



City of Austin
Water Reclamation
Program

City of Austin Water Reclamation Initiative

Water Reclamation in Austin Past, Present, and Future

February 5, 2010



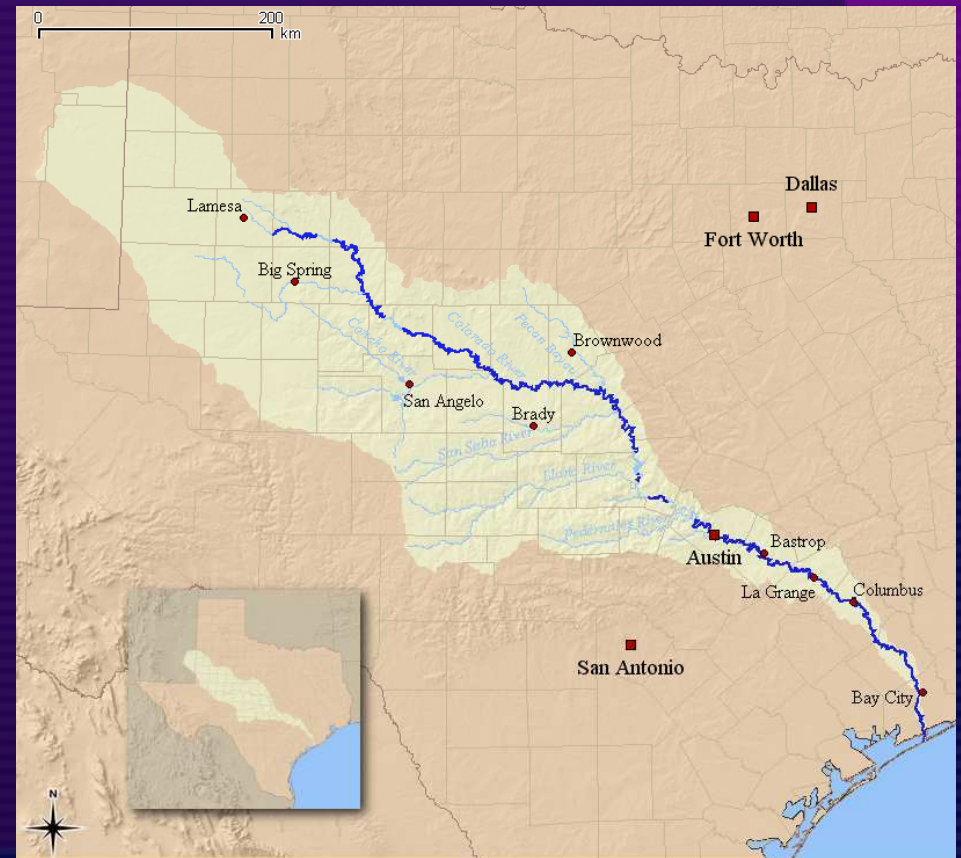
Austin – An Introduction

- Austin
 - Central Texas
 - State Capital
 - Growing
- Water
 - Annual precipitation ~ 32"
 - Water use ~ 53 billion gallons/yr
 - Wastewater treated ~ 32 billion gallons/yr

