

Algebra II

11-2

Arithmetic Sequences

Arithmetic Sequence -

Example of an Arithmetic Sequence -

3 7 11 15 19 23 ... 99 103

What is the 8th term? _____

What is the 100th term? _____

What is the 1257th term? _____

Formula for finding the n^{th} term of an Arithmetic Sequence -

$$a_n =$$

Find a formula for the n^{th} term of each arithmetic sequence.

1) 24, 32, 40, 48, . . .

Find the specified term of each arithmetic sequence.

7) $4, 9, 14, 19, \dots ; a_{25}$

17) $a_7 = -19, a_{10} = -28, a_{21} = \underline{\hspace{2cm}}$

Find the arithmetic mean of each pair of numbers.

19) $-3, 7$

Insert (a) two, (b) three, (c) four arithmetic means between each pair.

23) $-27, 33$

27) How many terms are in the sequence $18, 24, 30, \dots, 618$?

Assignment:
pg. 509
2-32 even.