

The Cycle of the Seasons 1: Temperature

Step 1: Collecting Temperature Data

In an Excel document, create a spreadsheet of the average temperature in Hartford CT over the course of a year. You can find this data at the ClimateZone web site at <http://www.climate-zone.com/>. Locate the Hartford climate data and refer to the line that is labeled “Avg Temperature.”

| Month | Temperature (°F) |
|--------------|-------------------------|
| Jan. | ? |
| Feb. | ? |
| March | ? |
| April | ? |
| May | ? |
| June | ? |
| July | ? |
| Aug. | 71.6 |
| Sept. | ? |
| Oct. | ? |
| Nov. | ? |
| Dec. | ? |

Step 2: Graphing Temperature Data

Make a three-year scatter plot of this data. Make an appropriate graph title, label your axes, and shut off the legend. Resize the graph so it is legible. Copy the graph to a Word document and answer the following questions:

1. Describe the shape of your scatter plot.
2. Where else have you seen this shape?
3. Explain what might cause the average temperature to follow this pattern.
4. According to the data, the average temperature in August is 71.6°F. That sure doesn't sound like beach weather! How is the average monthly temperature calculated?
5. Examine the temperatures for the most recently completed month at <http://www.accuweather.com/en/us/hartford-ct/06105/march-weather/327356?view=table> . Calculate the average monthly temperature.
6. Compare this to your graph. How much warmer or cooler than normal was last month?