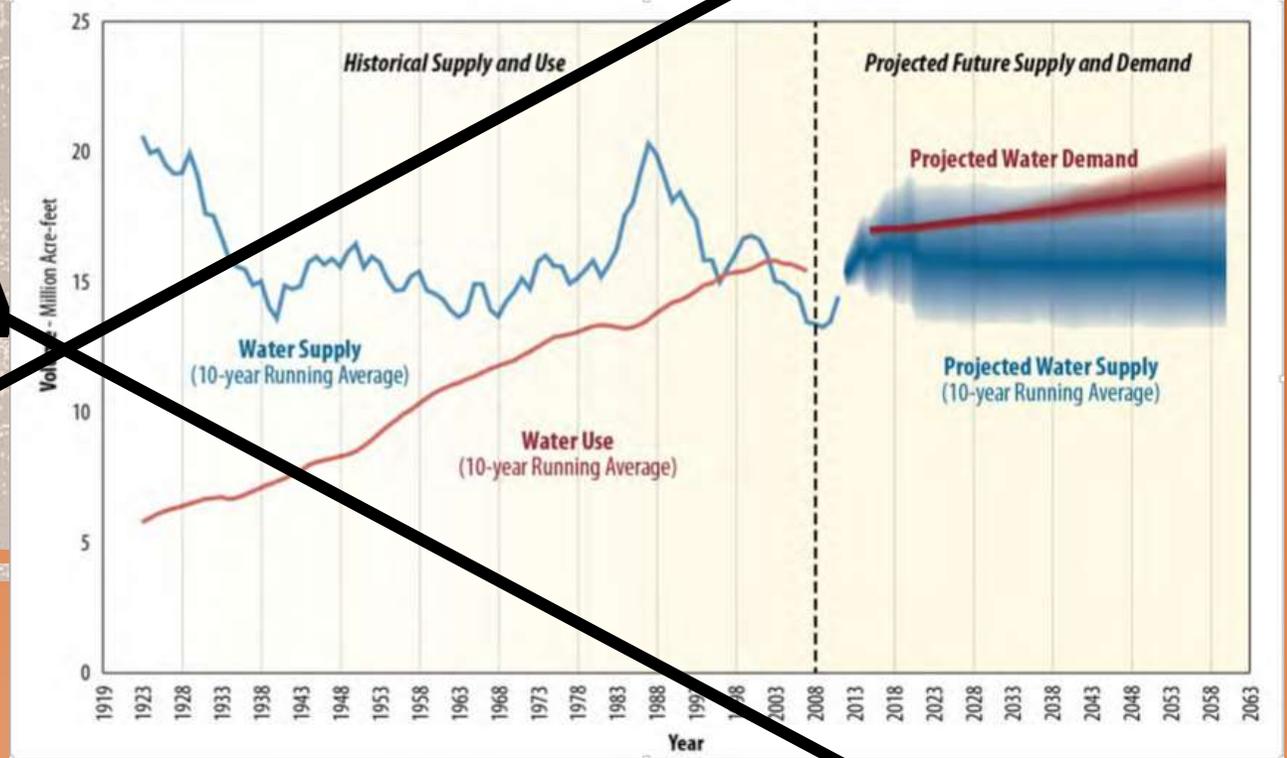


# Good News

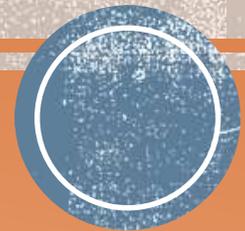
The Colorado River is Dead

Jonathan Bowler, MP  
University of Wyoming  
Living Rivers  
November 3, 2016



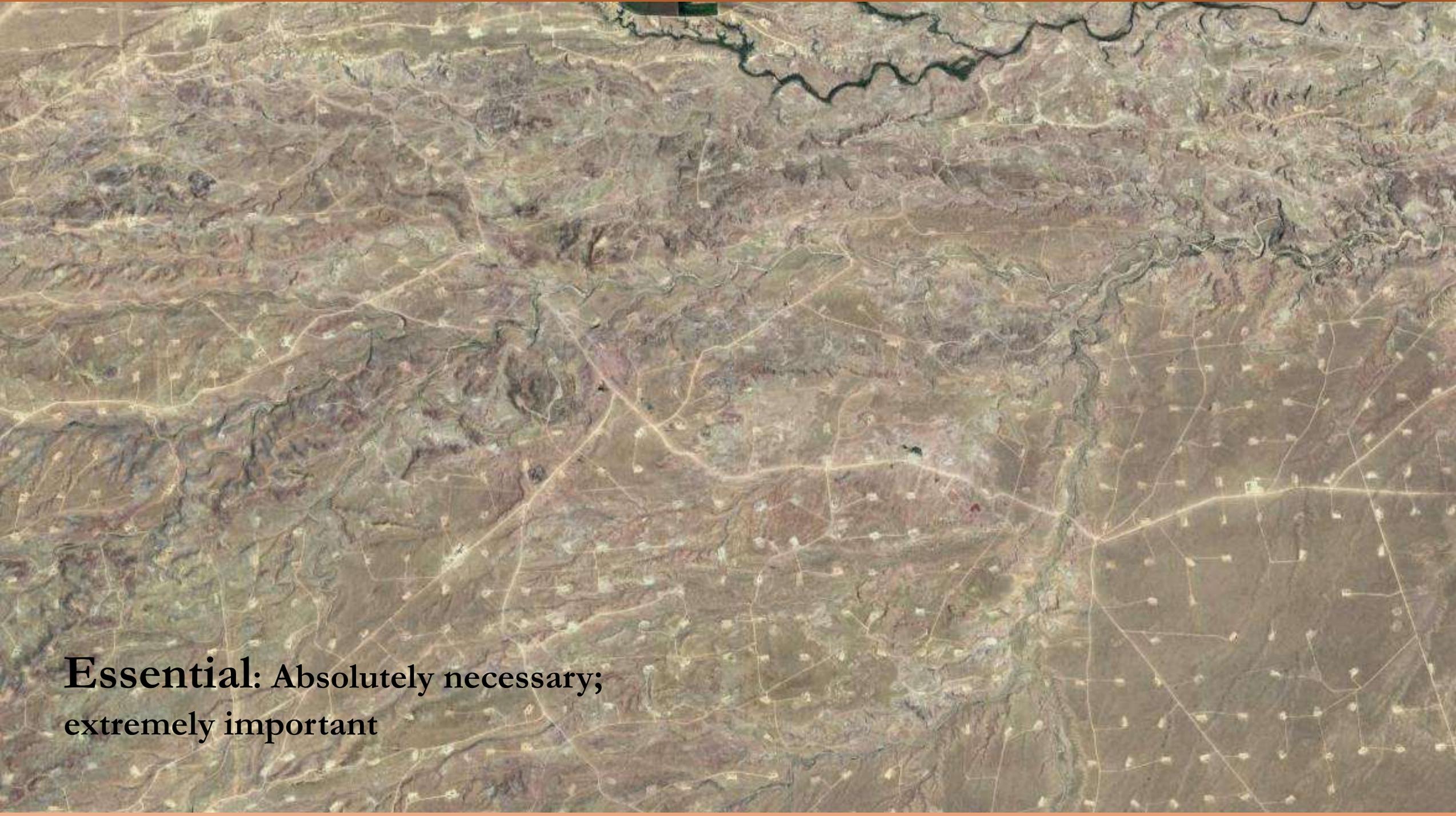
# Engaging Sacrificial Landscapes

Remembering a Forgotten Western River





**Superfluous:** Unnecessary,  
especially through being more than  
enough



**Essential:** Absolutely necessary;  
extremely important



**Sacrificial Zone:** Geographic area that has been permanently impaired by environmental damage

An aerial photograph of a river winding through a landscape at sunset. The river is illuminated by the low sun, creating a bright, shimmering path. The surrounding land is a mix of brown and green, with some rectangular solar panels visible in the upper left. The overall scene is serene and captures the beauty of a natural landscape.

**Sacrificial Landscape:** Geographic areas in which environmental values are perceived to be superfluous and subordinate to socially determined essential uses

