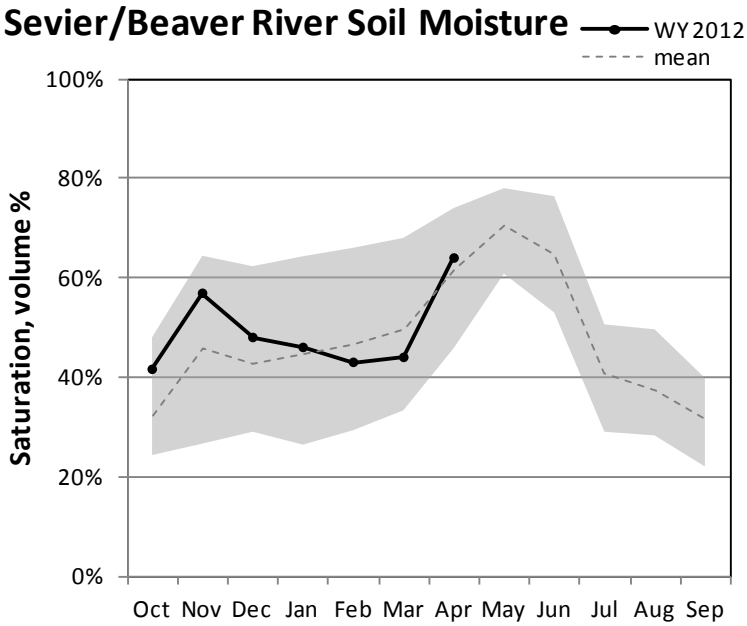
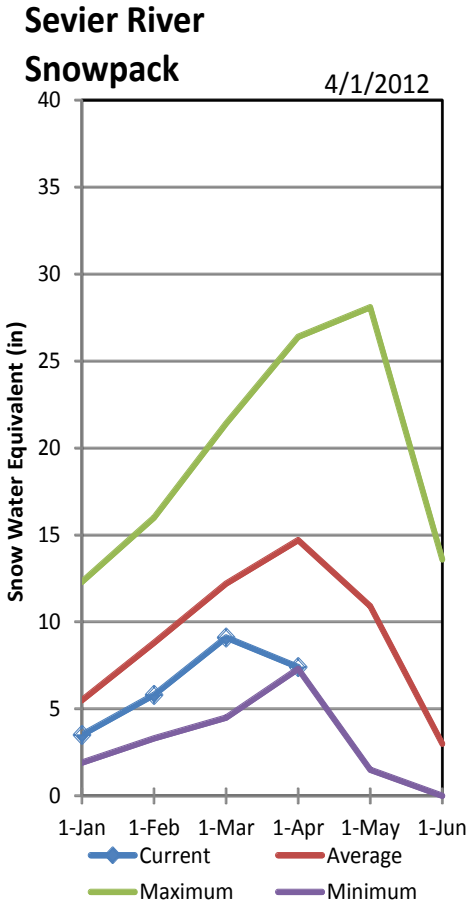
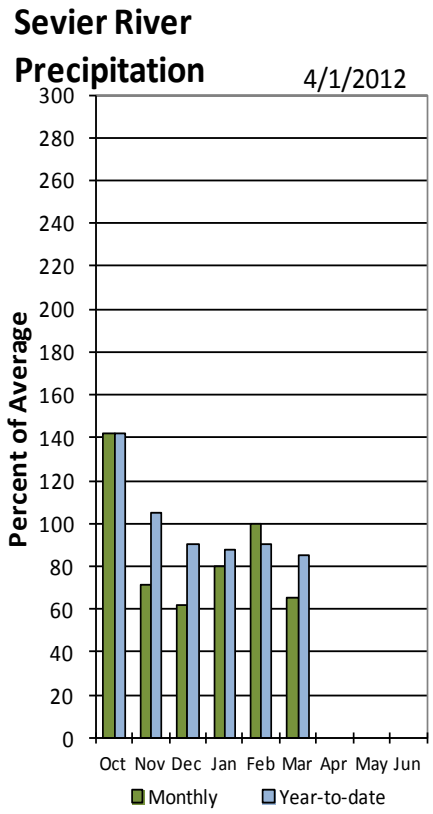
Sevier and Beaver River Basins
April 1, 2012

