

Any coloured slides will be enlarged at the end of this document.

Counting to 9 and 10

Learning focus

This week, children will learn to count to 10. They will be introduced to the numbers 9 and 10 and use the ten frame to scaffold their counting to 10.

Small steps

- Previous step: Counting to 6, 7 and 8
- **This step: Counting to 9 and 10**
- Next step: Comparing groups up to 10

COMMON MISCONCEPTIONS

Children may count too few or too many. Counting the same object more than once is common. Children should be encouraged to line up objects when counting and touch each object as they count. Ask:

- *Have you counted carefully? Can you check by counting again slowly?*

Children may think that objects need to be in a single row to be countable. Show 6–10 counters in one row, then move them into two rows as represented on a ten frame. Ask:

- *How many counters are there in this row? How many counters are there now? How many counters fill this part of the ten frame?*

KEY LANGUAGE

In lesson: 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, one, two, three, four, five, six, seven, eight, nine, ten, how many, count, group, same, different, totals

Other language to be used by the teacher: collections, altogether, ten frame, dice, method

STRUCTURES AND REPRESENTATIONS

ten frame, multilink cubes, counters

RESOURCES

Mandatory: ten frame, counters, multilink cubes, box of buttons

To start each lesson this week, I would like you to practise counting up in 1s to 10, moving on to counting backwards in 1s from 10. Counting backwards can be difficult so here are a few videos/songs to help you:

<https://www.youtube.com/watch?v=N3Zu3bl12Q8>

<https://www.youtube.com/watch?v=Z1E6JwGYhOY>

<https://www.youtube.com/watch?v=T0ooQv7oHvw>

One representation the children will come across this week is the tens frame.

Ten frame: The ten frame helps children visualise 10. It will also help strengthen children's fluency with numbers up to 10, demonstrating how they can be arranged in different ways but still be worth the same amount.



Children may place counters or objects like buttons on here.

Tens frames, images for teaching, worksheets and part-whole models for this week's lessons can be found at the end of this document.

Monday -

IN FOCUS Children use one-to-one correspondence to count objects up to 10. They continue to develop their understanding of cardinality.

ASK

- How many containers are there in the picture?
- What different items can you see?
- Can you count the shells by pointing to each shell as you count?
- How can you use counters to help you count the shells? Can you use one counter for each shell?
- How might the ten frame help you to count the shells?

Unit 1: Number to 10, Week 2: Counting to 10 and 10

Discover





How many  are there?



DEEPEN Ask children to represent the **Discover** picture themselves by counting the relevant number of items into the container. Can they count them back out again?

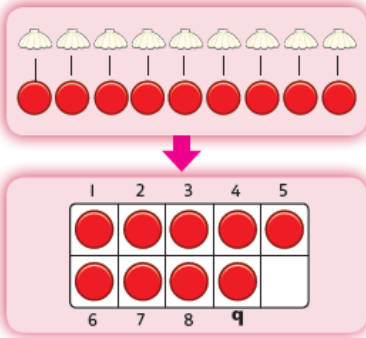
Unit 7: Addition to 10, Subtraction to 10, Counting to 10 and 10


Share

How many  are there?

I will use .

I will put  on a .




There are 9 .


DEEPEN Draw children's attention to the numerals around the ten frame. Ask children if they can read them. Ask: *Can you represent each number using counters?*

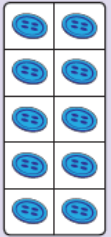
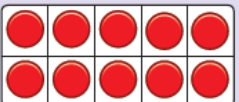
GET ACTIVE Use ten frames and counters to count the other objects in the **Discover** picture. How many precious stones or badges are there? Ask children to make each number on a ten frame, encouraging them to fill the top row first.

Unit 7: Addition to 10, Subtraction to 10, Counting to 10 and 10

Think together

1 How many  are there?

2 Does the  still show 10?

I think it is the same.

I think it is different.

STRENGTHEN Count items out of a box by taking them out one at a time and placing them on ten frame. Fill the top row first followed by the bottom row.

