**Common Core Math I Name\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**Unit 1: One-Variable Data**

**Comparing Data Sets Practice**

Listed below are the quality rating values of natural peanut butters:

34, 40, 52, 57, 57, 60, 60, 63, 67, 69, 69, 69, 71, 89

The data values for regular peanut butter are as follows:

11, 23, 23, 26, 29, 31, 31, 33, 34, 34, 35, 40, 40, 43, 45, 46, 49, 54, 54, 60, 76, 83, 83

1. Construct side-by-side boxplots for the two types of peanut butters. Make a sketch below.

0 10 20 30 40 50 60 70 80 90 100

1. Record the five-number summary for each in the table below. Calculate the IQR for each set of data and record in the table.

|  |  |  |
| --- | --- | --- |
| Statistic | Natural Peanut Butter | Regular Peanut Butter |
| Min |  |  |
| Q1 |  |  |
| M |  |  |
| Q3 |  |  |
| Max |  |  |
| IQR |  |  |

1. Calculate the mean and standard deviation for each set of data and record below.

|  |  |  |
| --- | --- | --- |
| Statistic | Natural Peanut Butter | Regular Peanut Butter |
| $$\overbar{x}$$ |  |  |
| $$s$$ |  |  |

1. Which measure of center and spread would be most appropriate to use to describe these two sets of data? Explain.
2. Compare the two data sets in context. Be sure to address shape, center, spread, and outliers. Which type of peanut butter is better?