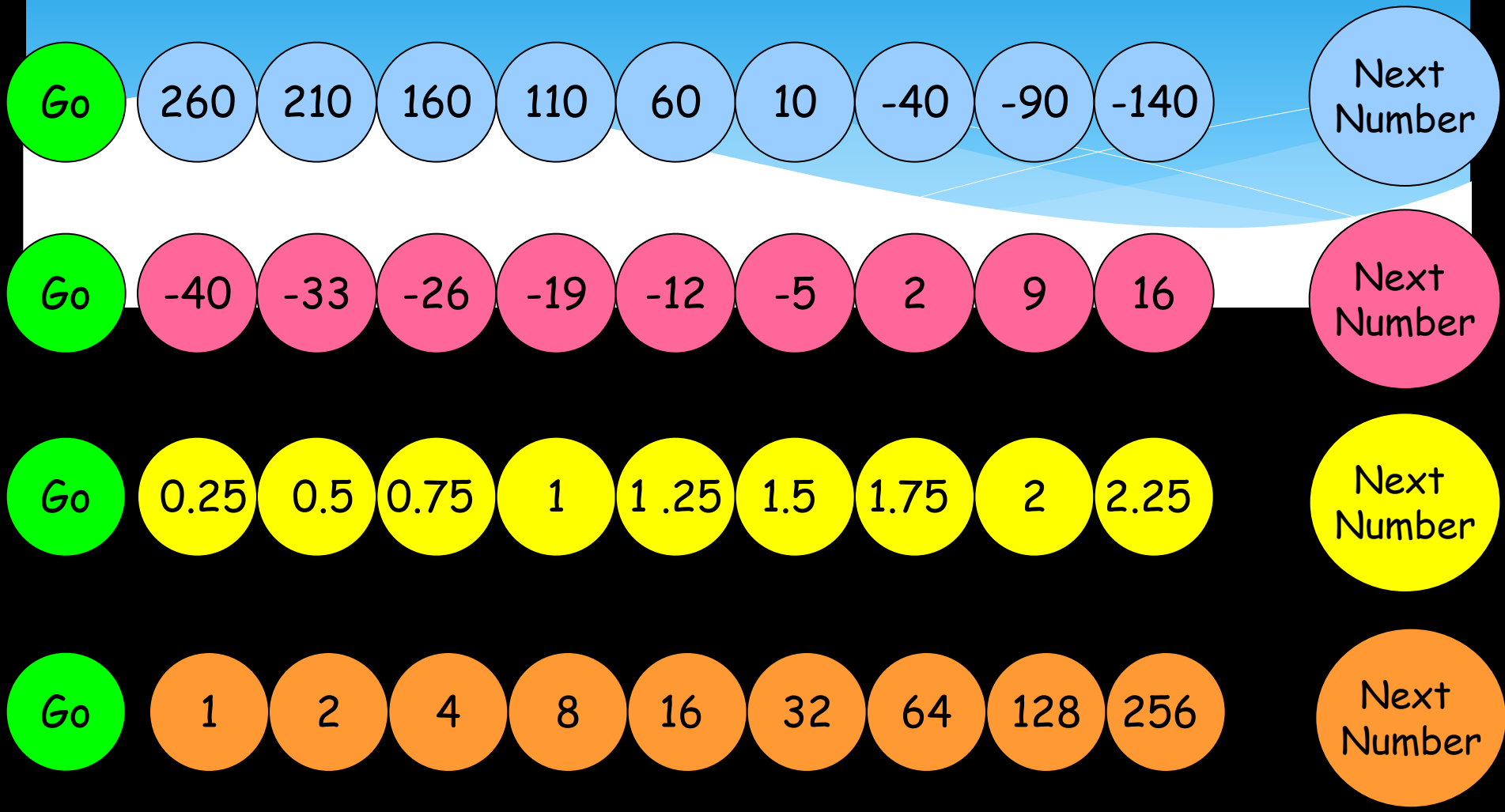
Negative Number Square

51	52	53	54	55	56	57	58	59	60
41	42	43	44	45	46	47	48	49	50
31	32	33	34	35	36	37	38	39	40
21	22	23	24	25	26	27	28	29	30
11	12	13	14	15	16	17	18	19	20
1	2	3	4	5	6	7	8	9	10
-9	-8	-7	-6	-5	-4	-3	-2	-1	0
-19	-18	-17	-16	-15	-14	-13	-12	-11	-10
-29	-28	-27	-26	-25	-24	-23	-22	-21	-20
-39	-38	-37	-36	-35	-34	-33	-32	-31	-30

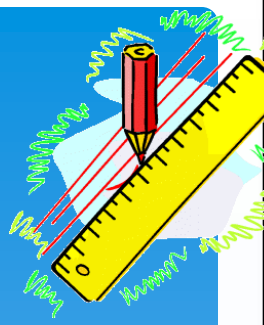
Number Sequences



Number Sequences



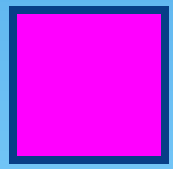
STARTER QUESTIONS



Q1. Calculate 30% of £600

Q2. What is the time difference between 8.15am and 1:00pm

Q3. Solve $6y-16=20$



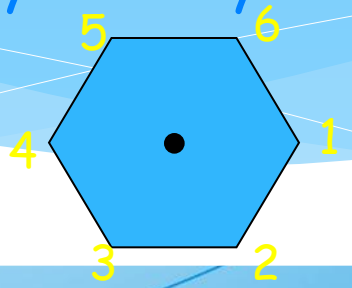
P=20cm

$A=25cm^2$

5cm

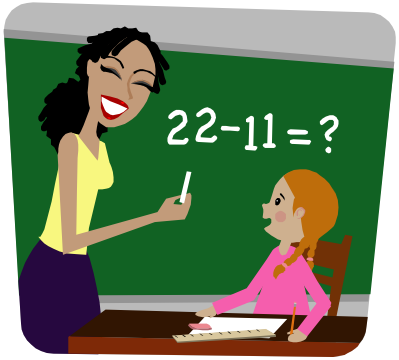
Q4. Find the perimeter and area of the square.

Q5. Find the order of rotational symmetry for the shape opposite.



Learning Objective

Revision:
Order decimals to 1dp or 2dp.
Continue decimal number sequences.



Decimal Place Value

Click on the digit to show its value *(Click again to hide)*

4	2	4	4
4	0.2	0.04	0.004
4 units	*2/10*	*4/100*	*4/1000*

2	5	2	8
2	0.5	0.02	0.008
2 units	*5/10*	*2/100*	*8/1000*

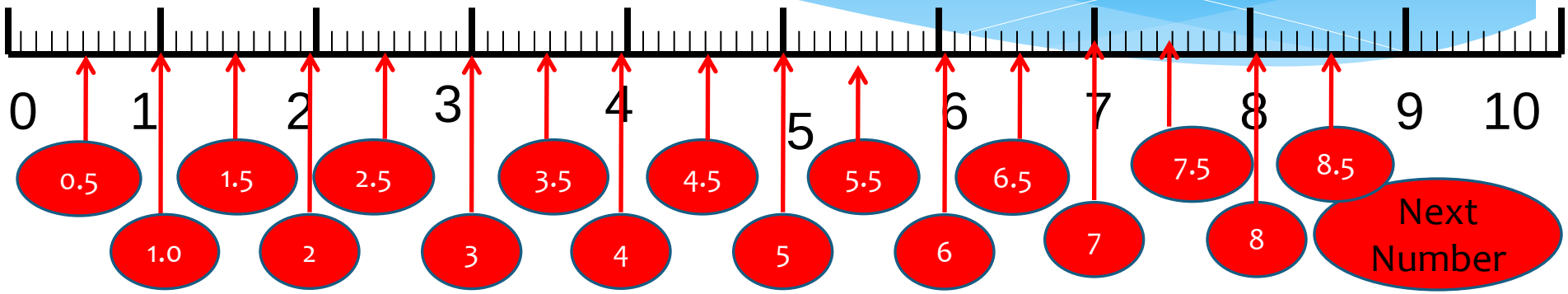
3	9	7	8
3	0.9	0.07	0.008
3 units	*9/10*	*7/100*	*8/1000*

