## 6-Month Climate Model Forecast Summary for Pennsylvania

October 15, 2017

Climate models continue to improve and may have some skill in forecasting patterns of temperature and precipitation anomalies several months in advance. However, climate modeling is still a very inexact science. Lacking highly precise observations from the earth's environment (air, land and sea) and a full understanding of the scientific processes that affect the motions in the atmosphere, it is impossible to make precise seasonal-scale weather predictions with any accuracy. Please keep this in mind as you review this forecast.

The following forecast is produced based on analysis of monthly forecast products from the Climate Forecast System Version 2 (CFS) and the North American Multi-Model Ensemble (NMME). Links to forecasts are provided at the end of this document.

### **Discussion:**

After looking over data for the next six months, it looks as though the Northeast and Pennsylvania area will remain at or above normal temperatures for the late winter and early spring. Thus, those cold bitter days could potentially be less frequent during that time. Although it is hard to predict exact information for February, March, and April it does look like it will be warmer than normal those months as well.

Based on the weather models for the next six months, it looks like precipitation levels will vary. The winter will move from below normal, to normal, and to above normal. While February had a mixed signal in the guidance products, March and April are showing some signs of warmth in our prediction analysis.

# Forecast: Changes highlighted in yellow Previous forecast in parentheses

Month	Temperature	Precipitation
November	A(N)	B(B)
December	A(A)	N(N)
January	A(N)	A(A)
February	A(N)	<mark>U</mark> (N)
March	A(U)	<mark>A</mark> (U)
April	U	A

BB = Much Below Normal

B = Below Normal

N = Near Normal

A = Above Normal

AA = Much Above Normal

U = Uncertain

The next forecast will be issued on November 1, 2017.

### **REFERENCES:**

### **CFSv2 Forecasts:**

http://www.cpc.ncep.noaa.gov/products/CFSv2/htmls/glbT2me1Mon.html

**CFS Monthly Forecasts:** 

http://climate.met.psu.edu/CFS/monthly\_by\_day.php

NMME Forecasts

http://www.cpc.ncep.noaa.gov/products/NMME/monanom.shtml