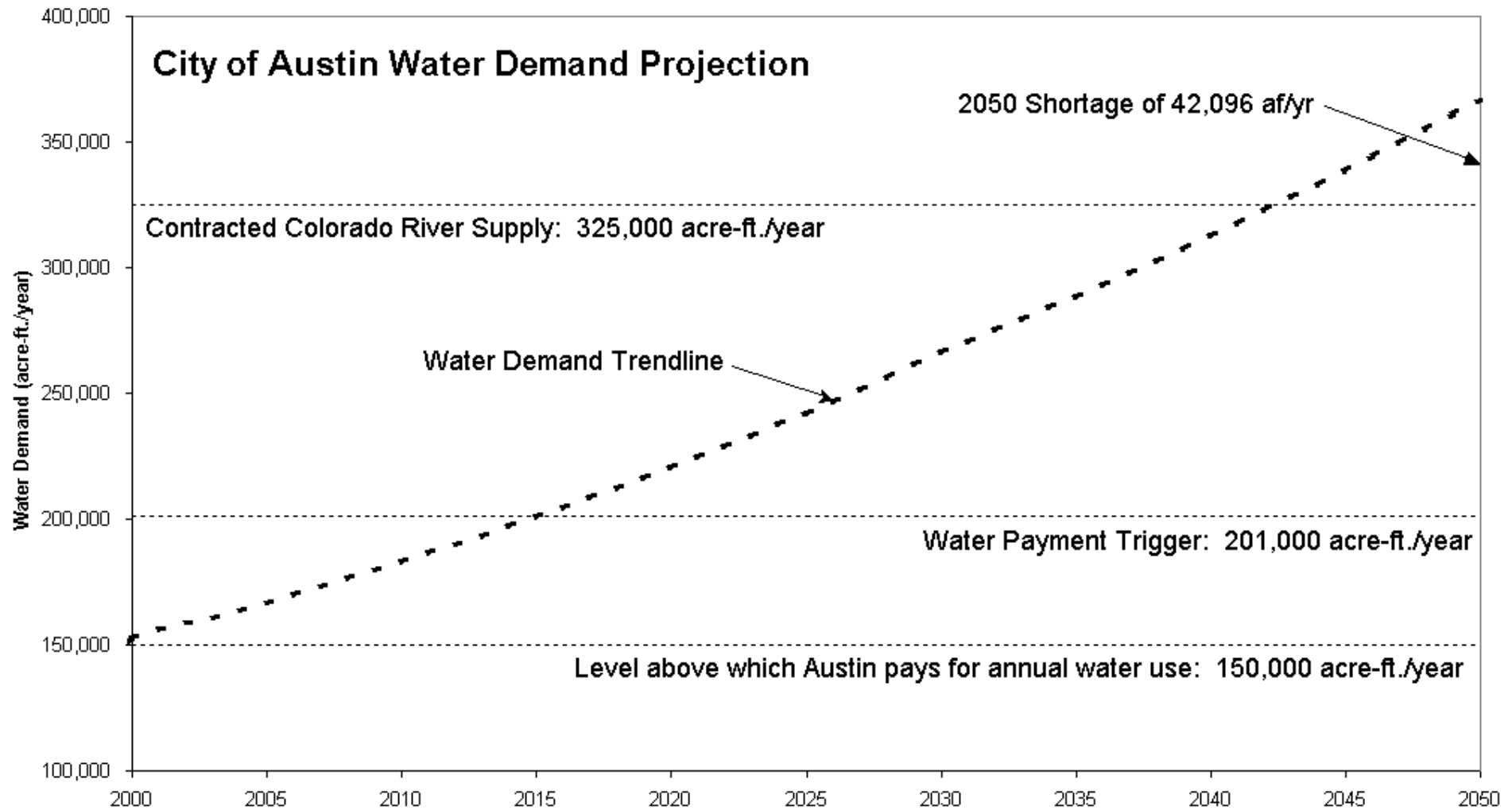


Austin's Water Source

- Colorado River
- 39,900 sq miles
- 2 water treatment plants
- 2 large wastewater treatment plants
- High → exceptional water quality



Water Conservation in Austin



What is Reclaimed Water ?

- Highly treated wastewater effluent
- Quality – akin to river water
- Demand management tool
- Major uses
 - Irrigation
 - Cooling
 - Manufacturing
 - Toilet flushing



Austin's Reclaimed History

- 1970's & 1980's – an afterthought
- 1990's – the lost decade
 - Master plans developed in 1992, 1998, 2001
- 2000's – construction