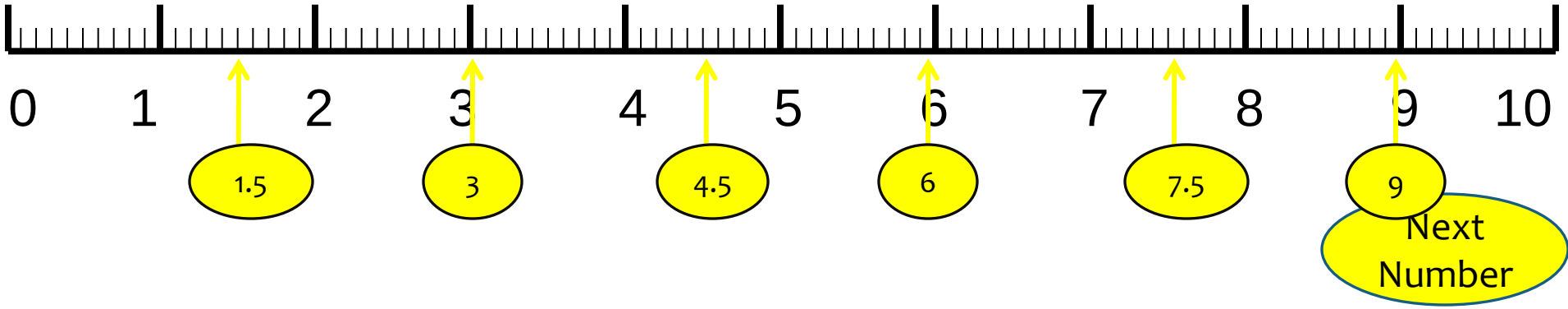
1	0	4	7
1	0.0	0.04	0.007
1 unit	*0/10*	*4/100*	*7/1000*

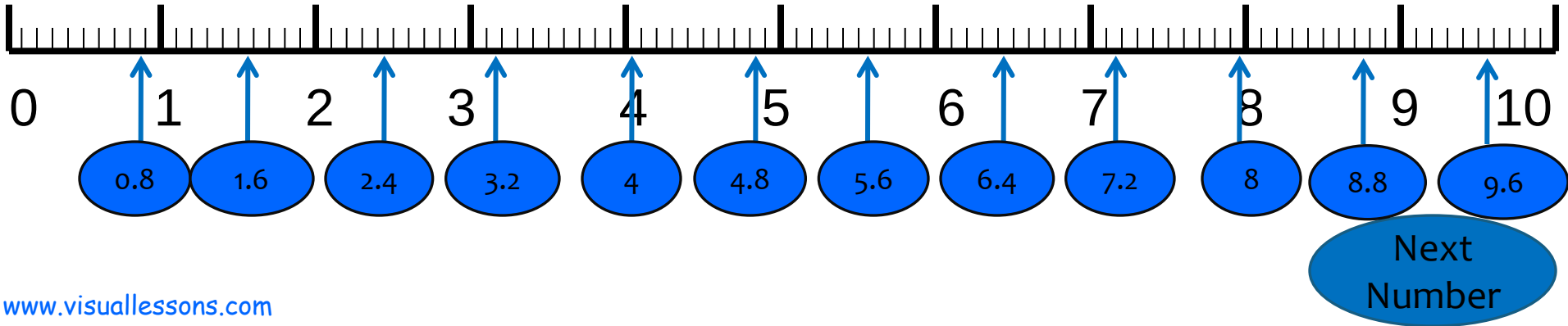
5	0	4	8
5	0.0	0.04	0.008
5 units	*0/10*	*4/100*	*8/1000*

