Big Chino Water Ranch Project

September 2018

WATER EDUCATION by DROP by DROP

Water Smart™

Welcome! This is a **WaterSmart** "***Drop by Drop***" factsheet; the new water education program sponsored by the City of Prescott. Each month learn more about Prescott's water resources. From history to infrastructure, together we'll discuss Prescott water one drop at a time!

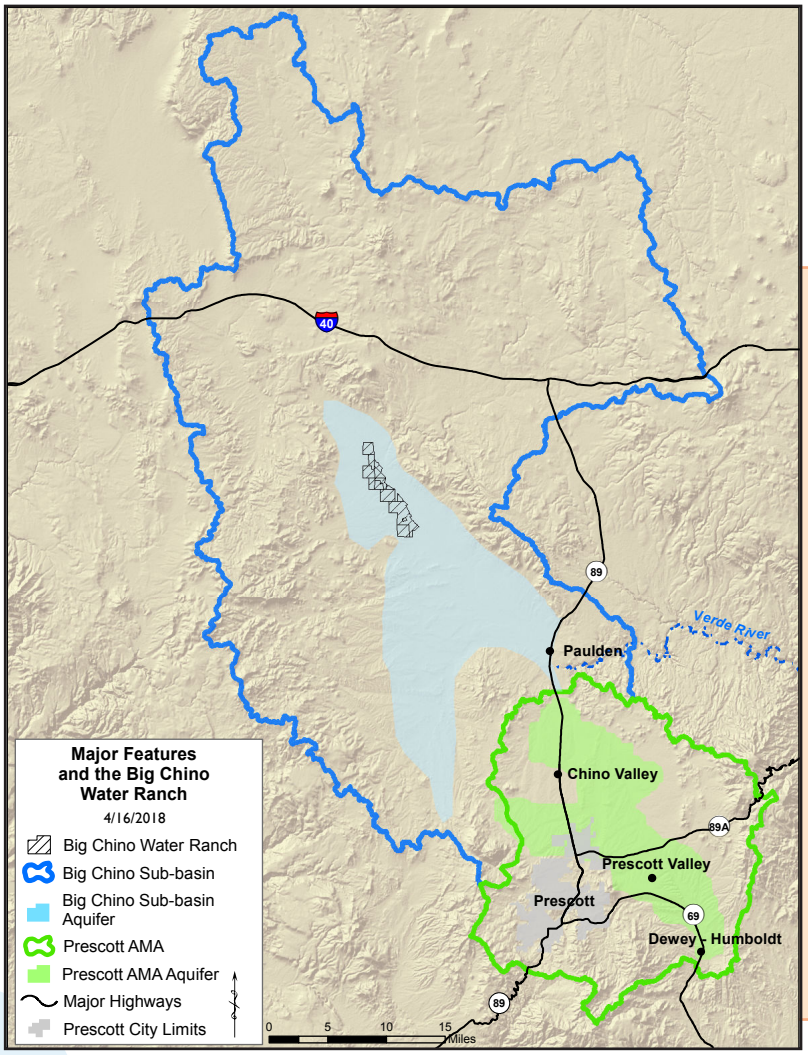
WaterSmart Factsheet Summary:

- *This future water supply of 8,068 acre-feet (AF) is recognized in the City's Water Portfolio; Prescott's share is 3,702.9 AF.*
- *As an Assured Water Supply, the quantity has been determined by the State of Arizona to be physically, legally and continually available.*
- *Withdrawal of the recognized quantity is being scientifically evaluated by the City, the Town of Prescott Valley, and Salt River Project via a cooperative study.*

Join us at noon on the 3rd Wednesday every month at the Prescott Public Library.

Background:

Groundwater supplies in the Big Chino Sub-basin have been discussed as a source of water since 1946 (and possibly earlier). In 1989, the results of preliminary scientific work compiled by Water Resources Associates, Inc., followed by United States Bureau of Reclamation estimated the amount of groundwater available to be 15 million acre-feet (1 acre-foot = 325,851 gallons). With the 1998 State of Arizona declaration that no more groundwater within the Prescott Active Management Area (PrAMA) could be used to support new residential and commercial subdivisions, in 2004, Prescott acquired lands in the Big Chino Sub-basin to secure a supplemental water supply for the City and Town of Prescott Valley, a project participant.



Why was this supply acquired?

The City of Prescott with the Arizona Department of Water Resources (ADWR) PrAMA management plans understood that additional water was necessary for water supply security. The Big Chino supply will assist in meeting current and future demands while also allowing the area to move toward a condition of safe-yield.

Water Resource Management
201 S. Cortez Street | Prescott, AZ 86303 | (928) 777-1645
www.prescottwater.com

CITY OF PRESCOTT ARIZONA

Follow us on Facebook at:

City of Prescott (Official)

Basic Facts Regarding this Future Water Supply

- ARS 45-555 of the enables **transportation of the groundwater** into the PrAMA.
- The **Big Chino Water Ranch** consists of 4,582.1 acres of deeded lands and 1,948.6 acres of Arizona State Land.
- City Contract No. 2004-255 provides for **sharing of the water**: 54.1% Prescott, and 45.9% for Prescott Valley.
- The City is allowed to impact a volume of 8,068 AF.

Recent Activities

In 2009, the supply was formally recognized in the City's legal portfolio. Current conditions (laws, populations, economics, etc.) are far different than when the supply was contemplated in 1946. In 2010 and 2012, two noteworthy agreements were entered into by three parties; the City of Prescott, Town of Prescott Valley, and the Salt River Project Agricultural Improvement & Power District and the Salt River Valley Water Users' Association (SRP) to address the source for a municipal water supply and downstream surface water flows:

- **Agreement in Principle** (February 11, 2010) – A conceptual framework which set forth principles guiding the parties for future agreements, addressing groundwater modeling, groundwater and surface water monitoring, and mitigation (if necessary) associated with future pumping from the Big Chino Water Ranch and importing the water into the PrAMA.
- **Comprehensive Agreement No. 1** (October 5, 2012) – An agreement providing for enhanced monitoring and modeling in the Big Chino Sub-basin, as well as mutual recognition of certain water rights arising from the PrAMA.

As mentioned, not only have the communities in the Prescott AMA grown since 1946, but those downstream in the Verde Valley and metropolitan Phoenix have grown too. Protection of surface water continues to be a topic of high interest. The scientific work consisting of monitoring the sub-basin and development of a more refined groundwater flow model is in its fifth year. The overall goals are:

1. ***Understand the relationship*** between groundwater and surface water in the Upper Verde River area.
2. ***Collect data*** that may be used to distinguish groundwater pumping from the Big Chino Water Ranch from the impacts of groundwater pumping by others.
3. ***Understand the system*** variability within the region.
4. ***Develop the ability*** to relate regional groundwater and surface water observations to future groundwater models.

This and additional information is available on the City of Prescott website under the Big Chino Water Ranch Project: www.prescott-az.gov

References:

Arizona Revised Statute §45-555

Reclamation, 1994, WRA, 1989

Be WaterSmart!

*The **water it takes to produce** the **average American diet** alone – approximately 1,000 gallons per person per day – is more than the **global average water footprint** of 900 gallons per person per day for diet, household use, transportation, energy, and the consumption of material goods.* *Source: www.nationalgeographic.com*

Water Smart™

CITY OF PRESCOTT ARIZONA

Printed on Recycled Paper
Each ton (2,000 pounds) of recycled paper saves 7,000 gallons of water!

WATER EDUCATION by DROP DROP