

Adv Math 6 - Unit 2: Ratios, Rates, Proportions

Mini Mystery Clue Sheet - Proportions

Name: _____

Class Period: 1 2 3 4 Date: _____

You are in the main tent at the carnival. All of the sudden, you hear the following announcement:

“Ladies and gentlemen, something terrible has happened. One of our Carnival workers has been murdered and a witness was the murderer run into this tent just a few moments ago. We were able to gather some information about the murderer, but we’ll need to set up some proportions to figure out who he or she is. In the meantime, no one is leaving this room.”

Someone in this room has murdered a carnival worker. Answer the questions on this clue sheet to figure out which one of you is the killer.

- 1) The first letter of the suspect’s name is the same as the letter that goes with **greatest** solution to the proportions below.

$$\frac{5}{6} = \frac{G}{24} \quad \frac{I}{7} = \frac{J}{91}$$

- 2) The suspect took a selfie with a clown on stilts. The ratio of the suspect’s height to the clown’s height is 4:7. If the clown is 112 inches tall, how tall is the suspect?

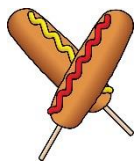
Suspect’s Height in Inches: _____

- 3) When the suspect arrived at the Carnival, he/she stopped at one end of the game booths to play the weight-guessing game. The scale at the carnival is rigged so that fewer customers win. One true pounds is equal to 0.8 scale pounds. If the suspect weighed 104 pounds on the scale, how much was their true (actual) weight?

Suspect’s Name Starts With: _____

Suspect’s Weight: _____

4) The suspect's favorite hobby can be found by solving the problems below. Use the code cracker below to convert your answers to letters, then unscramble to reveal the final clue. Use the information below to answer questions A-G.



\$4.20 for 3
Corn Dogs



\$2.32 per
drink



2 tickets for
\$13



2 Bags for
\$3.50

A) What is the cost per corn dog? (Unit Rate)

B) How many bags of popcorn can be bought with \$5.25?

C) If the suspect spent \$32.50 on tickets, how many tickets were purchased?

D) If you have \$25, is that enough for 4 tickets?

E) How much would 7 bags of popcorn cost?

F) If the suspect spent \$7 on corn dogs, how many were purchased?

G) If the suspect spent \$10.50 on popcorn, how many bags were purchased.

Suspect Favorite Hobby:

Code Cracker					
A	=	2		N	= 5
B	=	\$2.30		O	= 0
C	=	122.4		P	= \$14.00
D	=	8		Q	= 8
E	=	12		R	= Yes
F	=	10		S	= 16
G	=	No		T	= \$1.40
H	=	6		U	= \$12.25
I	=	3		V	= 18
J	=	12		W	= 130
K	=	\$5.20		X	= \$1.20
L	=	9		Y	= \$10.80
M	=	\$3.14		Z	= I

Suspect's Identity: