

The Endangered Species Act and New Mexico River Management

The Interstate Stream Commission's Role



Presented to the
Water and Natural Resources Interim Committee
Ruidoso, New Mexico
October 15, 2015

ESA and New Mexico's Rivers

- ESA affects many western rivers
 - New Mexico's are no exception
- All federal agencies required to address ESA
 - Any discretionary action funded, authorized, or carried out
 - Saying "No" is not an option
- Reclamation and the USACE perform critical flood control, water storage and delivery, and river and reservoir maintenance
 - ESA compliance can significantly affect water operations
 - may negatively affect NM water users



Pecos River at Salt Creek 8/8/2012. USFWS Photo

ISC Involvement in ESA Issues

- Starting in mid-1990s
- Provide NM representation in ESA decision making
 - Protect interstate compact deliveries
 - Advocate for NM water users
 - Perform independent assessments
 - Identify and implement cost-effective solutions



Pecos bluntnose shiner
Notropis simus pecosensis

The Strategic Water Reserve

- 2003 Think New Mexico Initiative:
 - “a pool of publicly held water rights dedicated to keeping New Mexico's rivers flowing to meet the needs of river-dependent endangered species and fulfill our water delivery obligations to other states”
- Passed NM Legislature in 2005 Session
 - HB 195 – Stell
 - SB 123 – Cisneros



Vaughan Conservation Pipeline outfall to Pecos River

The Strategic Water Reserve



- § 72-14-3.3 NMSA 1978

ISC manages all SWR water rights

- Anyone wishing to place rights in SWR must jointly apply with ISC
- Has proved to be an effective water management tool
 - Rio Grande and Pecos largest SWR application
- ISC actively expanding its SWR portfolio
 - Both Rio Grande and Pecos

ISC's Engagement Strategy



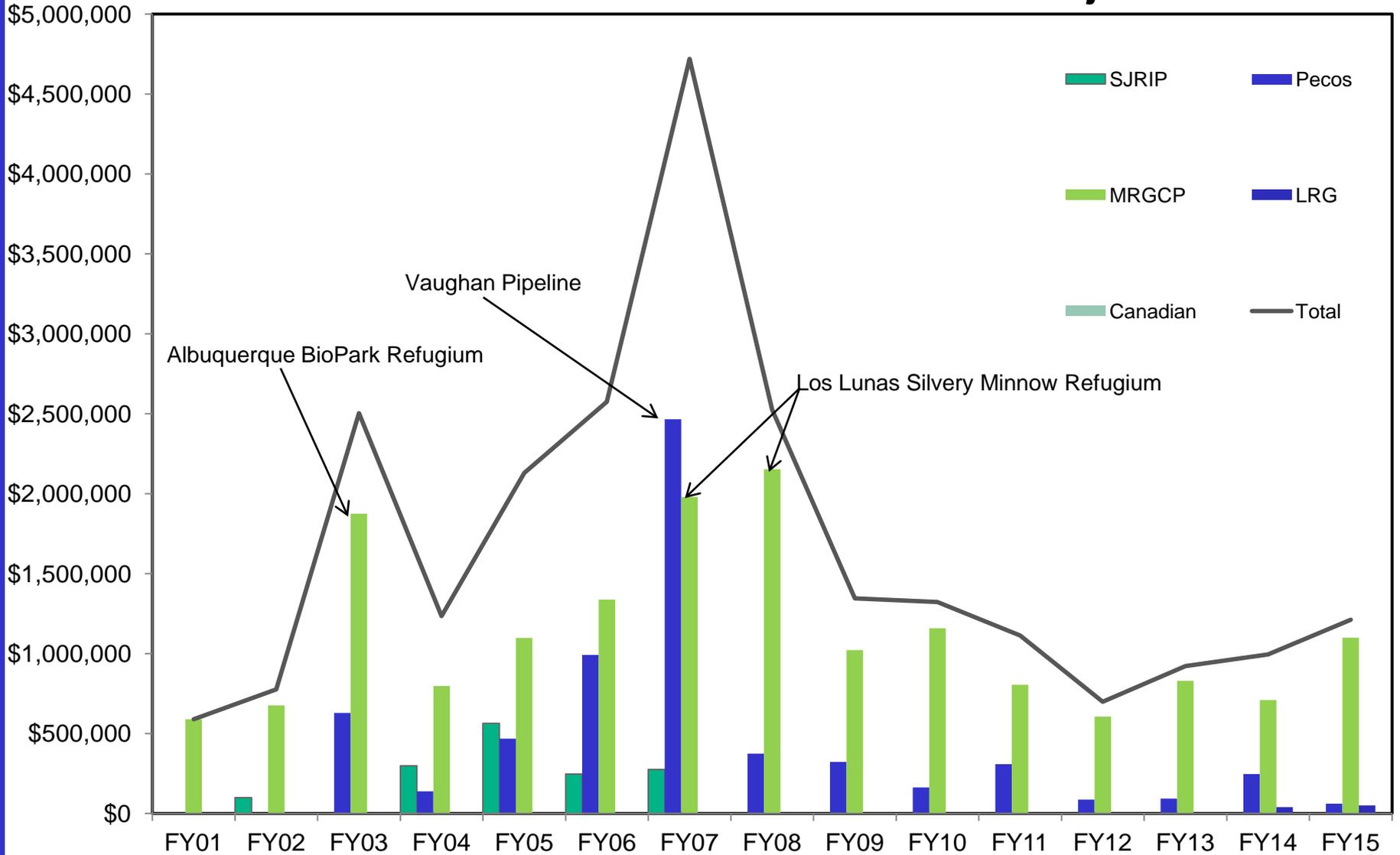
- Proactively address endangered species-related water issues to:
 - Maintain interstate compact compliance
 - Protect NM economy
 - M&I
 - irrigated agriculture
 - Improve species' status
 - Recovery is ultimate goal
- Leverage federal programs to achieve goals
 - State funds used in the San Juan and Middle Rio Grande are applied as cost share to federal programs
 - In the Middle Rio Grande, the state's contribution supports a 75% federal match.

