Diving into Mastery – Diving

Adult Guidance with Question Prompts

Children should be able to count on and back in 2s, 5s and 10s starting from numbers other than zero. They should start on a multiple of 2 or 5 when counting in 2s and 5s but can start from any number when counting in 10s. Children should be able to spot patterns as they count.

Are the sequences going forwards or backwards?

How do you know?

What multiples can you see?

What sized steps are the numbers counting in?

Can you find any patterns?

What numbers are missing?

What would come next in each sequence?

Counting in 2s, 5s and 10s

Complete the number sequences counting forwards and backwards in 2s, 5s and 10s.

16, 14, 12, 10, 8, _____, _____, _____

20, 25, _____, _____, _____, 45, 50, 55

_____, _____, _____, 53, 63, 73, 83

100, 90, 80, 70, _____, _____, _____

18, 20, _____, _____, _____, 28, 30

80, 85, 90, 95, _____, _____, _____

What would be the next number in each of these patterns?

Diving into Mastery – Deeper

Adult Guidance with Question Prompts

Children check sequences in 2s, 5s and 10s and reason about which is incorrect. They explain their thinking and correct the mistake.

Can you describe the sequences?

Are the numbers getting larger or smaller?

What sized steps are the numbers counting in?

Can you find any patterns?

Which one is incorrect?

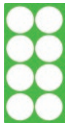
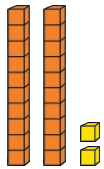
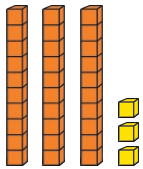
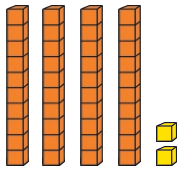
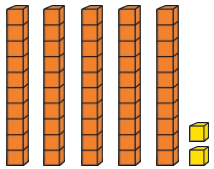
How do you know?

What should Lilly have done?

What would be the 5th number in each sequence?

Counting in 2s, 5s and 10s

Lilly has made these number sequences counting in 2s, 5s and 10s.

			
30 + 4	**40 + 4**	**50 + 4**	**60 + 4**
			
6 tens and 5 ones	**6 tens**	**5 tens and 5 ones**	**5 tens**
			

She has made one mistake. Can you find it and explain what she has done wrong? What should she have written? Make your own sequences counting forwards and backwards in 2s, 5s and 10s using different representations.

Diving into Mastery – Deepest

Adult Guidance with Question Prompts

Children solve problems involving counting in 2s, 5s and 10s.

Frank wants to buy 15 balls. What is 15 a multiple of?

Which pack should he buy?

How many will he need?

Can you count in 5s to find out?

Anita wants to buy 20 balls. What packs could she buy?

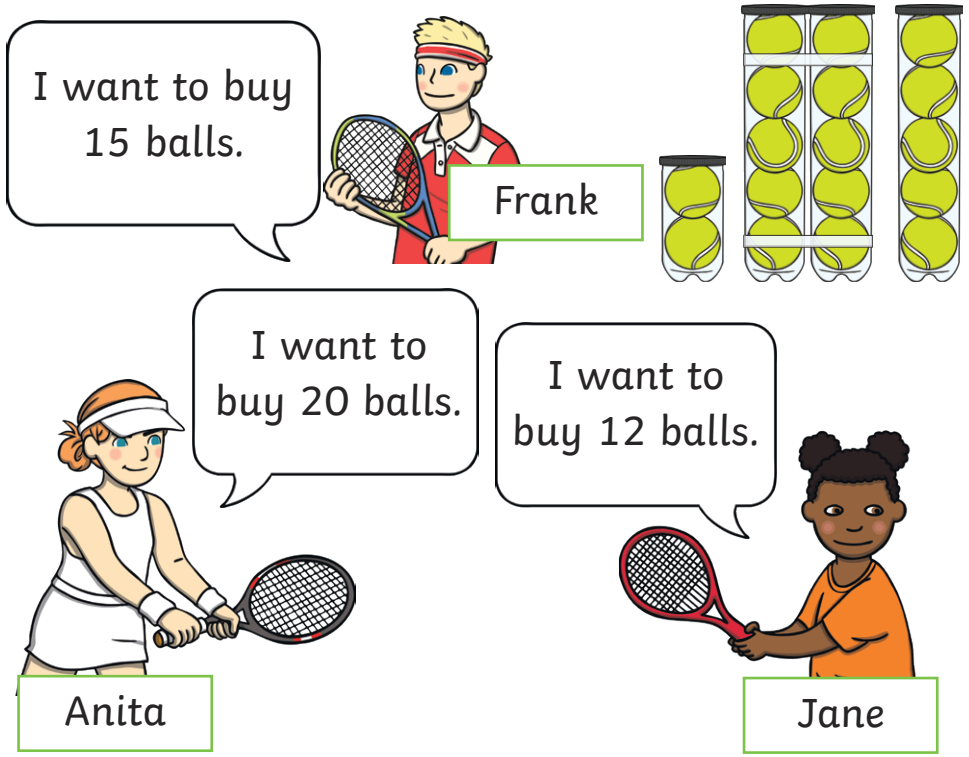
Is there another pack she could buy?

How many of each size would she need to make 20 in total?

How many packs of 2/5/10 would you need to buy to have 100 balls?

Counting in 2s, 5s and 10s

Tennis balls come in packs of different sizes.
Orders need to be for all the same size.



Which packs should each person buy?
How many packs will they need?
Is there more than one possibility for any of the players?

A tennis coach has 100 tennis balls. How many of each pack size could he have bought?