

Wyoming Basin & Water Supply Outlook Report

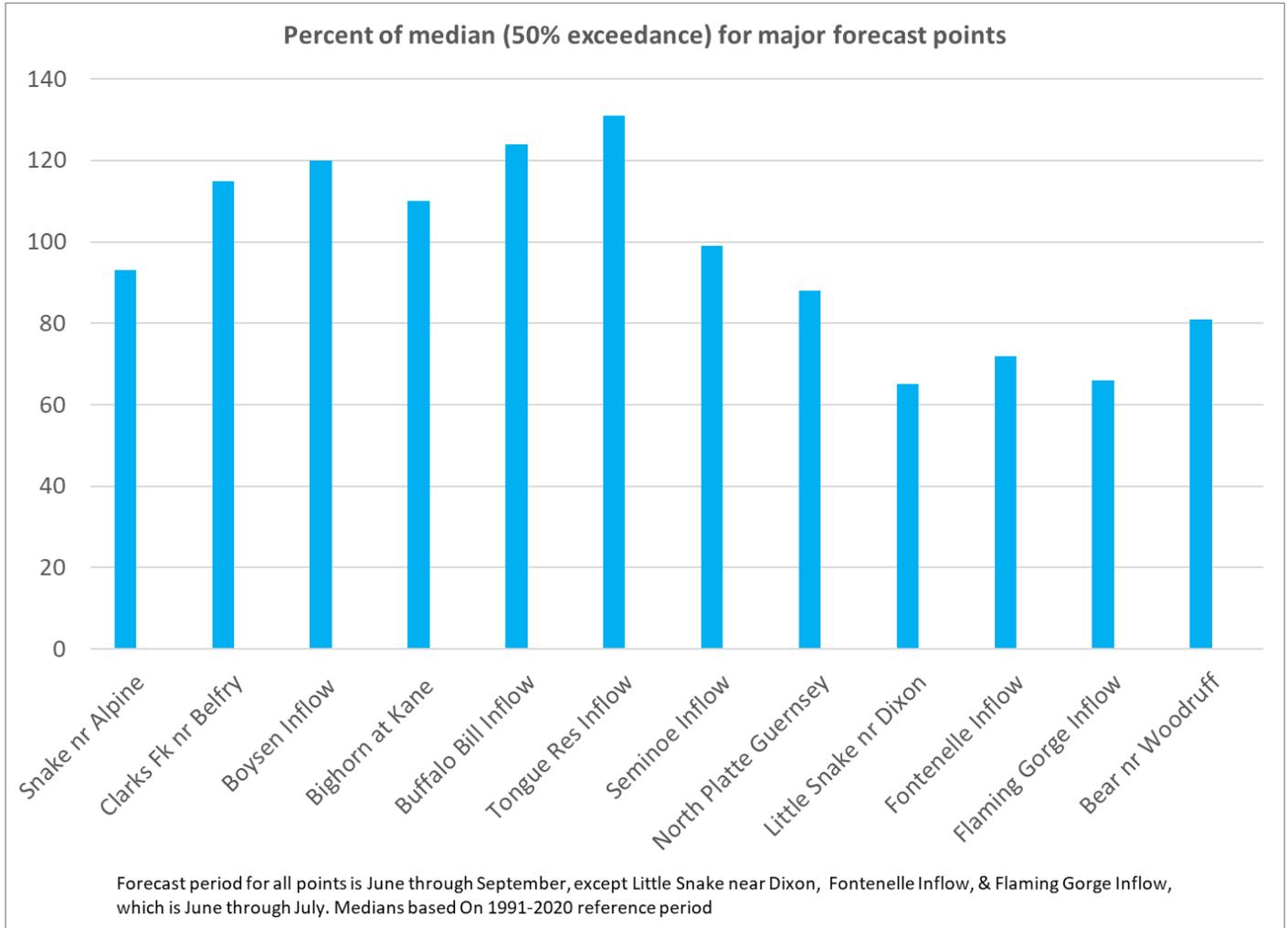
June 1, 2022

**Natural
Resources
Conservation
Service**



Geyser Snow Course. Photo courtesy of the State of Wyoming, Office of the State Engineer.

Forecasted stream flows for June 1st, 2022



Basin Outlook Reports

And

Federal - State - Private Cooperative Snow Surveys

For more information, contact:

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How forecasts are made

Most of the annual streamflow in the western United States originates as snowfall that has accumulated in the mountains during the winter and early spring. As the snowpack accumulates, hydrologists estimate the runoff that will occur when it melts. Measurements of snow water equivalent at selected manual snow courses and automated SNOTEL sites, along with precipitation, antecedent streamflow, and indices of the El Niño / Southern Oscillation are used in computerized statistical and simulation models to prepare runoff forecasts. Unless otherwise specified, all forecasts are for flows that would occur naturally without any upstream influences.

Forecasts of any kind, of course, are not perfect. Streamflow forecast uncertainty arises from three primary sources: (1) uncertain knowledge of future weather conditions, (2) uncertainty in the forecasting procedure, and (3) errors in the data. The forecast, therefore, must be interpreted not as a single value but rather as a range of values with specific probabilities of occurrence. The middle of the range is expressed by the 50% exceedance probability forecast, for which there is a 50% chance that the actual flow will be above, and a 50% chance that the actual flow will be below, this value. To describe the expected range around this 50% value, four other forecasts are provided, two smaller values (90% and 70% exceedance probability) and two larger values (30%, and 10% exceedance probability). For example, there is a 90% chance that the actual flow will be more than the 90% exceedance probability forecast. The others can be interpreted similarly.

The wider the spread among these values, the more uncertain the forecast. As the season progresses, forecasts become more accurate, primarily because a greater portion of the future weather conditions become known; this is reflected by a narrowing of the range around the 50% exceedance probability forecast. Users should take this uncertainty into consideration when making operational decisions by selecting forecasts corresponding to the level of risk they are willing to assume about the amount of water to be expected. If users anticipate receiving a lesser supply of water, or if they wish to increase their chances of having an adequate supply of water for their operations, they may want to base their decisions on the 90% or 70% exceedance probability forecasts, or something in between. On the other hand, if users are concerned about receiving too much water (for example, threat of flooding), they may want to base their decisions on the 30% or 10% exceedance probability forecasts, or something in between. Regardless of the forecast value users choose for operations, they should be prepared to deal with either more or less water. (Users should remember that even if the 90% exceedance probability forecast is used, there is still a 10% chance of receiving less than this amount.) By using the exceedance probability information, users can easily determine the chances of receiving more or less water.

Note: The median is the official normal for snowpack (SWE), precipitation, reservoir storage, and streamflow calculations. Please refer to the **Appendix** of this report for more detailed information.

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Wyoming Basin & Water Supply Outlook Report

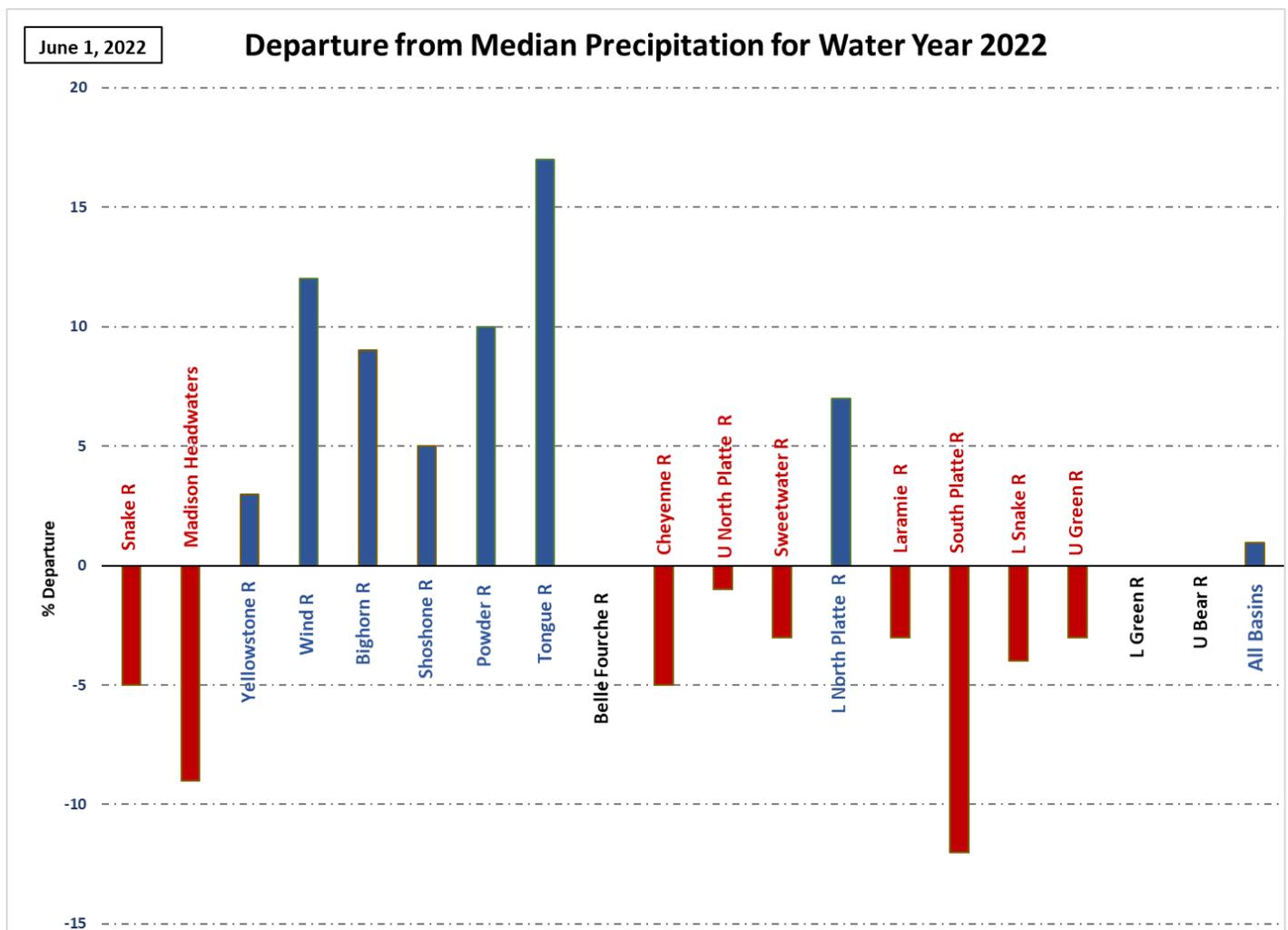
Snowpack

Snow water equivalent (SWE) across Wyoming for June 1st was at 202% of median. SWE in the Tongue River Basin was the highest at 705% of median. *See the map on page 6 and the Appendix for further information.*

Precipitation

The Shoshone River Basin had the highest precipitation for the month at 191% of median. The Lower North Platte River Basin had the lowest precipitation amount at 95% of median. The following graph displays the precipitation in major river basins and their departure from median for the water year beginning October 1, 2021.

See Appendix for further information.



Streams

Forecast median streamflow yields for June thru September in Wyoming basins (except Green, Little Snake and Cheyenne) average 104%. Forecast median stream flow yields for June thru July in Green, Little Snake, and Cheyenne average 70%. The Snake River and Yellowstone River in Wyoming, basins should yield about 94% and 106% of median. Yields from the Wind and Bighorn River basins should be about 118% and 112% of median. Yields from the Shoshone River basin should be 121% of median. Yields from the Powder and Tongue River basins should be about 102% and 128% of median. Yield for the Cheyenne River basin should be about 63% of median. Yields for the Sweetwater, Upper North Platte, Lower North Platte, and Laramie Rivers of Wyoming should be about 100%, 98%, 88%, and 97% of median, respectively. Yields for the Little Snake and Green River should be 75% and 71%.

Reservoirs

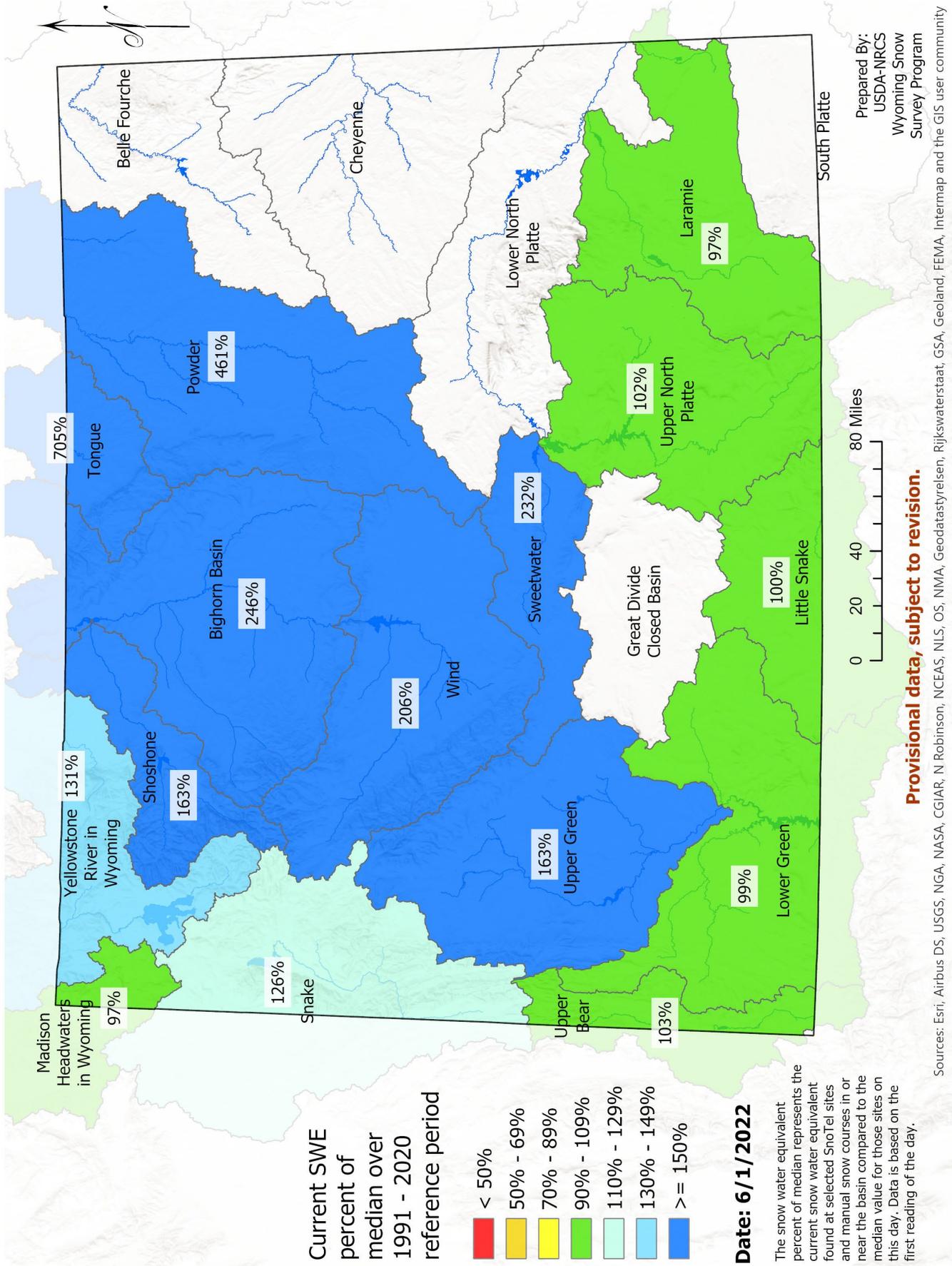
Reservoir storage was 86% of median across the entire state. Reservoirs in the Snake River basin are much below median at 34%. Reservoirs in the Wind River basin are above median at 108%. Reservoirs on the Big Horn are near median at 99%. The Buffalo Bill Reservoir on the Shoshone is below median at 89%. The Tongue River Reservoir was near median at 97%. Reservoirs in the Belle Fourche and Cheyenne River basins are below median at 93% and 88% respectively. Reservoirs on the Upper and Lower North Platte River are below median at 85% and 91% respectively. Reservoirs on the Upper Green River are below median at 81%. Reservoirs on the Lower Green River basin are below median at 89% and are below median in the Upper Bear River basin at 78%. *See below for further information.*