ISC's ESA Water Operations Involvement

- 5 River Basins
 - San Juan (thru the San Juan Recovery Implementation Program)
 - Pecos
 - Middle Rio Grande
 - Canadian
- Expense to State Since 2001: Approximately \$24.5 M
 - Has ranged between \$0.5 M and \$4.5 M per year.
 - Over last 7 years has been roughly \$1 M per year



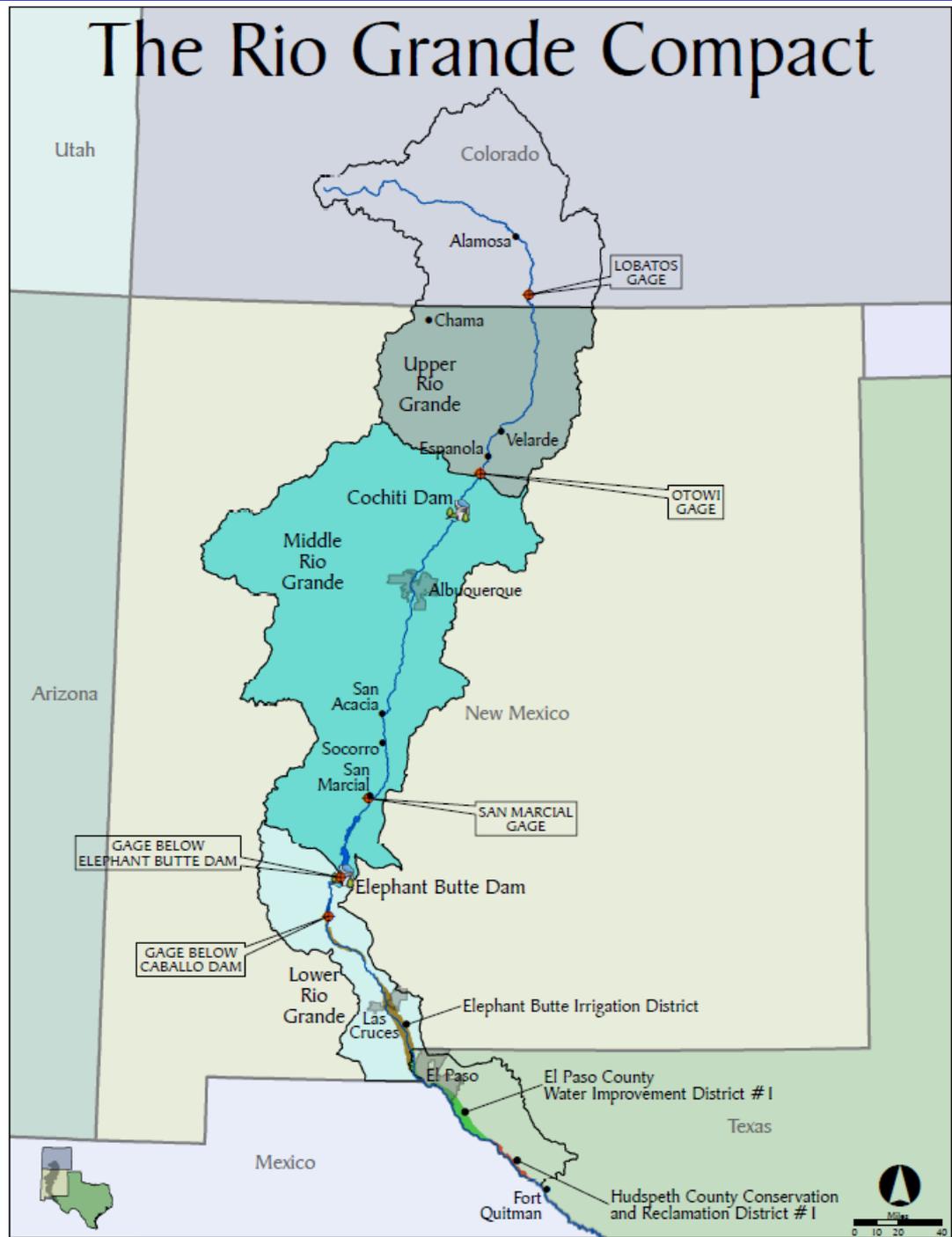
ISC Net* Contributions Towards ESA Projects