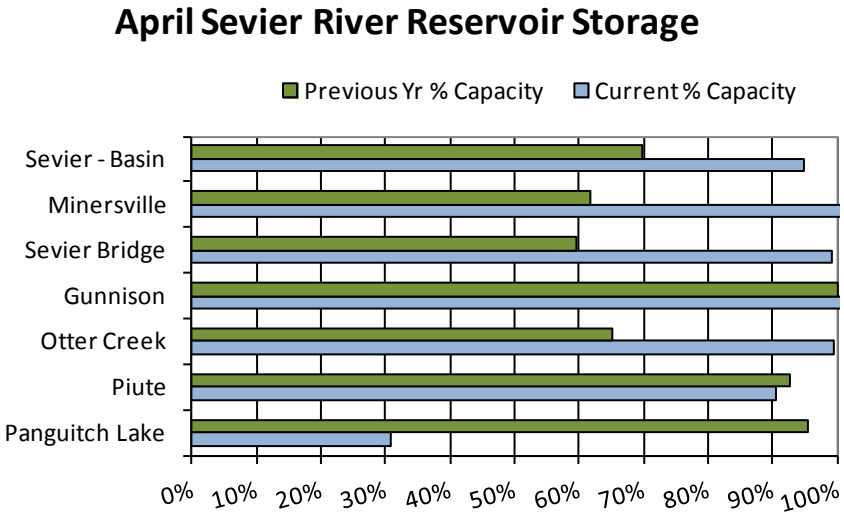
Snowpack on the Sevier River Basin is much below normal at 50% of average and only 37% of last year – near record lows. Individual sites range from 0% at Agua Canyon, Bryce Canyon, Long Valley and Panguitch to 95% at Farnsworth Lake. Precipitation during March was much below average at 65% of normal, bringing the seasonal accumulation (Oct-Mar) to 85% of average. Soil moisture estimates in runoff producing areas are at 64% of saturation in the upper 2 feet of soil compared to 68% last year. Streamflow forecasts range from 42% to 66% of average. Reservoir storage is at 95% of capacity, 25% more than last year. Surface Water Supply Indices are: Upper Sevier 27%, Lower Sevier 69% and Beaver 44%. Runoff conditions are much below average across all basins. Reservoir storage is in excellent condition.



Percent saturation is calculated using the weighted average of volumetric soil moisture content at 2, 8, and 20-inch depths. Saturation is estimated as 40% volumetric water content. The gray area represents the range in saturation values since 2005.