7	7	8	3	7
70	7	0.8	0.03	0.007
7 tens	*7 units*	*8/10*	*3/100*	*7/1000*

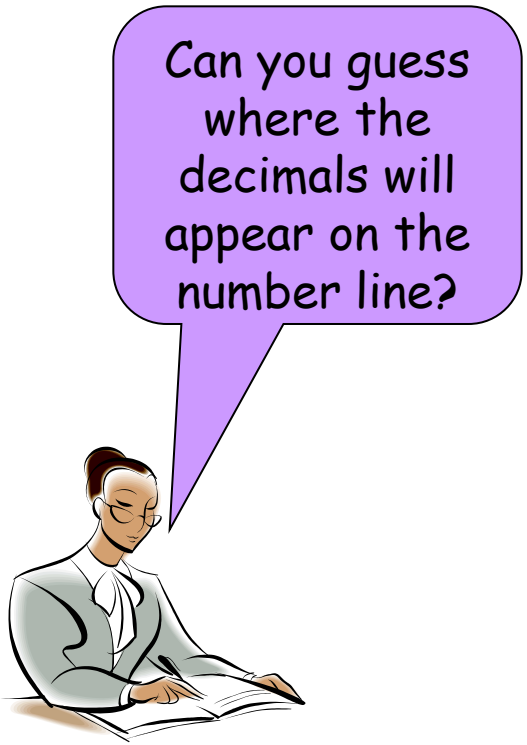
Counting - Using Number Lines







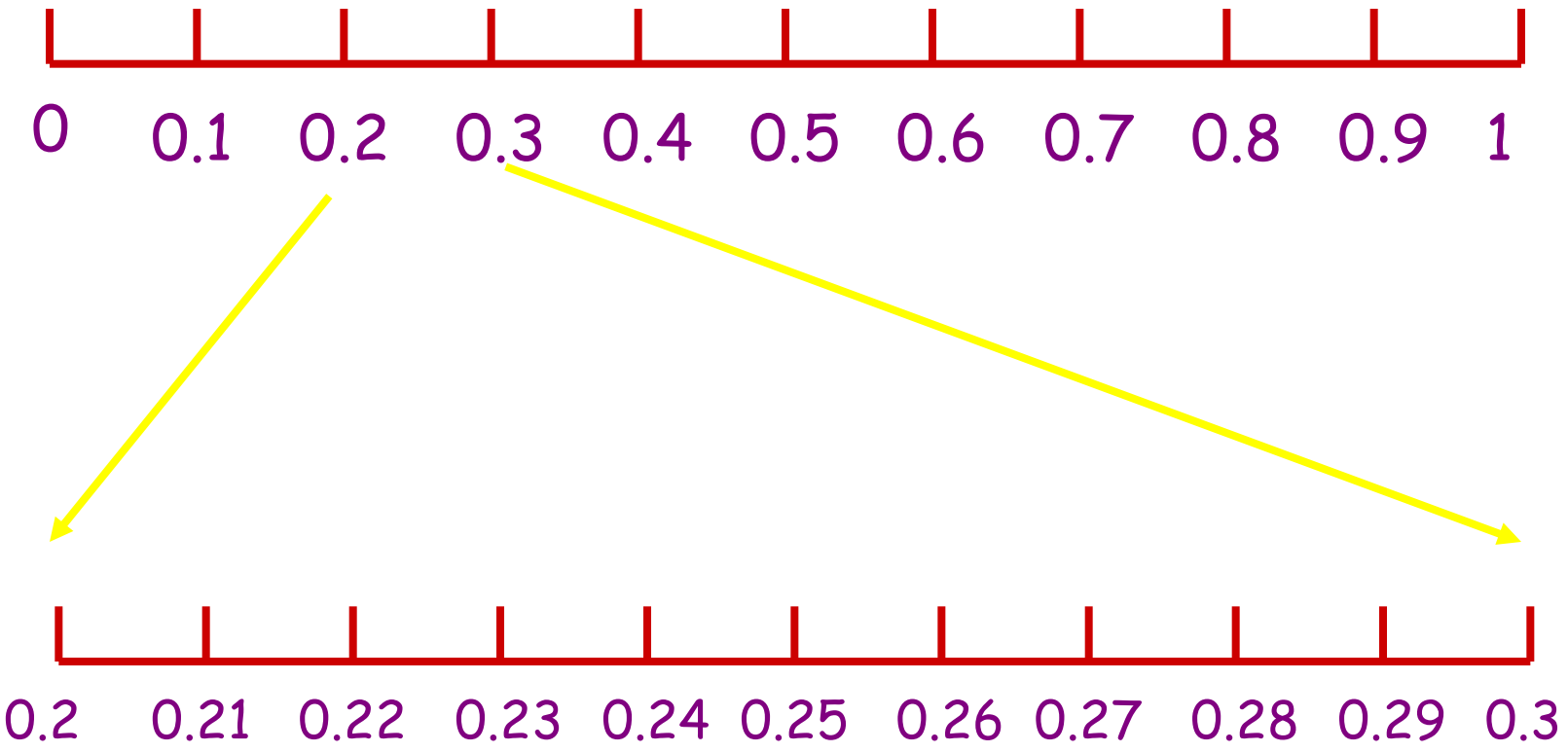
0 0.3 0.4 0.7 0.9 1



0.2 0.6 0.5 0.8 0.1

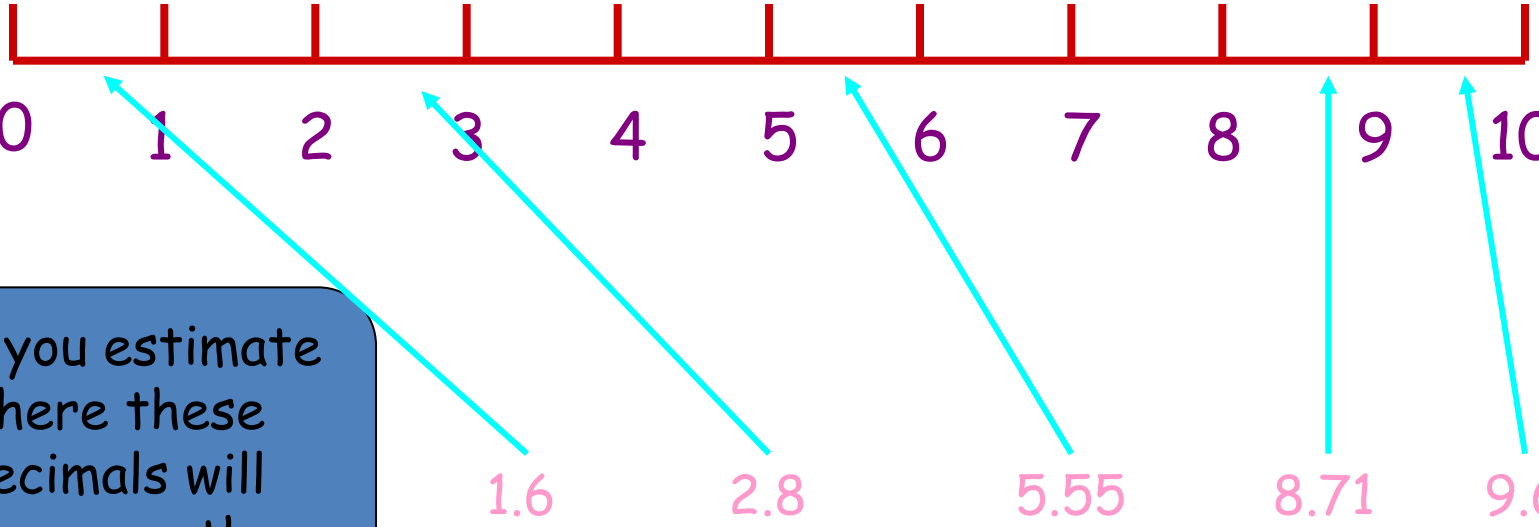
CLICK!

Decimal numbers can become even smaller too!



These decimal numbers are all in-between 0.2 and 0.3

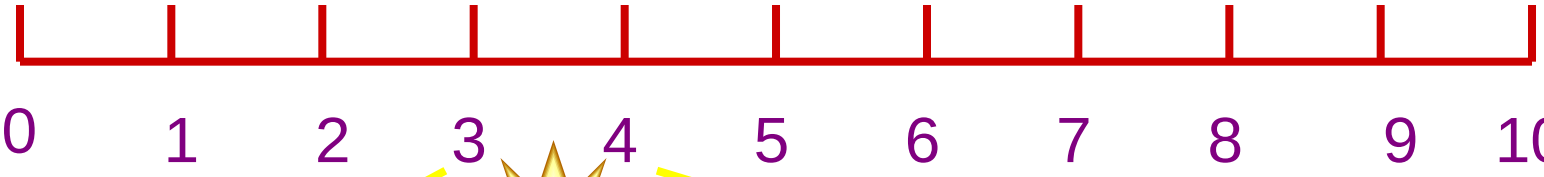
CLICK!



Can you estimate where these decimals will appear on the number line?

CLICK!

Understanding Decimals



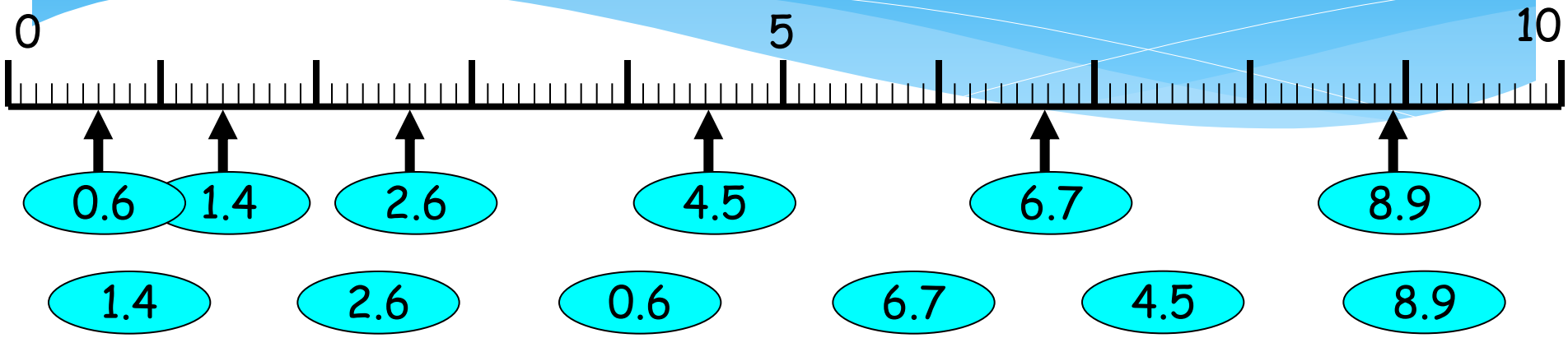
Whole Numbers

Tenths (1 decimal place)

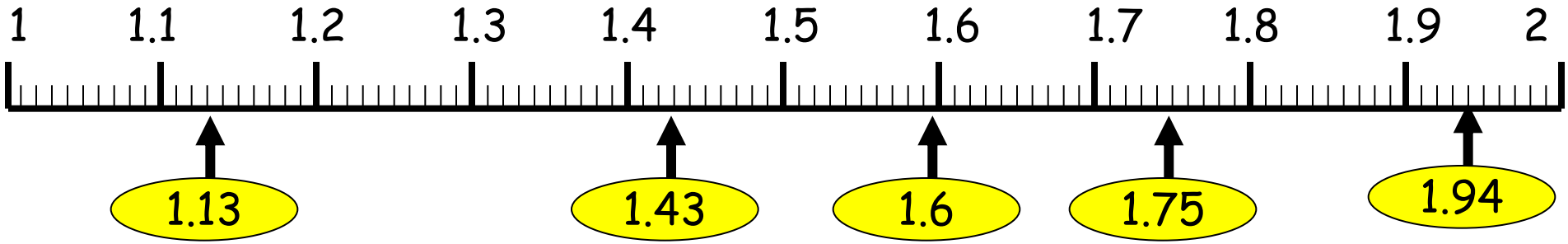
Hundredths (2 decimal places)

CLICK!

