



Big River Issues

**2009 Gunnison County
“State of the River”**

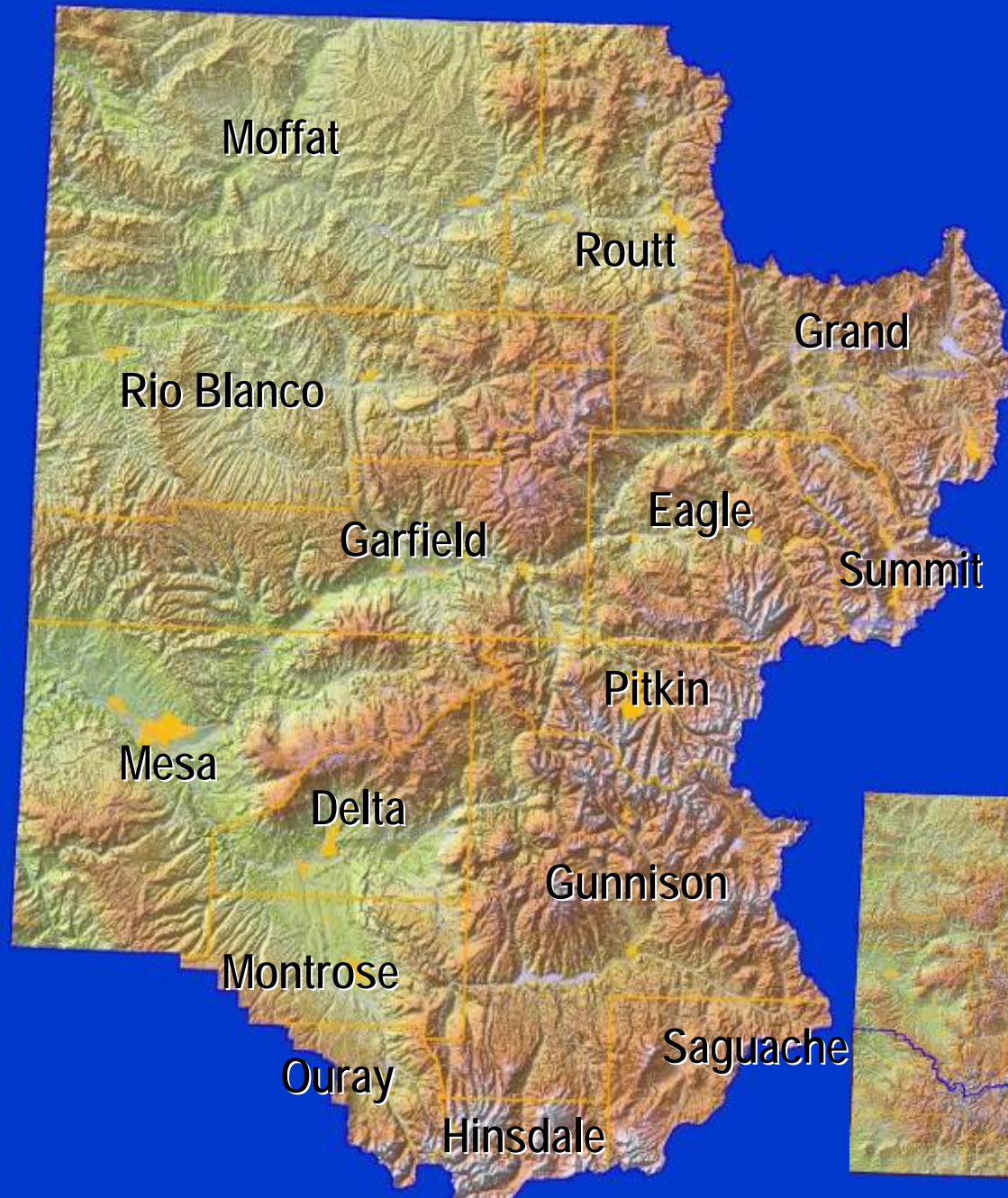
Montrose, CO – June 1, 2009

**Eric Kuhn
General Manager**

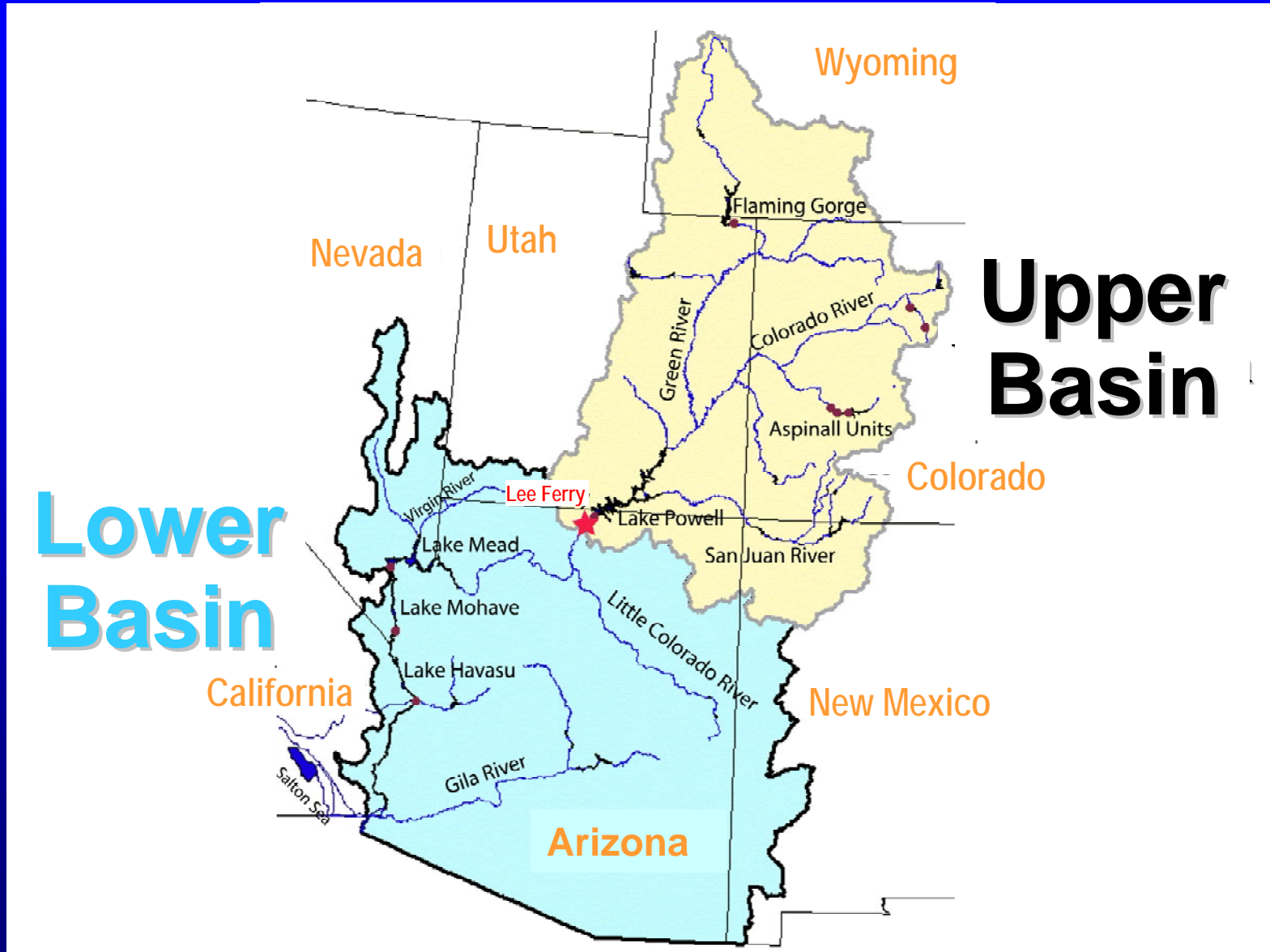


Colorado River District

Protecting Western Colorado Water Since 1937



Colorado River Basin



Big River Issues

- **Water Quality**
 - Salinity
 - Selenium
- **Climate change**
 - Dust storms
 - Decreased yield
- **Population increase**

Big River Issues (con't)

- **Multi-Species Conservation Plan**
 - Endangered Species
 - Recovery Implementation Programs
- **Invasive species**
 - Tamarisk
 - Mussels
- **Transbasin diversions**
 - Salt Lake City, Albuquerque, Front Range CO, SoCal, Green River in WY

Let the Challenges Begin...

(aka continue)

- Enough water to go around?
- Balancing human, environmental needs
- Look back at 2008
- Look forward to 2009

2008 Basin Operations

- The year that was
- *What was unique?*
 - Dry fall, wet winter, cool spring, (El Nino) above average snowpack, late runoff
- *What was common?*
 - Reservoirs filled, coordinated releases for peak enhancement; late season augmentation for baseflows, transbasin diversions, in basin uses

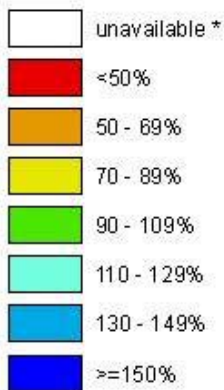
2009 Basin Operations

- The year that will be
- *What's unique?*
 - Dry fall, wet winter, warm spring (La Nina), 12 distinct “dust on snow” events, early runoff
- *What might be common?*
 - Average snowpack, reservoirs should fill, coordinated releases for peak enhancement; late season augmentation for baseflows, transbasin diversions, in basin uses

