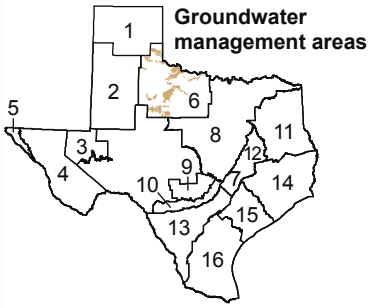
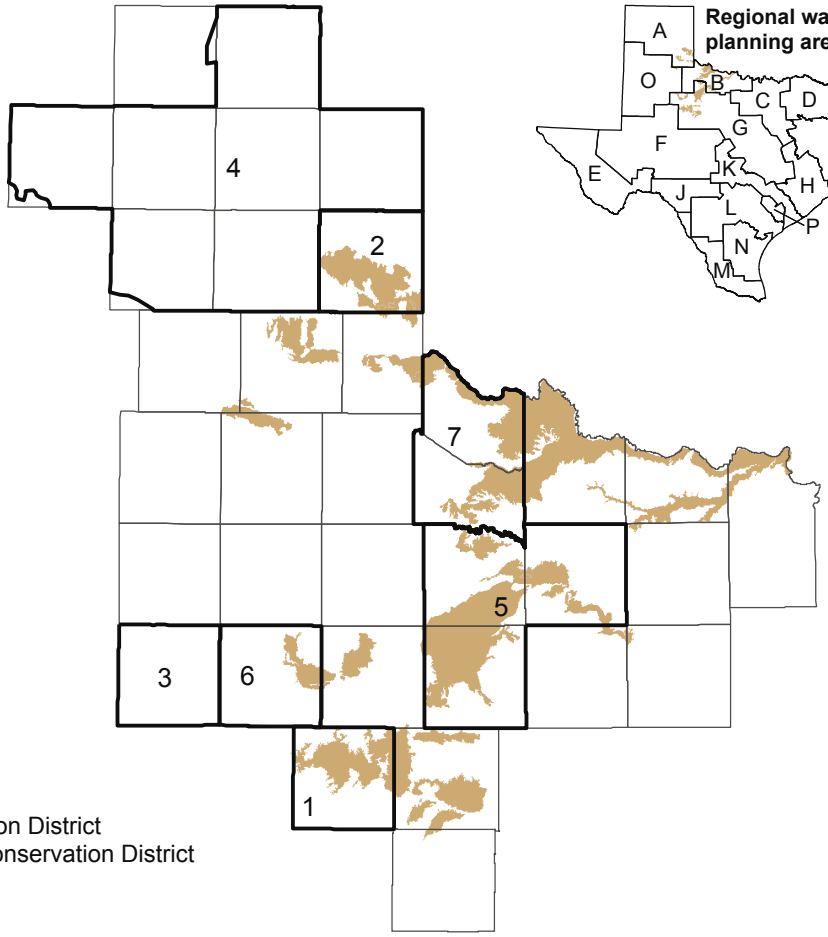
Seymour Aquifer





1. Clear Fork GCD
2. Collingsworth County UWCD
3. Garza County Underground and Fresh WCD
4. Panhandle GCD
5. Rolling Plains GCD
6. Salt Fork UWCD
7. Tri-County GCD

GCD = Groundwater Conservation District
UWCD = Underground Water Conservation District

The Seymour Aquifer is a major aquifer that extends across north-central Texas. Water is contained in isolated patches of alluvium made up of discontinuous beds of poorly sorted gravel, conglomerate, sand, and silty clay. Water ranges from fresh to slightly saline, although natural salt pollution exists in localized areas. The aquifer is affected by excess nitrate throughout its extent, caused partly by natural processes and partly by human activities. The aquifer also contains excess chloride. Almost all of the groundwater pumped from the aquifer—90 percent—is used for irrigation, with the remainder primarily used for municipal supply. No significant water level declines have affected the aquifer. The planning groups recommend several water management strategies that use the Seymour Aquifer, including new wells, overdrafts, and construction of a nitrate removal plant in Wilbarger County.

Aquifer characteristics

- Area of aquifer: 4,042 square miles
- Availability: 242,226 acre-feet per year (2010) to 227,580 acre-feet per year (2060)
- Well yield: range from 100 to 1,300 gallons per minute, with an average of about 300 gallons per minute
- Proportion of aquifer with groundwater conservation districts: 52 percent
- Number of counties containing the aquifer: 27

Groundwater supplies with implementation of water management strategies