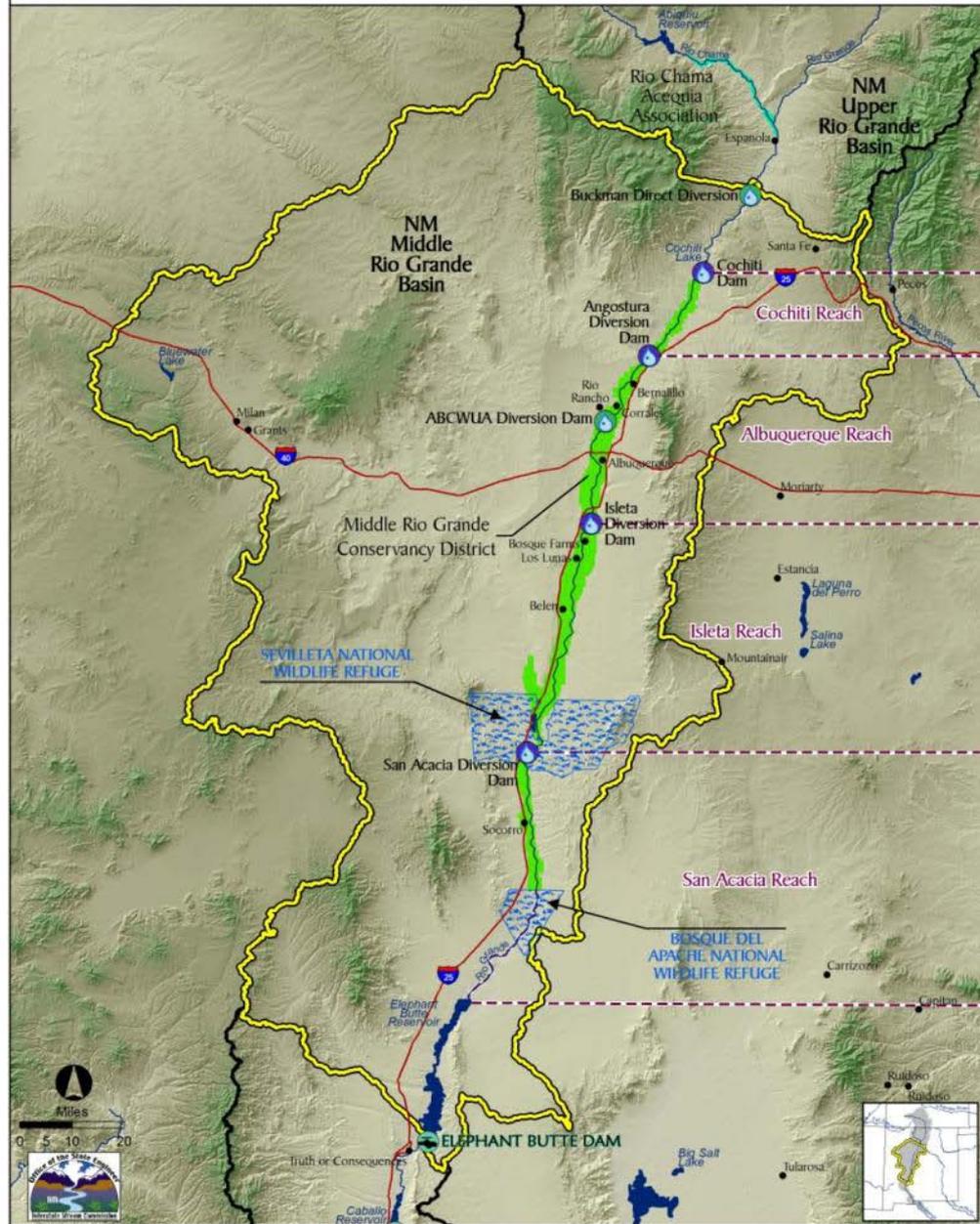
*Excludes federal funds

Rio Grande

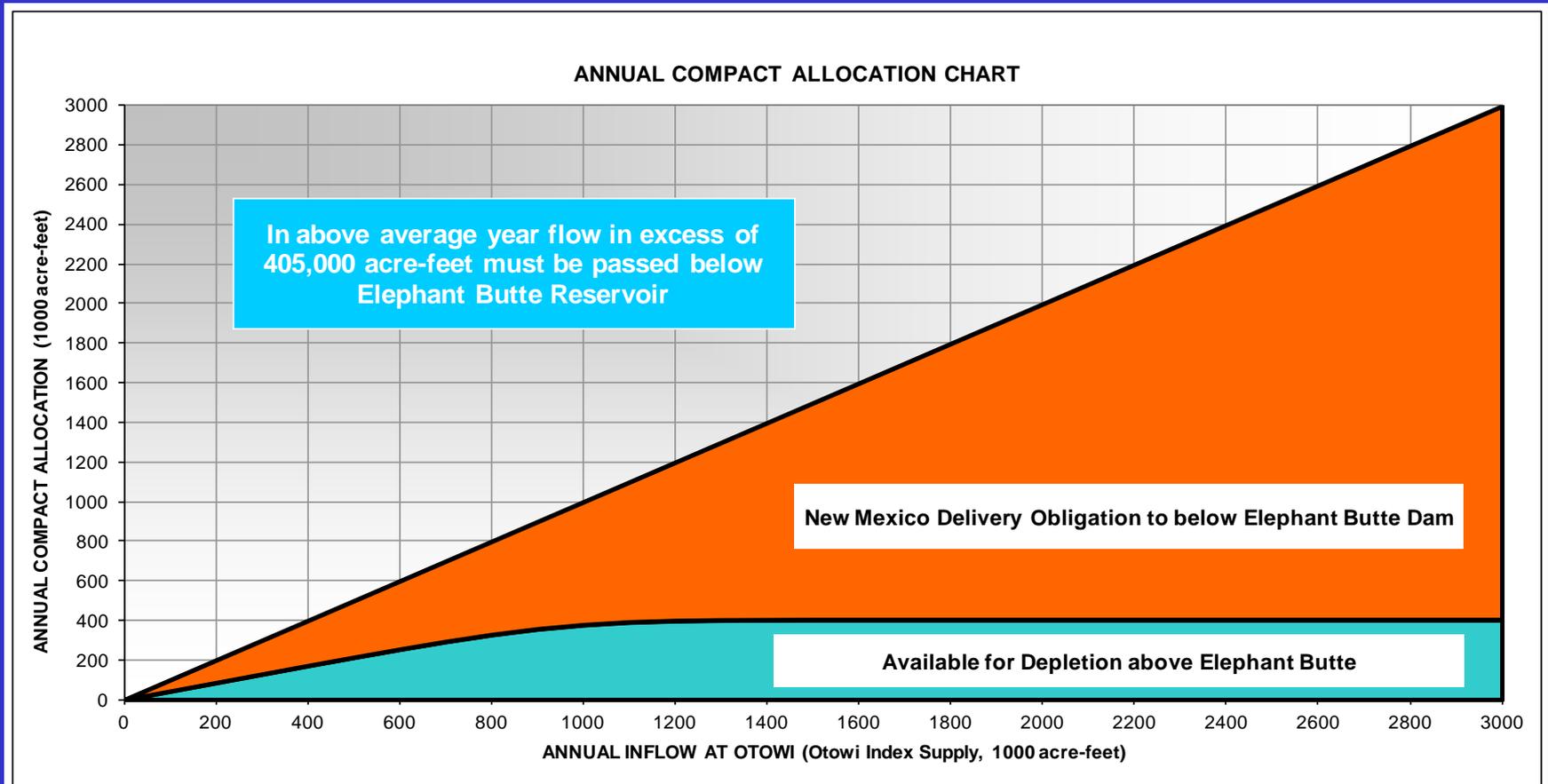
The Rio Grande Compact



New Mexico's Middle Rio Grande Basin



Rio Grande Compact Allocation

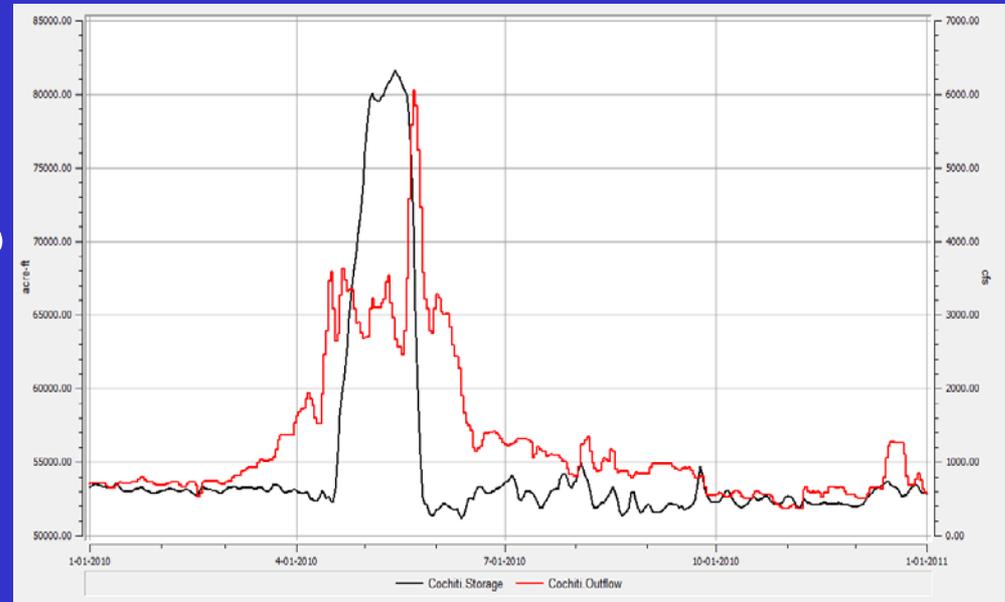


ISC MRG ESA Actions

In Support of Permit (Biological Opinion) Requirements

- Provide and Sell Rio Grande Relinquishment Credit
- Flexibly operate reservoir system under significant constraints
- Conduct River and Reservoir Water Operations Calls
- Conduct pilot projects for fish passage at diversion dams
- Use Water Rights from the New Mexico Strategic Water Reserve

Storage



Release



- Create species habitat
- Raise and study Rio Grande silvery minnow at hatcheries
- Promote the Recovery Implementation Program and Minnow Action Team
- Incorporate Adaptive Management to better meet species' needs



MRG Grande Strategic Water Reserve



ISC leases approximately 1,000 acre-feet of pre-1907 consumptive use water rights in the Middle Valley

Water is used to:

- Offset depletions from habitat restoration projects
- Operate Los Lunas silvery minnow refugium
- Support modified reservoir operations

Additional acquisitions being pursued to support new Middle Rio Grande Water Operations and River Maintenance Biological Opinion



