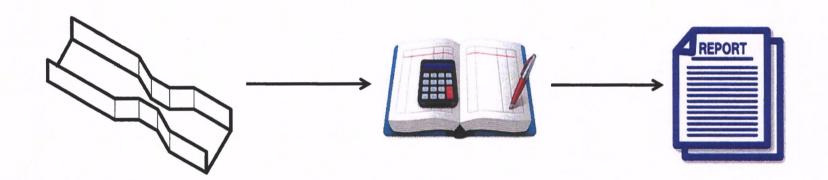


DATA COLLECTION AND WATER ACCOUNTING

Jared Manning, P.E., Assistant State Engineer AWSE Spring Workshop; May 9, 2016

TRADITIONAL WATER ACCOUNTING PROCESSES





CHALLENGES WITH TRADITIONAL ACCOUNTING METHODS

- Slow (computationally complex)
- Not transparent
- Spotty data set



WHAT GENERAL CHALLENGES ARE THERE IN ACCOUNTING FOR WATER?

- Separating natural flow from storage delivery
- System losses (evaporation and conveyance losses)
- Complex systems with many diversions, water rights, and complex operational criteria

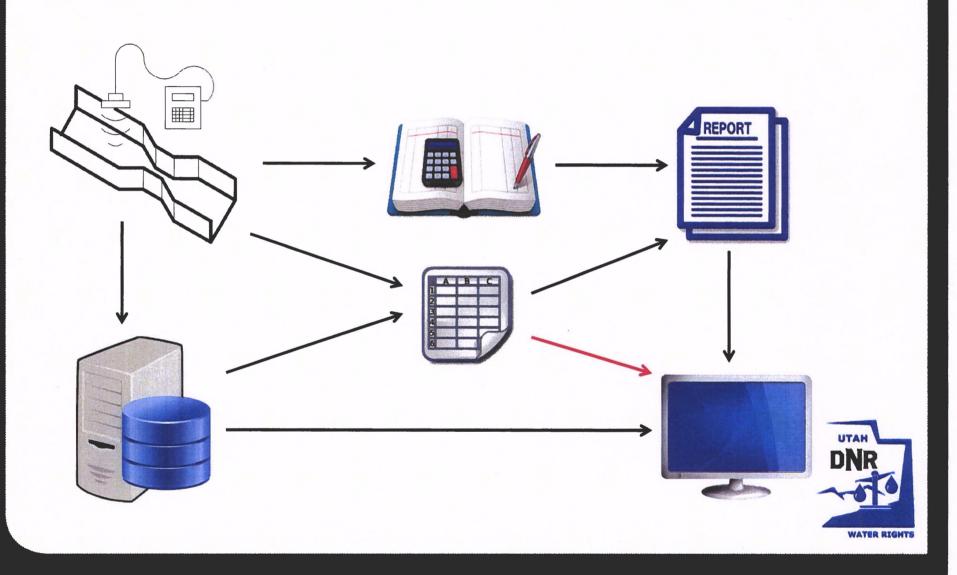


REAL-TIME (OR NEAR REAL-TIME) DATA SOURCES

- USGS (stream flows)
- Bureau of Reclamation (reservoir levels)
- Water Users (diversions)
 - · Independently collected
 - Telemetry installed by our office



MODERN WATER ACCOUNTING PROCESSES



WATER COMMISSIONER ACCOUNTING TOOL (WATER CAT) DESIGN CRITERIA

- Seamlessly communicate with Water Rights database
- Display data and reports online
- Expose all calculations and accounting algorithms
- Applicable to any river system in Utah
- Customizable



http://waterrights.utah.gov/dvrtdb/accounting/weber_provo_canal_no_header.asp

http://waterrights.utah.gov/dvrtdb/accounting/sevierupper.asp?yr=2014

https://test.waterrights.utah.gov/wcat

