

Watershed MANAGEMENT



Drought Information Center

May 17, 1999

During the past week, the southern half of the Commonwealth received up to 0.6 inch of rain. The heaviest concentrations occurred in the counties surrounding Allegheny County and in the southern tier from Franklin to Delaware Counties, where totals were in the 0.4-0.6 inch range. Totals declined quickly north of the southern tier, with generally no appreciable precipitation occurring north and east of Clearfield County. All counties are currently recording precipitation deficits for the month of May. Deficits in the Ohio River basin are in the 1.0-1.5 inch range. In the Susquehanna River basin, deficits range from about 0.5 inch in the southern basin to 1.0-1.2 inches in the northern basin. The Delaware River basin is generally about 1.5-1.9 inches behind normal at mid-month.

Stream flows are reflective of the 30-day precipitation deficits and generally below-normal ground water levels that abound in the state.

In the Delaware River basin, the main stem Delaware River is flowing at about 30 percent of the long-term median. At Trenton the flow is 4520 cubic feet per second (cfs), compared to a normal of 11,200 cfs, and is down from 3130 cfs last Monday. The Lackawaxen River at Hawley is down from 405 last Monday to 152 cfs, compared to a normal of 398 today. The Lehigh River at Bethlehem is down from 1410 to 1100 cfs, with a normal of 2100. The Walnutport gage on the Lehigh River recorded a record low for the day early in the week. The Schuylkill River decreased from 1410 to 1090 cfs at Philadelphia, compared to a normal of 2220 cfs. In the Christina River watershed, gages are generally less than half of normal, with Brandywine Creek at Chadds Ford reading 204 cfs this morning, compared to a 380-cfs normal.

In the Susquehanna River basin, flows are generally below half of normal. The Susquehanna River at Harrisburg is down noticeably from 30,400 cfs last Monday to 15,900 cfs this morning, compared to a normal flow of 30,400 cfs. The Lackawanna River at Old Forge is down from 495 to 224 cfs, compared to a 586 cfs normal. The West Branch Susquehanna River at Lewisburg declined from 6760 to 4050, compared to 10,600-cfs normal flows. The Juniata River at Newport declined from 6250 to 2770, with a normal of 4320. In the lower basin, the Conestoga River at Conestoga is down from 362 to 263, compared to a 426-cfs normal for today.

Ohio River basin stream flows are near half of normal, as well. The Allegheny River at Natrona is flowing at 10,700 cfs this morning, compared to a normal of 20,900 cfs. The Kiskiminetas River at Vandergrift declined from 1470 to 1390 cfs, compared to a normal of 3360 cfs. The Monongahela River is at about 20 percent of normal, flowing at 2650 cfs compared to 12,600 cfs. The Beaver River at Beaver Falls declined from 1780 to 1220, measured against 3130 cfs for normal. The Ohio River at

Sewickley declined from 18,600 to 13,900 cfs, less than half of the normal of 35,300 cfs.

Ground water levels continued a decline, with levels in all daily monitoring wells falling during the week.

Light precipitation is forecast over the next five days, predominately in the middle of the period, with up to 0.5 inch predicted for the Delaware River basin area, and generally less than 0.2 inch in the remainder of the state. The 5-10 day outlook adds another 0.5-1.0 inch statewide, with temperatures to be above normal in the 60-65 degree range.

The Commonwealth continues its drought "watch" statewide. We have now reached the time of year, with foliage nearing its completion, when ground water levels begin their natural decline. The decline continues generally until the fall defoliation period, absent major storm events. Ground water levels are currently below normal at many of the monitoring sites. In combination with deficit rainfall, the decreased ground water levels are already producing low stream flows. With the amount of precipitation predicted for the next ten days, May will likely be another deficit month, as was April. As conditions continue to build toward potential drought problems again, caution and conservation of water resources remain important.