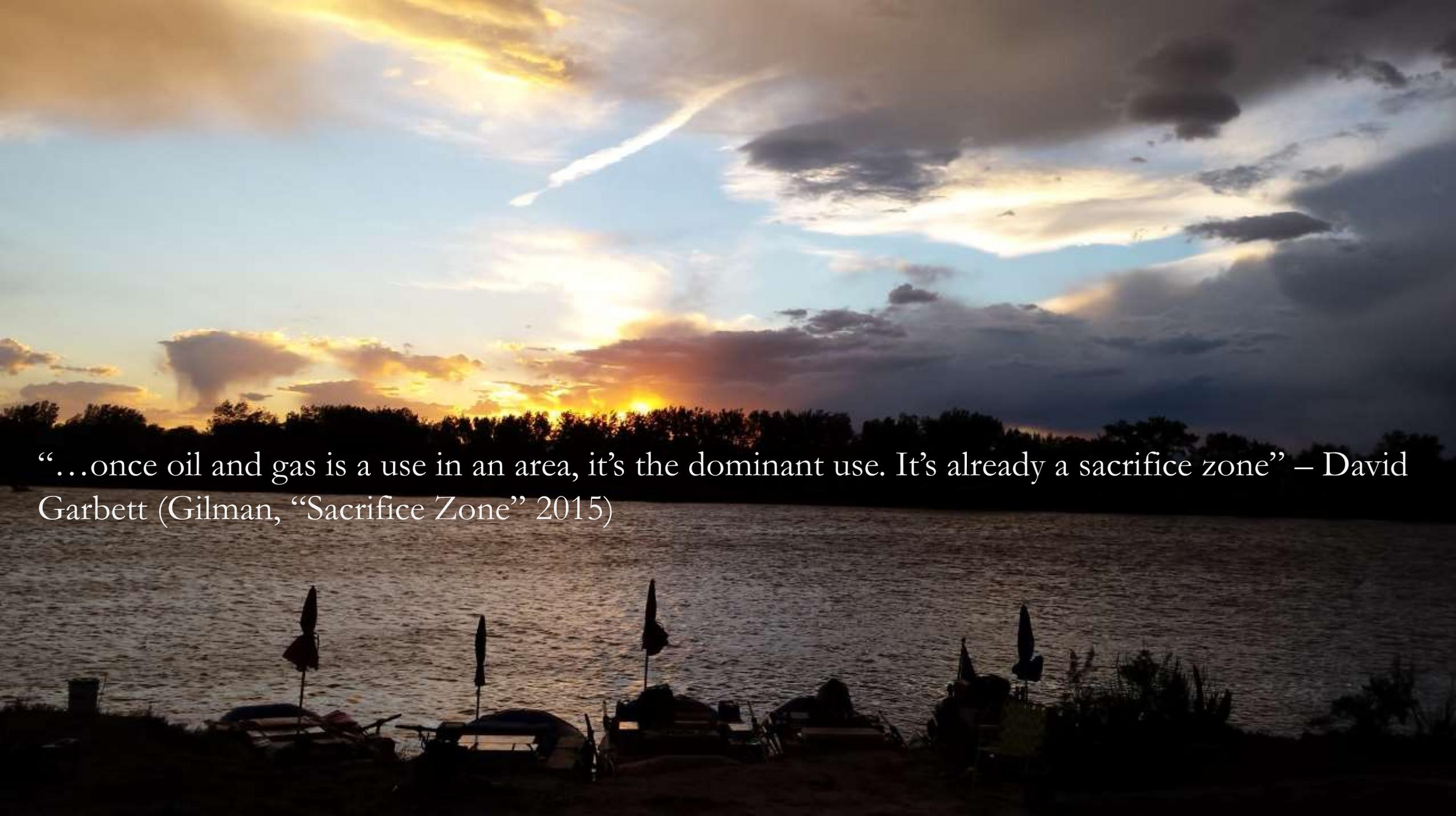
# Socio-Ecological Perceptions

“Perception is both the response of the senses to external stimuli and purposeful activity in which certain phenomena are clearly registered while others recede in the shade or are blocked out” – Tuan 1972, *Topophilia*

Judge puts brakes on Uinta Basin gas project, says BLM didn't think about impact on air quality -October 5 2016, Deseret News