Snow Water Equivalent % of Normal

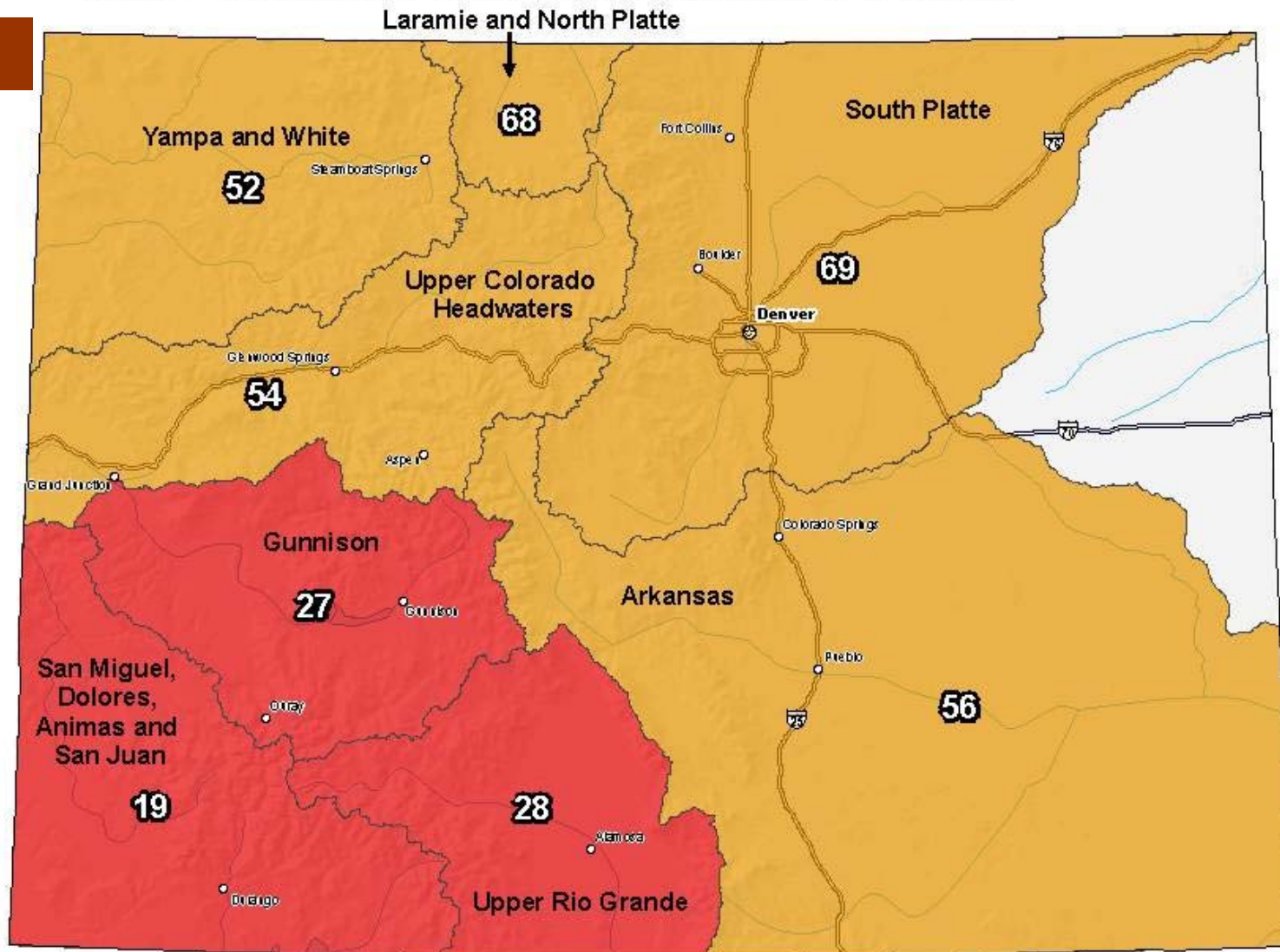
May 20, 2009

Current Snow Water Equivalent (SWE) Basin-wide Percent of 1971-2000 Normal



* Data unavailable at time of posting or measurement is not representative at this time of year

Provisional Data
Subject to Revision



The snow water equivalent percent of normal represents the current snowwater equivalent found at selected SNOTEL sites in or near the basin compared to the average value for those sites on this day. Data based on the first reading of the day (typically 00:00).

Prepared by the USDA/NRCS National Water and Climate Center
Portland, Oregon <http://www.wcc.nrcs.usda.gov/gis/>
Based on data from <http://www.wcc.nrcs.usda.gov/reports/>
Science contact: Tom.Pagano@por.usda.gov 503 414 3010

Lakes Powell / Mead Forecast

- Powell - how much will it **rise**?

net gain:

+12 feet

+1.3 million acre-feet

- Mead - how much will it **fall**?

net loss:

-14 feet

-1.2 million acre-feet

Issues Affecting Water Supply

- **Present Shock:**
 - Water quantity (TMDs, in basin uses)
 - Water quality (less dilution, more loading, increased temperature)
 - Stream health (encroachment)
- **Future Shock:**
 - Climate change (more ET, less flow?)
 - Dust on snow (faster runoff?)

Connections

- Colorado River *inter*state issues
- Colorado *intra*state issues
- Climate change
- Future energy economy
- Future recreation economy