Wyoming Reservoir Levels

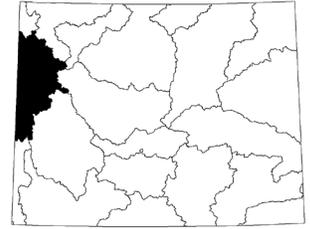
Reservoir Storage Summary For the End of May 2022

Basinwide Summary: June 1, 2022 (Medians based On 1991-2020 reference period)	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Alcova	180.7	180.0	180.2	184.3	98%	98%	98%	100%	100%
Angostura	89.4	101.0	111.7	122.1	73%	83%	91%	80%	90%
Belle Fourche	160.0	159.4	162.3	185.3	86%	86%	88%	99%	98%
Big Sandy	17.9	18.8	30.3	36.7	49%	51%	83%	59%	62%
Bighorn Lake	849.5	796.1	862.1	1011.0	84%	79%	85%	99%	92%
Boysen	550.2	565.8	509.6	741.6	74%	76%	69%	108%	111%
Buffalo Bill	396.3	462.1	447.7	644.1	62%	72%	70%	89%	103%
Bull Lake	103.5	105.8	95.7	152.4	68%	69%	63%	108%	111%
Deerfield	15.5	15.3	15.3	15.2	102%	100%	101%	101%	100%
Flaming Gorge Reservoir	2769.2	3148.8	3144.0	3749.0	74%	84%	84%	88%	100%
Fontenelle	158.3	151.6	188.1	334.0	47%	45%	56%	84%	81%
Glendo	419.4	422.4	482.7	492.0	85%	86%	98%	87%	88%
Grassy Lake	14.0	15.4	15.1	15.2	92%	101%	99%	93%	102%
Guernsey	29.1	27.9	30.9	45.6	64%	61%	68%	94%	90%
Jackson Lake	245.9	799.3	741.6	847.0	29%	94%	88%	33%	108%
Keyhole	132.6	151.7	153.3	193.8	68%	78%	79%	87%	99%
Meeks Cabin Reservoir	28.4	16.6	27.0	29.9	95%	56%	90%	105%	62%
Pactola	55.6	55.4	55.7	55.0	101%	101%	101%	100%	99%
Pathfinder	702.5	805.8	637.5	1070.0	66%	75%	60%	110%	126%
Pilot Butte	23.8	24.1	24.0	33.7	71%	72%	71%	99%	100%
Seminole	437.5	501.7	709.1	1017.2	43%	49%	70%	62%	71%
Stateline Reservoir	12.8	8.3	11.1	13.9	92%	59%	80%	115%	75%
Tongue River Res	75.9	78.1	78.6	79.1	96%	99%	99%	97%	99%
Viva Naughton Res	43.2	41.9	42.2	42.4	102%	99%	100%	102%	99%
Woodruff Creek	3.0	1.7	4.0	4.0	75%	42%	100%	75%	42%
Woodruff Narrows Reservoir	38.8	12.8	49.8	57.3	68%	22%	87%	78%	26%

Wyoming Basins Snow Water Equivalent (SWE) % of Median - includes manual courses



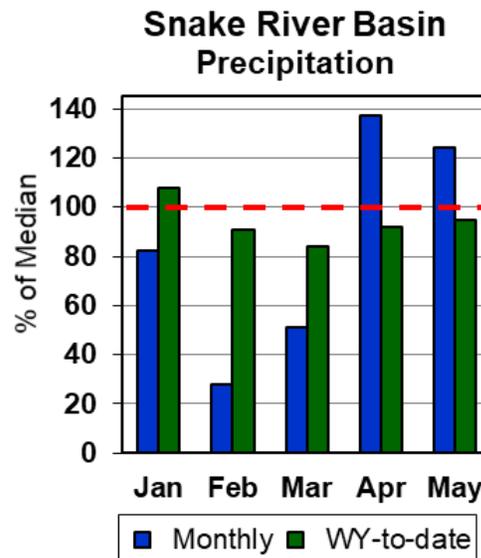
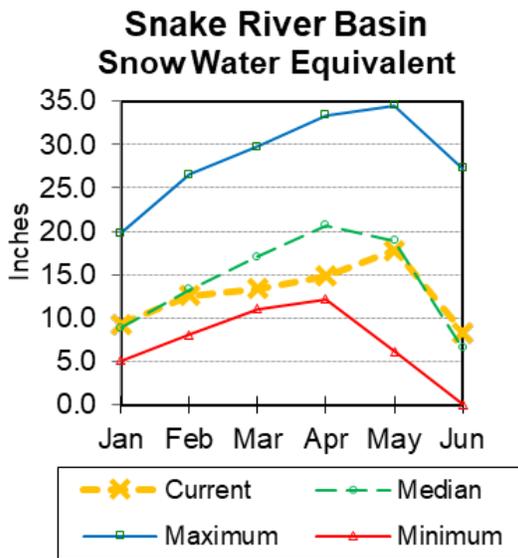
Snake River Basin



Snow

The overall Snake River basin SWE (portion above Palisades dam) is 126% of median. SWE in the Snake River Basin above Jackson Lake is 114% of median. Pacific Creek basin SWE is 114% of median. Buffalo Fork SWE is 105% of median. Gros Ventre River basin SWE is 140% of median. SWE in the Hoback River drainage is 127% of median. SWE in the Greys River drainage is 177% of median. Salt River Basin SWE is 277% of median.

See Appendix at the end of this report for a detailed listing of snow course information.



Precipitation

Last month's precipitation for the Snake River Basin was 124% of median. Water-year-to-date precipitation is 95% of median.

Reservoirs

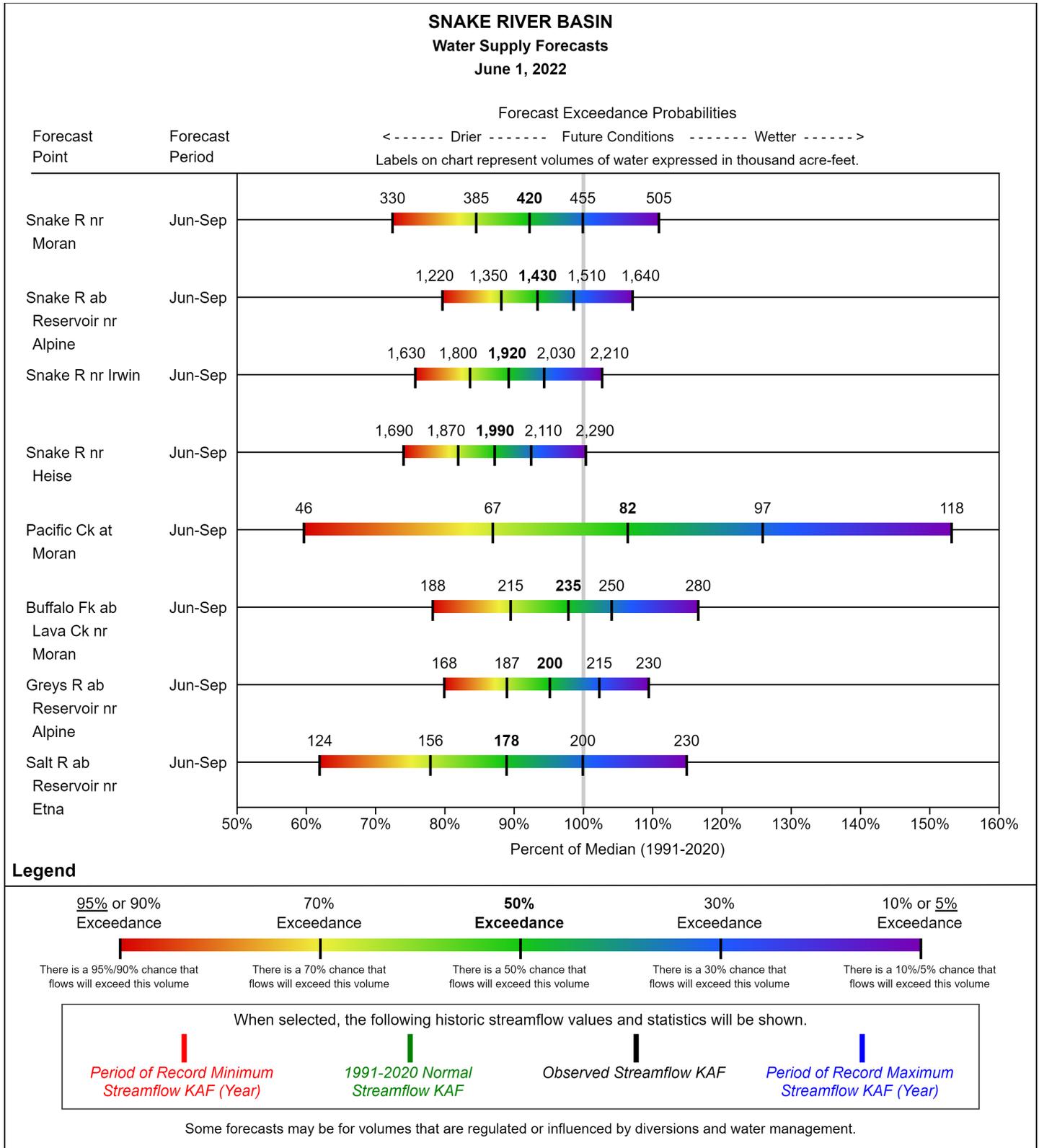
Current reservoir storage is 34% of median for the two storage reservoirs in the basin.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Grassy Lake	14.0	15.4	15.1	15.2	92%	101%	99%	93%	102%
Jackson Lake	245.9	799.3	741.6	847.0	29%	94%	88%	33%	108%
Basin Index	259.9	814.7	756.7	862.2	30%	94%	88%	34%	108%
# of reservoirs	2	2	2	2	2	2	2	2	2

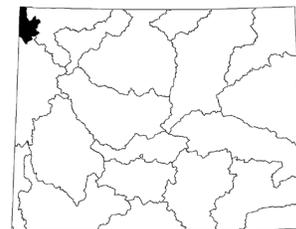
Streamflow

The 50% exceedance forecasts for June through September are slightly below median for this basin. The Snake near Moran yield should be 92% of median. Snake River above reservoir near Alpine will yield about 93%. Pacific Creek near Moran yield will be around 106%. Buffalo Fork above Lava near Moran will be around 98% of median. Greys River above reservoir near Alpine should yield about 95%. Salt River near Etna yield will be about 89%.

See the following graph for further information.

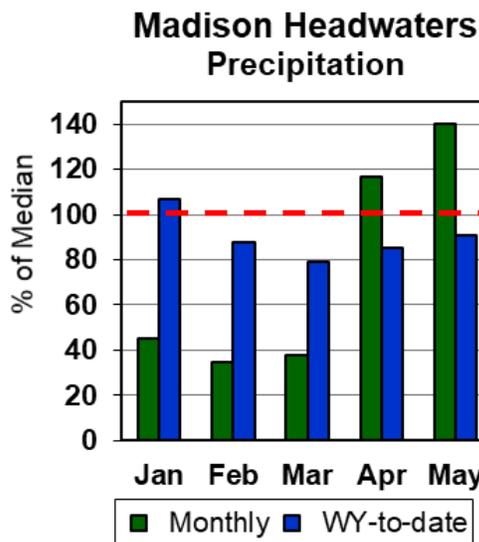
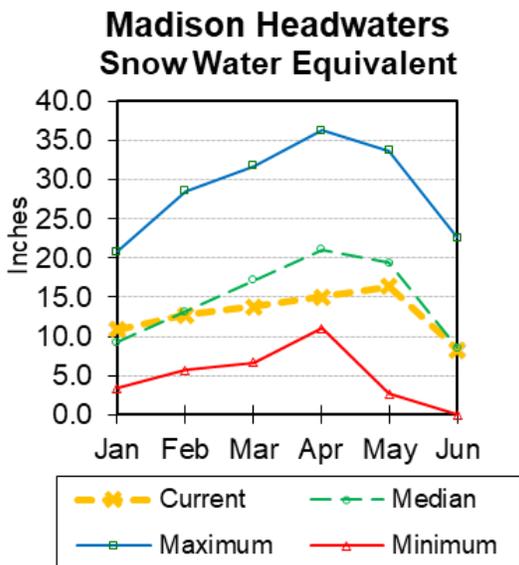


Madison Headwaters in Wyoming



Snow

SWE is 97% of median in the Madison Headwaters in Wyoming drainage. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Last month precipitation in the Madison Headwaters drainage was 140% of median. Water-year-to-date precipitation is at 91% of median.

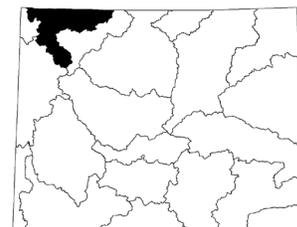
Reservoirs

No reservoir data.

Streamflow

There are no streamflow forecast points for the basin.

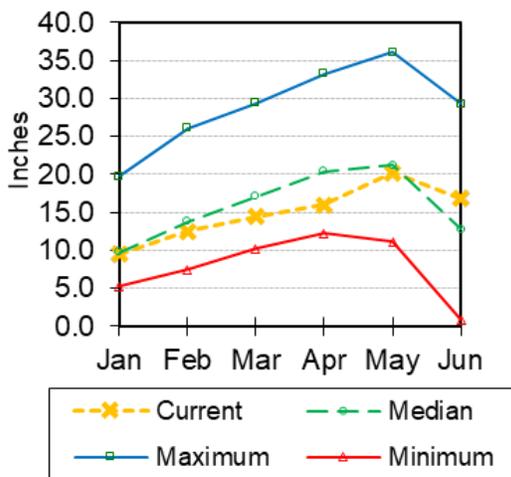
Yellowstone River Basin



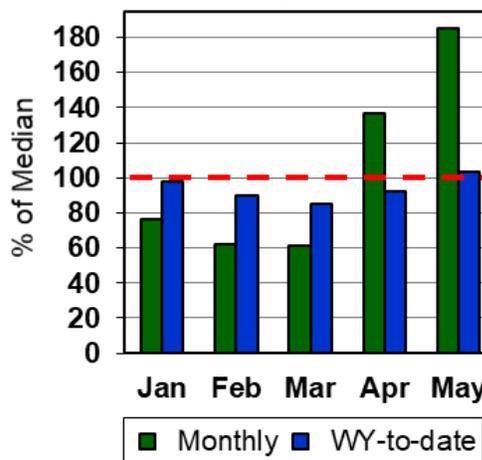
Snow

SWE in the Yellowstone River Basin is 131% of median. SWE in the Clarks Fork Drainage of the Yellowstone River basin in Wyoming is 133% of median. *See Appendix at the end of this report for a detailed listing of snow course information.*

**Yellowstone River Basin
Snow Water Equivalent**



**Yellowstone River Basin
Precipitation**



Precipitation

Last month's precipitation in the Yellowstone River Basin was 185% of median. Water-year-to-date precipitation is 103% of median.