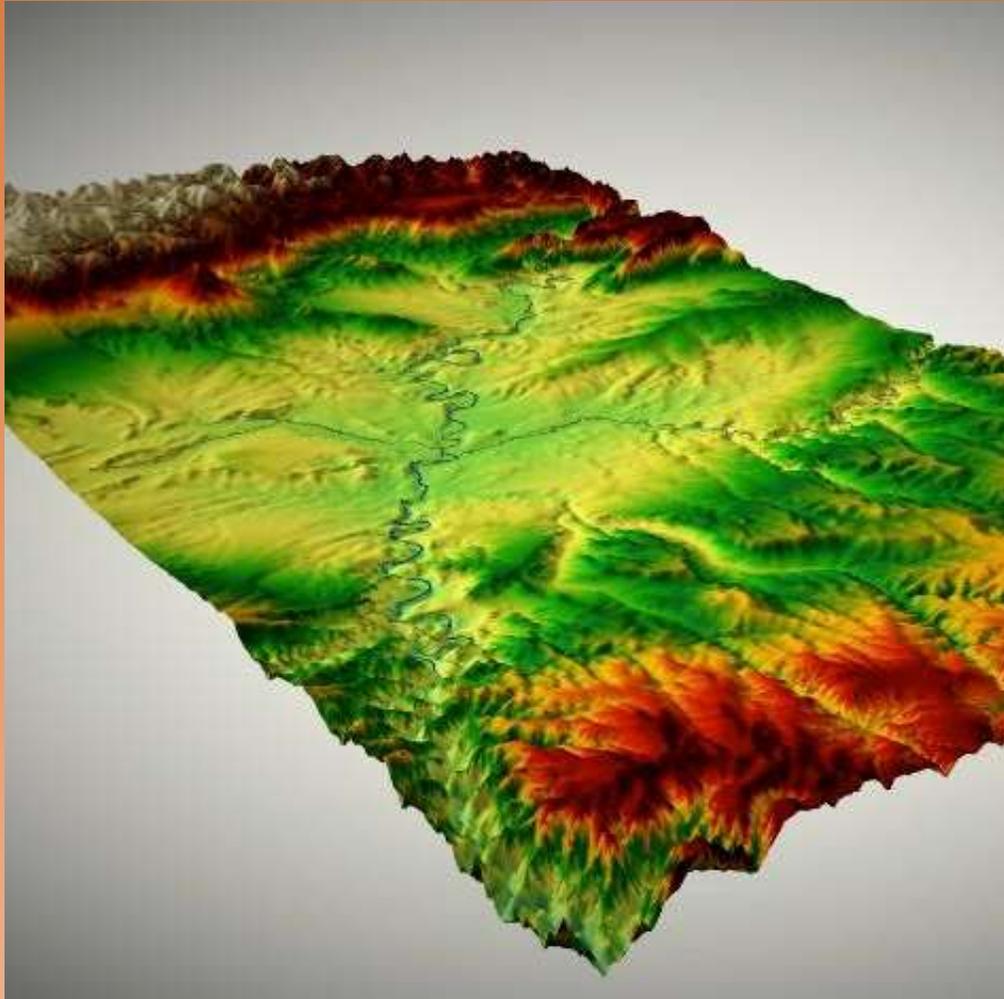
Judge overrules feds' refusal to list as endangered Utah wildflowers that grow on oil shale - October 27 2016, Salt Lake Tribune



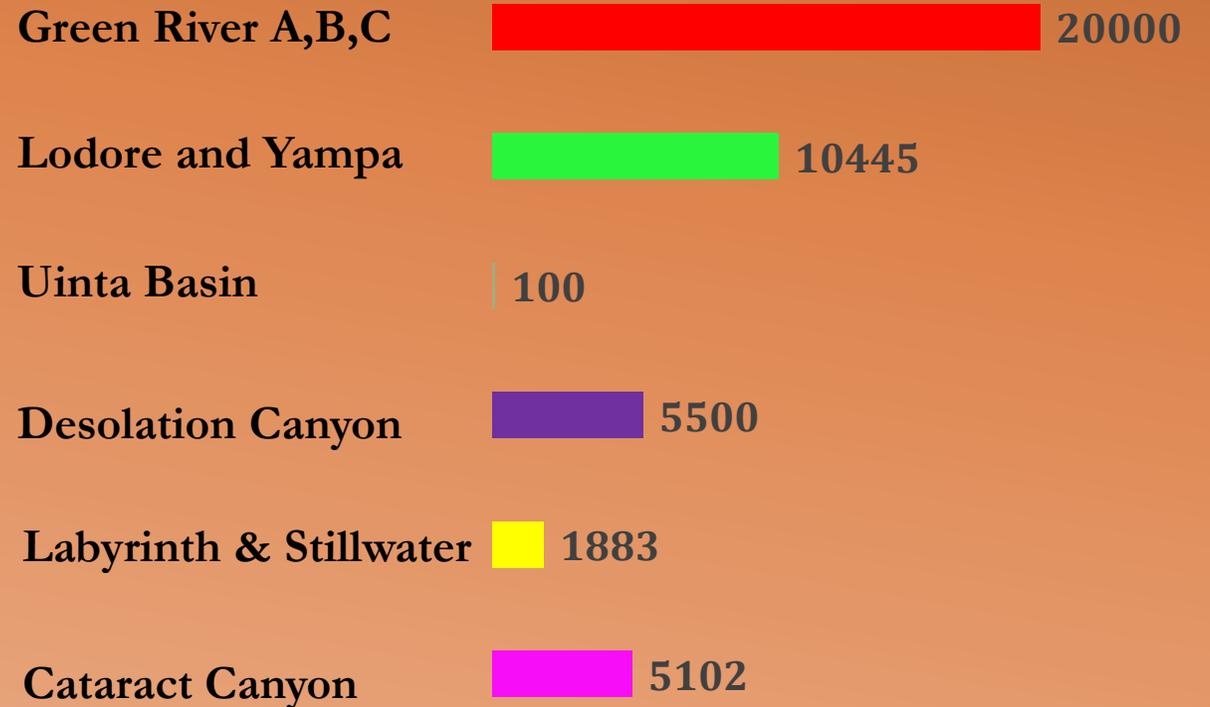


“...once oil and gas is a use in an area, it’s the dominant use. It’s already a sacrifice zone” – David Garbett (Gilman, “Sacrifice Zone” 2015)

