Sequence 1 WS

Find the next three terms in each sequence.

1) $-20,\ 0,\ 20,\ 40,\ 60, \ldots$

2) $-5,\ -205,\ -405,\ -605,\ -805, \ldots$

3) $6,\ 15,\ 24,\ 33,\ 42, \ldots$

4) $-36,\ -41,\ -46,\ -51,\ -56, \ldots$

5) $-2.3,\ -0.8,\ 0.7,\ 2.2,\ 3.7, \ldots$

6) $23,\ 33,\ 43,\ 53,\ 63, \ldots$

Find the first four terms in each sequence.

7) $a_n = 4 \cdot 6^{n-1}$

8) $a_n = -\frac{7}{5} \cdot \left(-\frac{5}{6}\right)^{n-1}$

9) $a_n = -3 \cdot (-2)^{n-1}$

10) $a_n = -4 \cdot 5^{n-1}$

11) $a_n = 6^{n-1}$

12) $a_n = -\left(-\frac{1}{5}\right)^{n-1}$

Find the tenth term in each sequence.

13) $-3,\ -1,\ 2,\ 6,\ 11, \ldots$

14) $3,\ 9,\ 27,\ 81,\ 243, \ldots$

15) $-1.5,\ -3,\ -6,\ -12,\ -24, \ldots$

16) $1,\ 2,\ 6,\ 24,\ 120, \ldots$

17) $-2,\ 4,\ -8,\ 16,\ -32, \ldots$

18) $4,\ 7,\ 12,\ 19,\ 28, \ldots$

19) $a_n = -\dfrac{4}{n+1}$

20) $a_n = n^2 + 1$

21) $a_n = -\dfrac{12}{n}$

22) $a_n = (2n)^2$

23) $a_n = (-2)^n - 2$

24) $a_n = n^2$

Find the first four terms in each sequence.

25) $a_n = a_{n-1} + 6$
$a_1 = -6$

26) $a_n = a_{n-1} + 8$
$a_1 = -34$

27) $a_n = na_{n-1}$
$a_1 = -2$

28) $a_n = a_{n-1} + 100$
$a_1 = -23$

29) $a_n = \dfrac{2 + a_{n-1}}{2}$
$a_1 = -14$

30) $a_n = a_{n-1} + 30$
$a_1 = 20$