The Current System

Miles of trans. main – 19

Customers – 32

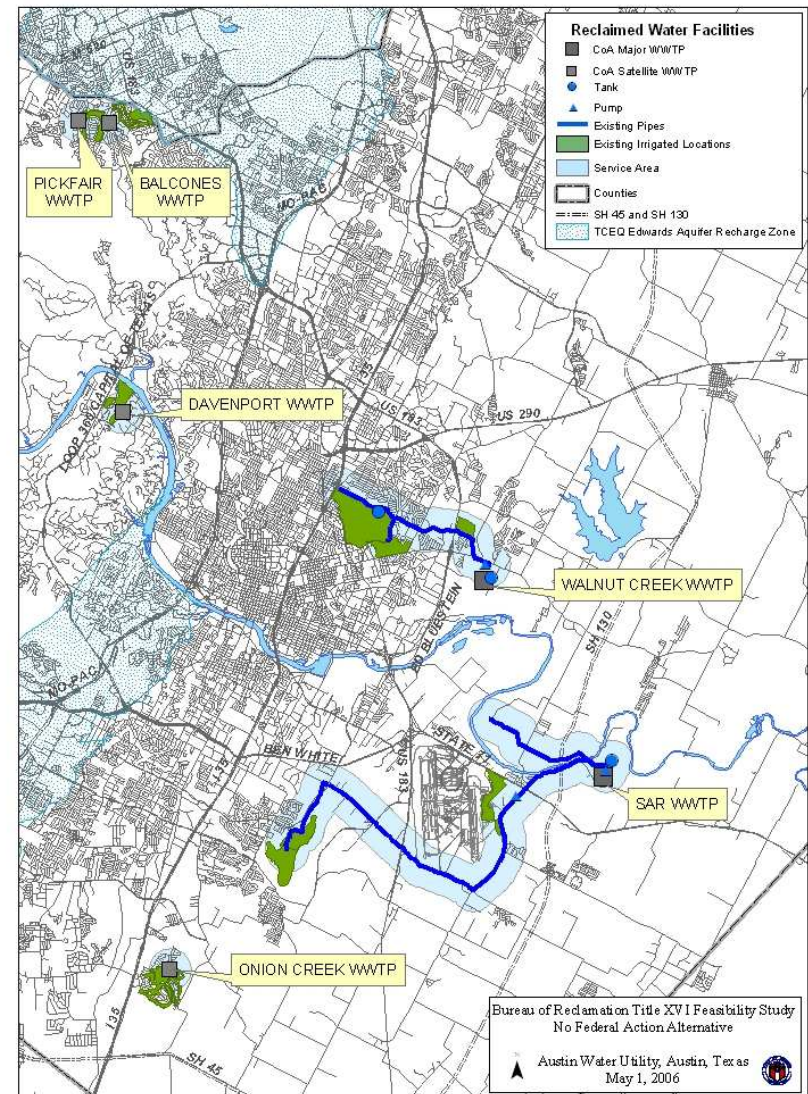
Annual use – 1.99 billion
gallons

How much water is that?

2,960 olympic-sized
swimming pools

39 million car washes

1.2 billion toilet flushes



Current Construction

- 12" FM Rehabilitation – 9,000'
- 24" FM Rehabilitation – 8,000'
- 51st Street Main – 4,000'
- 51st Street Tank – 2 MG
- UT Main – 22,000'



Preliminary Construction

- Main to Montopolis – 10,000'
- ABIA Main – 8,500'
- Guerrero Park 1&2 – 3,500'
- BAE Systems – 6,000'
- Walnut Creek Tank/Pump Station
- Waller Creek Garage



Plans and Opportunities

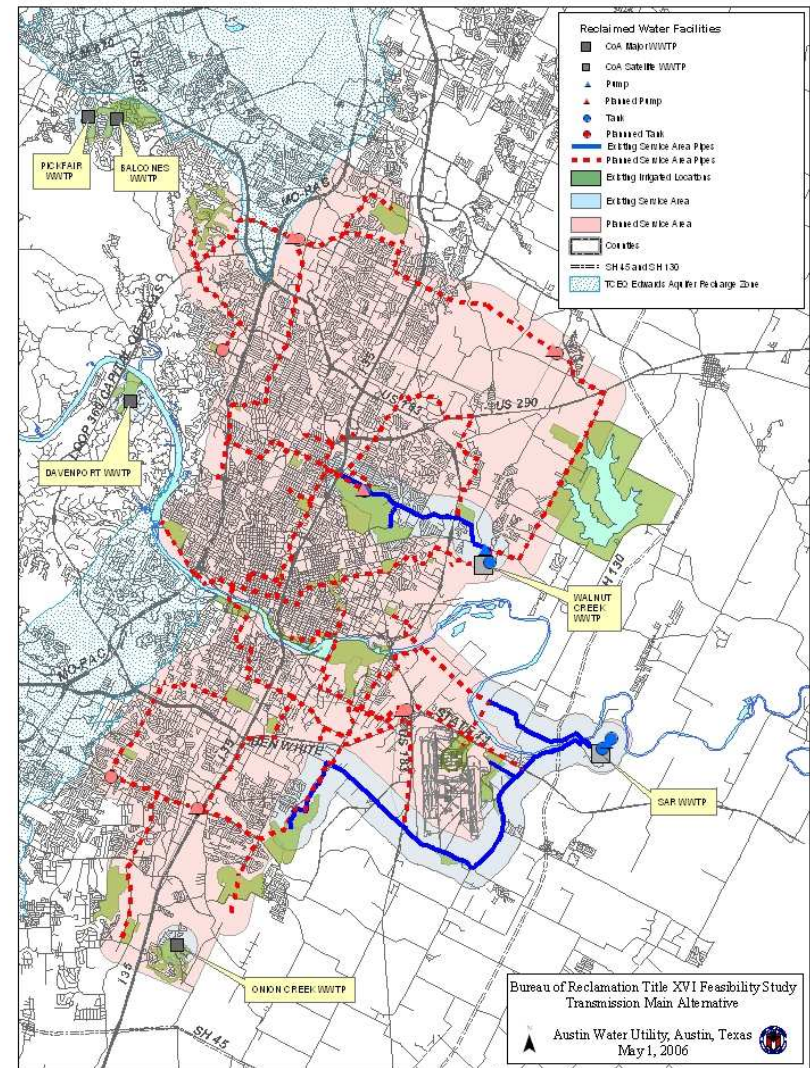
Miles of trans. main – 130+
Annual use – 5.48 billion
gallons

How much water is that?