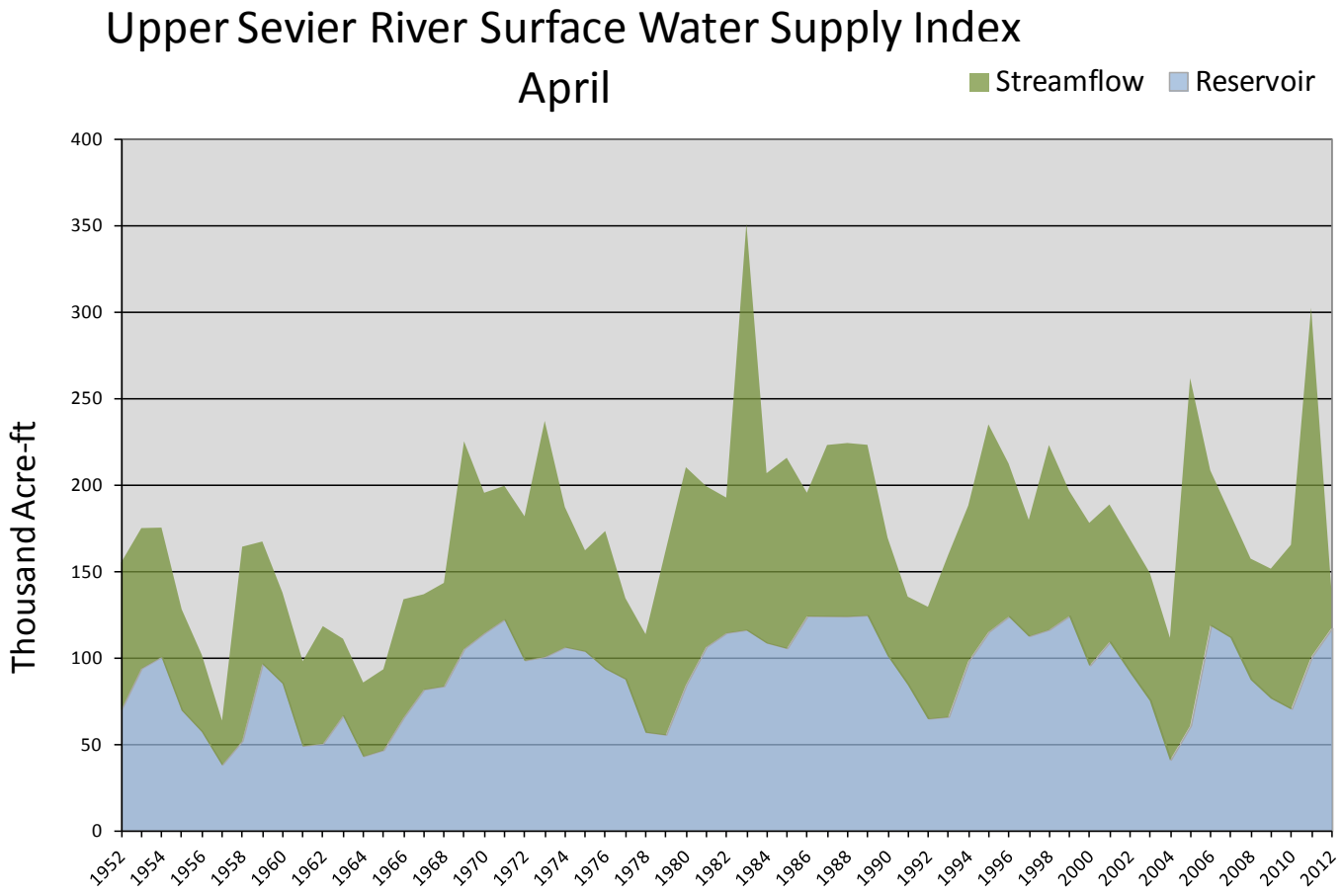


April 1, 2012

Upper Sevier Surface Water Supply Index

Basin or Region	March EOM* Piute & Otter Creek Reservoir	April-July Forecast Inflow to Piute Reservoir	Reservoir + Streamflow	SWSI#	Percentile	Years with similar SWSI
	*KAF^*	*KAF*	*KAF*		*%*	
Upper Sevier	**117.2**	**23**	**140**	**-1.88**	**27**	**67,60,68,03**

