

Name _____ Date _____

Power Standard 9 Practice Test

1. Look at the number pattern: 184, 92, 46,

What is the next number in the number pattern?

- a. 22 b. 21.5 c. 19 d. 23

2. Look at the number pattern: 17, 170, 18, 180,

What are the next two numbers in the number pattern?

- a. 19 & 900 b. 19 & 190 c. 18 & 190 d. 190 & 19

3. Which expression best describes this pattern? 3, 36, 432, 5,184

- a. $n + 12$
b. $n \times 12$
c. $n / 12$
d. $n - 12$

4. Which expression best describes this pattern? 236, 120, 62, 33

- a. $n \times 2 + 5$
- b. $n + 10 - 8$
- c. $n / 2 + 2$
- d. $n \times 10 / 4$

5. Which expression best describes the pattern? 60, 50, 40, 30, 20

- a. $n + 10$
- b. $n * 10$
- c. $n - 10$
- d. $n * 20$

6. The rule of a pattern is to multiply the first number by 3, then for the next number subtract 1. An example of this pattern would be:

- a. 5, 4, 12, 11, 33
- b. 2, 6, 7, 21, 22
- c. 3, 15, 11, 55, 51
- d. 2, 6, 5, 15, 14

7. Jack wrote the following numbers down on a piece of paper: 2, 4, 6, 8, 10

Jill also wrote down five numbers on a piece of paper: 3, 8, 13, 18, 23

How many more is Jack's 12th term compared to Jill's 12th term?

8. What is Jill's 51st term?

9. Generate two numerical sequences starting at zero using the given rules. Then compare and explain the relationship between the two sequences.

Add 8: _____, _____, _____, _____, _____, _____

Add 10: _____, _____, _____, _____, _____, _____

Compare and explain: _____

_____.

10. Every year that a dog lives is like living 7 years as a human. Mr. Renfro has a dog named Bailey Sue. She is 3 years old. How old (in human years) will Bailey be when she's 10 years old? Answer _____

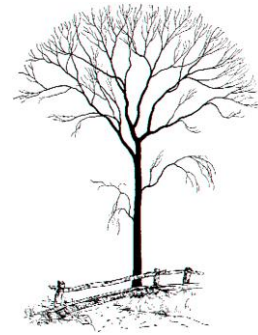
Dog years	1	2	3	4	5	6	7
Human years	7	14	21	28	?	?	?

Mr. Renfro has a total of 69 trees to plant. He has 32 oak trees and will plant 4 each day. He also has 37 birch trees and will plant 6 each day.

11. In the blanks below write the next four numbers in the pattern of oak trees and the next four numbers in the pattern of birch trees Mr. Renfro has remaining to plant.

Oak Trees: 32, 28, _____, _____, _____, _____

Birch Trees: 37, 31, _____, _____, _____, _____



12. After planting some of the trees, Mr. Renfro has a total of 19 trees remaining to be planted. How many of the remaining trees are oak trees and how many are birch? Show your work.

13. Suppose Mr. Renfro wanted to finish planting all of the trees on the same day. How many oak trees should he have started with?

14. Moe made a number pattern that started with the number 1 and used the rule “multiply by 4.” Curly also made a number pattern that started with the number 1. The 3rd term in Curly’s pattern was 6 less than the 3rd term in Moe’s pattern. Which rule could describe Curly’s pattern?

- a. +4, x5, +4, x5
- b. x5, x 4, x 3, x2
- c. +2, +5, +2, +5
- d. +4, +5, +6, +7