Reservoirs

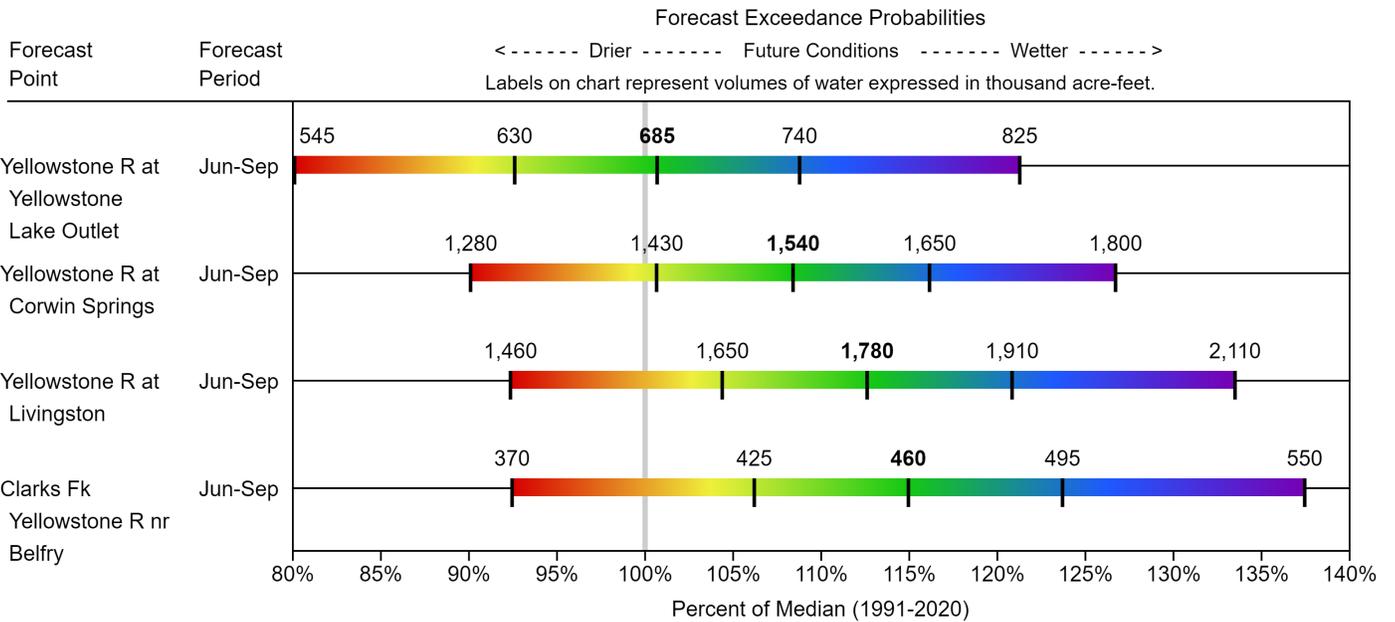
No reservoir data.

Streamflow

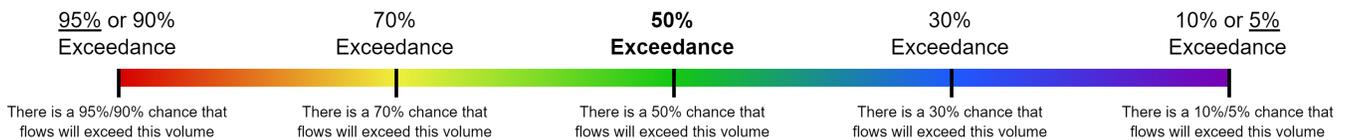
The 50% exceedance forecasts for June through September are near normal for the basin. Yellowstone at Lake Outlet will yield around 101% of median. Clarks Fork of the Yellowstone near Belfry will yield around 115%.

See the following graph for detailed information.

YELLOWSTONE RIVER BASIN Water Supply Forecasts June 1, 2022



Legend



When selected, the following historic streamflow values and statistics will be shown.

Period of Record Minimum Streamflow KAF (Year)	1991-2020 Normal Streamflow KAF	Observed Streamflow KAF	Period of Record Maximum Streamflow KAF (Year)
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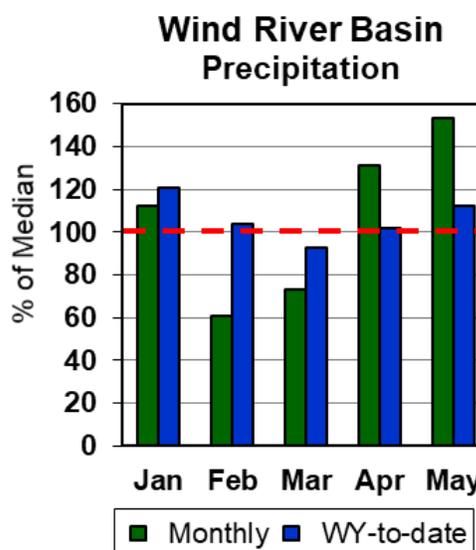
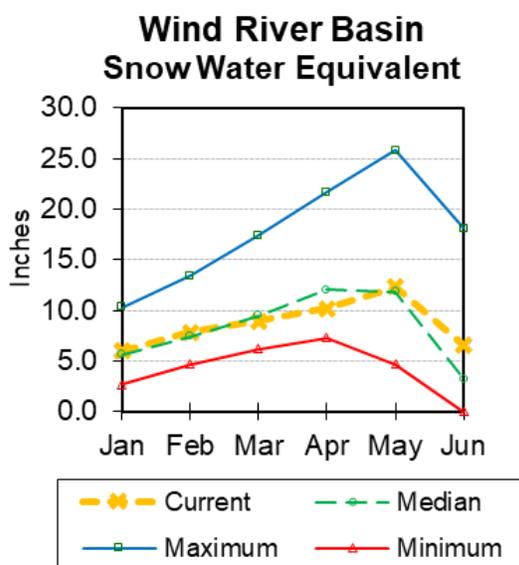
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Wind River Basin



Snow

Wind River basin SWE (above Boysen Reservoir) is 206% of median. SWE in the Wind River above Dubois is 119% of median. Little Wind SWE is 304% of median, and Popo Agie drainage SWE is 291% of median. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

February precipitation for the basin was 153% of median. Water year-to-date precipitation is 112% of median.

Reservoirs

Current storage is 108% of median in the basin.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Pilot Butte	23.8	24.1	24.0	33.7	71%	72%	71%	99%	100%
Boysen	550.2	565.8	509.6	741.6	74%	76%	69%	108%	111%
Bull Lake	103.5	105.8	95.7	152.4	68%	69%	63%	108%	111%
Basin Index	677.5	695.8	629.3	927.7	73%	75%	68%	108%	111%
# of reservoirs	3	3	3	3	3	3	3	3	3

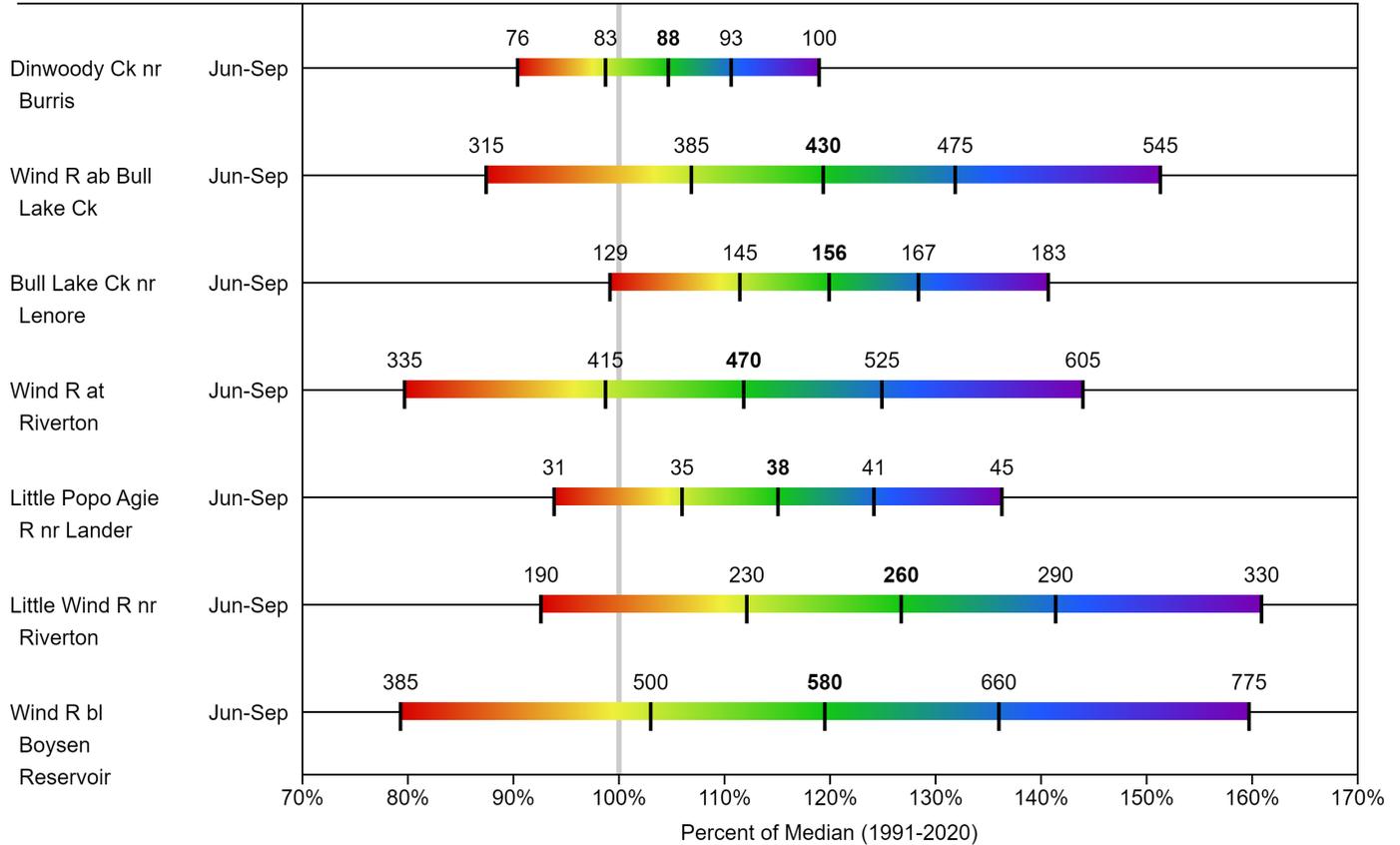
Streamflow

The 50% exceedance forecasts for the June through September runoff period are above normal for the Wind River. The Wind River above Bull Lake Creek will yield about 120% of median. Little Popo Agie River near Lander should yield around 115% of median. Little Wind River near Riverton will yield around 127% of median. Boysen Reservoir inflow will yield about 120% of median. *See the following graph for detailed runoff volumes.*

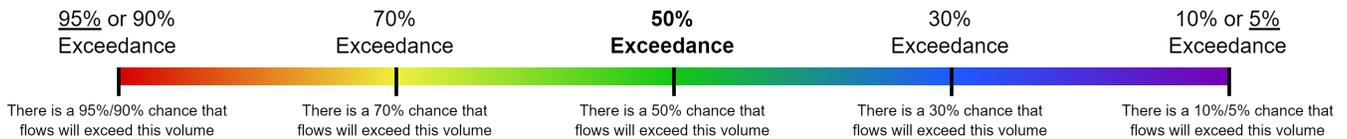
WIND RIVER BASIN
Water Supply Forecasts
June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
 Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend

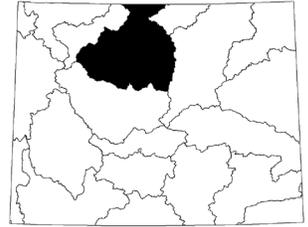


When selected, the following historic streamflow values and statistics will be shown.

<i>Period of Record Minimum Streamflow KAF (Year)</i>	<i>1991-2020 Normal Streamflow KAF</i>	<i>Observed Streamflow KAF</i>	<i>Period of Record Maximum Streamflow KAF (Year)</i>
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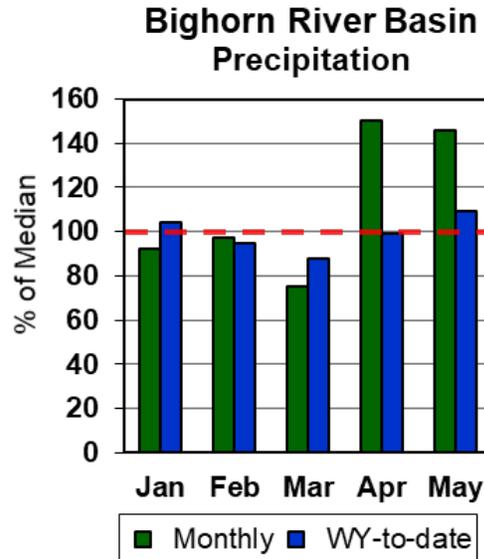
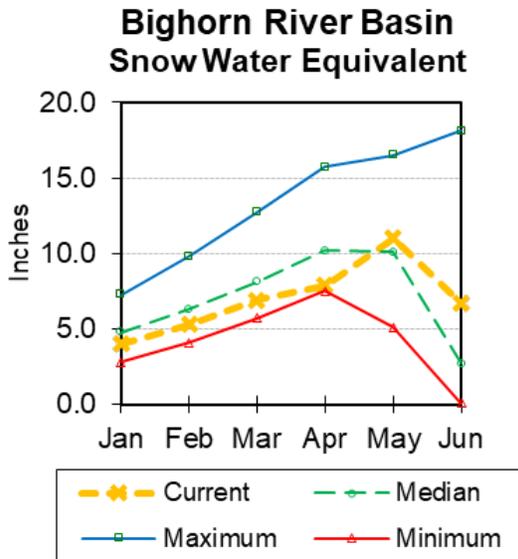
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Bighorn River Basin



Snow

The Bighorn River Basin SWE (above Bighorn Reservoir) is 246% of median. The Greybull River SWE is at 4075% of median. Shell Creek SWE is at 164% of median. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Last month's precipitation was 146% of median. Year-to-date precipitation is 109% of median.

Reservoirs

Current reservoir storage in the basin is 99% of median.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Bighorn Lake	849.5	796.1	862.1	1011	84%	79%	85%	99%	92%
Basin Index	849.5	796.1	862.1	1011	84%	79%	85%	99%	92%
# of reservoirs	1	1	1	1	1	1	1	1	1

Streamflow

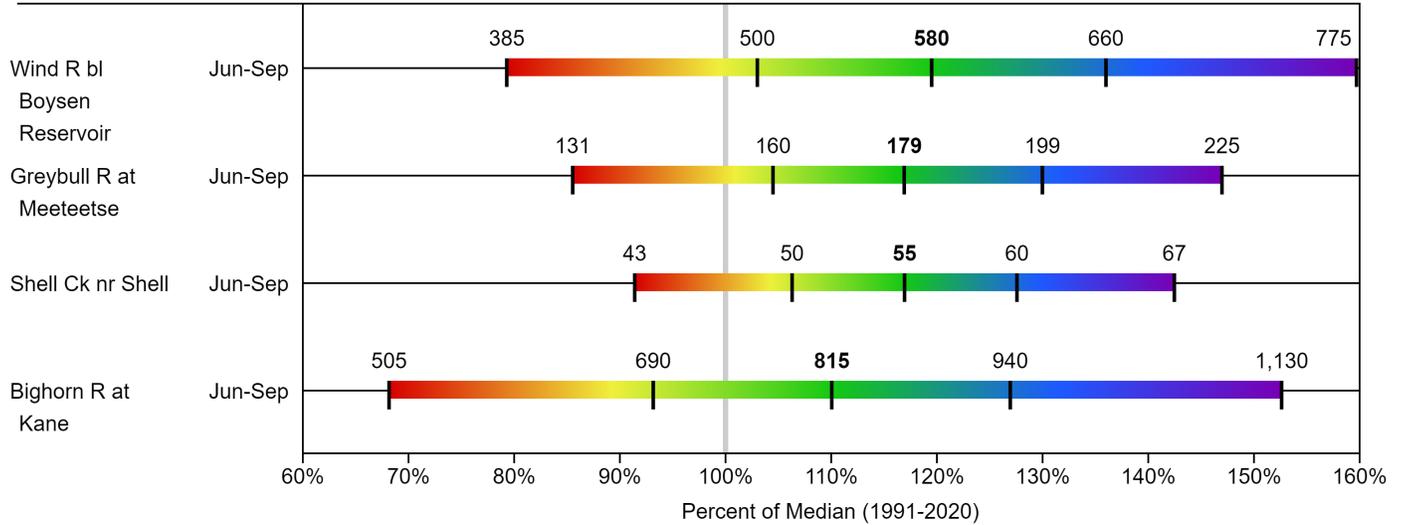
The 50% exceedance forecasts for the June through September runoffs are above normal. The Greybull River near Meeteetse should yield 117% of median. Shell Creek near Shell should also yield around 117% of median. The Bighorn River at Kane should yield around 110% of median.

See the following graph for detailed runoff volumes.

