STATE OF UTAH GENERAL OUTLOOK
Apr 1, 2003

SUMMARY

April 1 is the typical peak for snowpacks in Utah. This April marks the fifth consecutive year of below normal peak snowpacks across the state. In those five years, some areas at various times had extremely low snowpacks and at times they were a little closer to average, but all fell short of the 30 year normal. One of the characteristics of drought is persistence and this one, like a bad cold, just keeps hanging around. Historically, (for the period of snow record) general droughts that affect the entire state or even specific watersheds for this long are rare. March was another average month, very similar to February. Snowpacks at this peak time are about 60% to 75% of average in northern Utah and the Uintah Basin. In southern Utah, snowpacks range from 54% on the Virgin to 77% on the Sevier and southeastern Utah. This is a much improved situation from January, but still a rather bleak picture for snowmelt runoff this spring and summer. In the north, snowpacks are less (10% to 30%) than they were last year. In the south, they are substantially more (150% to 225%) than last year. However, all Utah snowpacks remain below to much below average. Low elevation snowpacks are still much below average and will most likely melt early. Soil moisture condition remains in relatively good shape over most of the state that is currently monitored. This should improve snowmelt runoff efficiency over what we have seen the past few years, where much of the snowpack has been lost to soil moisture replacement. Precipitation for March was near normal in northern Utah (86%-103%), in the southeast it was above average but on the Virgin, it below average. This brings the statewide seasonal precipitation, (Oct-Mar) to 77%. Reservoir storage in 41 major reservoirs across the state is at 53% of capacity, down 550,000 acre feet from last year, out of a total capacity of 5, 470,000, or about 10 %. Reservoir storage is down 1,200,000 acre feet (22%) from 2001 levels, reflecting the persistent nature of this drought. Some larger reservoirs, such as Bear Lake and Utah Lake would take several years of at least average runoff to fill to capacity. Water supply conditions are below to much below normal.

SNOWPACK

March first snowpacks as measured by the NRCS SNOTEL system range from 54% to 77% of average in southern Utah. Southeast Utah and the Sevier have the highest snowpacks at 77% of average and southwest Utah has the lowest at 54% of average. In northern Utah, snowpacks range from a low of 60% on the Weber to 73% on the Uintah Basin. Low elevation snowpacks are very low this year and, in some cases, stations are already reading zero. This could have a negative impact on streamflow. Statewide, snowpacks are at 68% of average, very similar to last year.

PRECIPITATION

Mountain precipitation during March was below to near normal (86%-103%) in the north and below to above normal (81%-124%) in southern Utah. This brings the seasonal accumulation (Oct-Jan) to 77% of average statewide.

RESERVOIRS

Storage in 41 of Utah's key irrigation reservoirs is at 53% of capacity. This is down substantially from last year indicating heavy use of reservoir storage to make up the streamflow deficit. Most reservoir operators are utilizing a conservative strategy, storing as much water as possible.

STREAMFLOW

Snowmelt streamflows are expected to be below to much below average across the entire state of Utah this year. Low snowpacks tend to melt earlier and produce proportionately less runoff. Streams may peak early, have significantly less volume and have short recessions back to base flow. Overall water supply conditions are below normal.