

Math Virtual Learning

6th Grade Math

Measures of Center and Variability

May 18, 2020



6th Grade Math Lesson: May 18, 2020

Objective/Learning Target:

Students will represent and summarize data sets in relation to context using appropriate measures of center and variability.

Warm Up Activity

Find the mean and median of the following data sets.

1. 5, 17, 6, 13, 6, 7, 8, 10, 9

Mean:____ Median:____

2. 85, 50, 75, 65, 70

Mean:____ Median:____

Warm Up Answers

Find the mean and median of the following data sets.

1. 5, 17, 6, 13, 6, 7, 8, 10, 9

Mean:____9___ Median:____8___

2. 85, 50, 75, 65, 70

Mean:____69____ Median:____75____

Lesson Videos

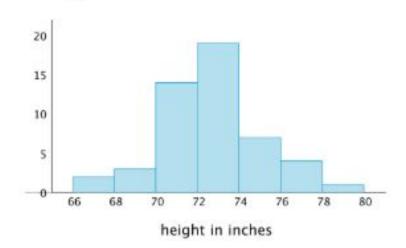
Mean and Median Review

Mean Absolute Deviation (MAD) Review

Practice # 1

For each dot plot or histogram:

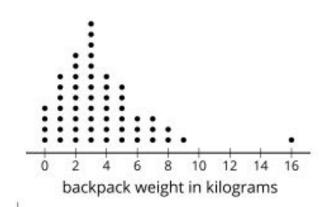
- a. Predict if the mean is greater than, less than, or approximately equal to the median. Explain your reasoning.
- b. Which measure of center—the mean or the median—better describes a typical value for the following distributions?
- Heights of 50 NBA basketball players

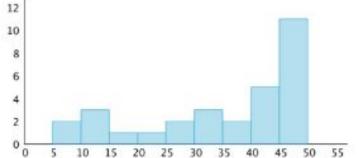


Practice # 1

Backpack weights of 55 sixthgrade students

3. Ages of 30 people at a family dinner party





age in years

Practice #1 Answers- (The following are sample responses) Check yours to see the

 a. The mean would be approximately equal to the median, because the data are roughly symmetric.

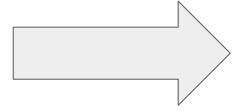
similarities.

- b. Since I think the values would be pretty close, either the mean or the median would describe a typical height pretty well.
- a. The mean would be higher than the median. The value of 16 kilograms would bring the mean up and move it away from the center of the data.
 - b. The median would better describe a typical backpack weight, since that value would lie in the center of the large cluster of data points.
- a. The mean would be lower than the median, because even though a large fraction of the people at the dinner party are 40 or older, the ages of the people that span from 5 to 40 would bring the average age down.
 - The median would better describe the center of the distribution of around 40–45 years old.

Practice #2

Mean vs. Median

- click Join
- type your first name
- click Continue without Signing In



Student Preview

Summary/Reflection

When would you use the mean for center of measure?

When would you use the median for the center of measure?

Why do you need to have an understanding when to use one and not the other?

Additional Practice:

Click on the link below to get additional practice and to check your understanding!

Practice:

Flexbooks: Measures of Variability

Khan Academy: Best measure of Center