Current MRG Status

- 2003 Biological Opinion ESA Coverage Remains in Effect
- 5th year of less than average snowmelt runoff
 - Many of the projects constructed do not function optimally under such conditions
 - Rely on hatcheries and collaborative water operations to get through the drought
- Initial ruling by Judge Brack in new Silvery Minnow Lawsuit
 - The requirements of the 2003 Biological Opinion remain valid while the new endangered species consultation continues
 - The USACE Motion to Dismiss the case was not granted.
- Consult on the New Biological Opinion
- Develop and Implement Recovery Program

Pecos

Pecos ESA Activities

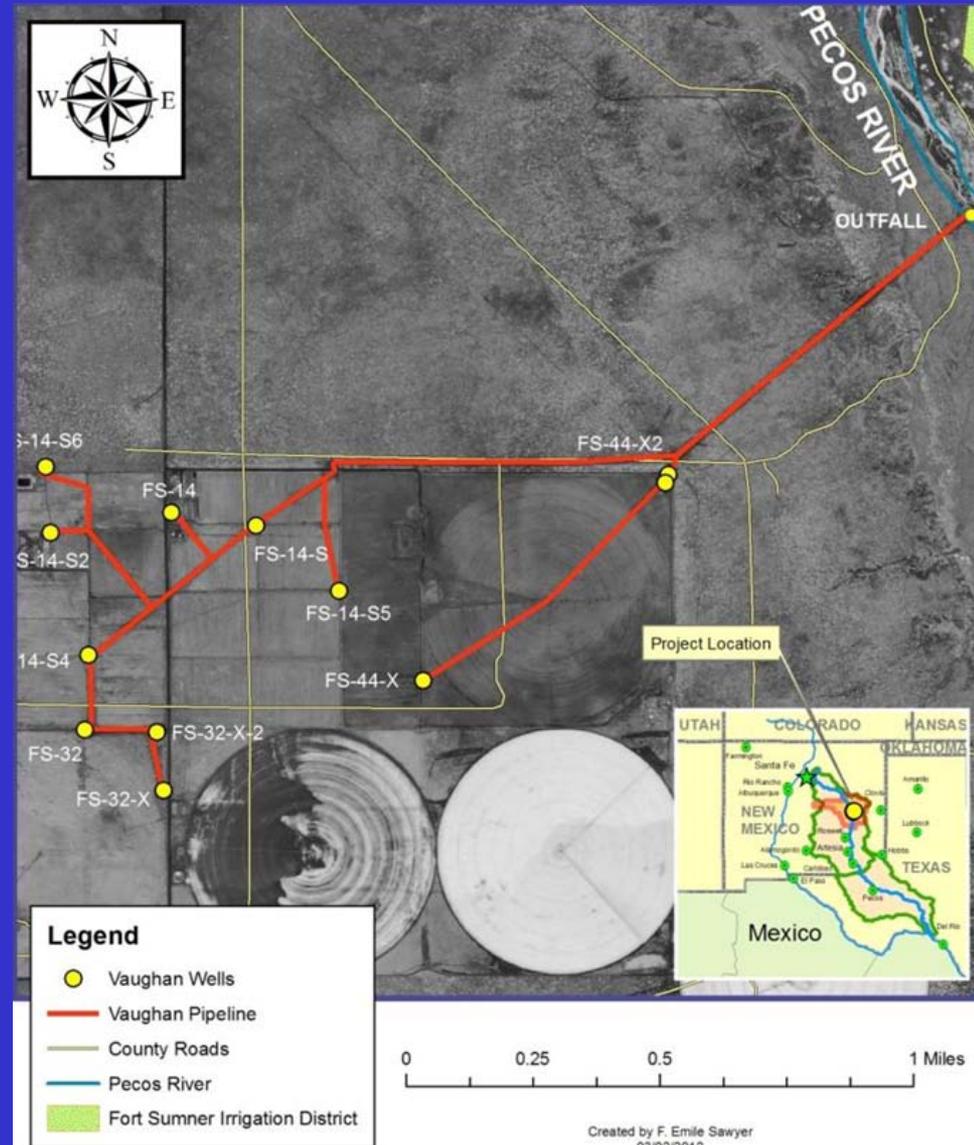
- Pecos bluntnose shiner
 - Pelagic minnow
- Carlsbad Project (CID) water operations detrimental to shiner
 - Federal project
- FWS issues BO with unsustainable flow requirements
 - ISC performs independent assessment
 - Leads to manageable BO
- Flow requirements prescribed in current 2006 BO
 - Min 35 CFS at Below Taiban Creek Gage
 - Keep river wet at Acme Gage near Roswell



