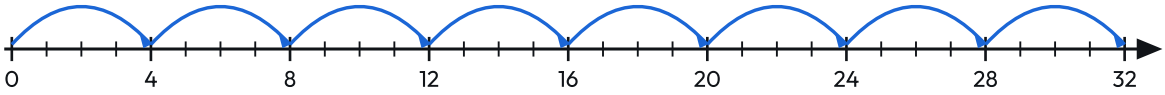
Names (pair) _____ Date _____

Multiples: Jumps and Trains

Example

A frog jumps along the number line in jumps of 4, starting at 0. Where does it land?

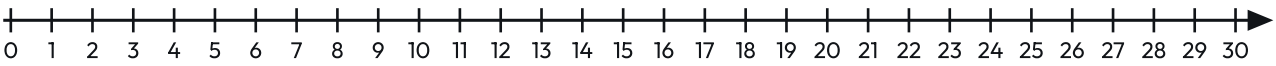


$4 \times 1 = 4, 4 \times 2 = 8, 4 \times 3 = 12, \ldots$ The numbers $4, 8, 12, 16, \ldots$ are the **multiples** of 4.

Remember

The multiples of b are $b \times 1, b \times 2, b \times 3, \ldots$ There are **infinitely many** of them, but only **finitely many** factors. A number b is both a factor and a multiple of itself. 0 is a multiple of every number because $0 = b \times 0$.

1 ON YOUR OWN Draw jumps of 3 (blue) and jumps of 5 (red) from 0 to 30. Where do both frogs land?



Multiples of 3 up to 30: _____

Multiples of 5 up to 30: _____

Common multiples: _____

2 ON YOUR OWN Write the first eight multiples.

6: _____ _____ _____ _____ _____ _____ _____ _____

7: _____ _____ _____ _____ _____ _____ _____ _____

9: _____ _____ _____ _____ _____ _____ _____ _____

Names (pair) _____ Date _____

3 IN PAIRS True or false? Correct the false statements.

a) A multiple of a number is always bigger than the number. **true / false**

Correction: _____

b) 7 is both a factor and a multiple of 7. **true / false**

Correction: _____

c) The number 12 has infinitely many factors. **true / false**

Correction: _____

d) 0 is a multiple of 5. **true / false**

Correction: _____

4 IN PAIRS **Trains.** Ana builds a train of rods of length 4, and Luka builds one of rods of length 6. When will the trains first be the same length?



They are the same length at ☐. Next time at ☐.

5 ON YOUR OWN Bus A leaves the stop every 15 minutes, and bus B every 20 minutes. Both left at 8:00. When will they next leave together?

A: ☐

B: ☐

Together at ☐

The Rods app · otooly.com/rods

Build trains of equal rods and compare them. You can also show multiples in the **Hundred Chart** app.

★ ON YOUR OWN **Exit card.** Write three multiples of 8 greater than 50:

☐