**EOM, end of month; # SWSI, Surface Water Supply Index; ^KAF, thousand acre-feet.*

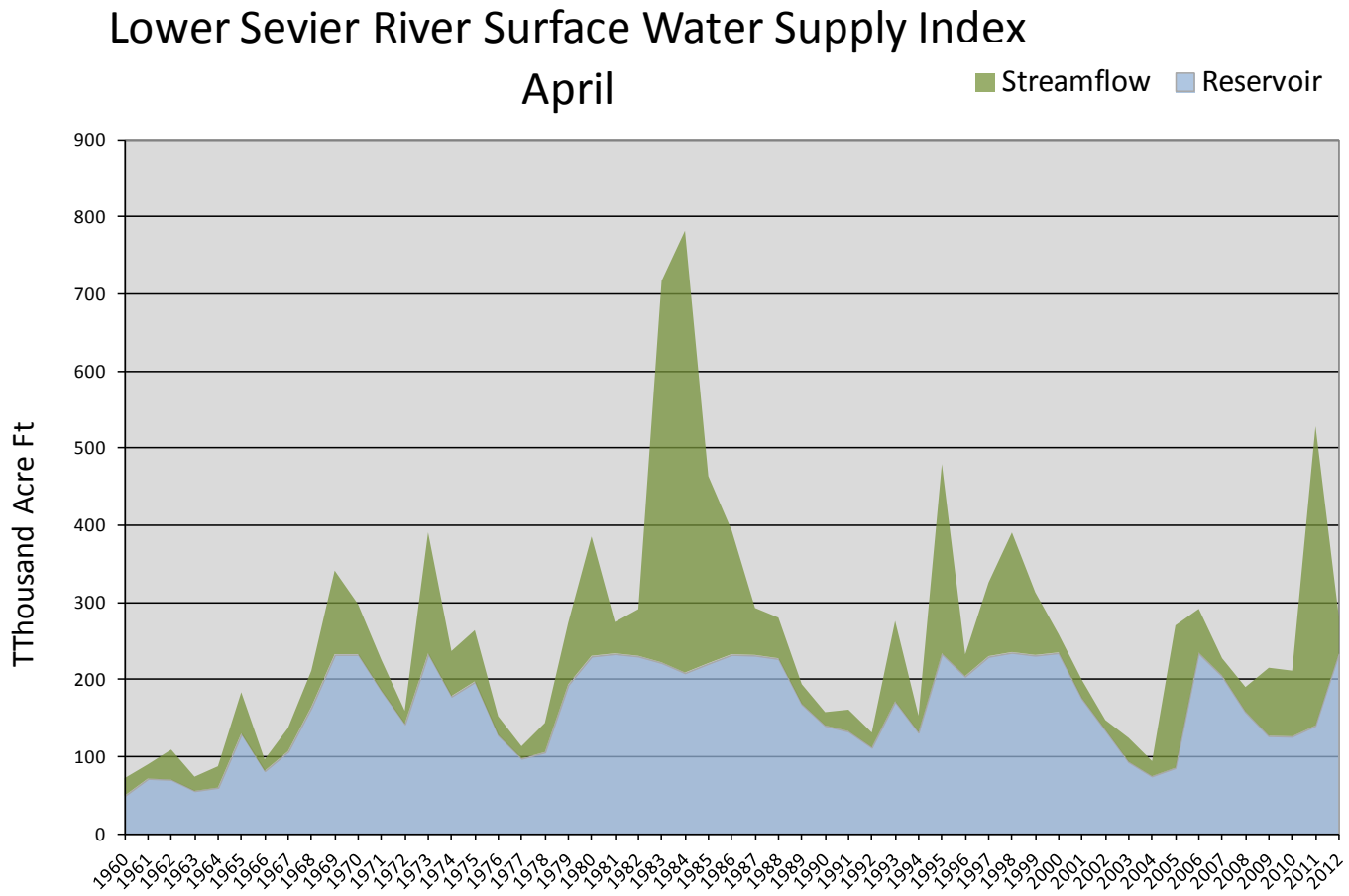


April 1, 2012

Lower Sevier Surface Water Supply Index

Basin or Region	March EOM* Sevier Bridge Reservoir	April-July Forecast Inflow to Sevier Bridge Reservoir	Reservoir + Streamflow	SWSI#	Percentile	Years with similar SWSI
	*KAF^*	*KAF*	*KAF*		*%*	
Lower Sevier	**234.1**	**47**	**281**	**1.54**	**69**	**93,88,82,06**