Click on a decimal to place it on the number line



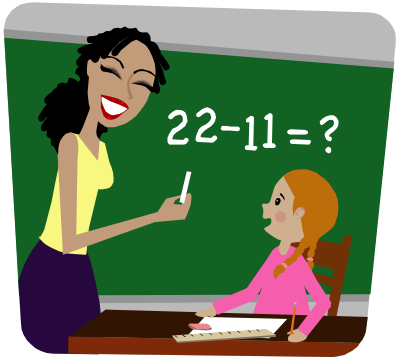
1.4 2.6 0.6 6.7 4.5 8.9



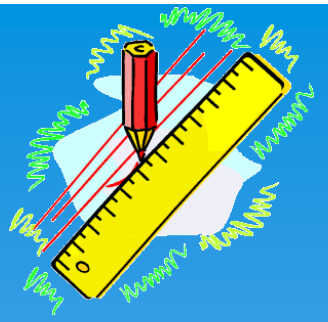
1.43 1.6 1.13 1.75 1.94

Learning Objective

Revision:
Order decimals to 1dp or 2dp.
Continue decimal number sequences.



STARTER QUESTIONS

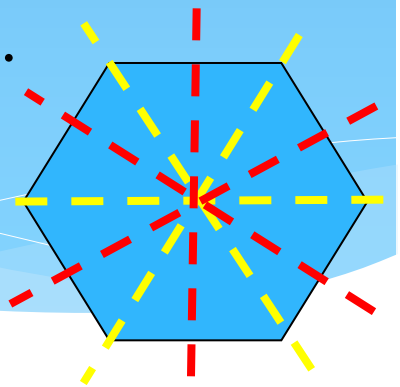


Q1. Round the following to the first decimal place.
(a) 153.37 (b) 261.55

Q2. What is the time difference between 8.15am and 1:00pm

Q3. A pencil costs 22p. How much does a 1000 cost. Put your answer in £'s.

Q4. How many lines of symmetry does a regular hexagon have?



Ordering Decimals

To order these decimal numbers we need to make sure the decimal places are lined up.

4.23	0	4	2	3	4th
5.5	0	5	5	0	2nd
4.05	0	4	0	5	5th (smallest)
4.6	0	4	6	0	3rd
40.1	4	0	1	0	1st (largest)

CLICK!

Ordering Decimals

Can you place these decimal numbers in order?

Click on the decimal to put in in order.

Largest	2	9	0
2nd Largest	2	5	3
3rd Largest	2	5	0
4th Largest	2	4	9
Smallest	0	9	8

