THE IMPACT of SUMP PUMP FLOWS

The impact of sump pump flows on a wastewater treatment plant can be significant. These additional flows can lead to operational problems at the treatment plant as well as sanitary sewer overflows (SSO's). The following illustrates the impact of sump pump flows:

The Facts:

- The average homeowner sump pump is between 1/3 and 1/2 horsepower.
- The average discharge rate is between 2500 to 3200 gallons per hour (gph) or 42 to 53 gallons per minute (gpm).

The Example:

- Using the low end pumping rate of 42 gpm
- Using an average pump time of 5 minutes per hour
- Using 50 sump pump connections

During a wet weather event (substantial rain, snow melt) the following can be assumed:

42 gpm x 5 mins/hr = 210 gallons per hour/connection

210 gph x 24 hrs/day = 5040 gallons per day/connection

5040 gpd/connection x 50 connections = **252000 gallons per day extra flow!**

That's 252000 gallons a day in addition to the usual daily flow.

What Can You Do?:

1. Disconnect sump pumps from the sanitary sewer. Connect them to a storm sewer, drainage ditch, or dry well.
2. Urge your neighbors to do the same. It will save you money in the long run.
3. If you have any questions regarding a sump pump connection, call your wastewater treatment plant operator. They will be happy to assist you.

This fact sheet was prepared by Steve Grimm, Wastewater Technician for the New York Rural Water Association, using information gathered from local hardware stores regarding basic homeowner sump pumps. For more information, or to schedule a technical assistance visit, please call (518) 828-3155.