KEOWEE-TOXAWAY DROUGHT MANAGEMENT ADVISORY GROUP

CONFERENCE CALL SUMMARY

Thursday, February 12, 2015

Organizations Present

Anderson Regional Joint Water System, SC
City of Seneca, SC
Duke Energy
Greenville Water, SC
HDR
Kearns & West
Powdersville Water District, SC
SC Dept. of Natural Resources
SC Dept. of Health and Environmental Control
U.S. Army Corps of Engineers
Georgia EPD
Town of Walhalla, SC

Attendance Roll and Agenda Review

1. Ed Bruce of Duke Energy took attendance and reviewed the agenda.

Low Inflow Protocol (LIP) Status

2. Bruce gave an update on the overall status of the Low Inflow Protocol (LIP) triggers. The Keowee-Toxaway (KT) Project remains in Stage 0. Reservoir storage in the KT Project is improving and storage in the downstream U.S. Army Corps of Engineers (USACE) federal projects (Hartwell Lake and J. Strom Thurmond Lake) remains similar to last month. Bruce noted the USACE storage calculation is based on rule curve lake levels beginning their gradual transition up to higher summer rule curve elevations, while Duke Energy’s full pond elevations remain constant throughout the year for the purposes of calculating remaining usable storage. The federal projects remain in Drought Plan Level 1 because two additional feet above the initial trigger level are needed for a normal condition declaration. The LIP Streamflow trigger has improved to a Stage 0 level, while the US Drought Monitor trigger indicates Normal conditions. The Groundwater level at the Oconee County USGS gage is at normal levels and remains similar to the previous January 2015 reading.

3. Bruce provided a detailed review of the individual LIP trigger conditions. Federal project reservoir level projections appear to be just under the guide curve through the early spring, which is also indicated in the USACE newsletter which indicates levels below the guide curve at least through Memorial Day. Streamflow appears to be following traditional seasonal patterns, but is below the long-term average for the last several years, except 2013. Streamflow appears to be about 80% of the long-term average over this time period. The US Drought Monitor indicates Alabama is in a low level drought, which appears to have drifted into northern Georgia from January to February. South Carolina appears to be avoiding these drought conditions, although there is an isolated area of low level drought near Augusta, Georgia. The Oconee groundwater gauge indicates groundwater levels to be right at the long-term average for this time of year.
4. Oconee Nuclear Station’s (ONS) consumptive use in February is approximately 26.2 MGD and expected to be approximately 25.4 MGD next month. Cumulative surface evaporation for all of Duke Energy’s reservoirs in January is estimated to be 43.4 MGD. The surface evaporation rates are expected to increase in March, as is typical during the early spring months.

5. Bruce reviewed Keowee’s releases to Hartwell during the previous month. Although there have been no required releases, beyond leakage, there have been discretionary releases related to ONS required testing at Keowee Hydro Station and power generation at the Keowee Hydro Station to meet peak energy demands during colder months.

6. KC Price, Greenville Water, gave an update on water levels and withdrawals from the Table Rock and North Saluda reservoirs and Stovall and Atkins treatment plants. Table Rock and North Saluda are at full pond. Rainfall continues to be lower than the 10-year running average at Table Rock, North Saluda and Adkins locations. The Adkins basin has been drier than Table Rock and North Saluda. The Adkins treatment facility is running at capacity with the difference in system demand being supplemented from the Stovall treatment plant.

7. Bob Faires of the City of Seneca reported that, as of the end of January, water withdrawals are just under 6 MGD and rainfall at their intake was measured at 4.4 inches for the month.

**Update on Meteorology and Keowee-Toxaway Project Operations**

8. George Galleher of Duke Energy summarized recent precipitation patterns and predictions. Keowee’s rainfall was about 1 to 1.5 inches below the long-term average for the month of January. Precipitation for Bad Creek and Jocassee is near the long-term average. The last 30 to 60 days have been dry in the region. The NOAA forecast predicts a slightly greater than average probability of precipitation over the next month. Above-average precipitation is predicted in the 8-14 day outlook, with the 7 day projection indicated 2 inches of potentially freezing precipitation. February temperatures are expected to remain cold, based on the Duke Energy forecast. There is little indication of drought in the U.S. drought monitor for the Savannah River Basin, with the exception of a small area at the top of the basin and a small area near Augusta, GA. The drought outlook through April indicates little chance of any developing drought condition in South Carolina through April. Streamflow continues to be below the long-term average. Stream base flow is at or near the 25th percentile for each of the monitoring gauges. The soil moisture outlooks indicated dry conditions over the next few weeks. Galleher showed lake levels graphs indicating Jocassee levels continue to recover from lower levels experienced last fall, due to lower downstream release while in the LIP. Galleher indicated some storage will likely be used over the next few weeks to meet system energy demands due the forecasted cold weather. Based on existing LIP conditions, water conservation is still requested by Duke Energy.