DEEPEN Set up pictures of ten frames using the **Ten frame teaching tool** with the screen frozen so that you can just show it for a few seconds. Ask children to match the ten frame they see on screen by making it themselves. Ask: *How many counters are there altogether? Can you show the same amount in a different way on the ten frame?*

Tuesday

Challenge

WAYS OF WORKING Whole class or pair work

Provide children with ten frames and counters to support learning. Encourage children who are confident to record the amount in each picture using numerals.

IN FOCUS Children will see different representations of 9 and 10, and will sort them into those that show 9 and those that show 10. Children make links between the representations and discuss what is the same and what is different about them.

ASK

- Which pictures show 9? Can you point to each item as you count? Can you make the pictures using real objects?
- Which picture shows the number 10?
- Do you need to count each object or can you see the number without counting?
- Which picture is the odd one out? Can you explain why it is the odd one out?

STRENGTHEN Model how to make the pictorial representations shown in the **Challenge**. Link each representation back to the ten frame and use it to check the number of items, for example, break up the cubes and place them on the ten frame to count how many, or model this using the **Ten frame teaching tool**.

DEEPEN Give children two large pieces of paper: one piece with the number 9 on it, one with the number 10 on it. Ask children to fill the paper with different representations of that number. They may use concrete and pictorial representations to make the number. Can any children write the numeral?

The challenge card is titled "Which do not show 9?". It contains several visual representations: a ten frame with 9 red circles, a vertical stack of 10 blocks (5 blue on top, 5 red on bottom), a row of 10 flowers, and two dice showing 4 and 5. To the right, a cartoon boy says, "I will count each group carefully." Below him, a cartoon cat asks, "Can you show how many with 9?"

GET ACTIVE Label sets of two hoops with the numerals 9 and 10. Ask four pairs of children to make or draw the representations shown in the **Challenge** question and add them to the correct hoop. Ask two more children to show 9 and 10 in ten frames to add to the hoops. Ask the other children to collect groups of 9 or 10 items from around the classroom or outside area and put them in the relevant hoop.

Learning focus

Count up to 10 from a larger group

Practical activities

WAYS OF WORKING Whole class

You will need digit cards 1–10 and action cards (photocopiable 10) for these activities.

IN FOCUS The focus of these activities is to encourage children to see that 9 and 10 can also be represented as an abstract amount. Children also count 9 or 10 from a larger amount. Encourage children to use containers to store the objects they count out and then to use a ten frame to double check they have counted correctly.

GET ACTIVE Card and action game

Use digit cards 1–10 and action cards showing star jumps, hopping, clapping and skipping.

Choose a digit card and an action card and ask children to do the action that many times.

Counting out from a larger group

Show children a large box containing about 30–40 items. Explain that lots of the items you have collected this week have been mixed together and you need to count them back out. Use the digit cards to choose a number and then ask children to count that number out from the larger group. Give each child a container to count the objects into. Once you have counted the objects out of the larger container, label how many items are in the smaller containers.

Reflect: Journal 2

WAYS OF WORKING Independent thinking

Have buttons and paper clips available for children to use to represent the **Reflect** activity.

IN FOCUS The focus of this activity is for children to count out 9 or 10 from a larger amount. Children consider different methods to help them count efficiently, including crossing out the items as they count, numbering the items as they count or putting counters on top of the items or on the ten frame. Children may need to use counters, lining them up to help them to count without missing any or counting any items more than once.

MASTERY CHECKPOINT Children who have mastered this concept can count to 10 using one-to-one correspondence. They can represent 9 and 10 on a ten frame. They are starting to recognise that they can count on using a ten frame understanding that a full row is 5. Children can count objects out from a larger group.

Children who have not yet mastered this concept can count objects in a straight line up to 10, touching each object as they count. They start to use the ten frame to support their counting but still need to count all the objects without making the link to counting on.

Children who have mastered this concept with greater depth can count to 10 efficiently and accurately. They are starting to subitise and can understand when they can count on to find the total without counting all the objects. Children can represent 9 and 10 in more than one way independently.

Reflect Unit 11: amounts to 10, sets of counting to 7 and 10

How many £5 are there?

There are _____

How many paper clips are there?