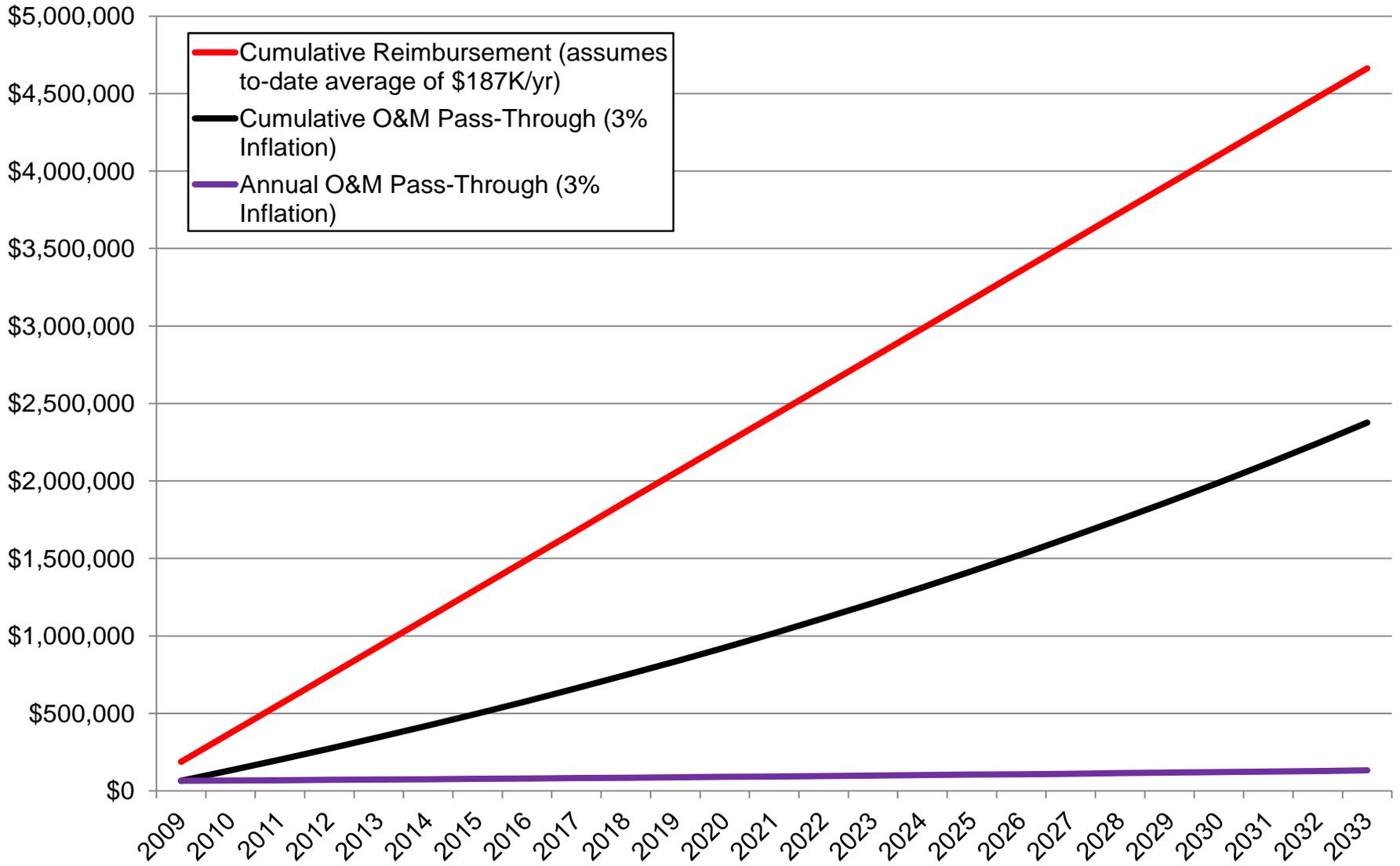
Pecos bluntnose shiner

Vaughan Conservation Pipeline

- Constructed in collaboration with BOR
 - ≈ \$3 million NM monies
- Augments Pecos River upstream of upper critical reach
- 10 wells and pipeline near Fort Sumner
 - Roughly 10 cfs capacity
 - ISC owns 1583 acre-feet CIR
 - ≈ 3 months' pumping
- ISC pumps at BOR's direction
 - 25-year lease (thru CY 2032)
 - BOR pays ISC \$130/AF
 - All ISC O&M costs reimbursed (pass-thru)
- 2009 recipient of BOR's prestigious John Keys Award for exceptional contribution to partnership building