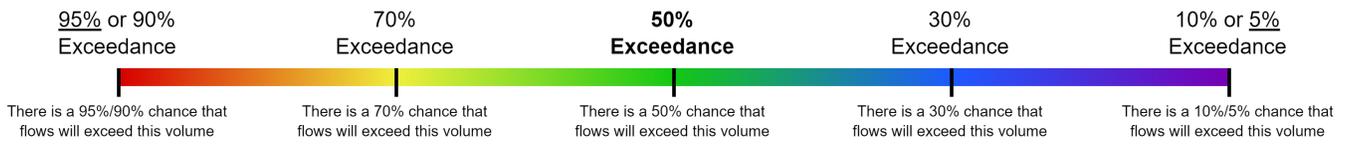
BIGHORN RIVER BASIN Water Supply Forecasts June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend



When selected, the following historic streamflow values and statistics will be shown.

Period of Record Minimum Streamflow KAF (Year)

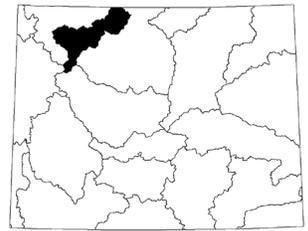
1991-2020 Normal Streamflow KAF

Observed Streamflow KAF

Period of Record Maximum Streamflow KAF (Year)

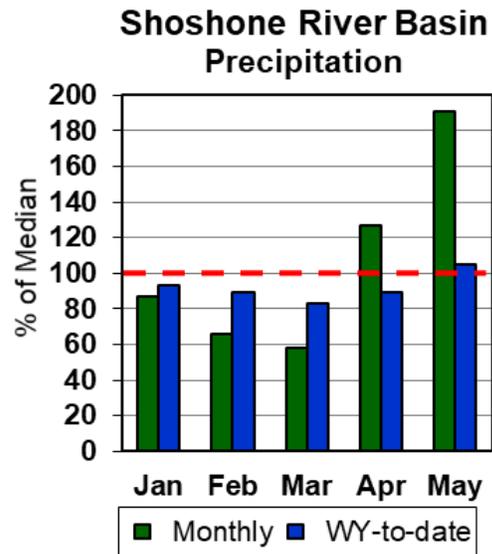
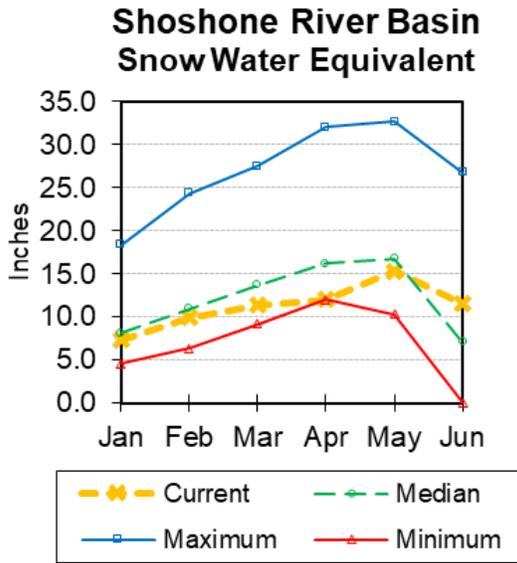
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Shoshone River Basin



Snow

Snow Water Equivalent (SWE) is 163% of median in this basin. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Precipitation for last month was 191% of median. The basin year-to-date precipitation is now 105% of median.

Reservoirs

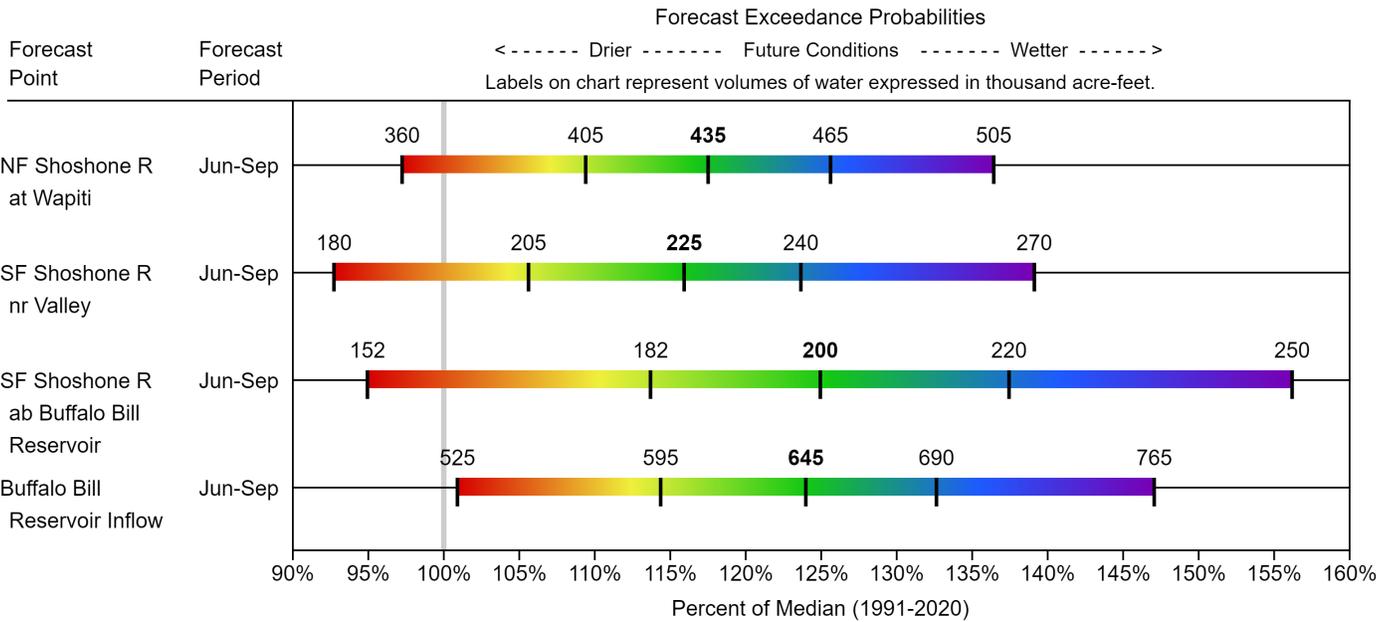
Current storage in Buffalo Bill Reservoir is about 89% of median.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Buffalo Bill	396.3	462.1	447.7	644.1	62%	72%	70%	89%	103%
Basin Index	396.3	462.1	447.7	644.1	62%	72%	70%	89%	103%
# of reservoirs	1	1	1	1	1	1	1	1	1

Streamflow

The 50% exceedance forecasts for the June through September period are above normal for the basin. The North Fork Shoshone River at Wapiti should yield 118% of median. The South Fork of the Shoshone River near Valley should yield 116% of median. The Buffalo Bill Reservoir inflow should yield 124% of median. *See the following graph for detailed runoff volumes.*

SHOSHONE RIVER BASIN Water Supply Forecasts June 1, 2022



Legend



When selected, the following historic streamflow values and statistics will be shown.

Period of Record Minimum Streamflow KAF (Year)

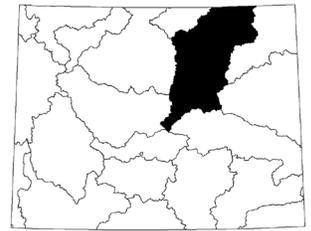
1991-2020 Normal Streamflow KAF

Observed Streamflow KAF

Period of Record Maximum Streamflow KAF (Year)

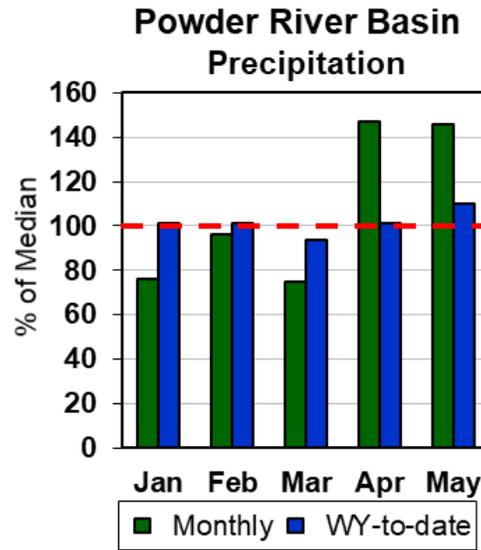
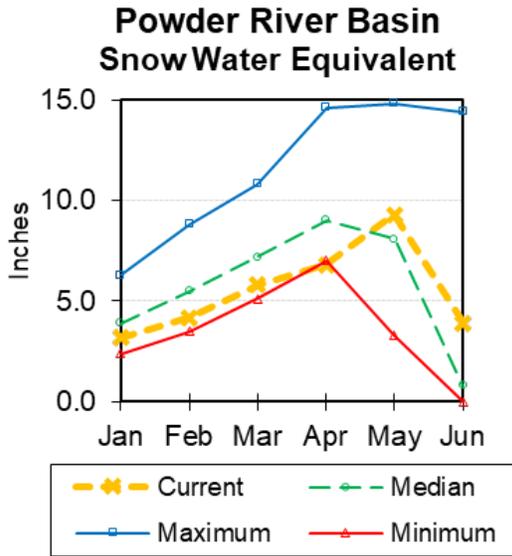
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Powder River Basin



Snow

Powder River Basin SWE is at 461% of median. SWE in the Clear Creek drainage is 322% of median. *See appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Last month's precipitation was 146% of median in the basin. Year-to-date precipitation is 110% of median.

Reservoirs

No reservoir data for this basin.

Streamflow

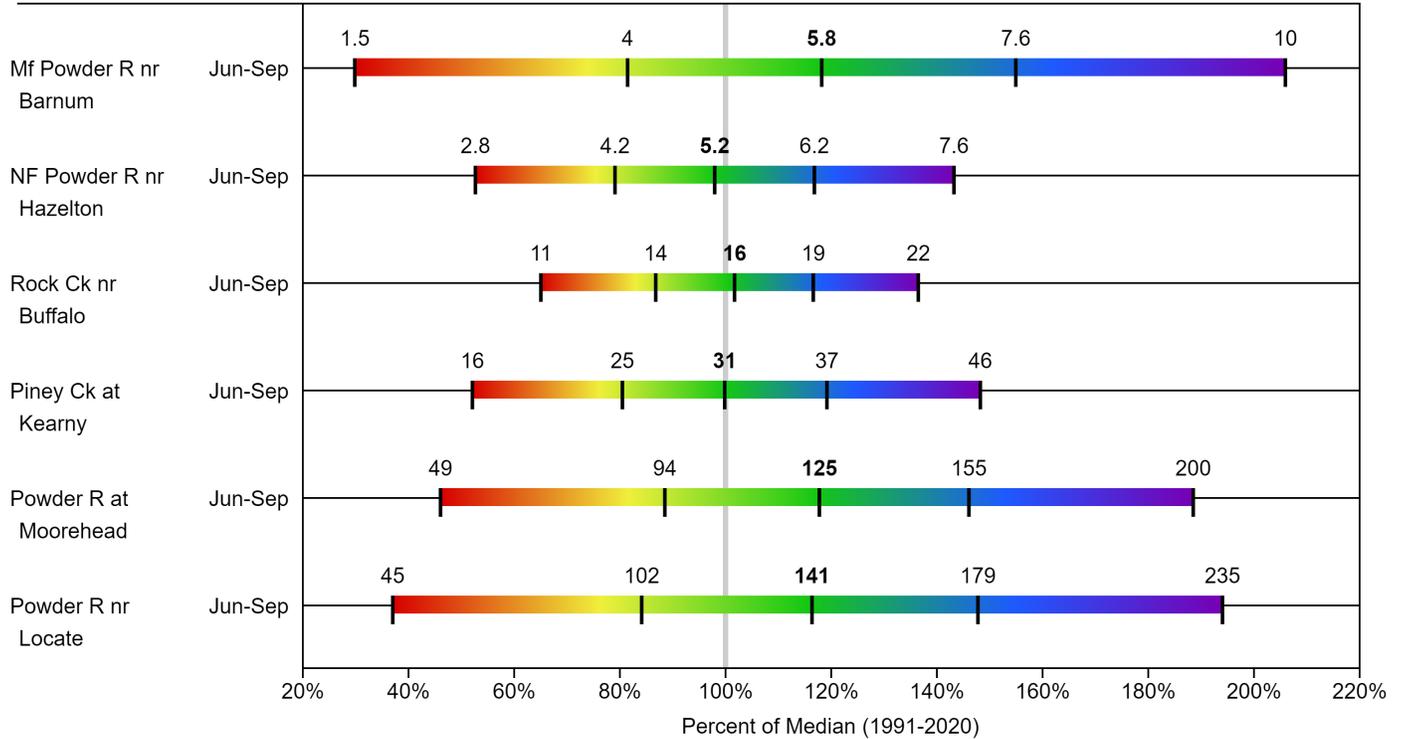
The 50% exceedance forecasts for the June through September period are near normal for the basin. The Middle Fork of the Powder River near Barnum should yield around 118% of median. The North Fork of the Powder River near Hazelton to yield around 98% of median.

See the following graph for detailed runoff volumes.

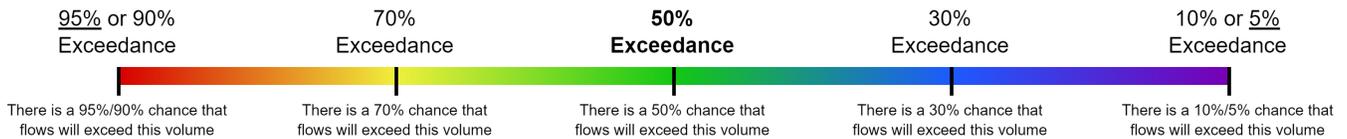
POWDER RIVER BASIN
Water Supply Forecasts
June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
 Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend

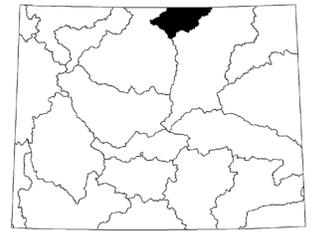


When selected, the following historic streamflow values and statistics will be shown.

<i>Period of Record Minimum Streamflow KAF (Year)</i>	<i>1991-2020 Normal Streamflow KAF</i>	<i>Observed Streamflow KAF</i>	<i>Period of Record Maximum Streamflow KAF (Year)</i>
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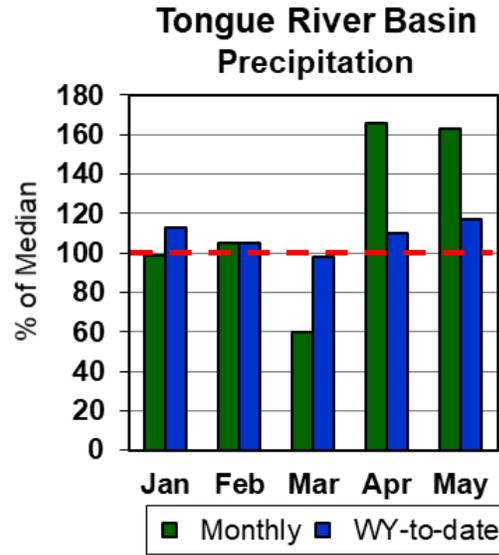
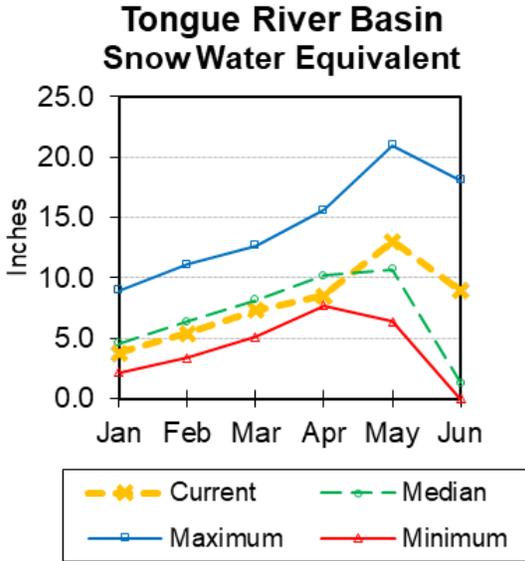
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Tongue River Basin



Snow

Upper Tongue River drainage SWE is at 703% of median. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Last month's precipitation was 163% of median. Year-to-date precipitation is 117% of median in the basin.

