2.4 Flooding Impacts on Drinking Water Systems (SBU portion)

4000 supply wells

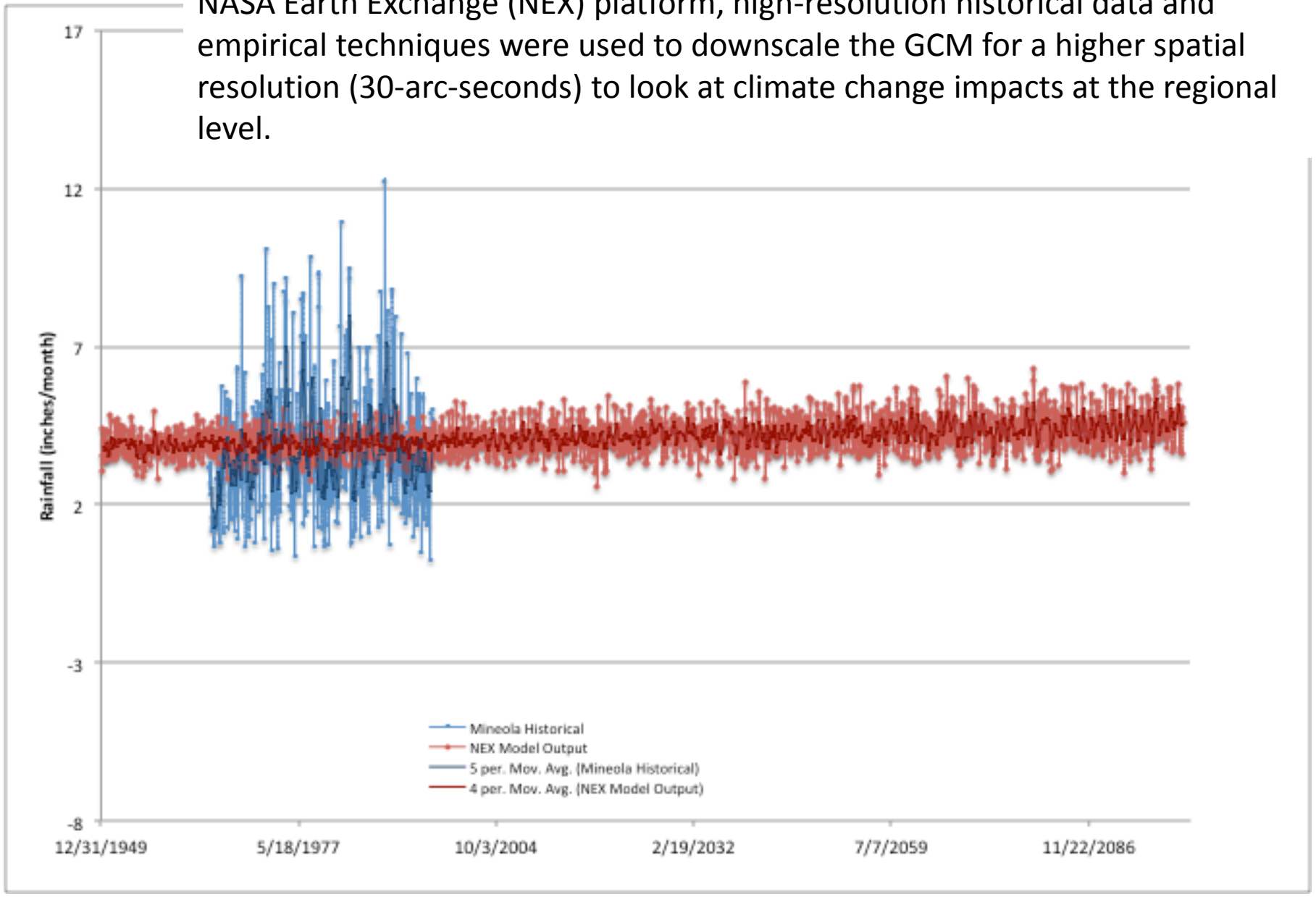
- Top off all fuel storage 1 week prior to storm
- Switched plants to standby power before storm hit to assure smooth operation
- All plants use natural gas emergency generators. No worries about fuel supply
- Switched plants to standby power before storm hit to assure smooth operation
- Backup power took 30 minutes to come online
- Intermittent cell phone communication problems
- Generator issues at administration building
- Some valves were inaccessible due to impassable roads or being buried by debris
- Recommend knowing how to interpret tank/reservoir levels from a pressure gauge, since no power equals no transmitter equals operating in the blind on tank levels! Know what a "safe range" of pressure is at that gauge so you can operate there until power is restored

…continued

- Shallow aquifers in flooded areas were contaminated by salt , sewage, oil
- Flooded deep wells carried salt into the lower aquifers.
- High water demand for post-Sandy clean-up
- Salt , sewage and oil contamination persisted in the vadose zone
- .
- Some wells, mostly private wells were flooded and required long purging times
- Misinformation led to unwarrented concern about water safety and hoarding of bottled water
- Posted notice on website to refute certain news media statements that the drinking water was unsafe

Preparing for Extreme Weather Events: Workshop Planner for the Water Sector

NASA Earth Exchange (NEX) platform, high-resolution historical data and empirical techniques were used to downscale the GCM for a higher spatial resolution (30-arc-seconds) to look at climate change impacts at the regional level.



USGS: Depth to groundwater