Groundwater Use in Tennessee

Overview¹

Total

Groundwater (mgd — fresh, not saline) Percentage of total freshwater* supply for state	
Public Supply	
Groundwater (mgd)	256
Percentage of total groundwater	
Percentage of total public supply	30.12%
Individual Household	
Groundwater (mgd)	42.8
Percentage of total groundwater	9.95%

Irrigation

Groundwater (mgd)	36.4
Percentage of total groundwater	
Percentage of total irrigation	. 57.05%

Percentage of total individual household supply 100%

Livestock/Aquaculture

Groundwater (mgd)	23.7
Percentage of total groundwater	
Percentage of total livestock/aquaculture	29.51%

Industrial, Self-Supplied

Groundwater (mgd)	51.6
Percentage of total groundwater	12.00%
Percentage of total industrial, self-supplied	7.03%

Mining

Groundwater (mgd)	17.1
Percentage of total groundwater	3.98%
Percentage of total mining	54.46%

Thermoelectric

Groundwater (mgd)	2.18
Percentage of total groundwater	
Percentage of total thermoelectric	0.05%

(mgd = million gallons per day)

*All totals and ratios are measures of freshwater only.

- ¹ US Geological Survey, Estimated Use of Water in the United States in 2015, released 2018.
- ² US Census Bureau 2013 American Housing Survey.
- ³ US Census Bureau 2013 American Community Survey.
- ⁴ US Geological Survey, Estimated Use of Water in the United States in 2015, released 2018.
- $^{\scriptsize 5}$ US EPA Federal Safe Drinking Water Information System Data for 2019.
- 6 Ibid.
- ⁸ Census of Agriculture 2013 Farm and Ranch Irrigation Survey.

Groundwater's Role in **Tennessee's Economic Vitality**

- Few states can accurately or confidentially determine how many residential wells are in place. For each region, the American Housing Survey by the U.S. Census provides regional data. Tennessee is found in the South, along with these other states: Maryland, Delaware, Virginia, North Carolina, South Carolina, Georgia, Florida, Alabama, Mississippi, Texas, Oklahoma, Arkansas, Tennessee, and Kentucky. The last American Housing Survey Census indicates this region had 4,360,000² households served by residential wells, with an average of 2.55³ persons per household. The USGS estimates the population of selfsupplied water supply users in Tennessee to be 594,000, with 100% of their water supply from groundwater.4
- 159 community water systems use groundwater for 1,507,200 people⁵
- 20 non-community, non-transient water systems use groundwater for 8,000 people⁶
- 277 non-community, transient water systems use groundwater for 53,000 people7
- 1,470 irrigation wells used serving 566 farms and 126,000 acres8



Tennessee's Groundwater Industry Employment

Men and women working to provide and protect Tennessee's groundwater resources for the benefit of people, business, and our environment.

Tennessee's Contracting Employment

Drill and service water wells, install and service pumps, install and service point of use water treatment devices. This portion of the industry is characterized by small firms, many of which are multi-generation family-owned and operated.⁹

- 70 firms employ an estimated 508 people
- Annual estimated sales of \$104.4 million

Tennessee's Scientists and Engineers Employment

Geologists, hydrogeologists, engineers, geochemists, geophysicists, microbiologists, regulators.

Environmental Consulting¹⁰

NAICS 54162: Establishments primarily engaged in providing advice and assistance on environmental issues, such as the control of environmental contamination from pollutants, toxic substances, and hazardous materials.

- 364 firms employ an estimated 1,513 people
- Annual estimated sales of \$292.1 million

Remediation¹¹

NAICS 56291: Establishments include those engaged in remediation and cleanup of contaminated buildings, mine sites, soil, or groundwater.

- 148 firms employ an estimated 3,512 people
- · Annual estimated sales of \$844.8 million

Public Service and Universities, Colleges, and Research Centers

Many more dedicated individuals



⁹ InfoUSA, SIC 1781, June 2019.

¹⁰ Barnes Reports: Environmental Consulting Services Industry (NAICS 54162); C. Barnes & Co., 2019.

¹¹ Barnes Reports: Remediation Services Industry (NAICS 56291); C. Barnes & Co., 2019.