The basis of this analog prediction scheme uses the notable temperature and precipitation anomaly from the last 30 days (or so) and in a ‘fuzzy’ way – that is setting all anomalies to +/- 0.5 standard deviations from the long-term mean – and matches these patterns to the climate division anomalies from 1895- present. The best matched years are selected (using a dozen or less) and these are used to produce the composite anomalies for the next two months and the years are used to create a composite daily anomaly for three regions of Pennsylvania.

Here are the anomalies for May, 2008:

The outstanding features of the May temperatures has been the persistent cool weather from the Dakotas to the Middle Atlantic seaboard and the warmth in Florida, south Texas and interior California.
The outstanding character of May’s rainfall has been the lack of rain in New England, Florida, much of Texas and most of the Northwest. The excessive rainfall in Montana, Wyoming and Nebraska along with a stripe of heavy rain from the Ohio Valley to the Middle Atlantic coast.

These pairs of anomaly patterns were the input into the climate division data ‘analog mapper’ to select the closest match to previous May conditions.


Below are the composite departures for those years for June and July.
Eastern Pennsylvania Temperature Forecast
June - July 2008