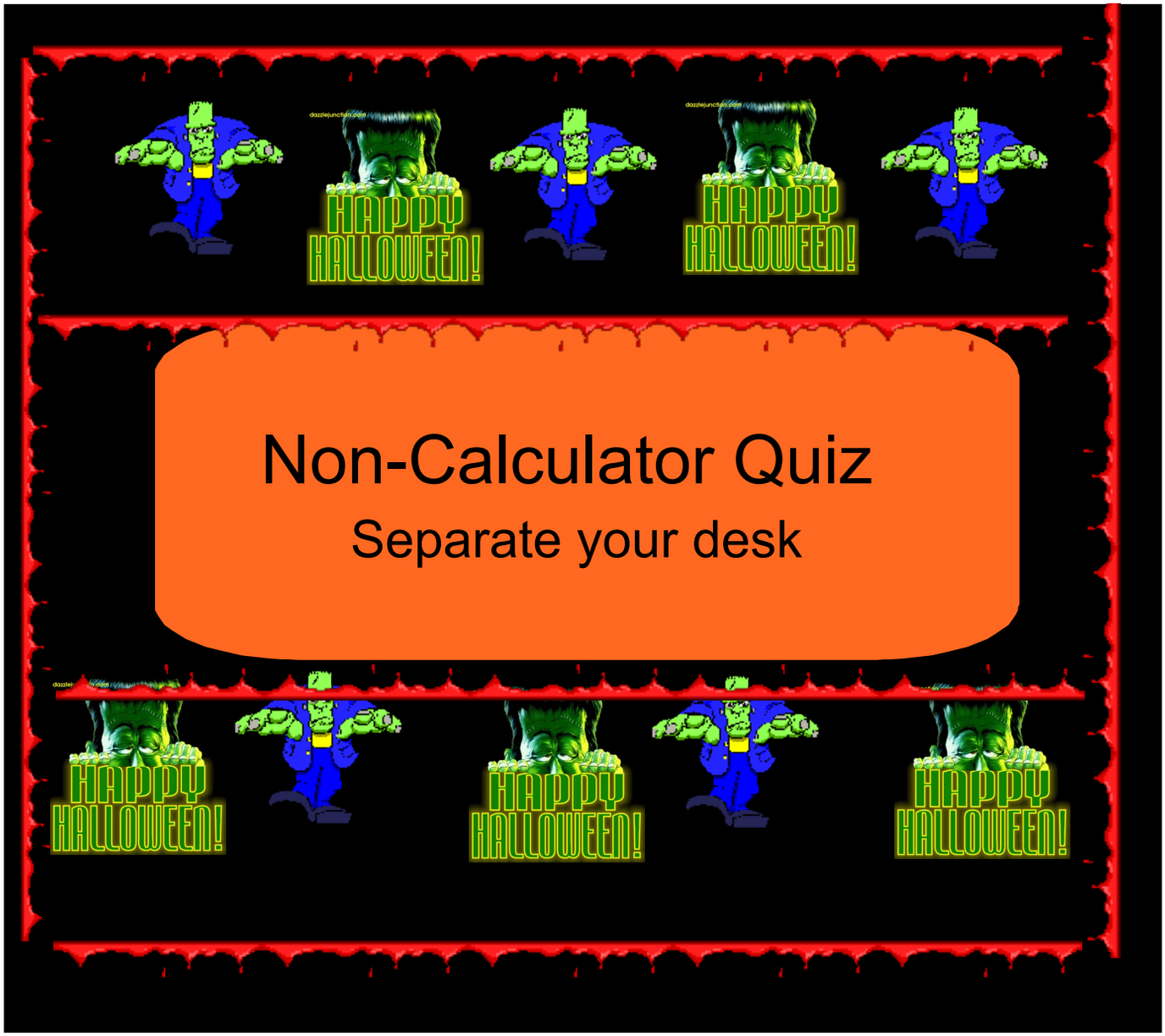
Curriculum Outcome

(N5) Determine the square root of positive rational numbers that are perfect squares.

(N6) Determine an approximate square root of positive rational numbers that are non-perfect squares.

(SS2) Determine the surface area of composite 3-D objects to solve problems

(N4) **Explain and apply the order of operations, including exponents, with and without technology.**


HAPPY HALLOWEEN!
HAPPY HALLOWEEN!
HAPPY HALLOWEEN!
HAPPY HALLOWEEN!
HAPPY HALLOWEEN!
Non-Calculator Quiz
Separate your desk

If you did not do last night's homework, do it now!
18 and 19.

4) a,c,e without
5) a,c,e without

ENJOY!

