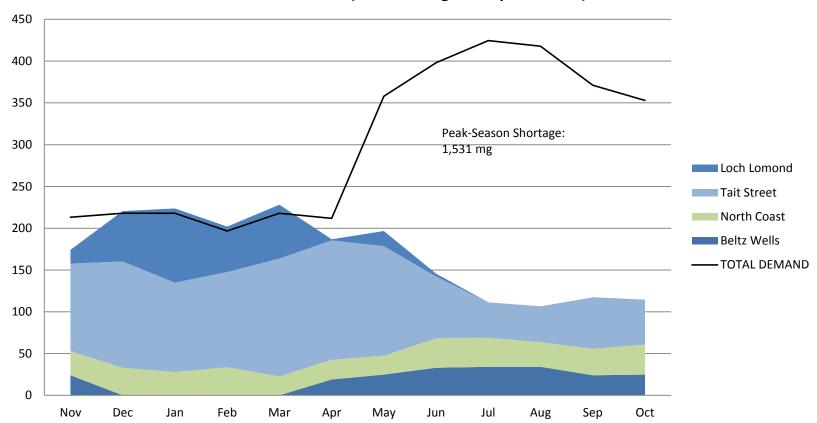
Learning from future scenarios exercise

- 1. More storage eliminates the shortfall
- 2. A little demand reduction goes a long way
- 3. The Model will be more useful if it can depict City drought response

More storage eliminates the shortfall

1.5 billion gallons of additional storage would mean zero shortfall in this scenario

Monthly Source Production Under 1977 Hydrologic Conditions – DFG-5 Flows, Base Infrastructure (millions of gallons per month)



A little demand reduction goes a long way

Example: Using current demand (2012/2013 average) rather than the old demand projection changes the outcome.

Shortfall with old demand estimate = 1530 mil gals

Shortfall using current demand (2012-2013)

Savings from 1975-76	700
Reduced demand in 1977	350
Revised shortfall	480

3. The Model will be more useful if it can depict City drought response

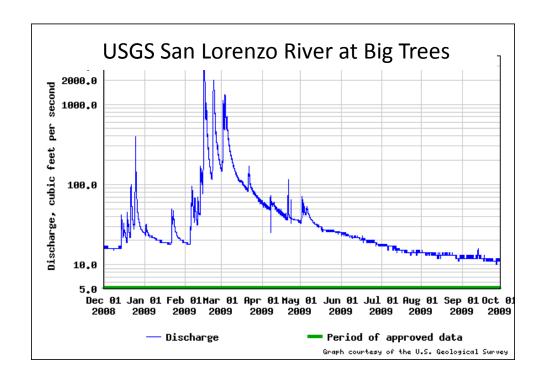
Currently the Model assumes that 100% of normal demand will be met every day of the year until...

- 1. the water rights limit on the reservoir is reached (1 billion gallons/year)
- 2. the reservoir drops to 1 billion gallons, to be kept in reserve for a possible 3rd dry year

Under actual drought conditions, the City responds with curtailment.

Example: 2009 Stage 2 response

Result: 15% cutback

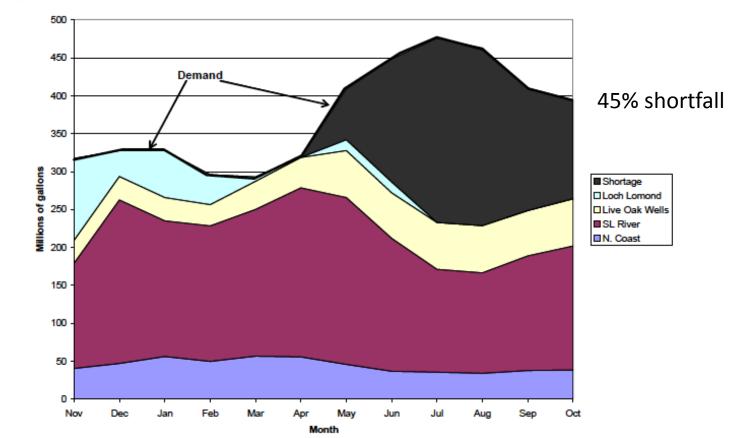


Reservoir level on Oct 1, 2009= 91%



What would this shortfall have looked like if it assumed a Stage 2 curtailment (15%) in the first dry year?

Figure II-6
Typical Worst-Year (1977) Monthly Source Production and Water Shortages



Source: Integrated Water Plan (2003)

Learning from future scenarios exercise

- 1. More storage eliminates the shortfall
- 2. A little demand reduction goes a long way i.e., When the system is at the edge of capacity, demand reduction is a high-leverage strategy to reduce shortfall.
- 3. Adjust the Model to depict drought response