# The Forgotten River



## Green River Annual Visitors



# Patriotism and Environmental Values

## Local Patriotism

- Local patriotism rests on the intimate experience of place, and on a sense of the fragility of goodness: that which we love has no guarantee to endure

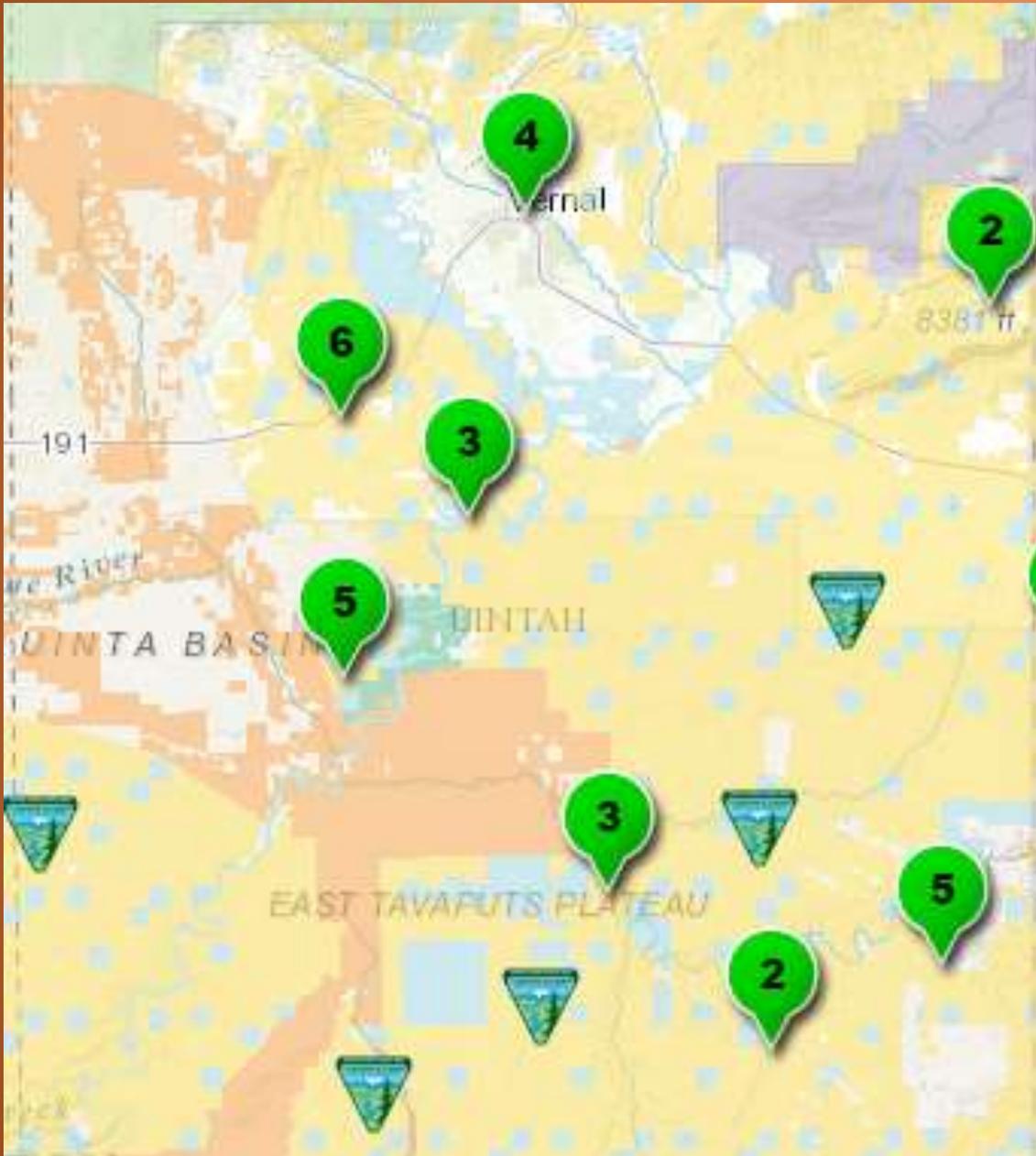
## Imperial Patriotism

- Imperial Patriotism feeds on collective egotism and pride. Such sentiment is extolled most vigorously at times of surging imperial ambition... The sentiment does not attach itself to anything concretely geographical.