Reservoirs

The Tongue River Reservoir is at 97% of median.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Tongue River Res	75.9	78.1	78.6	79.1	96%	99%	99%	97%	99%
Basin Index	75.9	78.1	78.6	79.1	96%	99%	99%	97%	99%
# of reservoirs	1	1	1	1	1	1	1	1	1

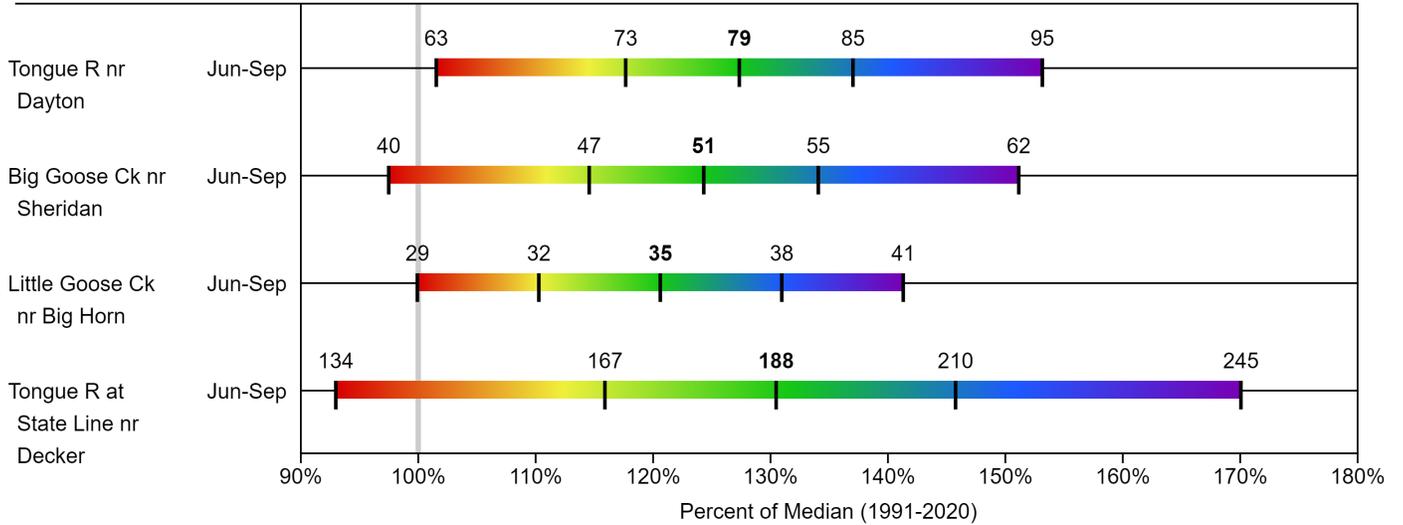
Streamflow

The 50% exceedance forecasts for the June through September period are well above normal for the basin. The yield for Tongue River near Dayton is forecasted to be 127% of median. Big Goose Creek near Sheridan should yield around 124%. Little Goose Creek near Bighorn should yield 121% of median. The Tongue River Reservoir Inflow should yield 131% of median. *See below for detailed runoff volumes.*

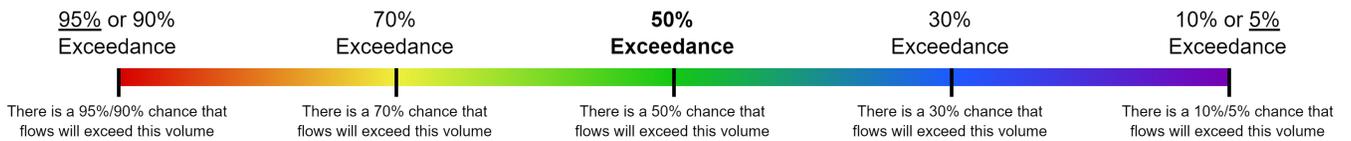
TONGUE RIVER BASIN
Water Supply Forecasts
June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
 Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend

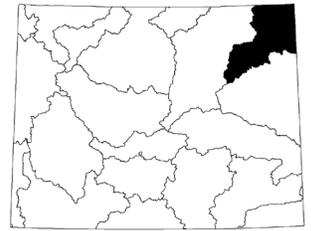


When selected, the following historic streamflow values and statistics will be shown.

 <i>Period of Record Minimum Streamflow KAF (Year)</i>	 <i>1991-2020 Normal Streamflow KAF</i>	 <i>Observed Streamflow KAF</i>	 <i>Period of Record Maximum Streamflow KAF (Year)</i>
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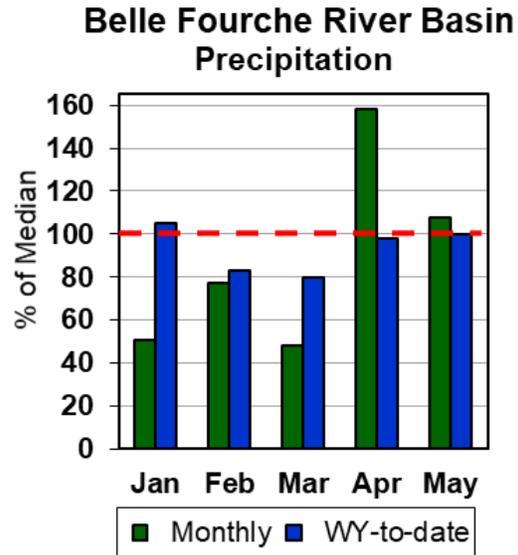
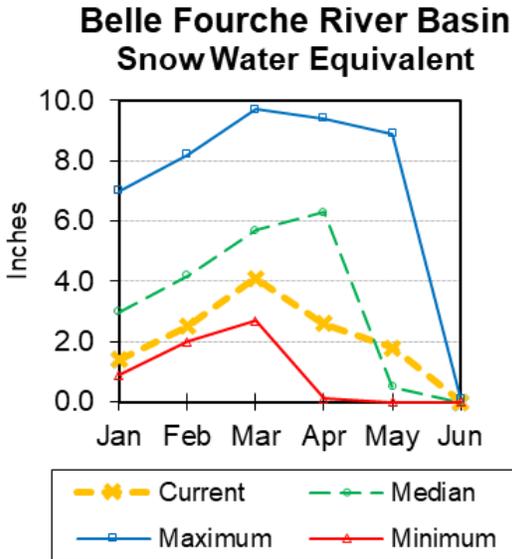
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Belle Fourche River Basin



Snow

Currently there is no SWE in the Belle Fourche River Basin. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Precipitation for last month was 108% of median in the Belle Fourche basin. Year-to-date precipitation is 100% of median.

Reservoirs

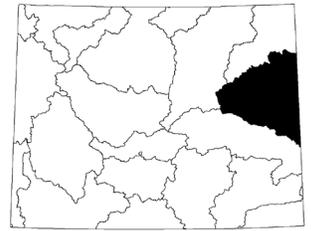
Combined storage for the 2 reservoirs in the basin is at 93% of median.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Keyhole	132.6	151.7	153.3	193.8	68%	78%	79%	87%	99%
Belle Fourche	160.0	159.4	162.3	185.3	86%	86%	88%	99%	98%
Basin Index	292.7	311.1	315.6	379.1	68%	78%	79%	93%	99%
# of reservoirs	2	2	2	2	2	2	2	2	2

Streamflow

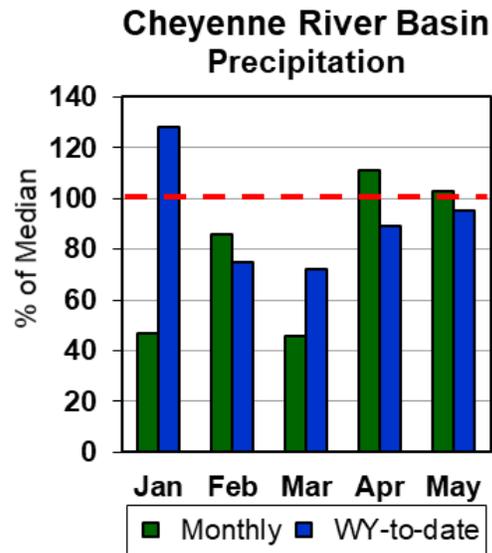
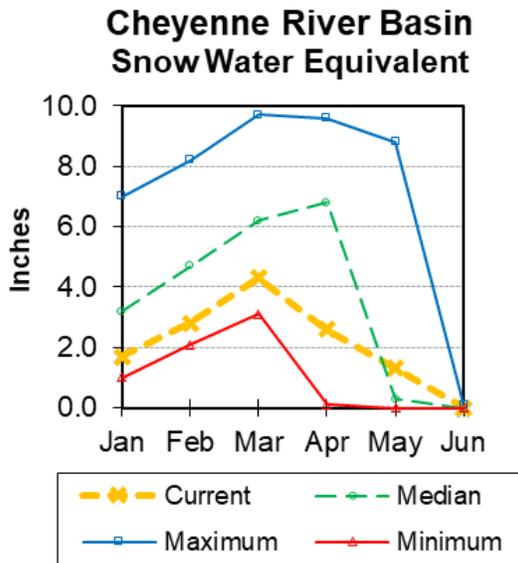
There are no streamflow forecast points for the basin.

Cheyenne River Basin



Snow

Currently there is no SWE recorded for sites in the Cheyenne River Basin. *See Appendix at the end of this report for a detailed listing.*



Precipitation

Precipitation for last month was 103% of median. Year-to-date precipitation is 95% of median.

Reservoirs

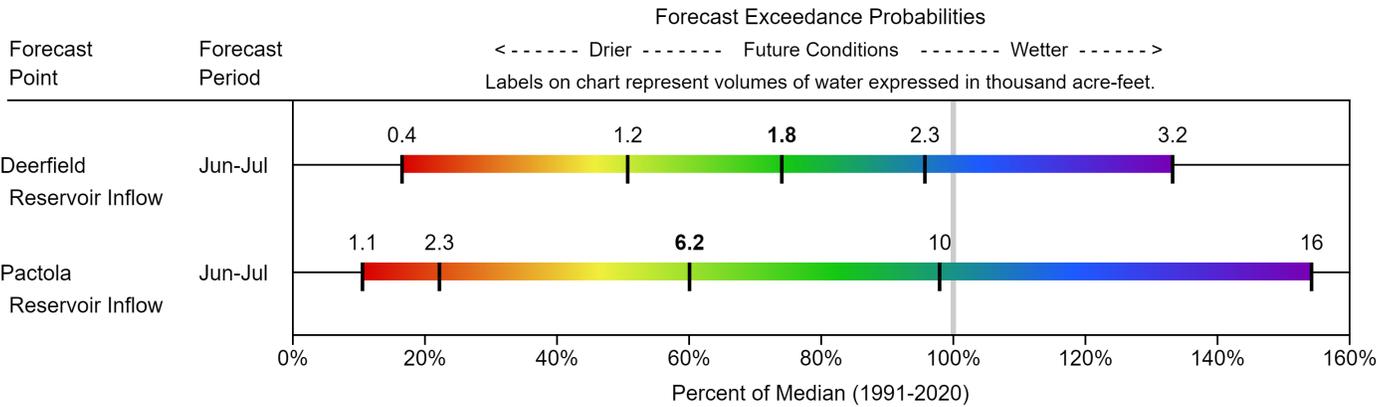
Combined storage for the 3 reservoirs in the basin is at 88% of median.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Angostura	89.4	101.0	111.7	122.1	73%	83%	91%	80%	90%
Deerfield	15.5	15.3	15.3	15.2	102%	100%	101%	101%	100%
Pactola	55.6	55.4	55.7	55.0	101%	101%	101%	100%	99%
Basin Index	160.5	171.6	182.7	192.3	83%	89%	95%	88%	94%
# of reservoirs	3	3	3	3	3	3	3	3	3

Streamflow

The Deerfield Reservoir Inflow yield is forecasted at 74% of median. Pactola Reservoir Inflow yield should be 60% of median. *See the following graph for detailed runoff volumes.*

CHEYENNE RIVER BASIN
Water Supply Forecasts
June 1, 2022



Legend

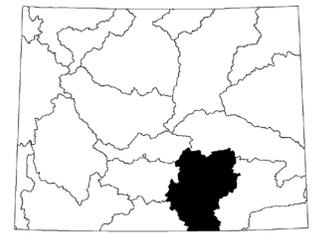


When selected, the following historic streamflow values and statistics will be shown.

 <i>Period of Record Minimum Streamflow KAF (Year)</i>	 <i>1991-2020 Normal Streamflow KAF</i>	 <i>Observed Streamflow KAF</i>	 <i>Period of Record Maximum Streamflow KAF (Year)</i>
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Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

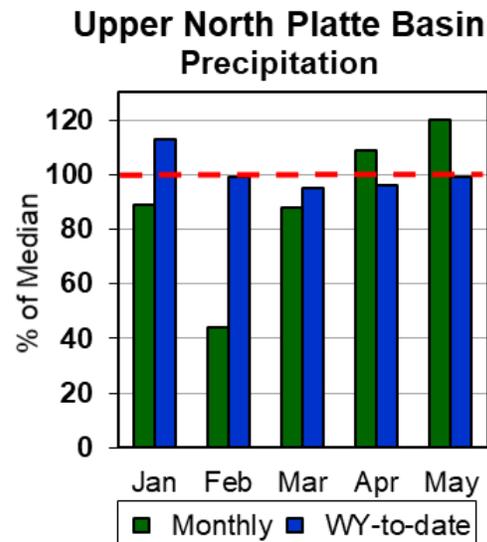
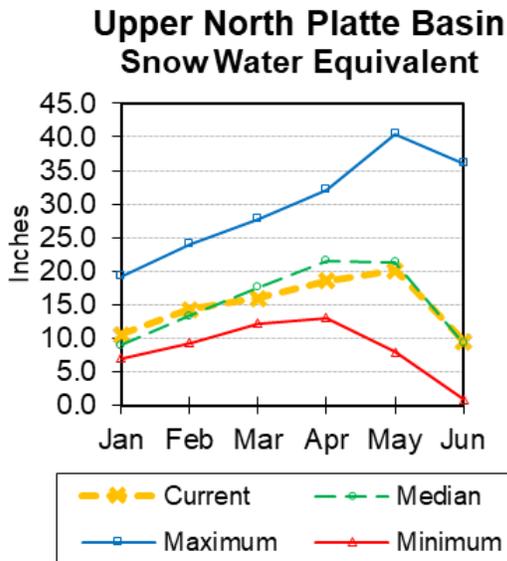
Upper North Platte River Basin



Snow

The Upper North Platte River basin SWE is 102% of median. North Platte above Northgate SWE is 110% of median. Encampment River SWE is 91% of median. Medicine Bow and Rock Creek SWE are 107% of median.

See Appendix at the end of this report for a detailed listing of snow course information.



Precipitation

Last month's precipitation was 120% of median. Total water-year-to-date precipitation is 99% of median.