There are _____

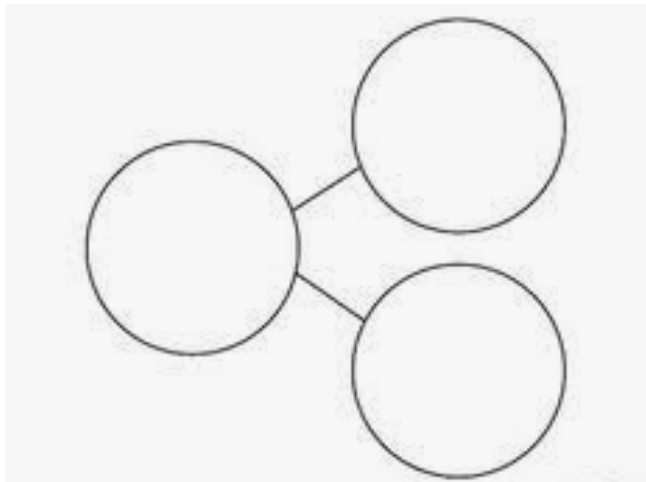
Can you count the _____?

Strengths: What can you use to help you count the items? Can you put a cube or counter on top of each button? How could you use the ten frame to help you count the cubes? Can you count each item out as you count it? Can you say the sentence aloud? 'There are _____ buttons.'

Deepen: How can you use cubes or counters to help you count the items? Can your number match them in the picture? Can you complete the sentence using numbers? [Children who are not confident writing numbers to represent an amount can say the sentence out loud, or can draw the appropriate number of counters to represent the amount of each item.]

Thursday - Complete the worksheets where children trace and write the number 9 and count the items. Children then complete the activity where they circle all the different representations which show 9.

Friday - Children use objects and the part-whole model grids to see how many ways they can split the number 9 into two parts, ie. $8+1$, $7+2$, $6+3$, $5+4$.



Monday's screens

Unit 1: Numbers to 10, Week 2: Counting to 9 and 10

Discover

How many  are there?

Share

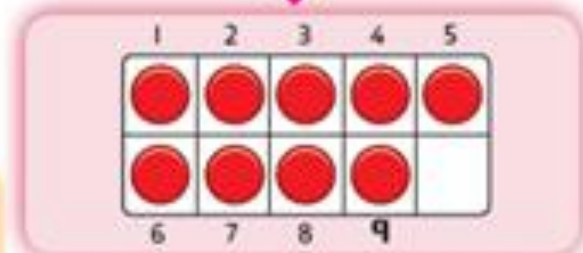
How many  are there?




I will use ○.



I will put ○ on a



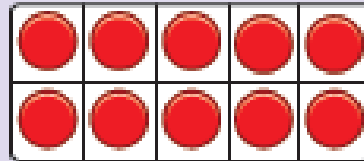
There are 9 .

Think together

1 How many  are there?



2 Does the  still show 10?



I think it is different.


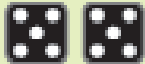

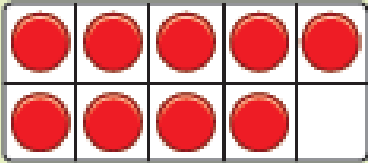
I think it is the same.



Tuesday's screen

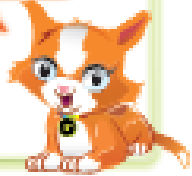
CHALLENGE

Which do not show 9?



I will count each group carefully.


Can you show how many with ○?



Draw 9 flowers.

Show 10.

1

ELG 11: Mathematics: Numbers count reliably with numbers from 1 to 10

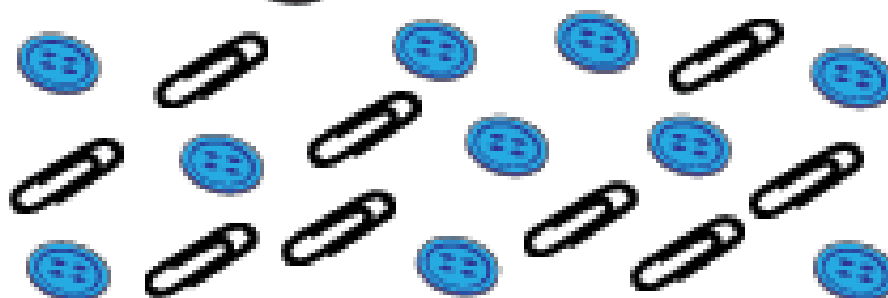
ELG 4: Physical development: Moving and handling handle equipment and tools effectively, including pencils for writing

Ask

Strengthen: How can you make sure you draw exactly 9 flowers? Can you use counters to help you check the number? Can you touch each counter as you count? Can you say the numbers aloud as you count?