VCP Funding Implications



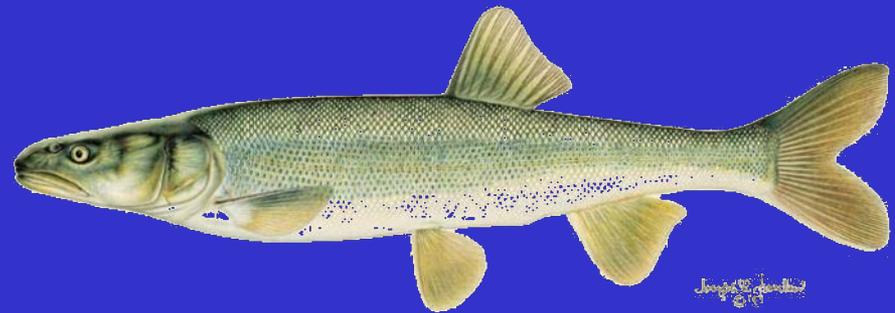
Current Status

- Pecos bluntnose shiner number recovering after extreme drought
- VCP essential water-management tool for BOR's ESA compliance
- Additional water being pursued for increased operational flexibility

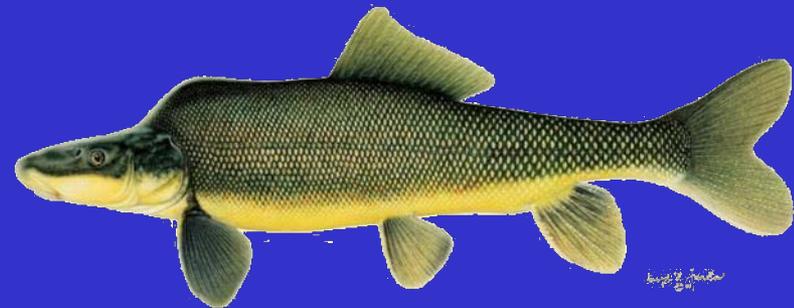
Vaughan Pipeline Discharge



San Juan



Colorado pikeminnow



Razorback sucker

Origin of the San Juan River Basin Recovery Implementation Program (SJ RIP)

- 1992 - Program Document was developed and Cooperative Agreement signed between the United States, Tribes, and Colorado and New Mexico
- 2000 - Formally authorized and funded by Congress (Public Law 106-392)

Program Participants

State of New Mexico

State of Colorado

Jicarilla Apache Nation

Navajo Nation

Southern Ute Indian Tribe

Ute Mountain Ute Indian Tribe

U.S. Bureau of Indian Affairs

U.S. Bureau of Land Management

U.S. Bureau of Reclamation

U.S. Fish and Wildlife Service

Water Development Interests

Conservation Interests

SJ RIP Capital Funding

- New Mexico's SJ RIP cost-share obligation: \$2.744 million
- NM legislative appropriations to date: \$1.802 million
- PNM contribution: \$100,000
- New Mexico's outstanding obligation: \$842,000

Program Accomplishments

Colorado Pikeminnow



- Evidence that stocked fish are surviving and reproducing in the San Juan River
- Downlisting from endangered to threatened expected by 2023

San Juan RIP Accomplishments

Razorback Sucker



- Strong reproduction in the wild
- Juveniles found from 2002-2011: larval fish are surviving
- Downlisting expected by 2023

Summary

- ISC currently spending roughly \$1M/yr on ESA support activities
 - ≈ \$25 M since 2001
- Past efforts have helped avoid costly litigation
- Species have benefitted from additional water and habitat
- Efforts have helped to protect NM water users and water operations
- Strategic Water Reserve is proving to be a valuable water management tool

Office of the State Engineer



Interstate Stream Commission