

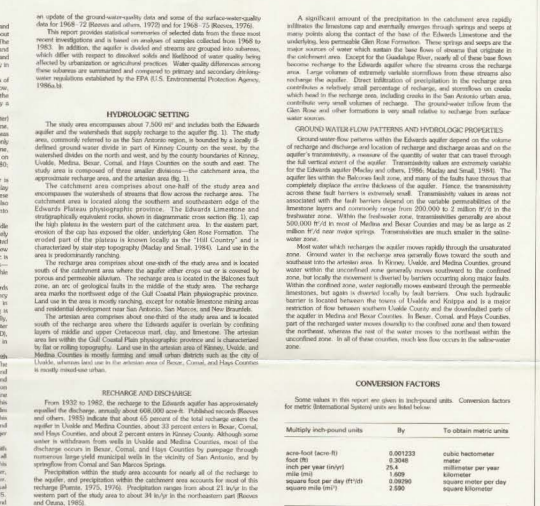
U.S. DEPARTMENT OF THE INTERIOR
U.S. GEOLOGICAL SURVEY

**WATER QUALITY OF THE EDWARDS AQUIFER AND STREAMS RECHARGING
THE AQUIFER IN THE SAN ANTONIO REGION, TEXAS**

By W.R. Roddy

Prepared in cooperation with the
EDWARDS UNDERGROUND WATER DISTRICT

HYDROLOGIC INVESTIGATIONS ATLAS
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EXPLANATION

Approximate recharge area isolated from Buckhorn, Ratonian, and Rosita, 1960

"Bed-water" line

Shade in hydrologic subarea—Number indicates the number of wells at location

- ▲ Urban
- Rural
- Major River
- Upland
- Coastal Flats
- North Hias
- Transition
- Subsoil water
- Glen River

Table 1. Summary of characteristics of hydrologic subareas

	Imps., milligrams per liter; ft., feet; m., meter; y., less than
Hydro-logic subarea	typical range
discharge	source of water
subarea	concentrated water
	land use
	type of water
	flow (ft.)
	sources of recharge
	groundwater
	surface water
	precipitation
	runoff
	evaporation
	transpiration
	infiltration
	recharge
	discharge
	subsurface
	surface
	precipitation
	runoff
	evaporation
	transpiration
	infiltration
	recharge
	discharge
	subsurface
	surface
	precipitation
	runoff
	evaporation
	transpiration
	infiltration
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	runoff
	evaporation
	transpiration
	infiltration
	recharge

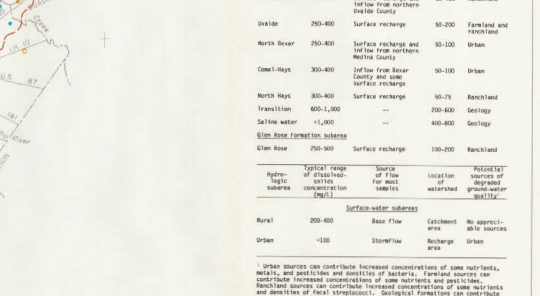


Figure 2. Locations of water-quality data-collection sites and hydrologic subarea