Deeper: Can you write the number next to each counter? Which number tells you how many there are altogether? Can you show 9 and 10 in more than one way? Is your way different from your partner's? Could you show 9 or 10 in a five frame? Why not?

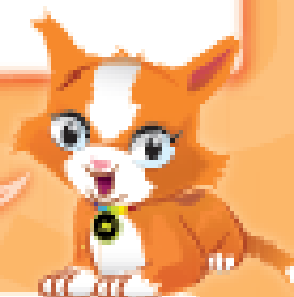
How many  are there?



There are _____ .

There are _____ .

Can you count the ?

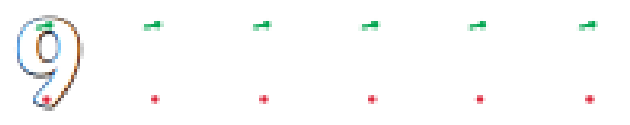


Strengthen: What can you use to help you count the items? Can you put a cube or counter on top of each button? How could you use the ten frame to help you count the cubes? Can you cross each item out as you count it? Can you say the sentence aloud? "There are _____ buttons."

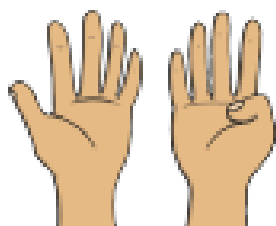
Deepen: How can you use cubes or counters to help you count the items? Can you number each item in the picture? Can you complete the sentences using numerals? [Children who are not confident writing numerals to represent an amount can say the sentences out loud, or can draw the appropriate number of counters to represent the amount of each item.]

All About Number 9

Number Formation Activity



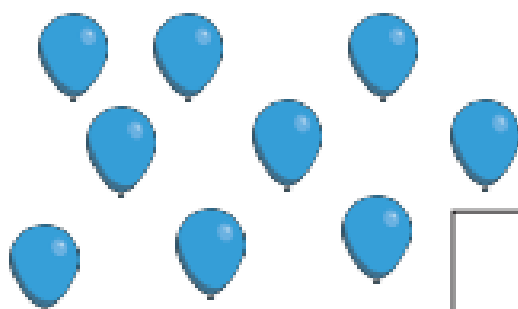
How many fingers are being shown?



How many counters are in the ten-frame?



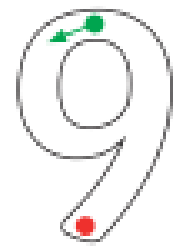
How many balloons can you see?



How many cakes are there?



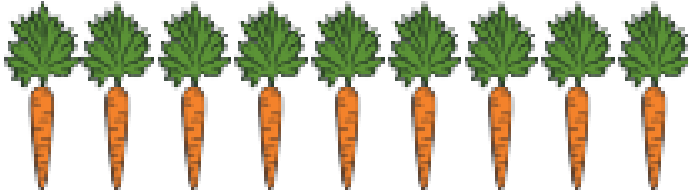
Number Nine Formation



Trace over these numbers and then try writing your own.



Write the answers in the circles.

How many carrots? 

How many flowers? 

How many frogs? 

I Spy Number Nine

Find and circle all of the number nines.

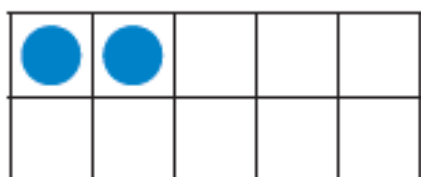
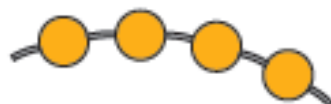
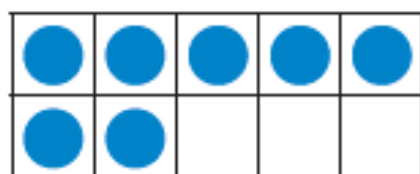
9



5



9



1

4

7



Part-Whole Models