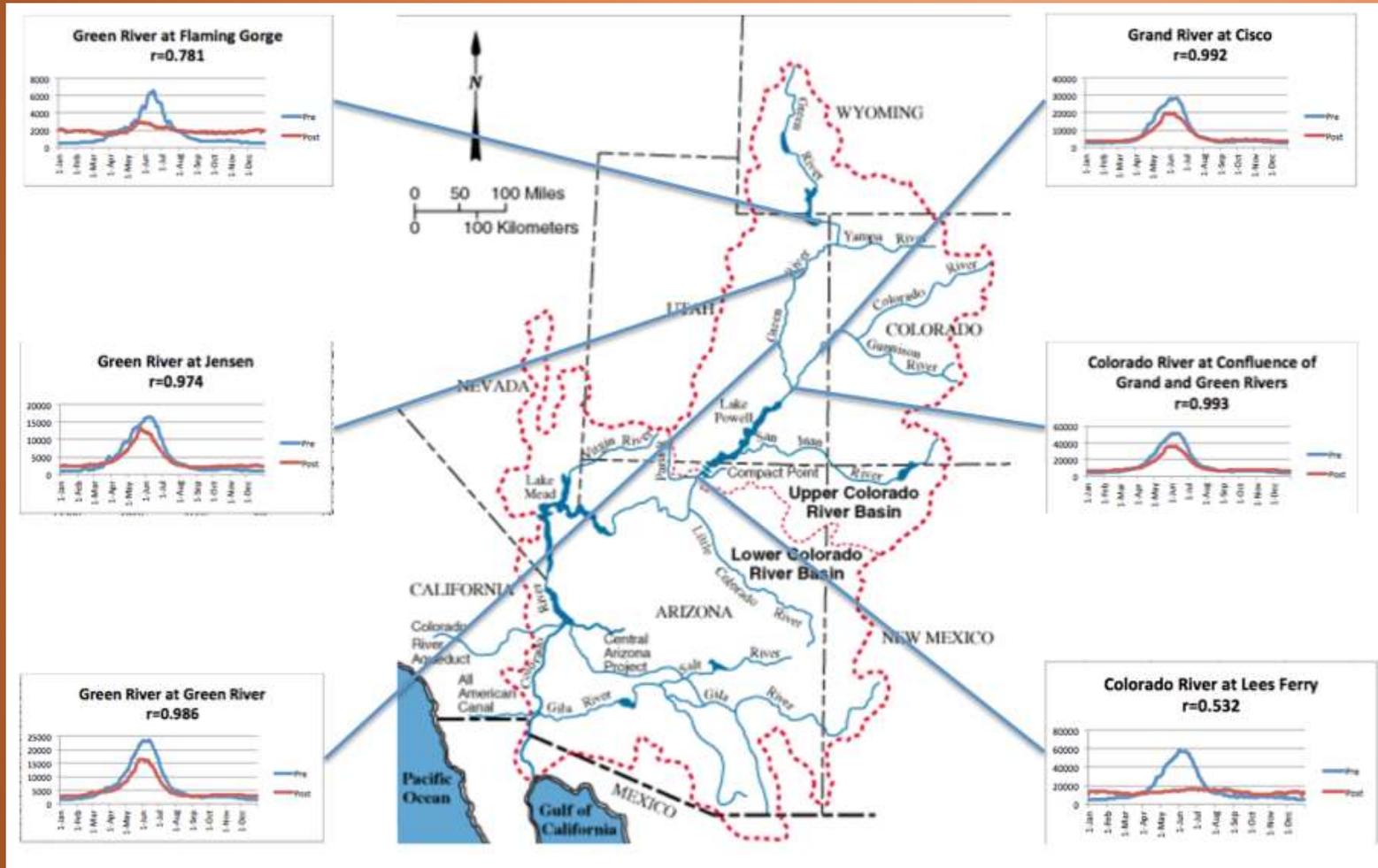


# Imperial Patriotism

- > 3000 current wells
- BLM ROD
  - 5750 new oil/gas wells
  - 10,000 acres disturbance
    - 4978 acres eventual reclamation
  - 1245 new drill pads
  - 226 miles new roads and pipeline
  - Comprehensive air mitigation strategy
    - - NGI's Shale Daily, October 3 2016



