

Arithmetic Sequences

Block: _____ Mark Out of 24 _____

State if each sequence is arithmetic.

1) 20, 10, 0, -10, ...

2) 3, 5.8, 8.6, 11.4, ...

Find the common difference.

3) -12, -112, -212, -312, ...

Find the three terms in the sequence after the last one given.

4) -17, -12, -7, -2, ...

Given the explicit formula for an arithmetic sequence find the first five terms.

5) $a_n = -19 + 10n$

Given the recursive formula for an arithmetic sequence find the first five terms.

6) $a_n = a_{n-1} - 20$
 $a_1 = 14$

Given the explicit formula for an arithmetic sequence find the term named in the problem.

7) $a_n = 17 - 5n$

Find a_{40}

Given the recursive formula for an arithmetic sequence find the explicit formula.

8) $a_n = a_{n-1} + 3$

$a_1 = -32$

Given two terms in an arithmetic sequence find the explicit formula.

9) $a_{19} = 580$ and $a_{37} = 1120$

Given two terms in an arithmetic sequence find the term named in the problem.

10) $a_{14} = 353$ and $a_{33} = 923$

Find a_{40}

Given two terms in an arithmetic sequence find the explicit formula.

11) $a_{20} = 187$ and $a_{37} = 340$

Given a term in an arithmetic sequence and the common difference find the explicit formula.

12) $a_{25} = 471$, $d = 20$