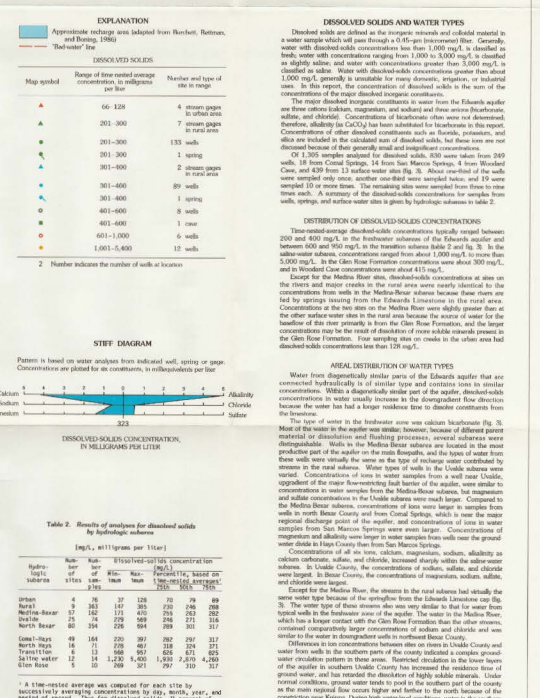
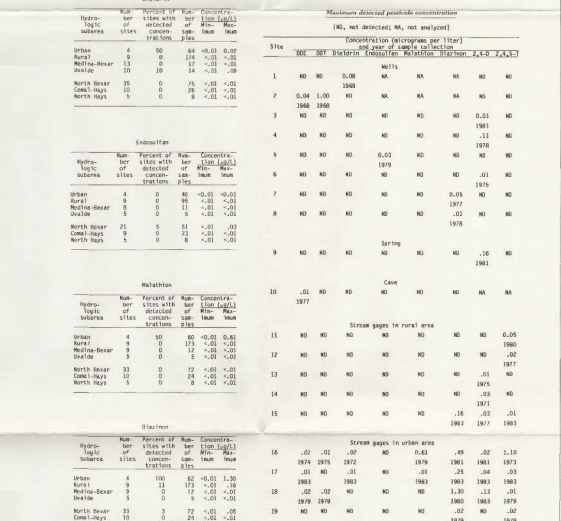


Figure 3. Areal distribution of dissolved-solids concentrations and water types.

EXPLANATION


 approximate recharge area (adapted from Burnham, Ruttman, and Boring, 1986)
 "Red-water" line
 Type of site
 Well in pesticide sampling network
 Stream gage in urban area
 Stream gage in rural area
 Spring
 Cave
 Number in site location. See table showing minimum detected pesticide concentration.

troika *trō'ik-ə* *n.* a group of three people or things, especially a group of three people in a position of joint authority or control, as in a government or a business organization. *troika* is a Russian word that entered English through the Czech word *trojka*, which means "trio" or "group of three." The word *troika* is often used to describe a group of three people who share power or control, such as a political coalition or a business partnership. It can also refer to a group of three horses harnessed together to pull a carriage or a sleigh. The word *troika* is also used in the context of the 1990s, when it referred to the three main branches of the Russian government: the executive, legislative, and judicial branches. The word *troika* is a relatively recent addition to the English vocabulary, and it is still not as common as some other words. However, it has become a useful term for describing a specific type of group or organization.

North Hays	5	20	8
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EXPLANATION

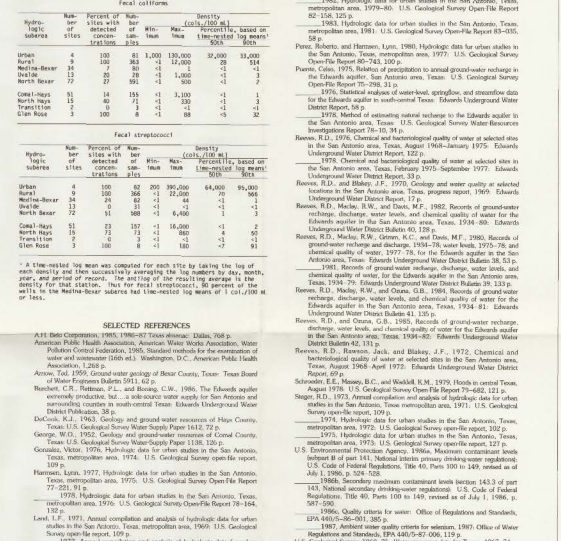
Approximate recharge area (adapted from Burchett, 1984 and Boring, 1986)

"Bed-water" line

Map symbol	Range of nested-loop mean density, in colonies per 100 milliliters	Number and site in map
●	Less than 1	147 wells
●	Less than 1	1 spring
●	1-10	23 wells
●	1-10	1 spring
▲	11-1,000	9 streams in nature
●	11-1,000	8 wells
■	11-1,000	1 creek

More than 1,000

3 Number indicates the number of wells at location



MacIay, R.W., Land, I.F., and Woodward, D.G., 1986, *Influences on groundwater flow in the Edwards aquifer*. San Antonio, Texas: Texas Water Development Board, 60 p.