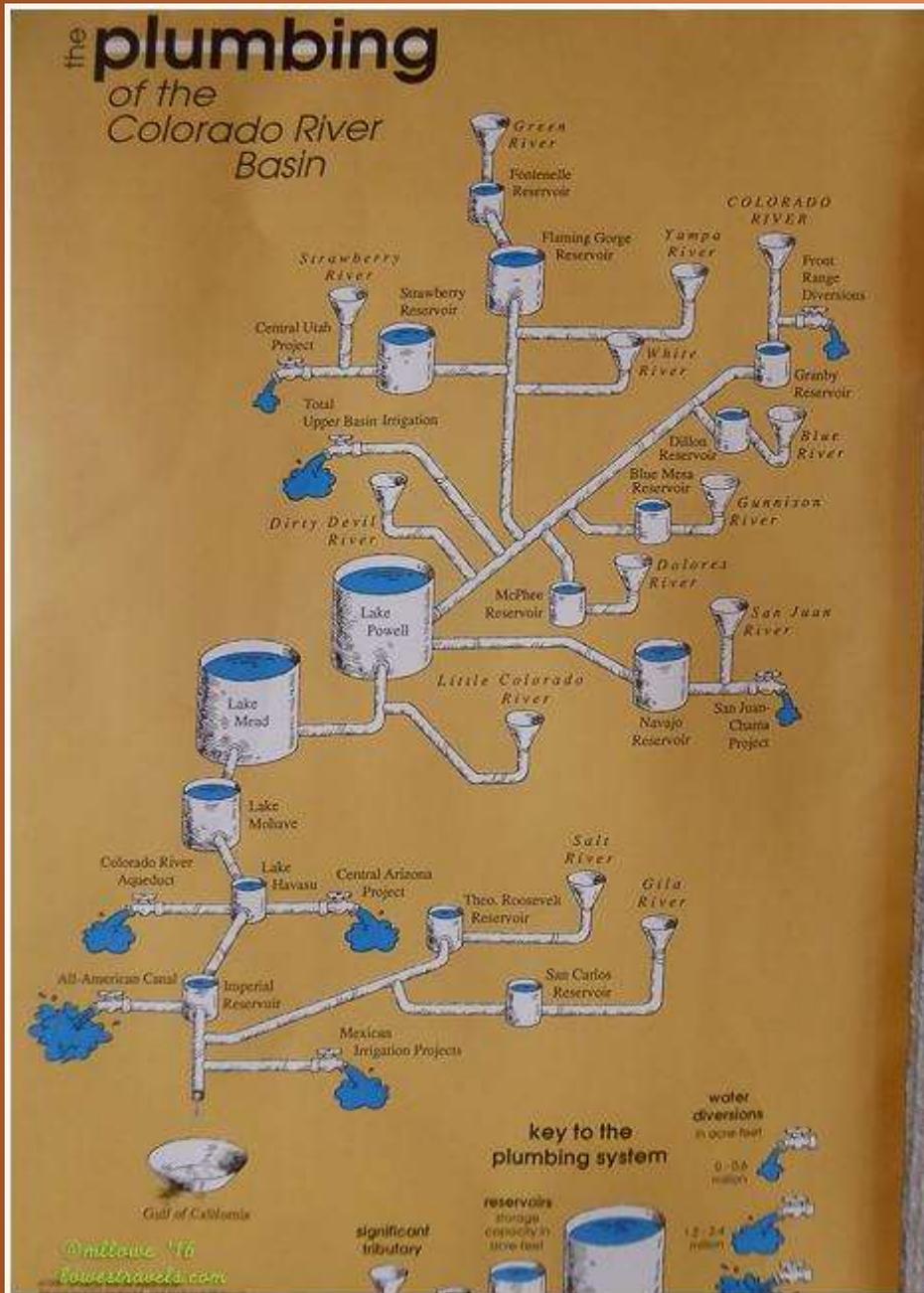
# Local Patriotism



- 27 miles suitable Lower Green River Wild and Scenic River Corridor
- Lower Green River Corridor ACEC
- Nine Mile ACEC
- Pariette Wetlands ACEC
- Designated Habitat Endemic Fish
- 103 miles river recreation opportunities
- High correlation with natural flow regimes