2.53

0.98

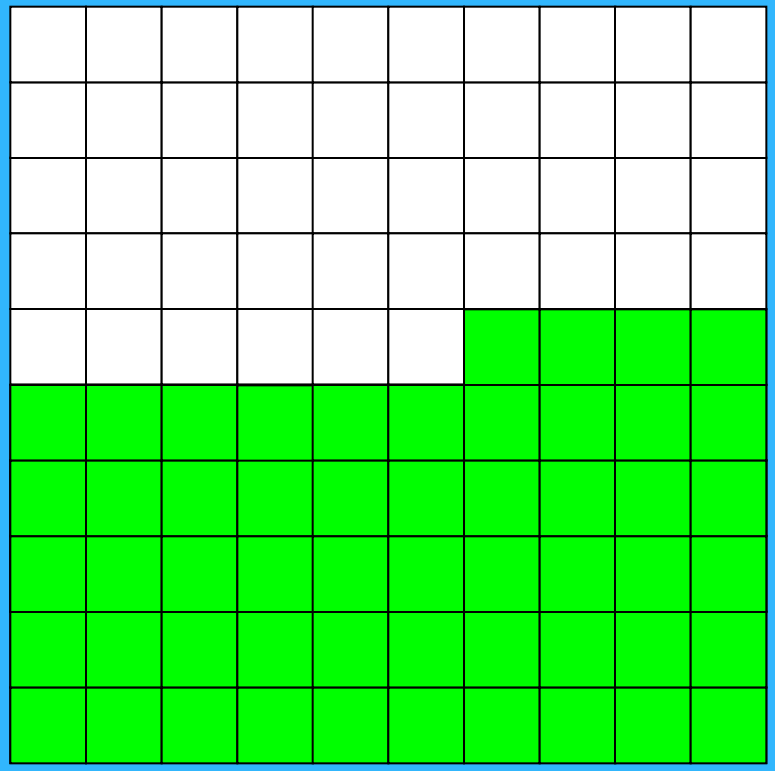
2.5

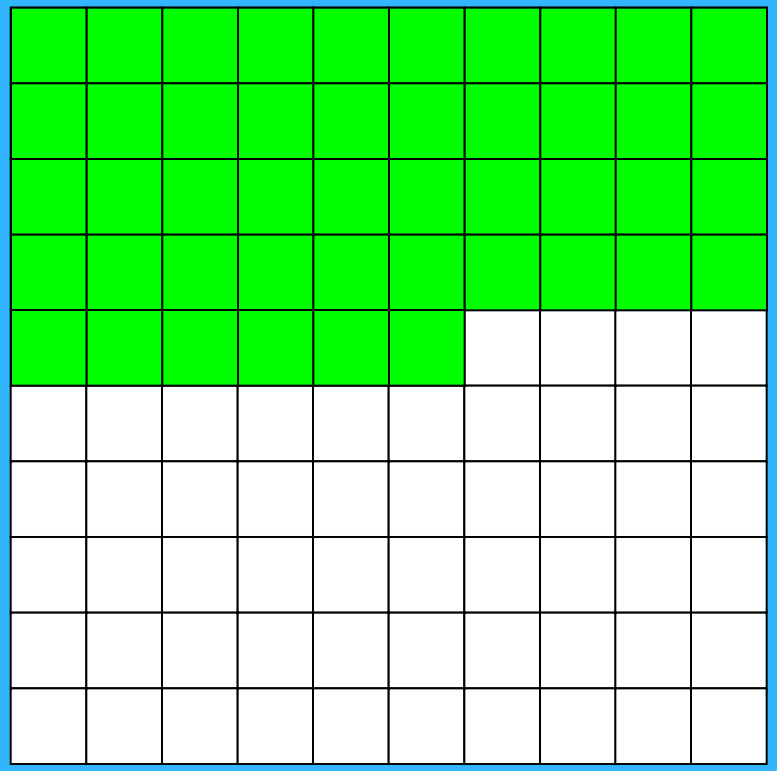
2.9

2.49

Making 1 from 2 Decimal Place Numbers

A Demonstration



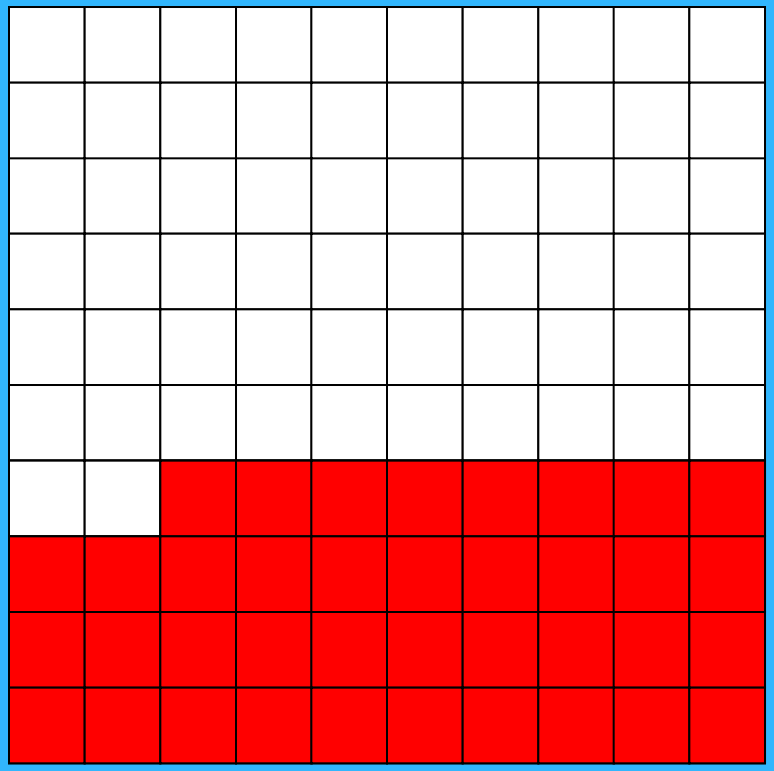


0.54 + 0.46

CLICK!

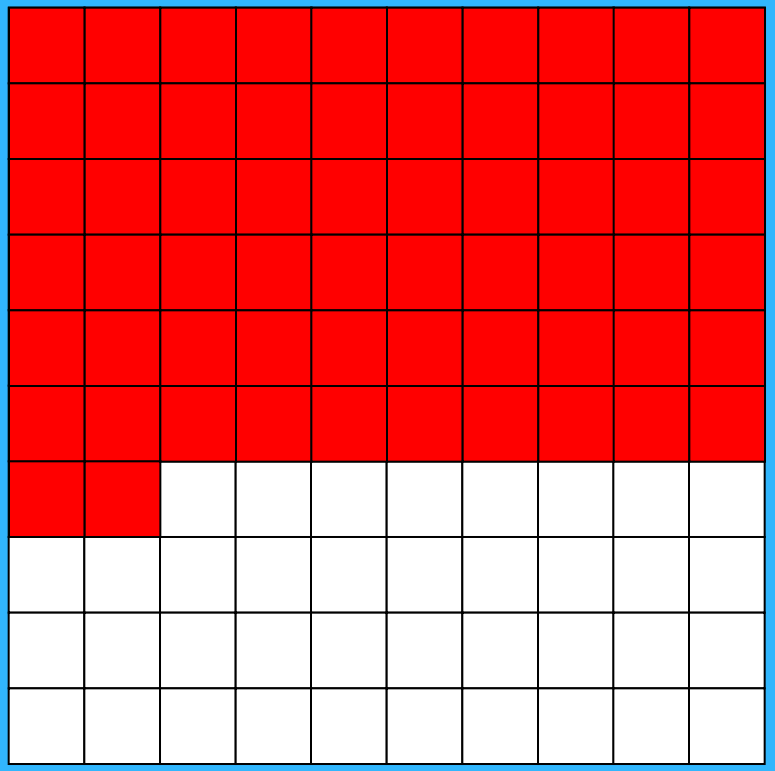
Making 1 from 2 Decimal Place Numbers

A Demonstration



0.38

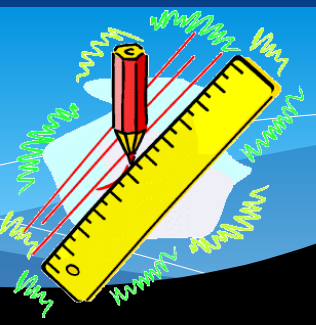
+



0.62

CLICK!

STARTER QUESTIONS



Q1. Calculate 10% of £270

Q2. How many euros do I get for £20 if exchange rate is £1 ⇨ 1.5 €

Q3. What is the time difference 09:28 and 10:50

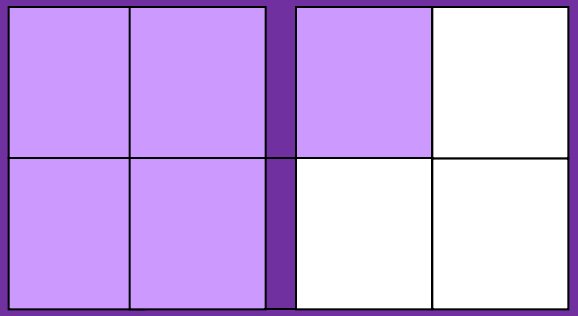
Q4. The answer to the question is 90. What is the question.

Learning Objective

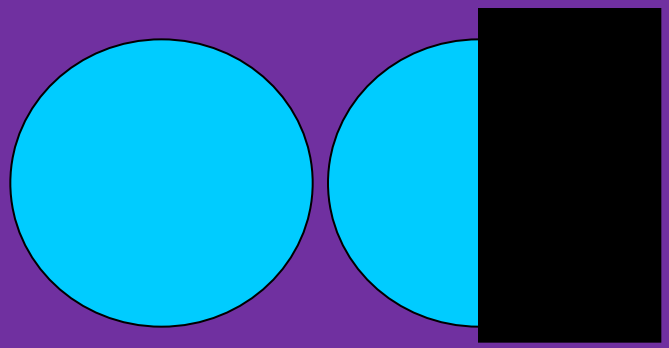
Revision:
Recognise equivalent fractions using a fraction wall.
Convert mixed numbers to improper fractions.
Find equivalent fractions.
Order fractions with different denominators.

Improper Fractions

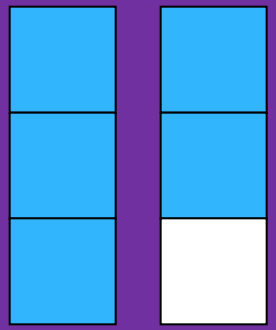
Click on the shapes to reveal the improper fractions



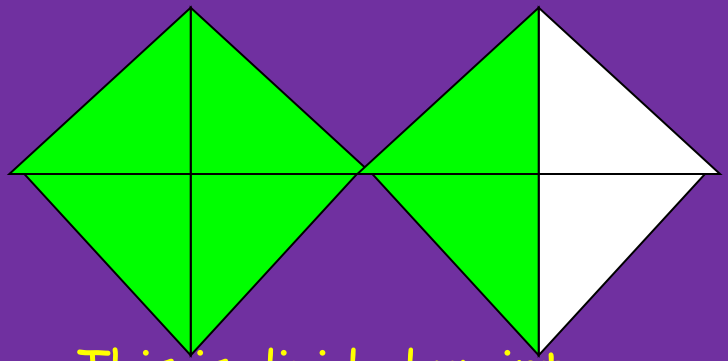
This is divided up into quarters. There are 5/4.



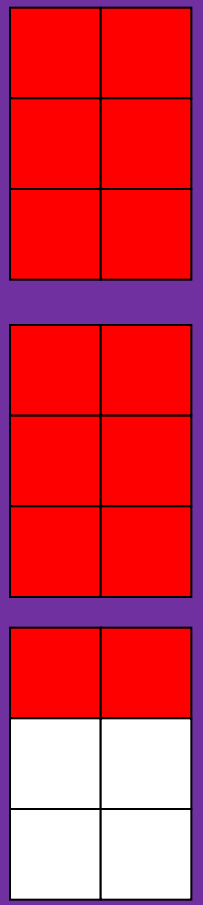
This is divided up into halves. There are 3/2.



