

Find the missing terms for each geometric sequence and state the common ratio

1. 1, 3, \_\_, 27, \_\_

Common ratio \_\_\_\_\_

2. 2, \_\_, 18, 54, \_\_\_\_

Common ratio \_\_\_\_\_

3. 3, \_\_, \_\_, 24, 48

Common ratio \_\_\_\_\_

4. \_\_, \_\_, 20, 40, 80

Common ratio \_\_\_\_\_

5. 1, 4, 16, \_\_, \_\_\_\_

Common ratio \_\_\_\_\_

6. 80, \_\_, 20, 10, 5, \_\_\_\_

Common ratio \_\_\_\_\_

Two consecutive terms in a geometric sequence are given. Find the common ratio, the recursive formula, and the explicit formula

7. If  $f(0) = 2$  and  $f(1) = 8$  then  $f(2) =$  \_\_\_\_\_ and  $f(3) =$  \_\_\_\_\_

Common ratio \_\_\_\_\_ Recursive rule \_\_\_\_\_ Explicit Rule \_\_\_\_\_

8. If  $f(1) = 4$  and  $f(2) = 8$  then  $f(3) =$  \_\_\_\_\_ and  $f(4) =$  \_\_\_\_\_

Common ratio \_\_\_\_\_ Recursive rule \_\_\_\_\_ Explicit Rule \_\_\_\_\_

9. If  $f(2) = 9$  and  $f(3) = 3$  then  $f(4) =$  \_\_\_\_\_ and  $f(5) =$  \_\_\_\_\_

Common ratio \_\_\_\_\_ Recursive rule \_\_\_\_\_ Explicit Rule \_\_\_\_\_

10. If  $f(3) = 16$  and  $f(4) = 32$  then  $f(5) =$  \_\_\_\_\_ and  $f(6) =$  \_\_\_\_\_

Common ratio \_\_\_\_\_ Recursive rule \_\_\_\_\_ Explicit Rule \_\_\_\_\_

11. If  $f(4) = 16$  and  $f(5) = 8$  then  $f(5) =$  \_\_\_\_\_ and  $f(6) =$  \_\_\_\_\_

Common ratio \_\_\_\_\_ Recursive rule \_\_\_\_\_ Explicit Rule \_\_\_\_\_

12. If  $f(5) = 40$  and  $f(6) = 80$  then  $f(5) =$  \_\_\_\_\_ and  $f(6) =$  \_\_\_\_\_

Common ratio \_\_\_\_\_ Recursive rule \_\_\_\_\_ Explicit Rule \_\_\_\_\_