Name\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

*The Timing of Fruit Production in Wild Strawberry Plants*

Each year, in order to reproduce, many species of angiosperms form flowers that, when pollinated, may produce fruit. Environmental cues, such as the temperature, amount of precipitation and the length of daylight can affect the timing of the first blooms and formation of ripe fruit. Animals in the ecosystem rely on this fruit as a food source and, therefore, are affected by its availability. In this activity, you will use the data provided to explore the timing and length of the fruit production of wild strawberries in northern New England.

**Do wild strawberry plants produce fruit at the same time each year?**

*Signs of the Seasons* observers in Maine and New Hampshire have been recording the days when fruit are visible on wild strawberry plants. Create a graph that compares fruit presence by year. A box plot for each year is one possible way to compare them.

---------------------------------------------------------------------------------------------------------------------------------

**2011**: 155, 155, 155, 155, 160, 164, 166, 166, 166, 166, 178, 178, 178, 180, 182

**2012**: 120, 138, 143, 145, 155, 159, 161, 166, 169, 169, 179, 185, 187, 176, 201

**2013**: 133, 148, 151, 155, 155, 159, 164, 164, 172, 174, 187, 188, 202

**2014**: 155, 157, 162, 162, 162, 166, 170, 170, 173, 173, 173, 177, 177, 180, 180, 180, 195

*Data from the Nature’s Notebook Database; recorded days of fruit presence per site*

---------------------------------------------------------------------------------------------------------------------------------

 **Analysis**

 1. What does the graph suggest about the yearly availability of strawberries as a food source?

 2. What are some similarities between the years? What are some differences?

 3. In which year was fruit available for the longest period of time?