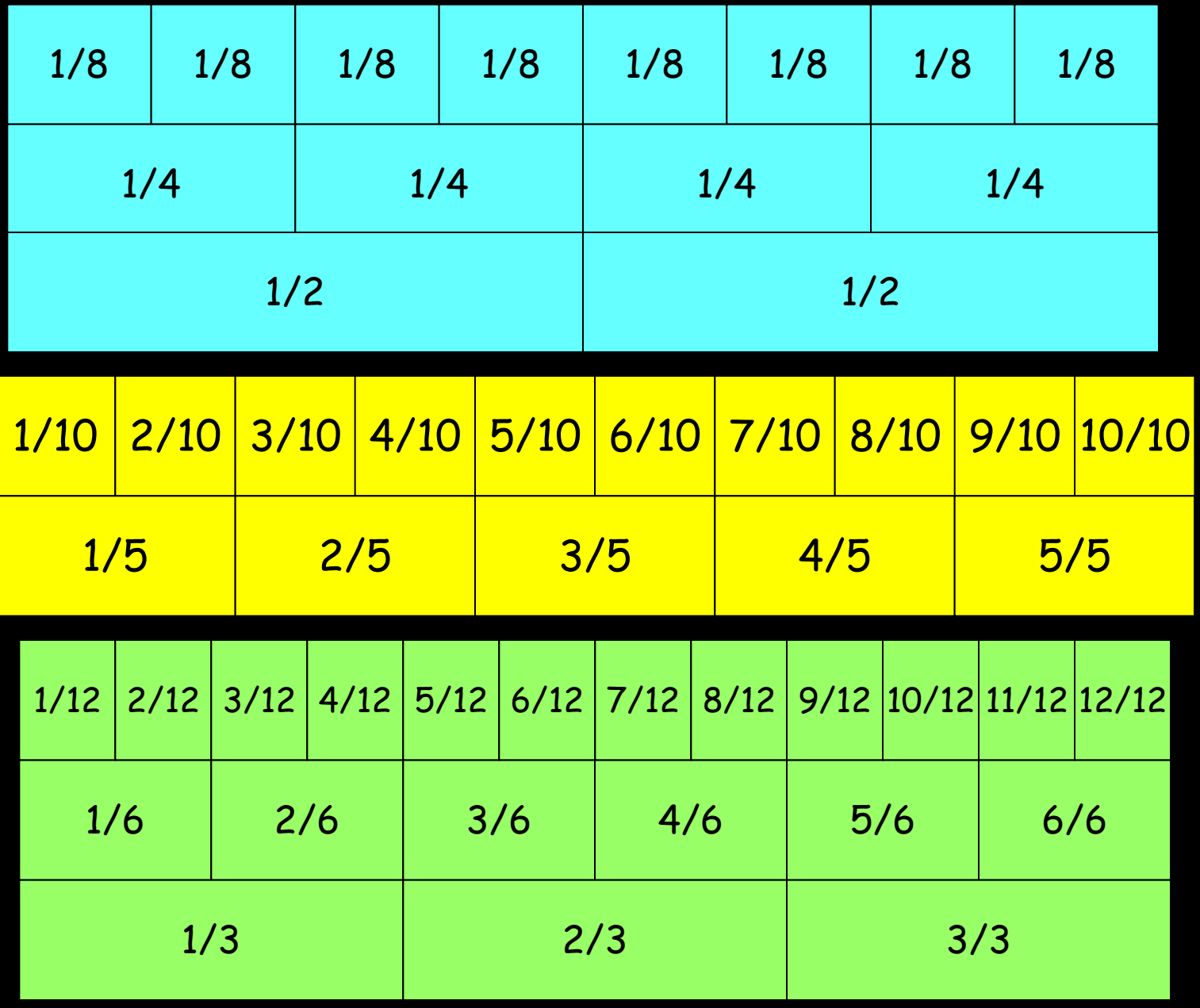
This is divided up into thirds. There are 5/3.



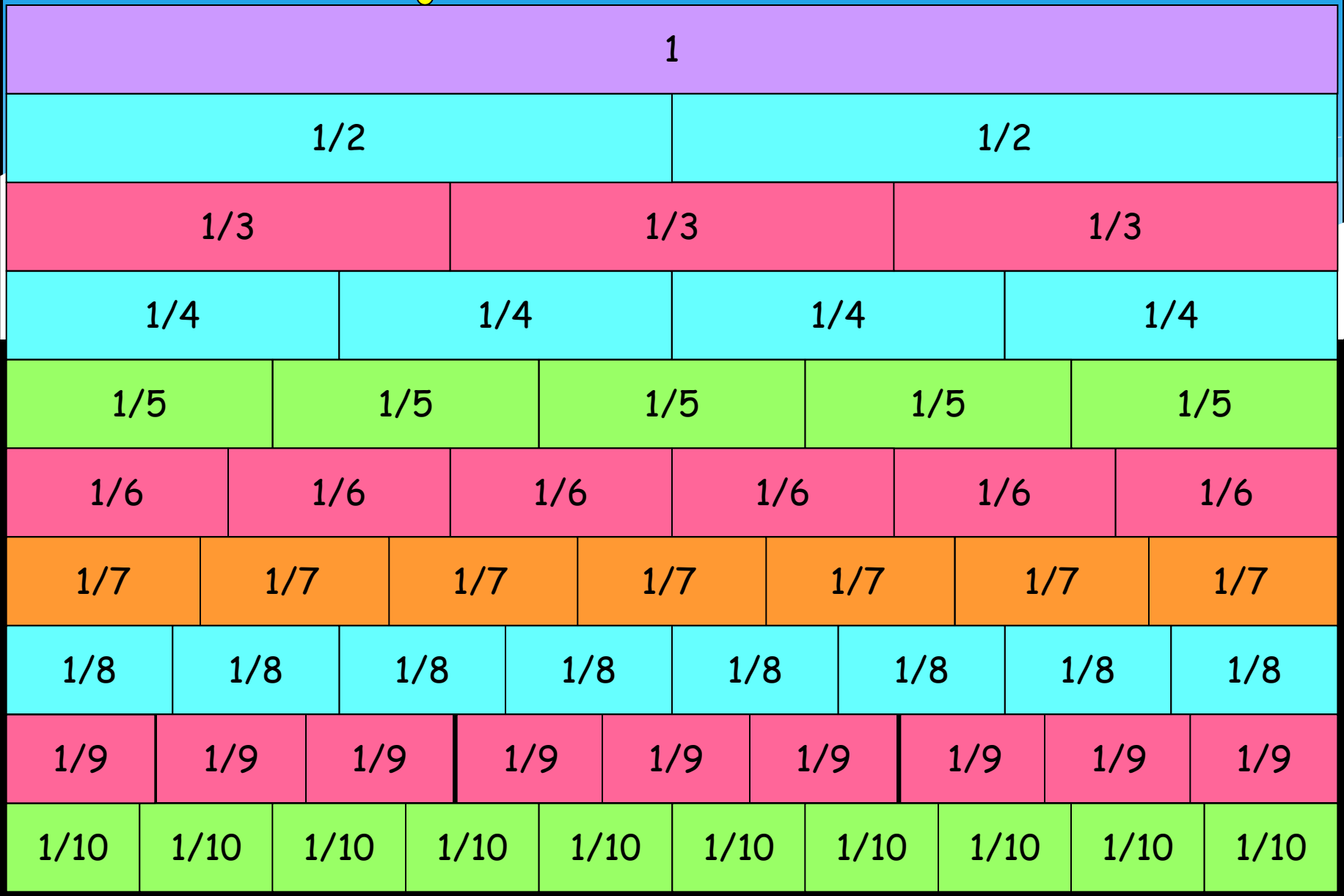
This is divided up into quarters. There are 6/4.



