

Blooket | Question Set - Answer Key

Name _____

Date _____

Class _____

linear vs exponential

1. repeatedly adding

a) exponential

b) linear ✓

2. repeated multiplication

a) linear

b) exponential ✓

3. Linear or exponential?

x	y
0	1
1	2
2	4
3	8
4	16

a) exponential ✓

b) Linear

4.

$$y = 3x^2$$

a) Linear

b) Exponential

c) Neither ✓

5. $y = 3x + 6$

a) Linear ✓

b) Neither

c) Exponential

6.

$$y = 5^x$$

a) Exponential ✓

b) Neither

c) Linear

7.

$$y = 5\left(\frac{1}{3}\right)^x$$

a) Exponential ✓

b) Linear

c) Neither

8.

$$y = 5\left(\frac{1}{4}\right)^x + 5$$

a) Neither

b) Linear

c) Exponential ✓

9.

$$y = 5(x)^5 + 5$$

a) Exponential

b) Linear

c) Neither ✓

10.

$$y = \frac{1}{2}(x)^3 + 4$$

a) Linear

b) Exponential

c) Neither ✓

11.

$$y = 3x + 2$$

a) Neither

b) Linear ✓

c) Exponential

12.

$$y = 4x$$

a) Linear ✓

b) Exponential

c) Neither

13.

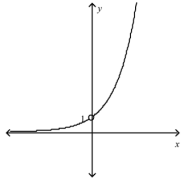
$$y = 5$$

a) Linear ✓

b) Neither

c) Exponential

14. Which corresponds to the graph

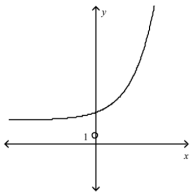


a) $y = b^x$ ✓

b) $y = \left(\frac{1}{b}\right)^x$

c) $y = b^x + k$

15. Which corresponds to the graph

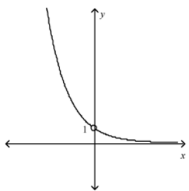


a) $y = b^x + k$ ✓

b) $y = b^x$

c) $y = \left(\frac{1}{b}\right)^x$

16. Which corresponds to the graph

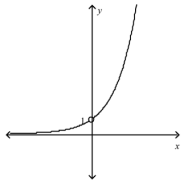


a) $y = b^x$

b) $y = \left(\frac{1}{b}\right)^x$ ✓

c) $y = b^x + k$

17. Which corresponds to the graph

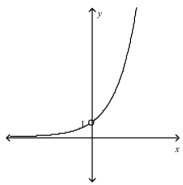


a) $y = b^x + k$

b) $y = \left(\frac{1}{b}\right)^x$

c) $y = b^x$ ✓

18. Which corresponds to the graph

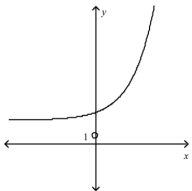


a) $y = b^x$ ✓

b) $y = \left(\frac{1}{b}\right)^x$

c) $y = b^x + k$

19. Which corresponds to the graph

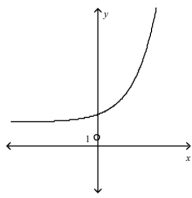


a) $y = b^x + k$ ✓

b) $y = \left(\frac{1}{b}\right)^x$

c) $y = b^x$

20. Which corresponds to the graph

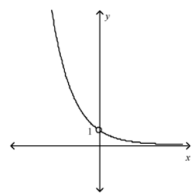


a) $y = b^x$

b) $y = \left(\frac{1}{b}\right)^x$

c) $y = b^x + k$ ✓

21. Which corresponds to the graph

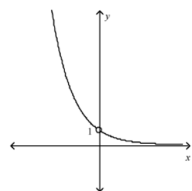


a) $y = b^x + k$

b) $y = \left(\frac{1}{b}\right)^x$ ✓

c) $y = b^x$

22. Which corresponds to the graph

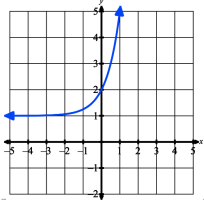


a) $y = b^x$

b) $y = \left(\frac{1}{b}\right)^x$ ✓

c) $y = b^x + k$

23. This graph represents ...



a) exponential growth ✓

b) exponential decay

c) a linear equation

d) a quadratic equation

24. What is the initial value of this table?

x	y
0	3
1	12
2	48
3	192

a) 4

b) (1,12)

c) (0,3) ✓

d) (0,4)

25. What is the multiplier of this table?

x	y
0	3
1	12
2	48
3	192

a) (0,3)

b) 4 ✓

c) (0,4)

d) (1,12)

26. What is the equation of this table?

x	y
0	3
1	12
2	48
3	192

a) $y = 3^x$

b) $y = \frac{1}{4}^x$

c) $y = 4^x$

d) $y = 3(4)^x$ ✓

27. What is the initial value of this table?

x	y
-2	50
-1	10
0	2
1	2/5

a) (0,50)

b) (-2,50)

c) 4

d) (0,2) ✓

28. What is the multiplier of this table?

x	y
-2	50
-1	10
0	2
1	2/5

a) (0,3)

b) (1,12)

c) (0,4)

d) $\frac{1}{5}$ ✓

29. What is the equation of this table?

x	y
-2	50
-1	10
0	2
1	2/5

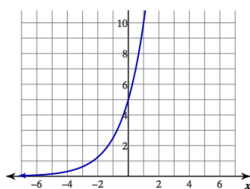
a) $y = 2\left(\frac{1}{5}\right)^x$ ✓

b) $y = 3^x$

c) $y = \frac{1}{4}^x$

d) $y = 4^x$

30. What is the initial value of this graph?



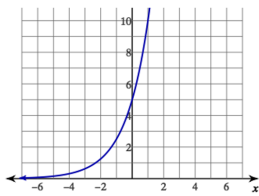
a) (1,12)

b) (0,3)

c) (0,5) ✓

d) 4

31. What is the multiplier of this graph?



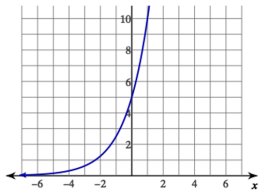
a) $(1,12)$

b) 5

c) $(0,3)$

d) 2 ✓

32. What is the equation of this graph?



a) $y = 4^x$

b) $y = \frac{1}{4}^x$

c) $y = 3^x$

d) $y = 5(2)^x$ ✓