

Varied Fluency

Multiply by 3

Developing

- 1a. $3 + 3 + 3 + 3 + 3 + 3 = 18$
 2a. False, 9 groups of 3 is 27.
 3a. 7 lots of 3 = 21

4a.

$3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 =$	
$3 + 3 + 3 + 3 + 3 =$	
$3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 =$	

Expected

- 5a. $3 + 3 + 3 + 3 + 3 = 15$
 6a. False, 12 groups of 3 is 36.
 7a. 6 lots of 3 = 18

8a.

$7 \times 3 =$	
$4 \times 3 =$	
$9 \times 3 =$	

Greater Depth

- 9a. $3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 = 30$
 10a. True
 11a. $3 + 3 + 3 + 3 = 12; 4 \times 3 = 12$

12a.

$9 \times 3 =$	$3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 = 36$
$12 \times 3 =$	$3 + 3 + 3 + 3 + 3 + 3 = 18$
$6 \times 3 =$	$3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 = 27$

Varied Fluency

Multiply by 3

Developing

- 1b. $3 + 3 + 3 = 9$
 2b. True
 3b. 10 lots of 3 = 30.

4b.

$3 + 3 + 3 + 3 + 3 =$	
$3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 =$	
$3 + 3 + 3 =$	

Expected

- 5b. $3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 = 21$
 6b. False, six groups of three is 18.
 7b. 8 lots of 3 = 24

8b.

$3 \times 3 =$	
$8 \times 3 =$	
$5 \times 3 =$	

Greater Depth

- 9b. $3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 = 27$
 10b. False, the answer is 27.
 11b. $3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 = 24; 8 \times 3 = 24$

12b.

$5 \times 3 =$	$3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 + 3 = 33$
$11 \times 3 =$	$3 + 3 + 3 + 3 + 3 + 3 = 15$
$7 \times 3 =$	$3 + 3 + 3 + 3 + 3 + 3 + 3 = 21$

Varied Fluency
Divide by 3

Developing

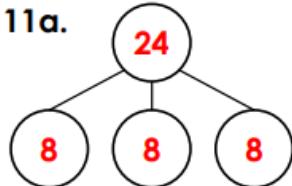
- 1a. 5
2a. False, $24 \div 3 = 8$
3a. 7
4a. $18 \div 3 = 6; 9 \div 3 = 3; 6 \div 3 = 2$

Expected

- 5a. 8
6a. False, $18 \div 3 = 6$
7a. 11
8a. $12 \div 3 = 4; 27 \div 3 = 9; 36 \div 3 = 12$

Greater Depth

- 9a. 12
10a. False, $21 \div 3 = 7$



12a. $36 \div 3 = 12; 18 \div 3 = 6; 21 \div 3 = 7$

Varied Fluency
Divide by 3

Developing

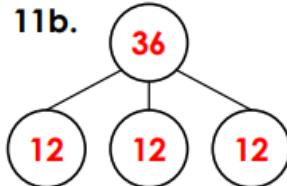
- 1b. 4
2b. False, $27 \div 3 = 9$
3b. 5
4b. $24 \div 3 = 8; 12 \div 3 = 4; 3 \div 3 = 1$

Expected

- 5b. 6
6b. False; $30 \div 3 = 10$
7b. 9
8b. $24 \div 3 = 8; 15 \div 3 = 5; 33 \div 3 = 11$

Greater Depth

- 9b. 9
10b. True, $33 \div 3 = 11$



12b. $24 \div 3 = 8; 33 \div 3 = 11; 27 \div 3 = 9$