This is divided up into sixths. There are 14/6.

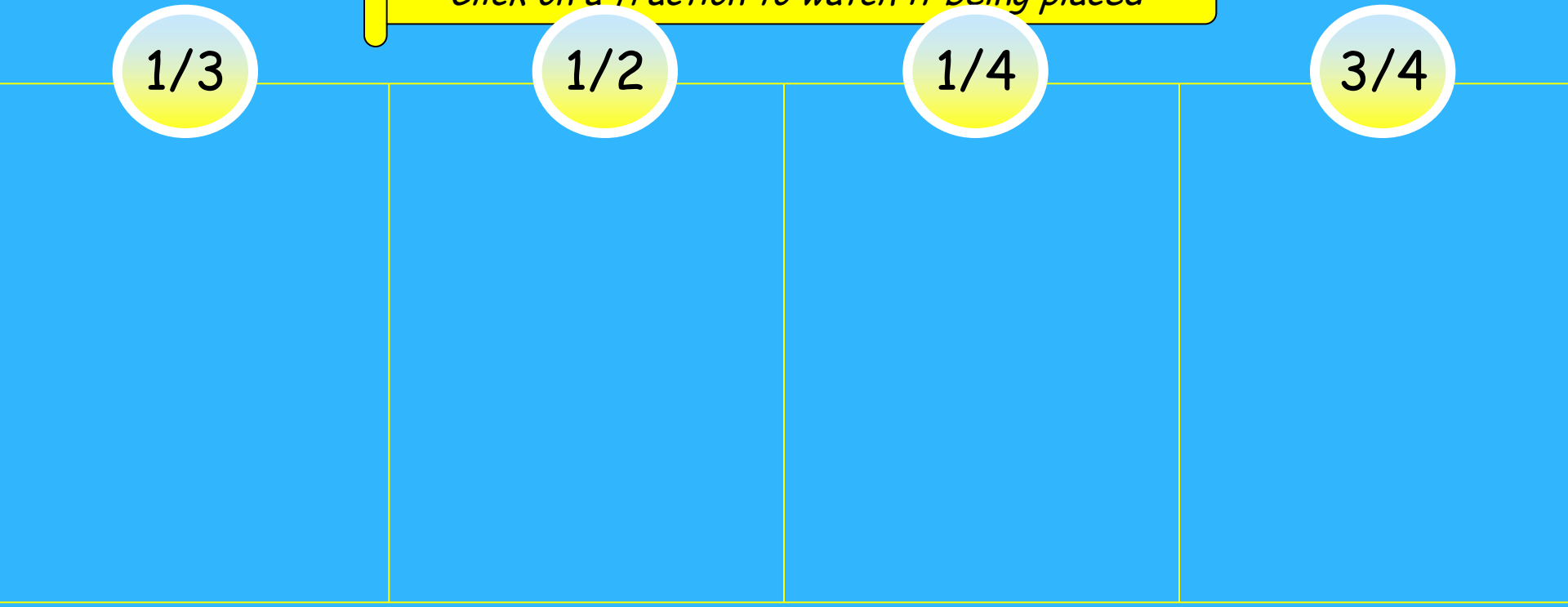

1/8 1/8 1/8 1/8 1/8 1/8 1/8 1/8
1/4 1/4 1/4 1/4
1/2 1/2
1/10 2/10 3/10 4/10 5/10 6/10 7/10 8/10 9/10 10/10
1/5 2/5 3/5 4/5 5/5
1/12 2/12 3/12 4/12 5/12 6/12 7/12 8/12 9/12 10/12 11/12 12/12
1/6 2/6 3/6 4/6 5/6 6/6
1/3 2/3 3/3

Fraction Wall



Finding Equivalent Fractions

Click on a fraction to watch it being placed



2/6 12/16 4/16 2/4 7/21 5/15 3/12 7/14

15/20 6/24 5/10 4/12 9/12 3/6 5/20 6/8

Finding Equivalent Fractions

Click on a fraction to watch it being placed

2/3 | 3/5 | 1/5 | 5/6

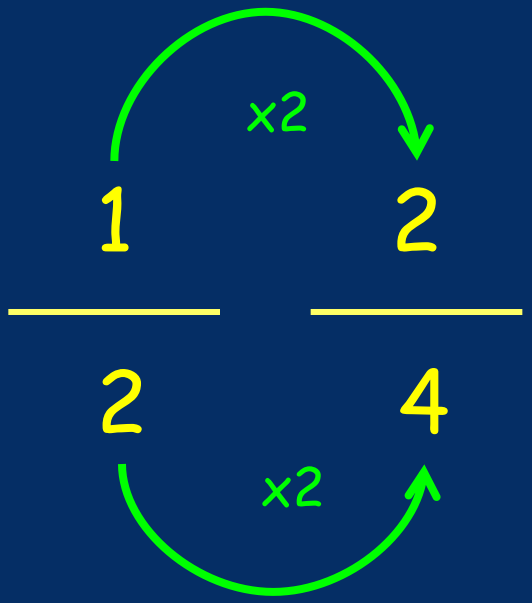
9/15 4/20 20/24 3/15 14/21 10/15 25/30 15/25

15/18 6/30 8/12 2/10 10/12 12/20 6/9 6/10

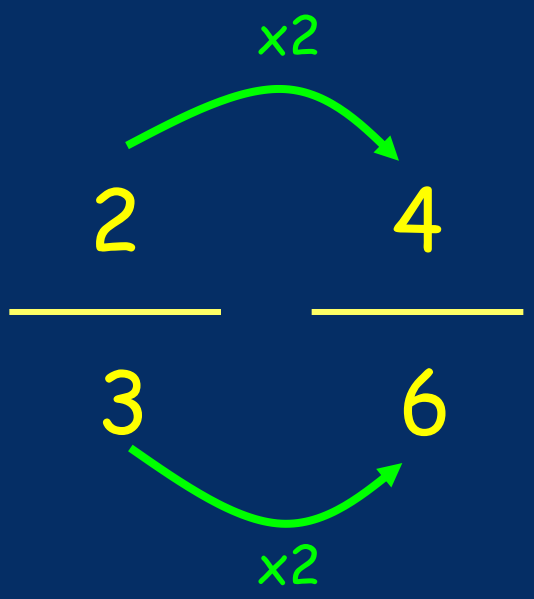
Common Denominators

Click on the statement to see why the fractions are the same

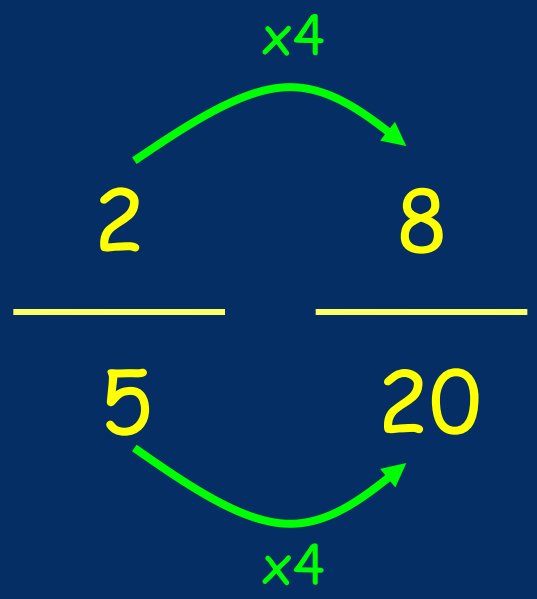
1/2 is the same as 2/4



2/3 is the same as 4/6



2/5 is the same as 8/20



Ordering Fractions

Click on the fractions to watch the steps

The Fractions To Order	Change the Denominator	The 'Ordered' Fractions
3/5	24/40	*11/40*
4/10	16/40	*3/10*
7/20	14/40	*7/20*
11/40	11/40	*4/10*
3/10	12/40	*3/5*