7) a, c, e without
9)a, c
10) a, c,e
11) a,b
12)a c
13) ac
15 (Estimate first then answer the question *Show work*)
19 a c

Name : _____ Score : _____

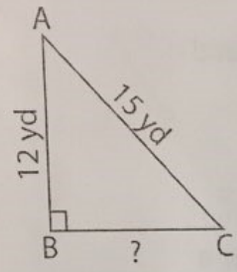
est

Pythagorean Theorem

Sheet 1

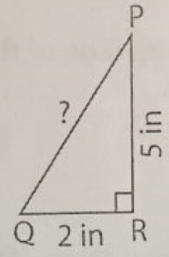
Determine the missing length in each right triangle using the Pythagorean theorem. Round the answer to the nearest tenth.

1)



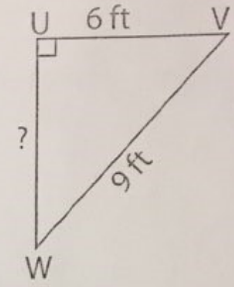
BC = _____

2)



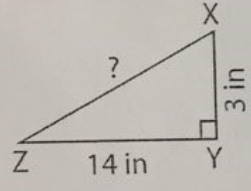
PQ = _____

3)



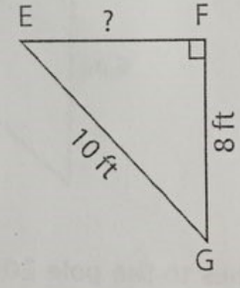
UW = _____

4)



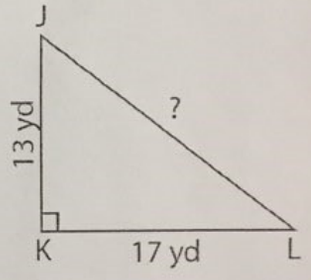
XZ = _____

5)



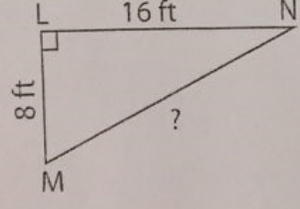
EF = _____

6)



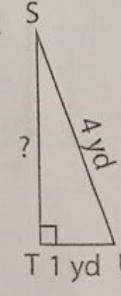
JL = _____

7)



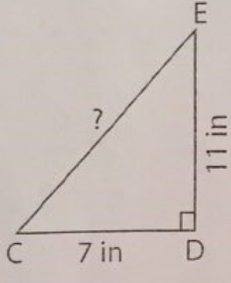
MN = _____

8)



ST = _____

9)



CE = _____

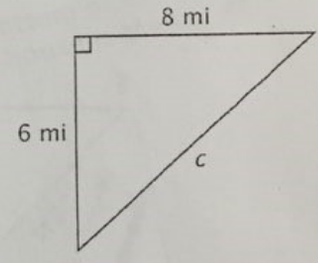
Lesson 2: Pythagorean Theorem Teacher Blackline #1

1) If one leg of a right triangle is 12 and the other leg is 16, what is the length of the hypotenuse in this right triangle?

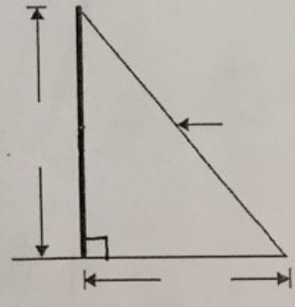
2) Find the missing measure if a and b are the legs of the right triangle and c is the hypotenuse, with $a = 11$ and $c = 61$.

3) The measures of three sides of a triangle are given. Determine whether a triangle with sides 9, 40 and 41 is a right triangle. Explain your answer.

4) Find the missing side of the triangle.



5) A telephone pole support cable attaches to the pole 20 feet high. If the cable is 25 feet long, how far from the bottom of the pole does the cable attach to the ground?



Lesson 2: Pythagorean Theorem Student Worksheet #2

1) Find the length of the hypotenuse of a right triangle, if one leg is 15 and the other leg is 8.

2) The legs of a right triangle have lengths a and b. The hypotenuse has length c. Find the unknown length for each triangle.
(a) $b = 18,\ c = 82$ (b) $a = 12,\ c = 37$

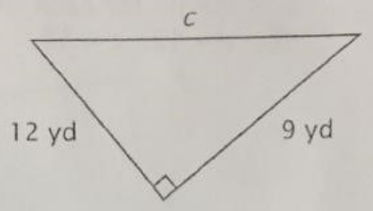
3) The measures of three sides of a triangle are 9, 16, and 20. Determine whether the triangle is a right triangle. Explain your answer.

4) The size of a television screen is given by the length of the diagonal of the screen. What size is a television screen that is 21.6 inches wide and 16.2 inches high?

5) If the diagonal of a rectangle measures 60 inches and one side measures 48 inches, what is the length of the other side of the rectangle?

6) A disabled ship radios to shore for help. The Coast Guard determines that the ship is 16 miles east and 43 miles north of the station. What is the direct distance between the ship and the Coast Guard station? Round answer to the nearest whole number.

7) Find the missing side of the triangle.



8) Tara leaned a 17 foot ladder against the house. The bottom of the ladder is 8 feet from the house. How high up the side of the house is the top of the ladder?