Reservoirs

Seminole Reservoir storage is at 62% of median.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Pathfinder	702.5	805.8	637.5	1070	66%	75%	60%	110%	126%
Seminole	437.5	501.7	709.1	1017.2	43%	49%	70%	62%	71%
Basin Index	1140.0	1307.6	1346.6	2087.2	55%	63%	65%	85%	97%
# of reservoirs	2	2	2	2	2	2	2	2	2

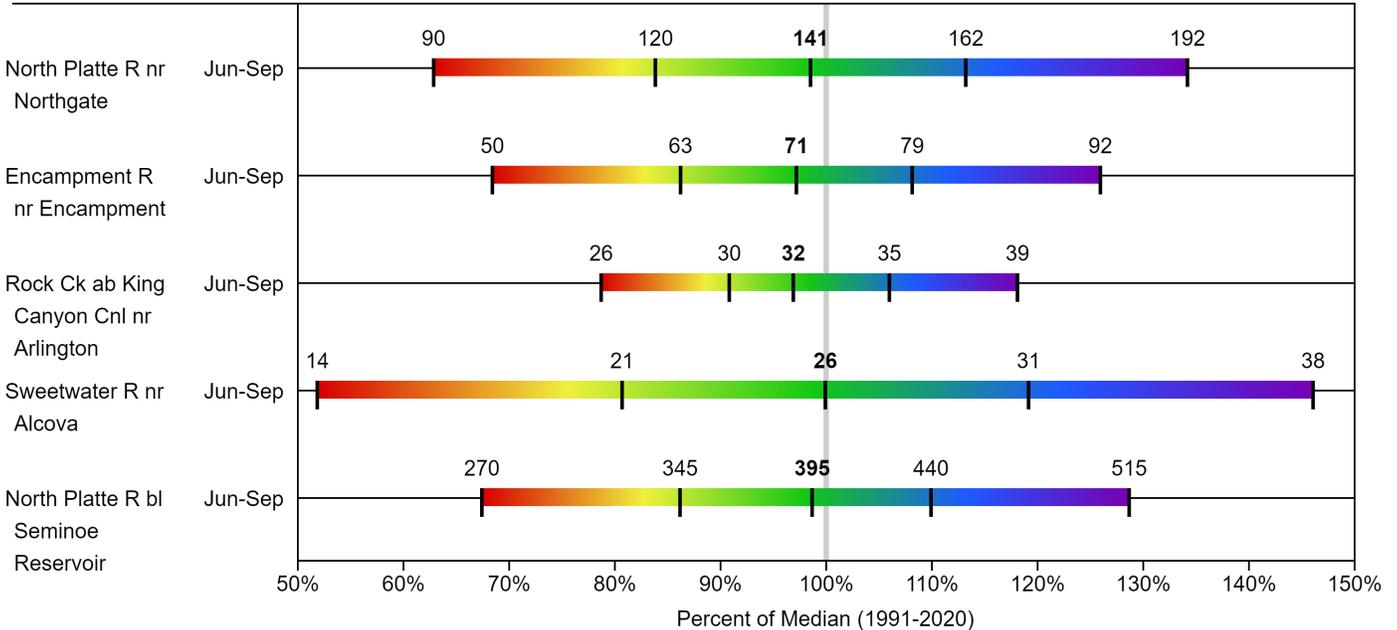
Streamflow

The 50% exceedance forecasts for the June through September period are normal for the Upper North Platte River Basin. The yield for the North Platte River near Northgate will be around 99% of median. The Encampment River near Encampment yield will be about 97%. Rock Creek near Arlington yield will be around 97%. Seminole Reservoir inflow should be about 99% of median. *See the following page for more detailed information on projected runoff.*

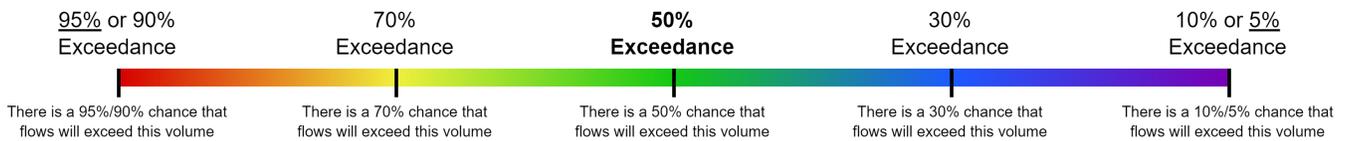
UPPER NORTH PLATTE RIVER BASIN Water Supply Forecasts June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend

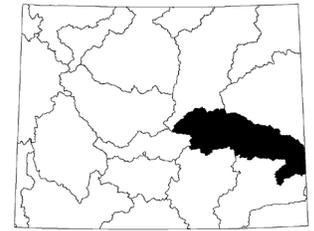


When selected, the following historic streamflow values and statistics will be shown.

Period of Record Minimum Streamflow KAF (Year)	1991-2020 Normal Streamflow KAF	Observed Streamflow KAF	Period of Record Maximum Streamflow KAF (Year)
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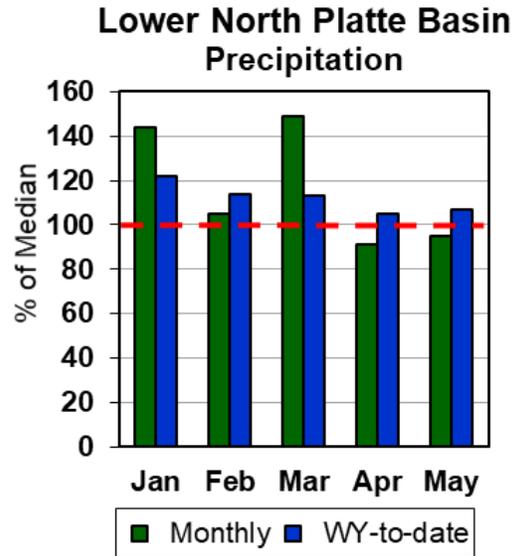
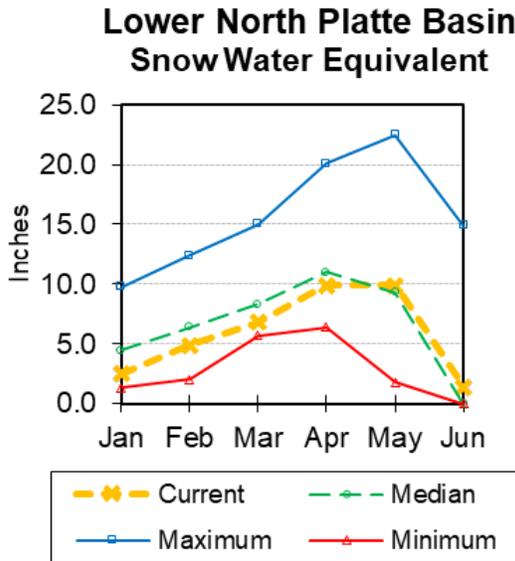
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Lower North Platte River Basin



Snow

Currently, the median SWE for sites in the Lower North Platte River Basin is 0. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Last month's precipitation was 95% of median. The water year-to-date precipitation for the basin is currently 107% of median.

Reservoirs

Combined storage for the 3 reservoirs in the basin is at 91% of median.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Glendo	419.4	422.4	482.7	492	85%	86%	98%	87%	88%
Alcova	180.7	180.0	180.2	184.3	98%	98%	98%	100%	100%
Guernsey	29.1	27.9	30.9	45.6	64%	61%	68%	94%	90%
Basin Index	629.2	630.3	693.8	721.9	87%	87%	96%	91%	91%
# of reservoirs	3	3	3	3	3	3	3	3	3

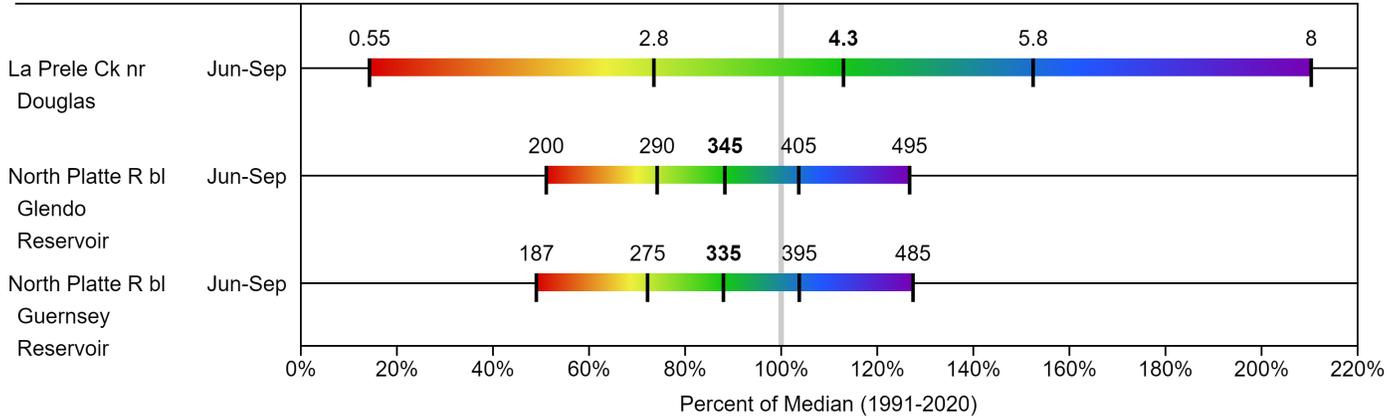
Streamflow

The 50% exceedance forecasts for the June through September period should be below normal. LaPrele Creek near Douglas is forecasted to yield 113% of median. North Platte River below Guernsey Reservoir should yield around 88% of median. *See the following for more detailed information on projected runoff.*

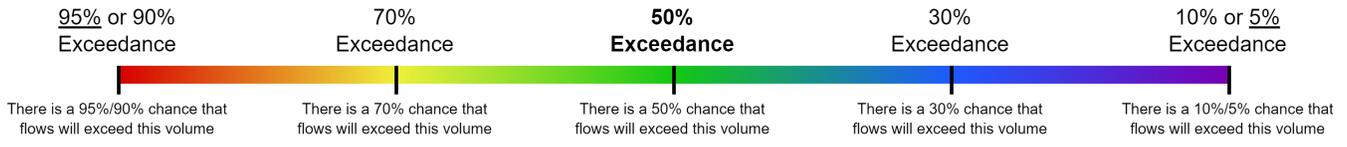
LOWER NORTH PLATTE RIVER BASIN
Water Supply Forecasts
June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
 Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend

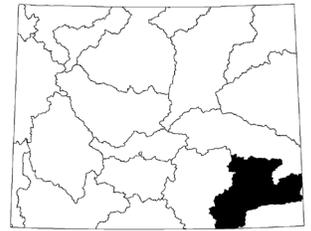


When selected, the following historic streamflow values and statistics will be shown.

<i>Period of Record Minimum Streamflow KAF (Year)</i>	<i>1991-2020 Normal Streamflow KAF</i>	<i>Observed Streamflow KAF</i>	<i>Period of Record Maximum Streamflow KAF (Year)</i>
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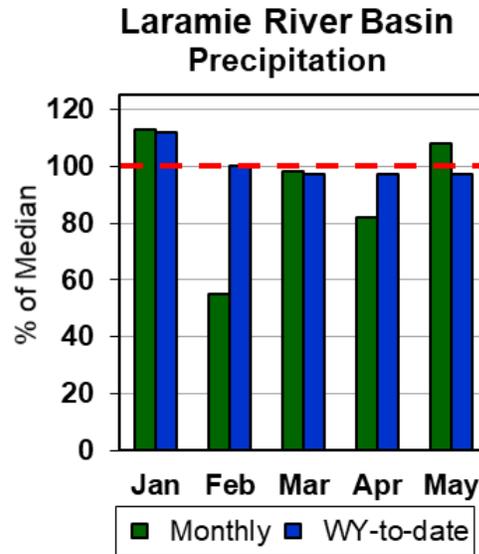
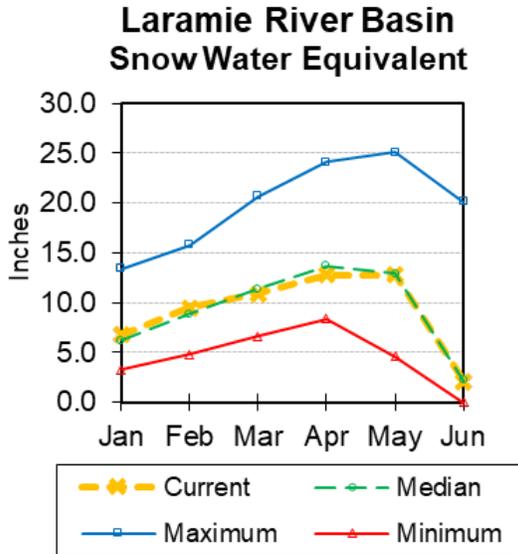
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Laramie River Basin



Snow

SWE for the entire Laramie River Basin (above mouth entering North Platte) is 97% of median. SWE for the Laramie River above Laramie is 97% of median. SWE for the Little Laramie River is 93% of median. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Last month's precipitation was 108% of median. The water year-to-date precipitation for the basin is currently 94% of median.

Reservoirs

No reservoir data for this basin.

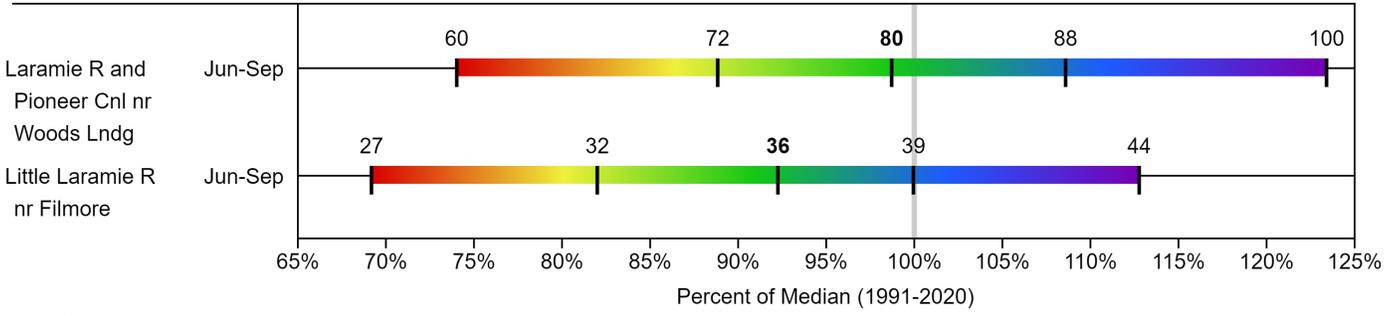
Streamflow

The 50% exceedance forecasts for the June through September period at Laramie River near Woods Landing should yield around 99% of median. The Little Laramie near Filmore should produce about 92% of normal.

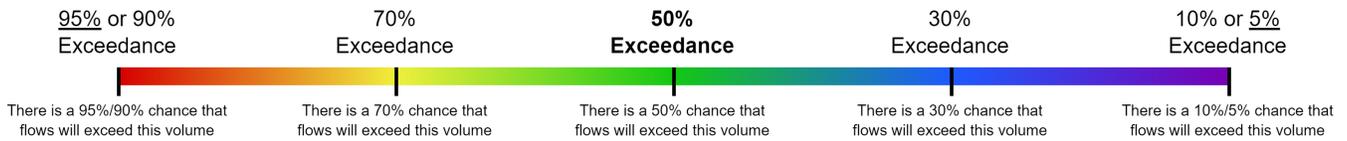
LARAMIE RIVER BASIN
Water Supply Forecasts
June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
 Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend

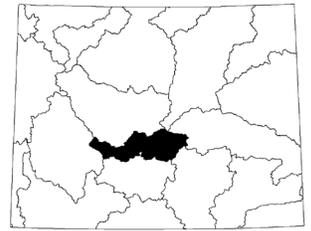


When selected, the following historic streamflow values and statistics will be shown.

