## Mr. Powder

## Ditto 16 - Review of Statistics

Math 7R
Name: $\qquad$
4. Neela has 11.5 yards of fabric. She will use $20 \%$ of the fabric to make a flag. How many yards of fabric will she use?
5. A patio blueprint has a key that shows 1 inch is equal to 12 feet. If the owner wants the length to be 30 feet, how many inches will the length be on the blueprint?
6. The number of ringtones that twelve middle school students have on their cell phones is $14,8,7,6,5,5,10,11$, $8,8,6$, and 7 . Which of the following statements is NOT supported by these data?
F. Half of the ringtones are below 7.5 and half are above 7.5.
G. The range of the data is 9 ringtones.
H. An outlier of the data is 11 ringtones.
I. About one fourth of the ringtones that the students have are at or above 9 .
7. Which box plot represents the data set $8,12,21,15,20,9,16,14$, and 25 ?
A.

B.

C.

D.

8. Katherine polled 21 classmates to find out the average number of hours each spends watching television each week. Which of the following displays would be most appropriate to show the individual student responses?
F.

G.

H. Number of Hours Spent Watching Television Each Week

I. Number of Hours Spent Watching Television Each Week

9. The numbers of monthly minutes Gary used on his cell phone for the last eight months are shown below.

| Monthly Cell Minutes |  |  |  |
| :---: | :---: | :---: | :---: |
| 400 | 550 | 450 | 620 |
| 550 | 600 | 475 | 425 |

Find the mean, median, and mode of this data.
10. Mr. Thompson made 20 liters of punch for a party. The punch contained 5 liters of orange juice. Write and solve a proportion to find the percent of orange juice in the punch.
11. The table shows how values of a painting increased over ten years.

| Year | Value | Year | Value |
| ---: | ---: | ---: | ---: |
| 2005 | $\$ 350$ | 2010 | $\$ 1,851$ |
| 2006 | $\$ 650$ | 2011 | $\$ 2,151$ |
| 2007 | $\$ 950$ | 2012 | $\$ 2,451$ |
| 2008 | $\$ 1,200$ | 2013 | $\$ 2,752$ |
| 2009 | $\$ 1,551$ | 2014 | $\$ 3,052$ |

Part A Select and create a display ( n a separate sheet of paper) that shows the relationship between years and the value of the painting. Justify your reasoning.

Part B Write a conclusion based on your graph.

Part C Use the graph to predict what the value of the painting will be in 2018.

