

Finding $\frac{3}{4}$ of an amount

REHEARSE

Talk through 2LS30_step2_speaking_frame while you find $\frac{3}{4}$ of each amount. Then complete the models to show your understanding.

12			
$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$
3	3	3	3

12 is shared into 4 equal parts.
There are 3 in each equal part.
 $\frac{1}{4}$ of 12 is 3. $\frac{3}{4}$ of 12 is 9.

What is $\frac{3}{4}$ of 16?

16			
$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$
4	4	4	4

16 is shared into 4 equal parts.
There are 4 in each equal part.
 $\frac{1}{4}$ of 16 is 4. $\frac{3}{4}$ of 16 is 12.

What is three quarters of 24?

24			
$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$
6	6	6	6

24 is shared into 4 equal parts.
There are 6 in each equal part.
 $\frac{1}{4}$ of 24 is 6. $\frac{3}{4}$ of 24 is 18.

RETRIEVE

Can I still identify the missing part?

I have some ones and 4 tens. I am 59. How many ones do I have? 19 ones

REHEARSE

Complete the models to find $\frac{3}{4}$ of the following amounts. Pupils may also have shaded 3 of the 4 equal parts.

44			
$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$
11	11	11	11

$\frac{3}{4}$ of 44 is 33.

80			
$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$	$\frac{1}{4}$
20	20	20	20

$\frac{3}{4}$ of 80 is 60.

28			
7	7	7	7

$\frac{3}{4}$ of 28 is 21.

40			
10	10	10	10

$\frac{3}{4}$ of 40 is 30.

APPLY AND EXPLORE

Look at the models. They are all different. Which model do you prefer? Why? Any relevant response.

REHEARSE

Draw your own model to show $\frac{3}{4}$ of 20. $\frac{3}{4}$ of 20 is 15. Any relevant model with 4 equal parts of 5 and $\frac{3}{4}$ of 20 = 15.

APPLY AND EXPLORE

Look at the models where 20, 40 and 80 are the wholes.

What do you notice about $\frac{3}{4}$ of 20, 40 and 80? Can you explain why? The wholes show a pattern of doubling. This doubling is repeated in the fractions. For example, 40 is double 20 and $\frac{3}{4}$ of 40 is double $\frac{3}{4}$ of 20.

This is because the same calculation is being applied to each calculation – divide by 4 and x 3.