



# A PERSONAL ACCOUNT OF A FLASH FLOODING EVENT

Steven Winkley | Hydrogeologist & Source Water Protection Specialist

As I begin this article, I am sitting in near darkness with no power, internet, or cell service. This is the result of a series of a wave of five to six strong thunderstorms that hit Rensselaer County in eastern New York over the course of about 2-3 hours. These storms uprooted trees and knocked down branches but more importantly dumped 4 to 5 inches of rain on top of already saturated ground. The result was flash flooding that in some areas rivaled that of Hurricane Irene. Unfortunately, my home was in the “bullseye” of heavy rain that the National Weather Service mapped on Figure 1.

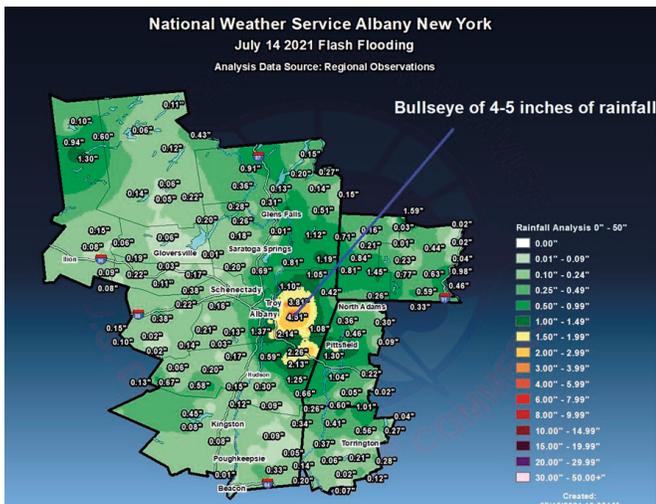


Figure 1. Flash Flooding Rainfall - July 14, 2021 (from the National Weather Service)

The result of this sudden deluge was that the bridge over Horse Heaven Brook

(normally a placid small stream) located at the end of our road was swept away in the high water. All you can see now is twisted culvert pipe and a huge hole where the bridge once stood (see Figure 2).



Figure 2. Former Horse Heaven Brook Bridge at Oak Hill Road



Figure 3. Remains of Bridge on Taborton Road.

After this bridge gave way, a huge wall of water swept down the valley, collapsing the next bridge (Figure 3). The resulting flood swept across roads and parking lots, damaging homes, businesses, and cars (Figure 4).



Figure 4. Flooding at Homeroom Lofts Apartments (formerly Sand Lake School)

The devastation is widespread across our Town of Sand Lake. Roads have washed out, homes have been flooded, and authorities fear that wells will be contaminated by the flood water. Bottled water is being distributed. All of this damage will be costly and take time to repair (I'll have to be patient – something I am not good at). County and Town officials hosted Congressional Representative Antonio Delgado and USDA Secretary Tom Vilsack and they toured the damage near my home.

I have written about and given many presentations on flooding and flood preparations. This sudden destructive episode has given me a first-hand perspective on the power of Mother Nature and the damaging force of water (8.34 pounds per gallon). Weather like we experienced is becoming more widespread. Weather extremes are greater. I would urge everyone on a personal and professional level to examine your vulnerabilities to flooding. You never know when Mother Nature will strike! 💧💧💧