Equivalent Decimals, Fractions & Percentages

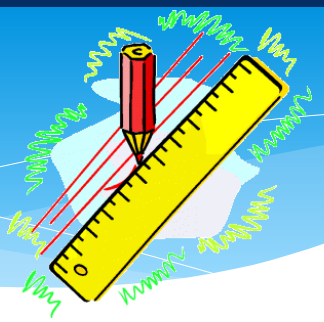
Click on a fraction to watch it being placed

25% | 0.4 | $\frac{3}{4}$ | $\frac{1}{2}$

8/20 | 75% | 0.5 | 0.75 | 5/20 | 0.25 | 2/4 | 12/30

5/10 | 15/20 | 3/12 | 9/12 | 50% | 40% | $\frac{1}{4}$ | 4/10

STARTER QUESTIONS



Q1. Calculate 50% of £300

Q2. How many euros do I get for £10 if exchange rate is £1 ⇨ 1.4 €

Q3. What is the time difference 09:45 and 20:30?

Q4. The answer to the question is 30. What is the question?

Learning Objective

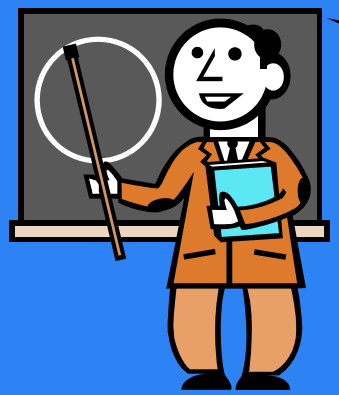
Revision:
Continue sequences including decimal number sequences.

? 0.5 0.75 1 ? 1.5 1.75 ? 2.25

? 0 0.4 0.8 ? 1.6 2

0 0.15 ? 0.45 0.6 ? 0.9

? 3 6 12 24 48 ? 192



Number Patterns.

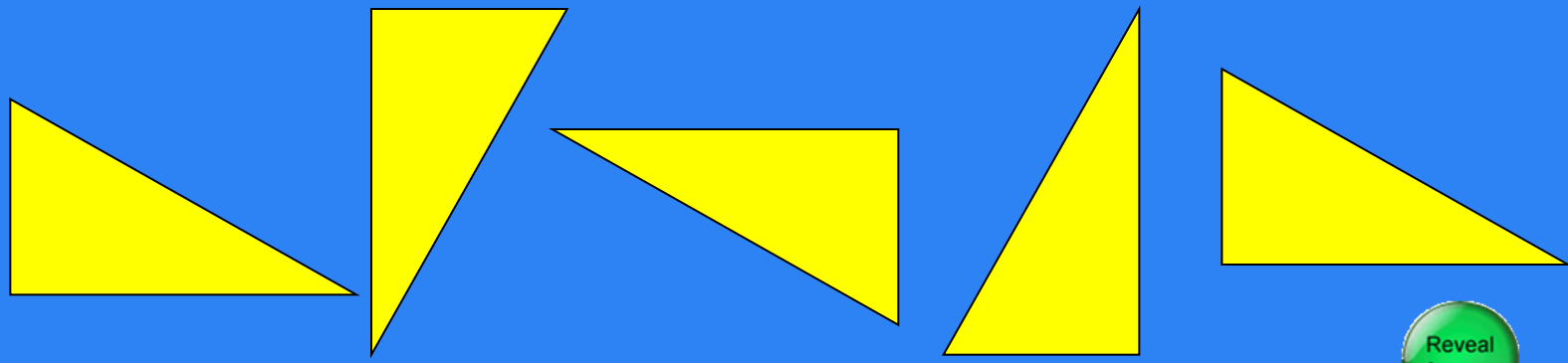
Click the "?" to reveal the missing answers.

Number Patterns

07:25 | 07:50 | 08:15 | 08:40 | 09:05

Reveal Answer

Adding 25 minutes each time!



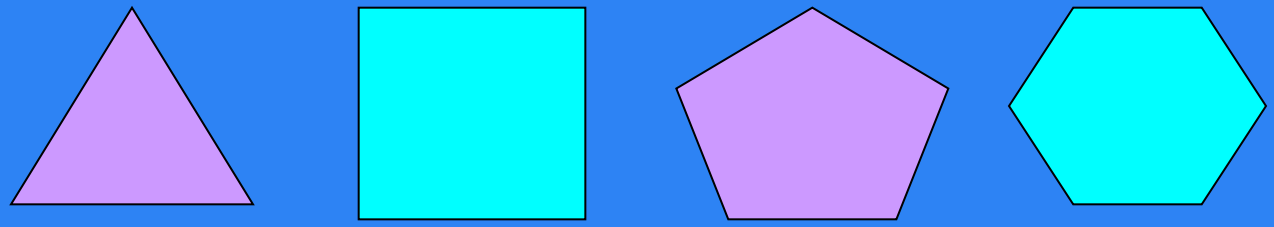
Reveal Answer

The triangle rotates 90° each time!

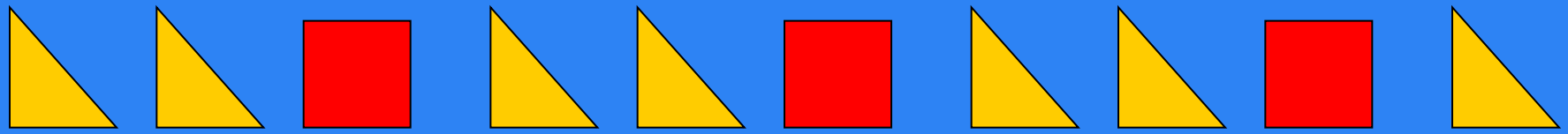
December | January | March | May | July | August

Months with 31 days!

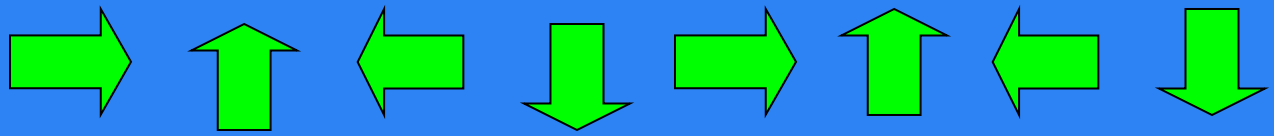
Reveal Answer



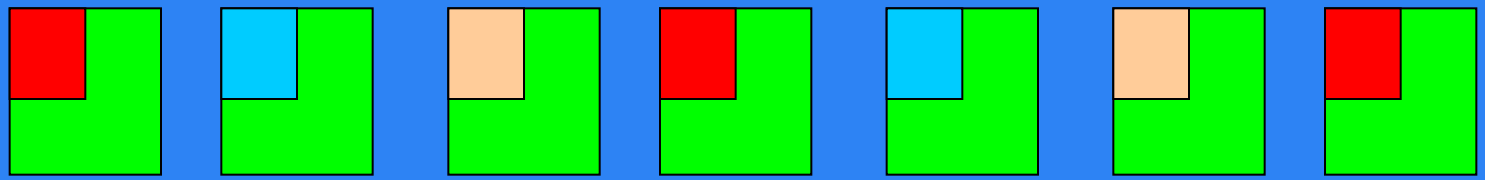
Reveal Answer



Reveal Answer



Reveal Answer



Reveal Answer

What comes next?