# Living with Drought



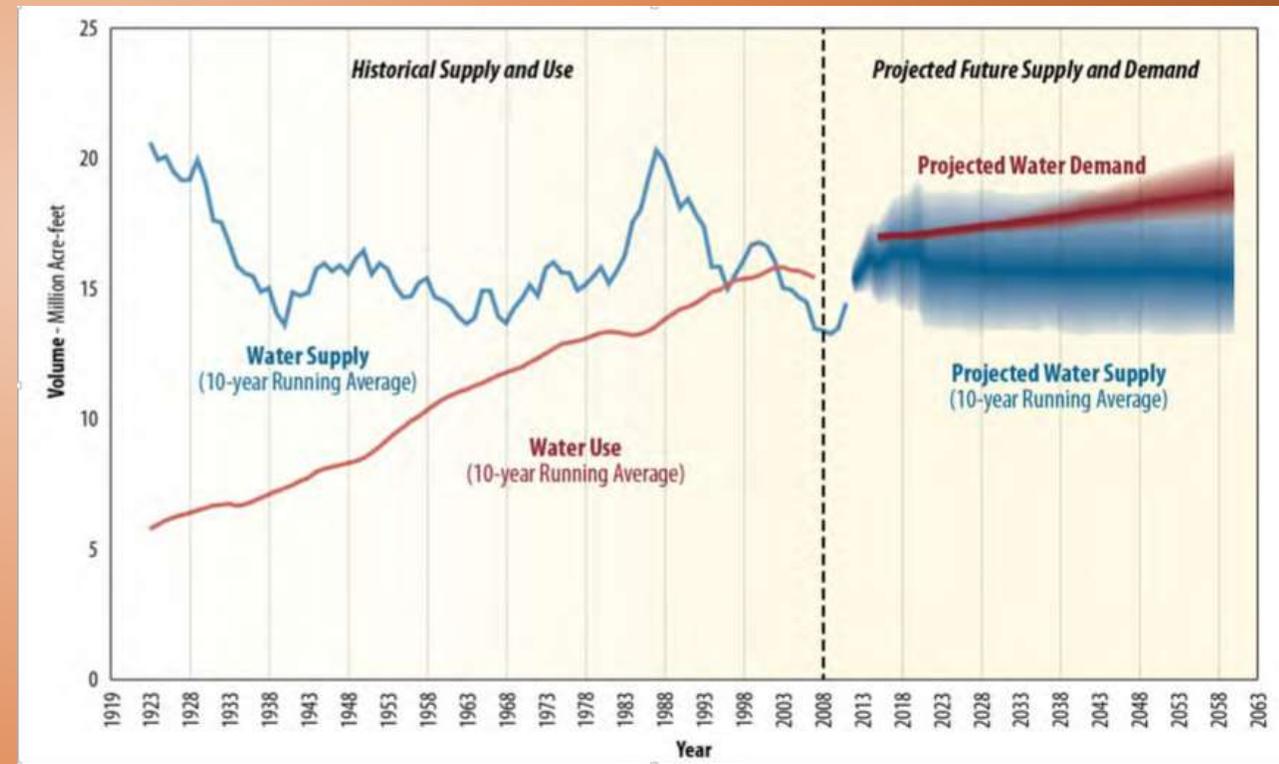
- Total allocation - 17.5 MAF
  - Average consumption - 14 MAF
    - Lower Basin - 8.5 MAF
    - Upper Basin - 4 MAF
    - Mexico - 1.5 MAF
  - Average loss (Evaporation)
    - 1 MAF
  - Total Average Consumption / Loss - 15 MAF
  - Total Average Flows - 13 MAF
- 2 MAF / year deficit



# Into the Great Unknown

## The next 150 years in the Arid Lands

- Drought is a socially constructed crisis
  - Requires socially constructed solutions
- Take a lesson from Powell
  - Embrace the unknown
  - Streamline
- Don't be a Howland or Dunn
  - Stay at the table
  - Share the burden, share the water
- Don't waste a good crisis
  - Innovative solutions
  - Share the burden
  - Account for the 13 MAF (It's a reality)
- Reconnect the river to the resource
  - Shift in ecological perception
- Foster local patriotism
  - Education
  - Citizen science
  - Accessible data
  - Understandable objectives
- Change the story



Source: USBR



An aerial photograph of a vast, rugged landscape. A dark blue river winds through a series of rolling, eroded hills and valleys. The terrain is characterized by deep shadows and bright highlights, suggesting a dry, mountainous region. The colors range from dark browns and blues to lighter tan and yellowish-browns. The overall scene is one of natural beauty and wilderness.

I hope that the United States of America is  
no so rich that she can afford to let these  
wildernesses pass by- or so poor that she  
cannot afford to keep them – Mardy Murie,  
1977