**EOM, end of month; # SWSI, Surface Water Supply Index; ^KAF, thousand acre-feet.*

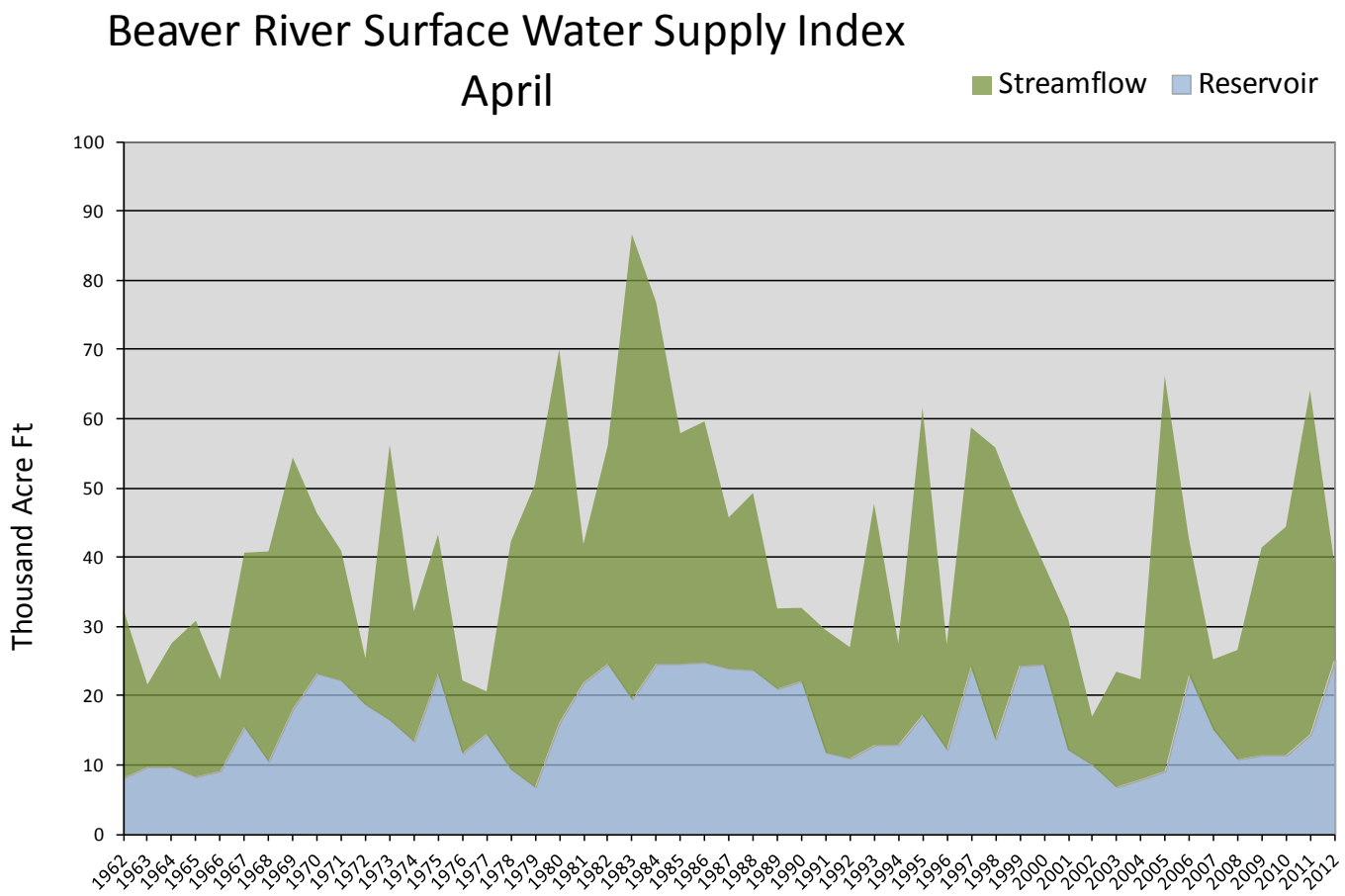


April 1, 2012

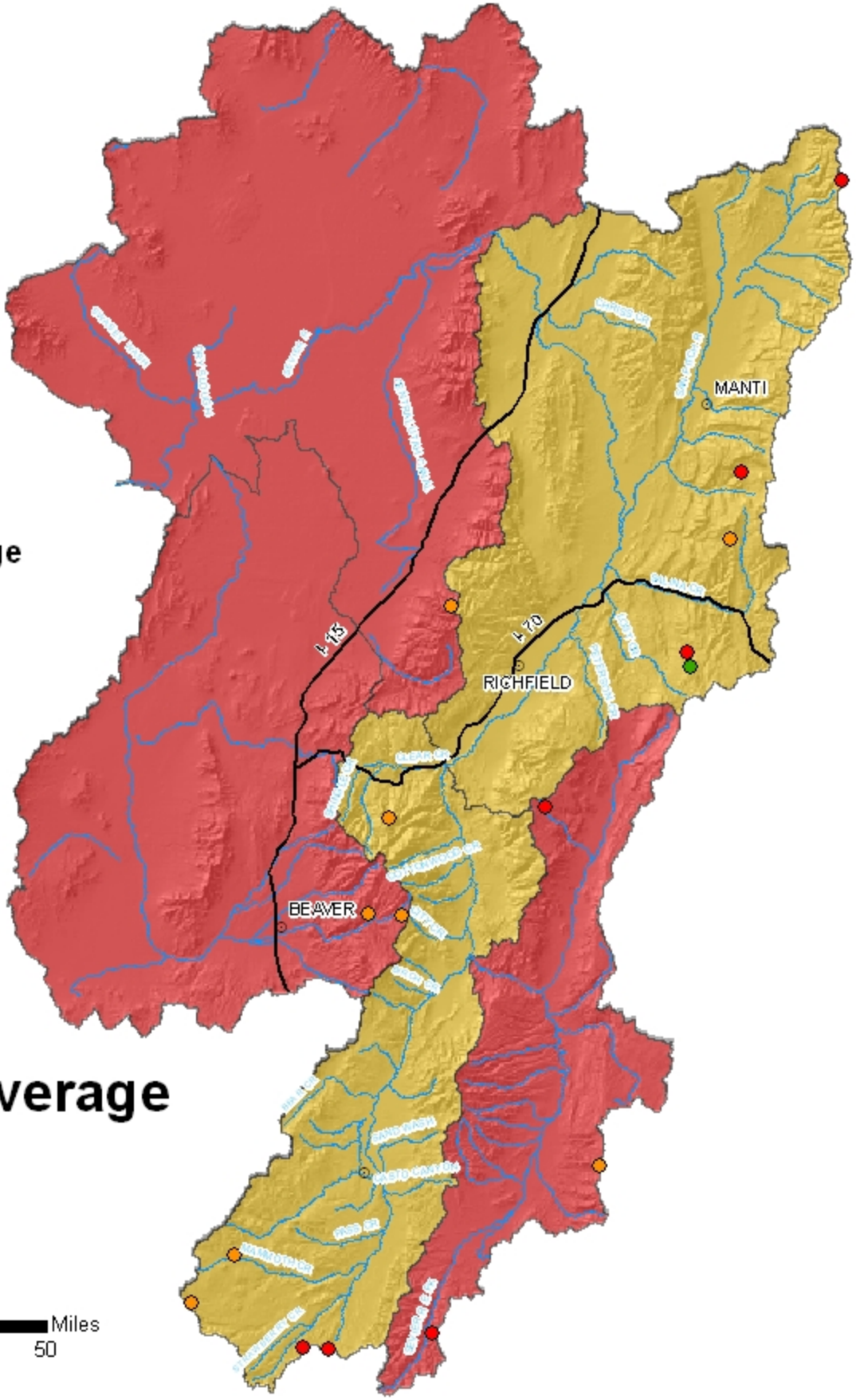
Beaver Surface Water Supply Index

Basin or Region	March EOM* Minersville Reservoir	April-July forecast Beaver River at Beaver	Reservoir + Streamflow	SWSI#	Percentile	Years with similar SWSI
	*KAF^*	*KAF*	*KAF*		*%*	
Beaver	**25.2**	**14.0**	**39.2**	**-0.48**	**44**	**90,00,67,68**