 <i>Period of Record Minimum Streamflow KAF (Year)</i>	 <i>1991-2020 Normal Streamflow KAF</i>	 <i>Observed Streamflow KAF</i>	 <i>Period of Record Maximum Streamflow KAF (Year)</i>
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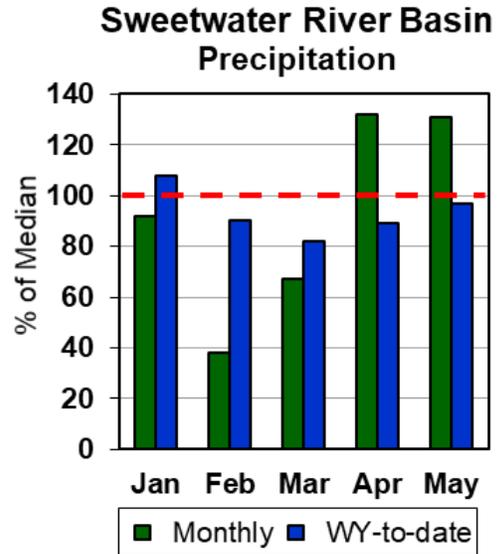
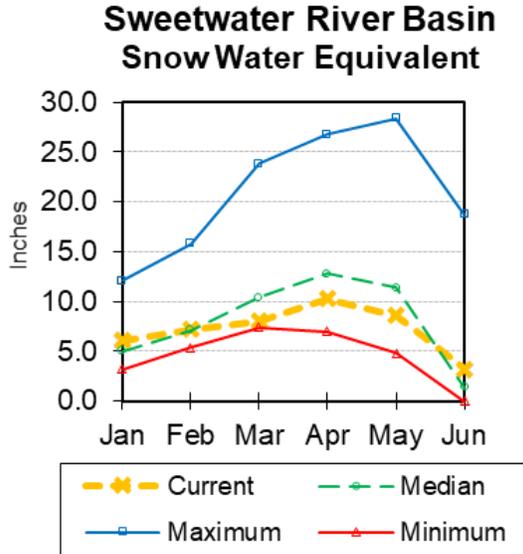
Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Sweetwater River Basin



Snow

Sweetwater River Basin SWE is at 232% of median. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

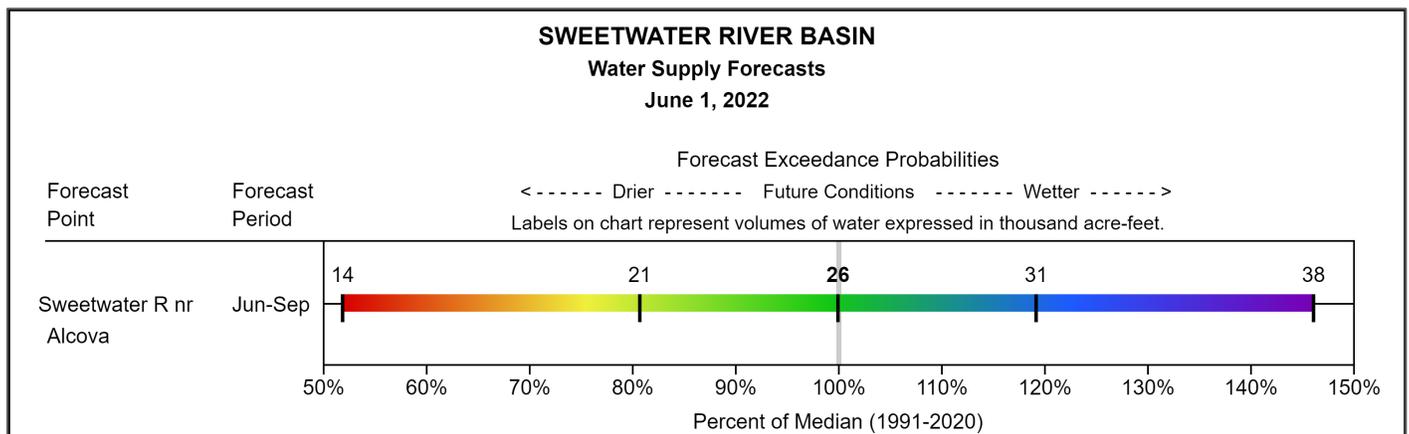
Last month's precipitation was 131% of median. The water year-to-date precipitation for the basin is currently 97% of median.

Reservoirs

No reservoir data for the basin.

Streamflow

The following is the streamflow forecast for the June through September period. The Sweetwater River near Alcova will yield about 100% of median. *See below for detailed information on projected runoff.*

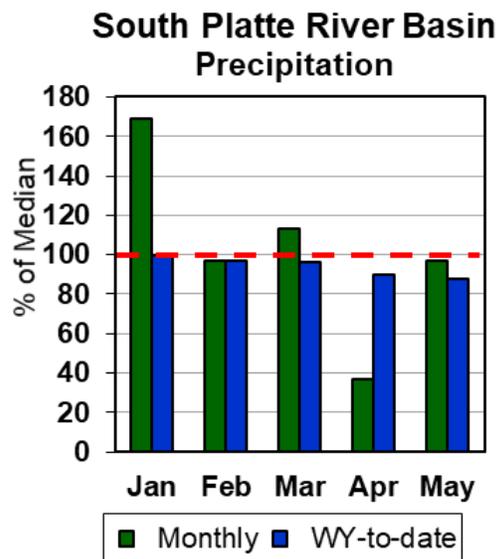
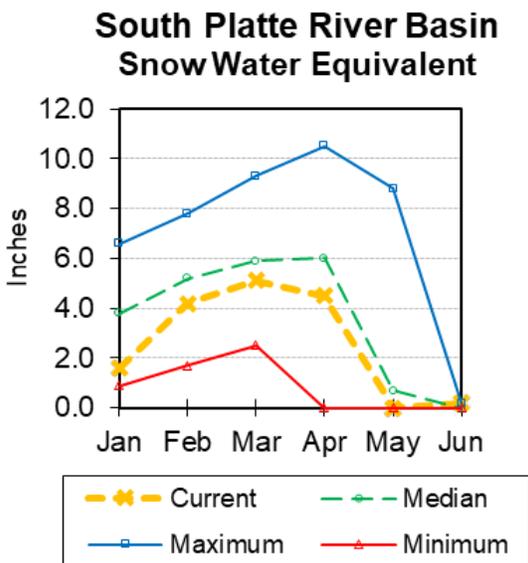


South Platte River Basin (WY)



Snow

The median SWE for sites in the South Platte River Basin is 0. *See Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

Last month's precipitation was 97% of median. The water year-to-date precipitation for the basin is currently 88% of median.

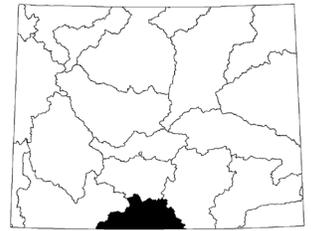
Reservoirs

No reservoir data for the basin.

Streamflow

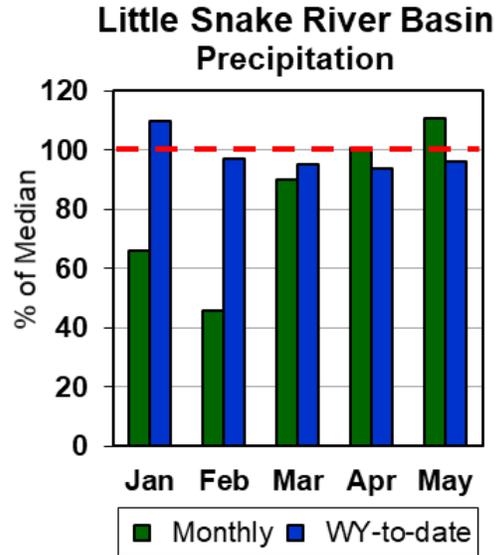
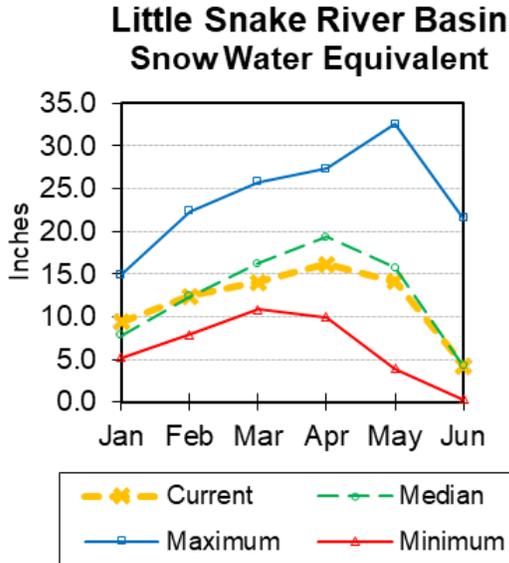
There are no streamflow forecast points for the basin.

Little Snake River Basin



Snow

Little Snake River drainage SWE is 100% of median. See *Appendix at the end of this report for a detailed listing of snow course information.*



Precipitation

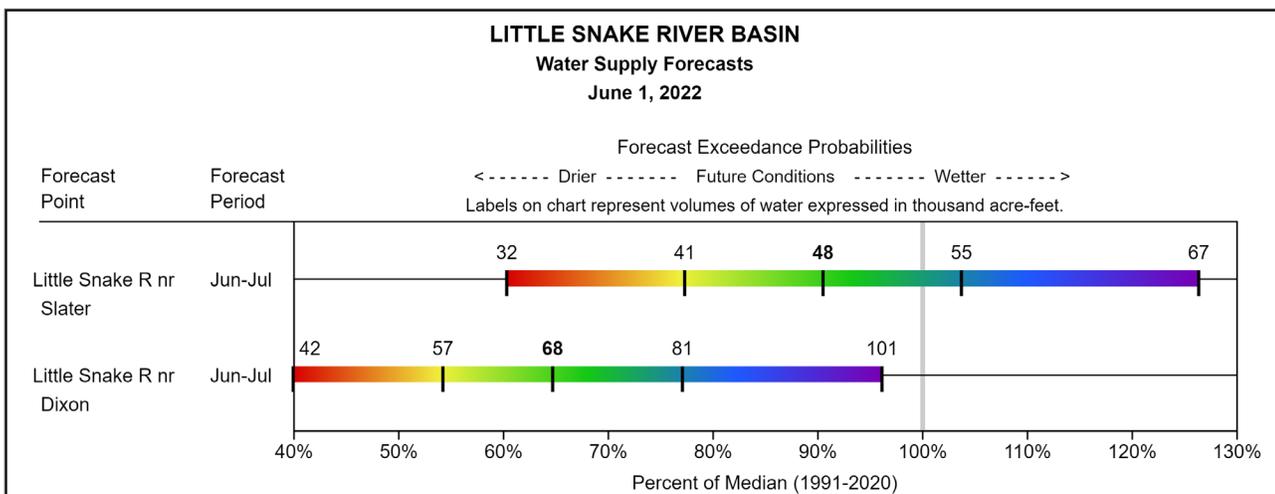
Precipitation across the basin was 111% of median. The Little Snake River Basin water-year-to-date precipitation is currently 96% of median.

Reservoirs

No reservoir data for the basin.

Streamflow

The 50% exceedance forecasts for the June through July period will be well below normal. The Little Snake River near Slater is forecasted to yield around 91% of median. *See below for detailed information on projected runoff.*



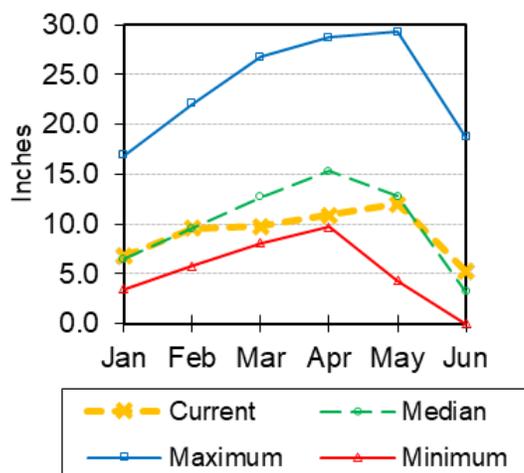
Upper Green River Basin



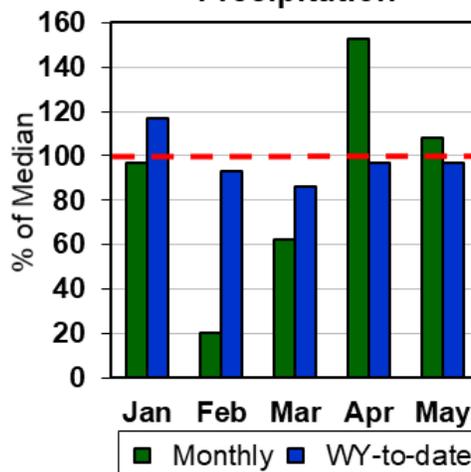
Snow

The Upper Green River Basin SWE (above Fontenelle Reservoir) is 163% of median. Green River Basin above Warren Bridge SWE is 287% of median. West Side of Upper Green River Basin SWE is 159% of median. *See Appendix at the end of this report for a detailed listing of snow course information.*

Upper Green River Basin Snow Water Equivalent



Upper Green River Basin Precipitation



Precipitation

Precipitation for sites in the basin was 108% of median last month. Water year-to-date precipitation is 97% of median.

Reservoir

Combined water storage in the basin was at 81% of median for the 2 reservoirs.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Big Sandy	17.9	18.8	30.3	36.7	49%	51%	83%	59%	62%
Fontenelle	158.3	151.6	188.1	334	47%	45%	56%	84%	81%
Basin Index	176.3	170.4	218.4	370.7	48%	46%	59%	81%	78%
# of reservoirs	2	2	2	2	2	2	2	2	2

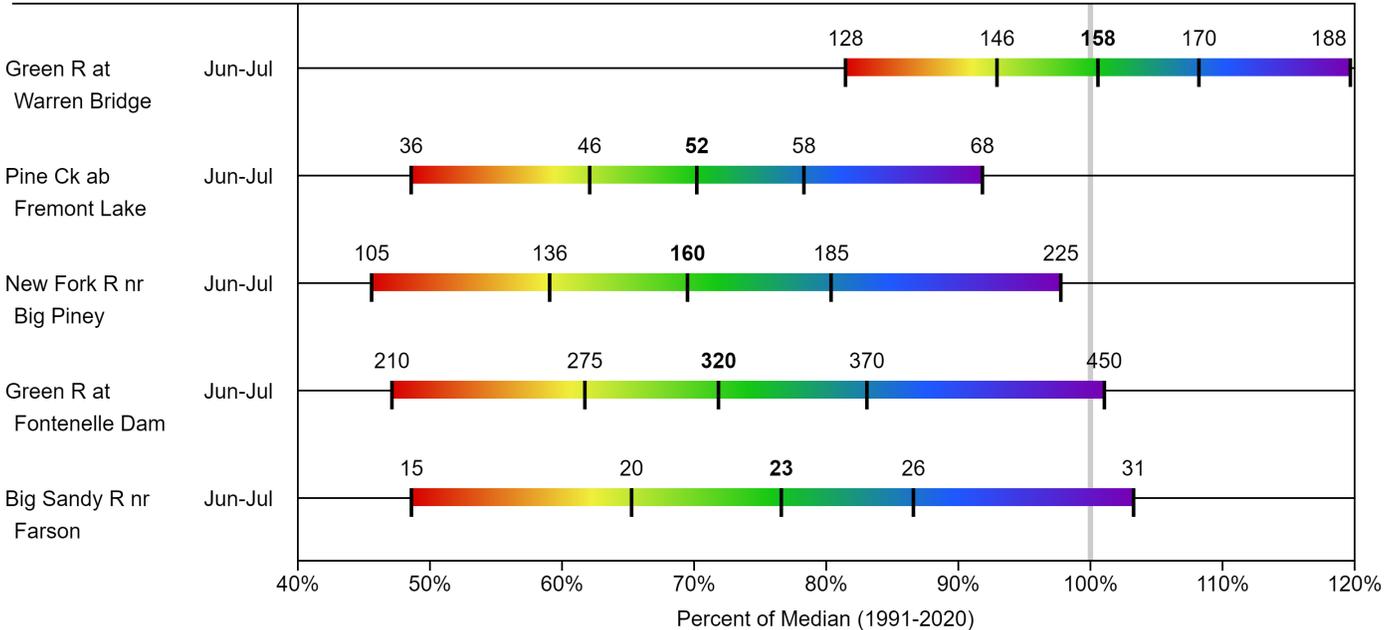
Streamflow

The 50% exceedance forecasts for the June through July period will be below normal. The yield on the Green River at Warren Bridge is about 101% of median. New Fork River near Big Piney yield will be around 70% of median. Green River at Fontenelle Dam is estimated to be about 72% of median. *See the following for a more detailed forecast.*

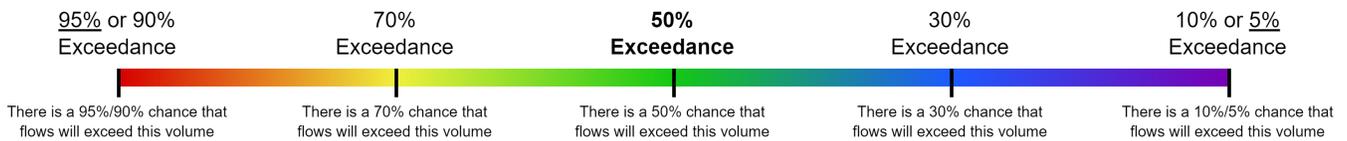
UPPER GREEN RIVER BASIN
Water Supply Forecasts
June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
 Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend

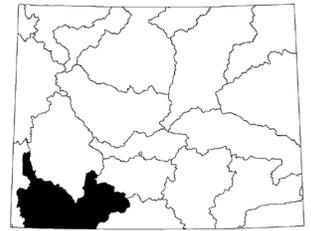


When selected, the following historic streamflow values and statistics will be shown.

