## **Arithmetic Sequences**

Date\_\_\_\_\_ Period\_\_\_

- a) Write a recursive rule for the sequence
- b) Write an explicit rule for the sequence
- 1) 37, 67, 97, 127, ...

2) 11, 9, 7, 5, ...

3) 22, 52, 82, 112, ...

4) 40, 70, 100, 130, ...

5) 39, 19, -1, -21, ...

6) 36, 34, 32, 30, ...

Given the arithmetic sequence, determine the value of the term given

7) 30, 26, 22, 18, ... Find  $a_{33}$ 

8) 24, 21, 18, 15, ... Find  $a_{28}$ 

9) -22, -15, -8, -1, ... Find 
$$a_{_{28}}$$

10) 11, -189, -389, -589, ... Find 
$$a_{_{38}}$$

11) -20, -10, 0, 10, ... Find 
$$a_{34}$$

12) 
$$-30$$
,  $-24$ ,  $-18$ ,  $-12$ , ... Find  $a_{30}$ 

## Define the following vocabulary terms

15) 
$$a_{1}$$

16) 
$$a_{n-1}$$