**EOM, end of month; # SWSI, Surface Water Supply Index; ^KAF, thousand acre-feet.*



Sevier & Beaver Basins



Snotel % of Average

- < 50%
- 50 - 69%
- 70 - 89%
- 90 - 109%
- 110 - 129%
- 130 - 149%
- > 150%

Watershed % of Average

- 0
- <50%
- 50 - 69%
- 70 - 89%
- 90 - 109%
- 110 - 129%
- 130 - 149%
- >150%

Basinwide Average
50 %

0 5 10 20 30 40 50 Miles

Provisional Data
Subject to Revision

SEVIER & BEAVER RIVER BASINS as of April 1, 2012

SEVIER & BEAVER RIVER BASINS
Streamflow Forecasts - April 1, 2012

Forecast Point	Forecast Period	<<====== Drier ====== Future Conditions ======= Wetter =====>> Chance Of Exceeding * 90% (1000AF)	70% (1000AF)	50% (1000AF)	50% (% AVG.)	30% (1000AF)	10% (1000AF)	30-Yr Avg. (1000AF)
Mammoth Ck nr Hatch	APR-JUL	0.5	3.6	13.0	51	23	37	26
Sevier R at Hatch	APR-JUL	7.6	18.0	25	46	32	42	55
Sevier R nr Kingston	APR-JUL	1.0	7.1	16.0	49	25	38	33
EF Sevier R nr Kingston	APR-JUL	3.7	15.2	23	66	31	42	35
Sevier R bl Piute Dam	APR-JUL	2.0	20	40	61	60	88	66
Clear Ck ab Diversions nr Sevier	APR-JUL	0.8	5.7	9.0	41	12.3	17.2	22
Salina Ck nr Emery	APR-JUL	0.36	2.20	4.20	47	6.20	9.00	9.00
Manti Ck Blw Dugway Ck Nr Manti	APR-JUL	6.0	8.2	10.0	55	11.9	15.0	18.3
Sevier R nr Gunnison	APR-JUL	3.0	29	47	44	65	93	106
Chicken Ck nr Levan	APR-JUL	0.95	1.51	2.00	44	2.60	3.60	4.50
Oak Creek nr Oak City	APR-JUL	0.42	0.63	0.80	48	0.99	1.31	1.66
Beaver R nr Beaver	APR-JUL	0.9	8.7	14.0	52	19.3	27	27
Minersville Res Inflow	APR-JUL	2.2	4.6	7.0	42	10.0	16.0	16.6

SEVIER & BEAVER RIVER BASINS
Reservoir Storage (1000 AF) - End of March

Reservoir	Usable Capacity	*** Usable Storage *** This Year	Last Year	Avg
GUNNISON	20.3	20.5	20.3	16.3
MINERSVILLE (RkyFd)	23.3	25.2	14.4	17.9
OTTER CREEK	52.5	52.2	34.2	43.5
PIUTE	71.8	65.0	66.5	58.5
SEVIER BRIDGE	236.0	234.1	140.5	189.7
PANGUITCH LAKE	22.3	6.9	21.3	152.9

SEVIER & BEAVER RIVER BASINS
Watershed Snowpack Analysis - April 1, 2012

Watershed	Number of Data Sites	This Year as % of Last Yr	Average
UPPER SEVIER RIVER	8	34	46
EAST FORK SEVIER RIVER	3	39	40
SOUTH FORK SEVIER RIVER	5	30	50
LOWER SEVIER RIVER	6	45	51
BEAVER RIVER	2	43	60
SEVIER & BEAVER RIVER BAS	16	39	50

* 90%, 70%, 50%, 30%, and 10% chances of exceeding are the probabilities that the actual volume will exceed the volumes in the table.

The average is computed for the 1971-2000 base period.

(1) - The values listed under the 10% and 90% Chance of Exceeding are actually 5% and 95% exceedance levels.
(2) - The value is natural volume - actual volume may be affected by upstream water management.
(3) - Median value used in place of average.