8,150 olympic-sized
swimming pools

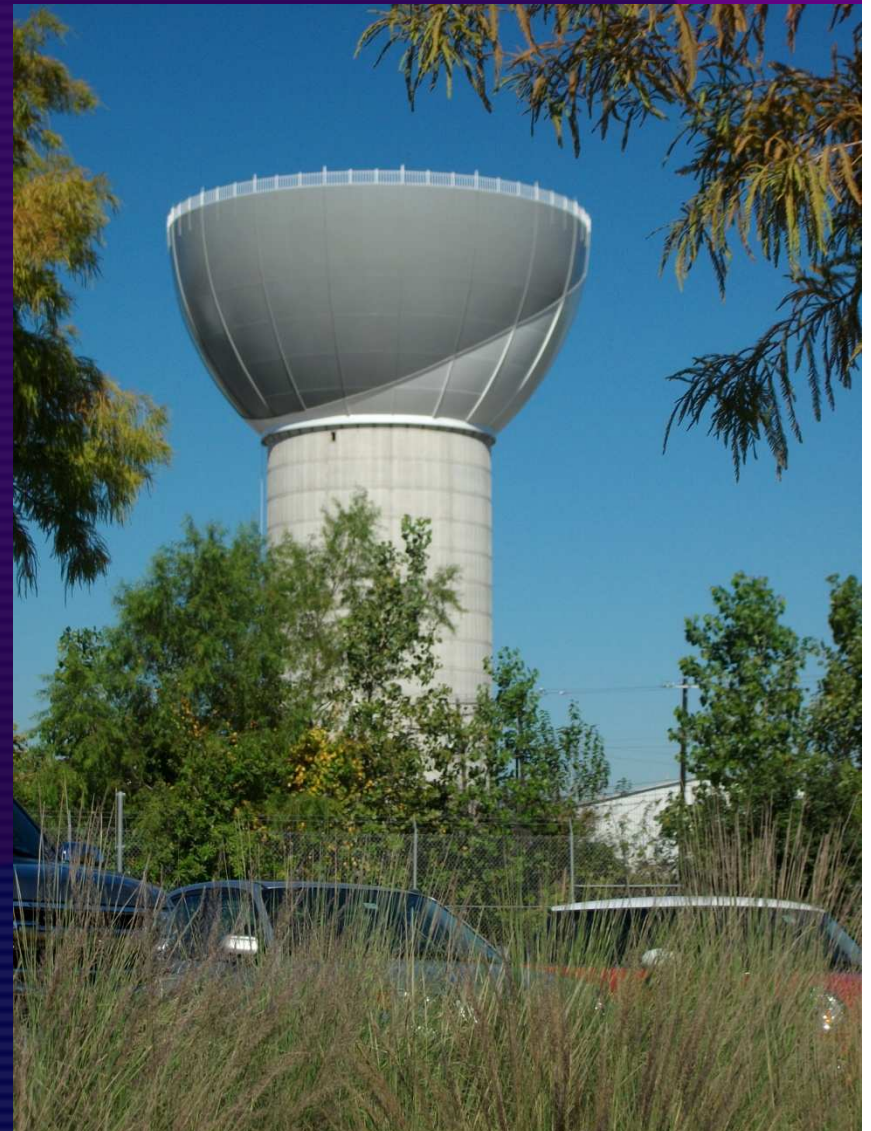
109 million car washes

3.42 billion toilet flushes



Future – 51st Street Tank

- Environmental considerations
 - Photovoltaics
 - Rainwater harvesting
 - Green concrete
- Aesthetics



Future – Bulk Water Station

- For water hauling trucks



Future – Downtown/Toilet Flushing

- Growing buildings –
> growing water use
- 60-80% of office building use is for toilet flushing
- New potable mains or new reclaimed mains ???



Other Issues

- Customer service
- Cross-connection
- Growth expectations
- Subsidization
- System reliability
- Codes and ordinances
- New developments
- Zilker Park



THANK YOU

Q&A