<i>Period of Record Minimum Streamflow KAF (Year)</i>	<i>1991-2020 Normal Streamflow KAF</i>	<i>Observed Streamflow KAF</i>	<i>Period of Record Maximum Streamflow KAF (Year)</i>

Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

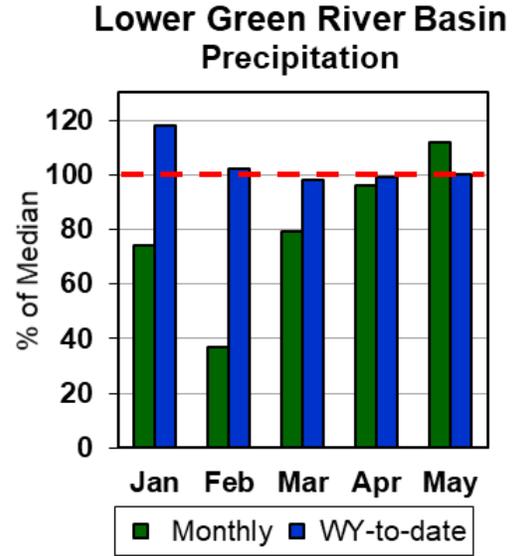
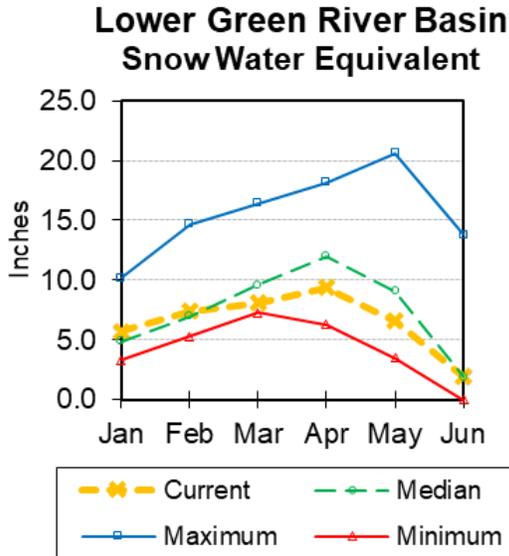
Lower Green River Basin



Snow

Lower Green River Basin SWE is at 99% of median. Hams Fork drainage SWE is 109% of median. Blacks Fork drainage SWE is 66% of median.

See Appendix at the end of this report for a detailed listing of snow course information.



Precipitation

Precipitation for the basin last month was 112% of median. The basin year-to-date precipitation is currently 100% of median.

Reservoirs

Combined storage for the 4 reservoirs in the basin was at 89% of median at the end of last month.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Stateline Reservoir	12.8	8.3	11.1	13.9	92%	59%	80%	115%	75%
Flaming Gorge Reservoir	2769.2	3148.8	3144.0	3749.0	74%	84%	84%	88%	100%
Viva Naughton Res	43.2	41.9	42.2	42.4	102%	99%	100%	102%	99%
Meeks Cabin Reservoir	28.4	16.6	27.0	29.9	95%	56%	90%	105%	62%
Basin Index	2853.6	3215.5	3224.3	3835.2	74%	84%	84%	89%	100%
# of reservoirs	4	4	4	4	4	4	4	4	4

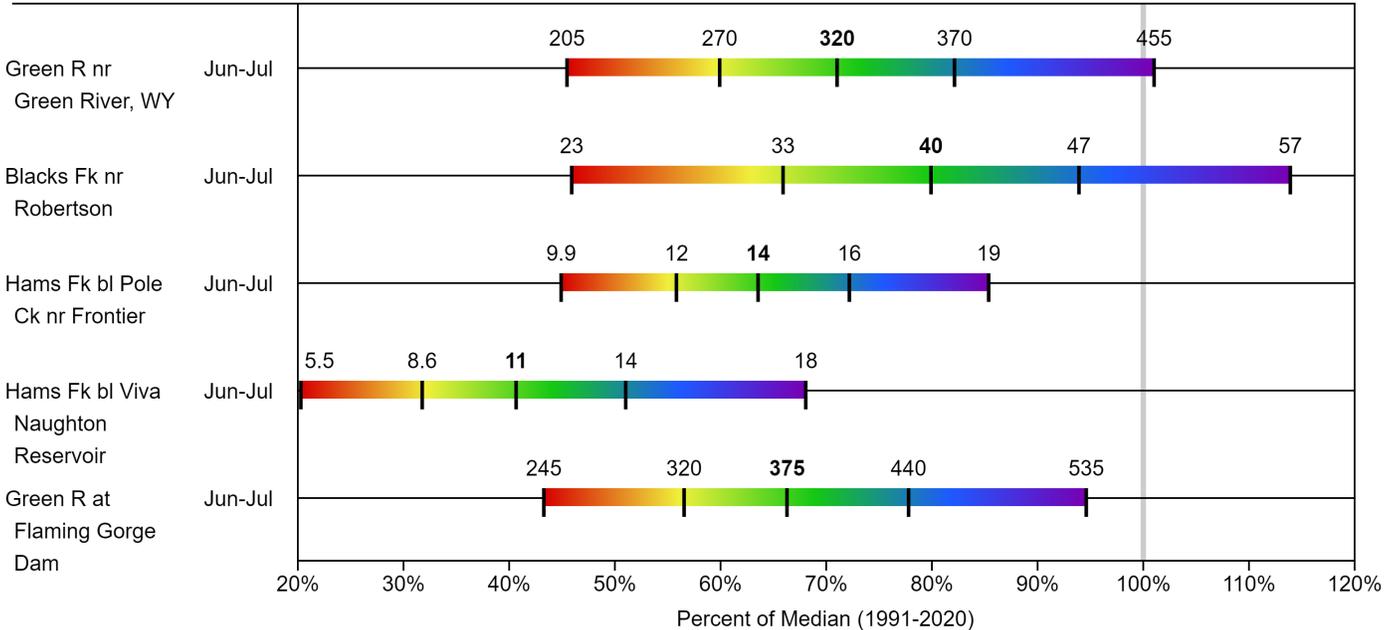
Streamflow

The following are the 50% exceedance forecasts for the June through July period. The Green River near Green River will yield about 71% of median. The Flaming Gorge Reservoir inflow will be about 66% of median. *See the following page for more detailed information on projected runoff.*

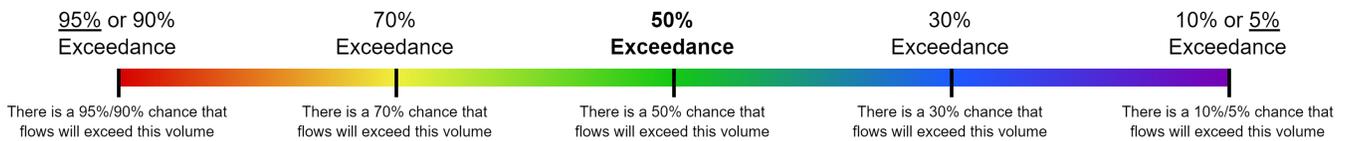
LOWER GREEN RIVER BASIN
Water Supply Forecasts
June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
 Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend

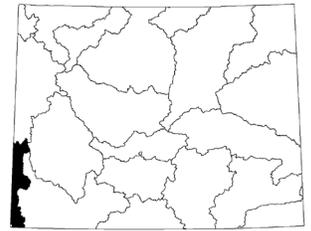


When selected, the following historic streamflow values and statistics will be shown.

<i>Period of Record Minimum Streamflow KAF (Year)</i>	<i>1991-2020 Normal Streamflow KAF</i>	<i>Observed Streamflow KAF</i>	<i>Period of Record Maximum Streamflow KAF (Year)</i>
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Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

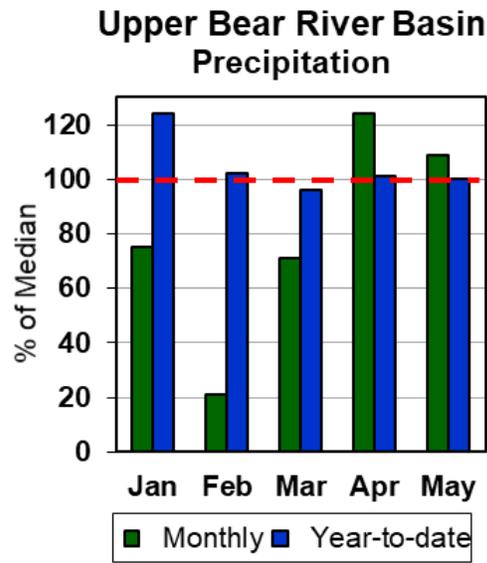
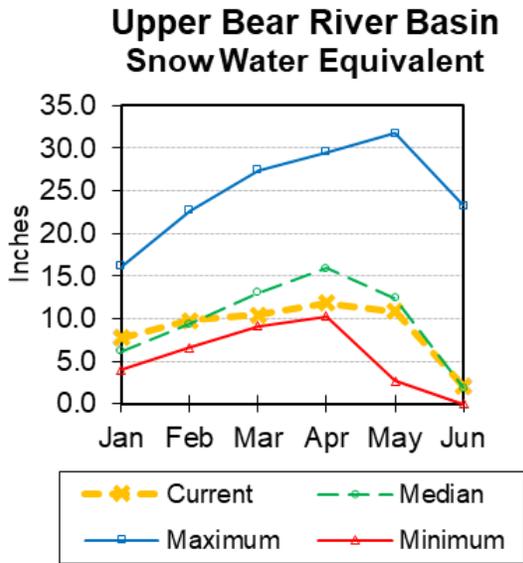
Upper Bear River Basin



Snow

SWE in the Upper Bear River Basin of Utah is 103% of median. SWE in the Wyoming portion of the Bear River drainage (Smiths and Thomas Forks) is 135% of median.

See Appendix at the end of this report for a detailed listing of snow course information.



Precipitation

Precipitation for last month was 109% of median in the basin. The year-to-date precipitation for the basin is 100% of median.

Reservoirs

Storage in Woodruff Narrows Reservoir was at 78% of median for the end of last month.

	Current (KAF)	Last Year (KAF)	Median (KAF)	Capacity (KAF)	Current % Capacity	Last Year % Capacity	Median % Capacity	Current % Median	Last Year % Median
Woodruff Narrows Reservoir	38.8	12.8	49.8	57.3	68%	22%	87%	78%	26%
Woodruff Creek	3.0	1.7	4.0	4.0	75%	42%	100%	75%	42%
Basin Index	41.8	14.5	53.8	61.3	68%	24%	88%	78%	27%
# of reservoirs	2	2	2	2	2	2	2	2	2

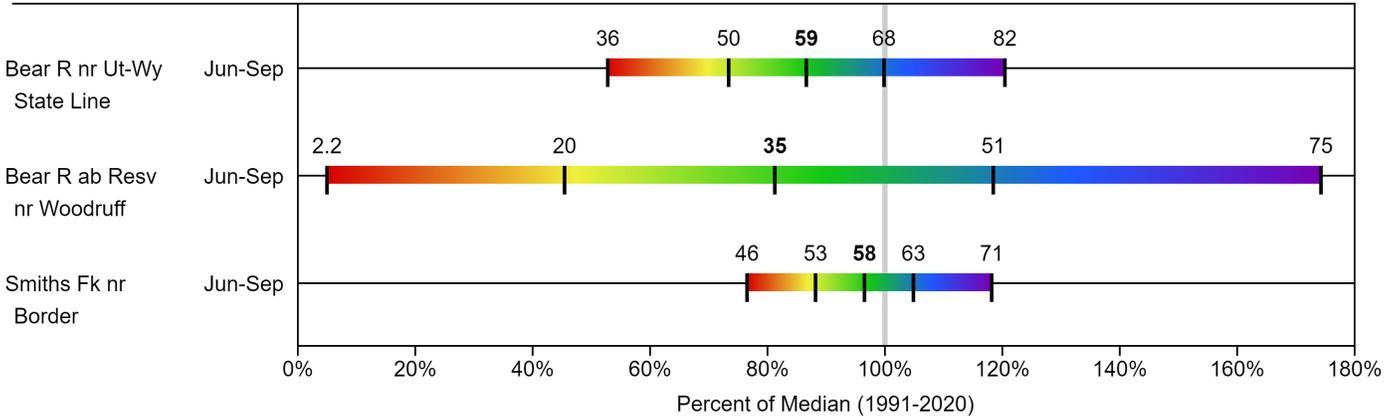
Streamflow

The 50% exceedance forecasts for the June through September period will be below median. The Bear River above Reservoir near Woodruff should yield around 81% of median. The Smiths Fork River near Border Jct. will yield around 97%. *See the following page for more detailed information on projected runoff.*

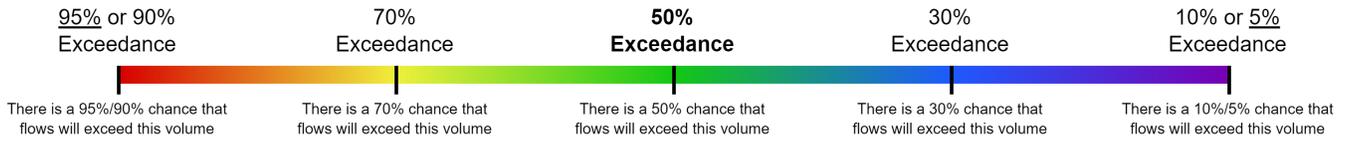
UPPER BEAR RIVER BASIN
Water Supply Forecasts
June 1, 2022

Forecast Exceedance Probabilities

<----- Drier ----- Future Conditions ----- Wetter ----->
 Labels on chart represent volumes of water expressed in thousand acre-feet.



Legend



When selected, the following historic streamflow values and statistics will be shown.

<i>Period of Record Minimum Streamflow KAF (Year)</i>	<i>1991-2020 Normal Streamflow KAF</i>	<i>Observed Streamflow KAF</i>	<i>Period of Record Maximum Streamflow KAF (Year)</i>
---	--	--------------------------------	---

Some forecasts may be for volumes that are regulated or influenced by diversions and water management.

Appendix

MEDIAN INFORMATION

Transitioning from 1981 – 2010 **Averages** to 1991 – 2020 **Medians**

Starting January 2022, the NRCS will use the 30-year **median** as the official normal for snowpack (SWE), precipitation, reservoir storage, and streamflow calculations. The National Water and Climate Center (NWCC) will continue to publish and distribute 30-year averages for alternate normal calculations.

The 30-yr reference period for median and normal calculations has also been recently updated from 1981-2010 to 1991-2020.

Please refer to this NWCC website or more information about the significant changes in data and forecast computations:

<https://www.nrcs.usda.gov/wps/portal/wcc/home/snowClimateMonitoring/30YearNormals/>

Topics include:

- **1991 – 2020 Median/Averages Overview**
- **Calculation Methods**
- **Differences Between 1991-2020 and Previous Normals**
- **Median vs. Average**
- **Retrieving 1991-2020 Normals**

For specific seasonal streamflow normal comparisons for NRCS forecasted stations, please refer to:

https://www.wcc.nrcs.usda.gov/ftpref/support/srvo_norms_comps/

LINKS (for more information/graphics)

National Water Climate Center (NWCC)

- Interactive maps featuring current conditions of snow, precipitation, reservoir storages:
<https://www.nrcs.usda.gov/wps/portal/wcc/home/quicklinks/predefinedMaps/>

Water Resources Data System and State Climate Office (WRDS)

- Clearinghouse of hydrological and climatological data for the State of Wyoming:
<http://www.wrds.uwyo.edu/>

USGS WaterWatch

- Tools and products to monitor streamflow, runoff, drought, and floods:
<https://waterwatch.usgs.gov/index.php>

Appendix - Snowpack Data

Appendix - Precipitation Data

Wyoming Basin Outlook Report

National Resources Conservation Service

Casper, Wyoming

Issued by:

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Released by:

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Acting State Conservationist
N R C S
Casper, Wyoming

The Following Agencies and Organizations Cooperate with the Natural Resources Conservation Service with Snow Surveys and/or with Data:

FEDERAL:

United States Department of the Interior (National Park Service)

United States Department of the Interior (Bureau of Reclamation)

United States Department of Agriculture (Forest Service)

United States Department of Commerce NOAA (National Weather Service)

STATE:

The Wyoming State Engineer's Office

The University of Wyoming

LOCAL:

The City of Cheyenne