

Lesson 2-5 • Apply Day

Reinforce Understanding

Comparing Variability

I can find the range and the interquartile range of a data set and use them to describe how spread out the data is.

Worked model

Class A: min 52, Q1 61, median 68, Q3 74, max 89. **Class B:** min 57, Q1 63, median 69, Q3 71, max 83.

1. Range: take each set's least value away from its greatest value.
2. Class A stretches from 52 to 89. Class B stretches from 57 to 83.
3. IQR: take quartile 1 away from quartile 3. A runs 61 to 74; B runs 63 to 71.
4. The set with the larger range and the larger IQR is the one that varies more.

Answer: Class A varies more: its whiskers reach further and its box is wider than Class B's.

Practice

Complete each exercise. Show the reasoning that supports your answer.

1. (Lesson 2.2) A histogram has interval counts 2, 4, 3. How many data values are represented?

Complete each step, then write the final answer.

1. Add the bar frequencies: ____.
2. Total data values: ____.

Answer: _____

2. (Lesson 2.2) A histogram has interval counts 3, 5, 4. How many data values are represented?

Complete each step, then write the final answer.

1. Add the bar frequencies: ____.
2. Total data values: ____.

Answer: _____

3. (Lesson 2.2) A histogram has interval counts 4, 6, 3. How many data values are represented?

Complete each step, then write the final answer.

1. Add the bar frequencies: ____.
2. Total data values: ____.

Answer: _____