

# Ground-Water Resources of SHELBY COUNTY

by  
Richard J. Kostelnick

1:62,500

Scale in miles



Contour Interval: 10 feet



Index Map

## AREAS IN WHICH 100 TO 500 GPM MAY BE DEVELOPED

- Permeable sand and gravel deposits in the Loramie Creek and Turtle Creek flood plains may yield large supplies to properly screened wells. Wells are generally less than 75 feet deep however test drilling is recommended to locate the most permeable material.
- Deep sand and gravel deposits in ancestral Teays Valley may yield small industrial and municipal supplies. Coarsest materials are generally between 100 and 300 feet deep near the Valley floor. Flowing wells have been noted near Salem and Perry townships. Test drilling required.
- Deeper drilling into the impermeable shale in the Valley floor is not advised.
- Limestone aquifer. Principal water bearing zone is the Lockport Formation. Yields of over 150 gallons per minute have been developed from wells penetrating various solution cavities in the rock. Farm and domestic supplies of over 10 gpm may be developed from shallow wells.
- Glacial moraine and till overlie the bedrock surface and often yield substantial supplies of 5 to 20 gallons per minute.

## AREAS IN WHICH 25 TO 100 GPM MAY BE DEVELOPED

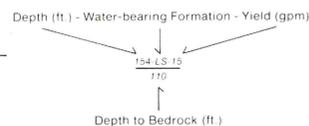
- Limestone aquifer. Lower members of the Niagara Group limestone and Dolomite may yield small industrial and municipal supplies. Water-bearing bedrock is thinner than formations to the north.
- Permeable irregular sand and gravel deposits within 75 feet of the surface may yield 25 to 100 gpm to properly screened wells. Test drilling is needed to locate wells requiring large yields.

## AREAS IN WHICH 10 TO 25 GPM MAY BE DEVELOPED

- Carbonate aquifer near ancestral Valley walls. Thin limestone and shale may yield as much as 25 gpm.

## AREAS IN WHICH 3 TO 10 GPM MAY BE DEVELOPED

- Thick clay, fine sand and gravel over impermeable bedrock in ancestral drainage channel. Yields of 3 to 10 gpm may be developed for domestic supplies in the Valley fill material however deeper drilling into the shale is not recommended. Dry holes have been noted.



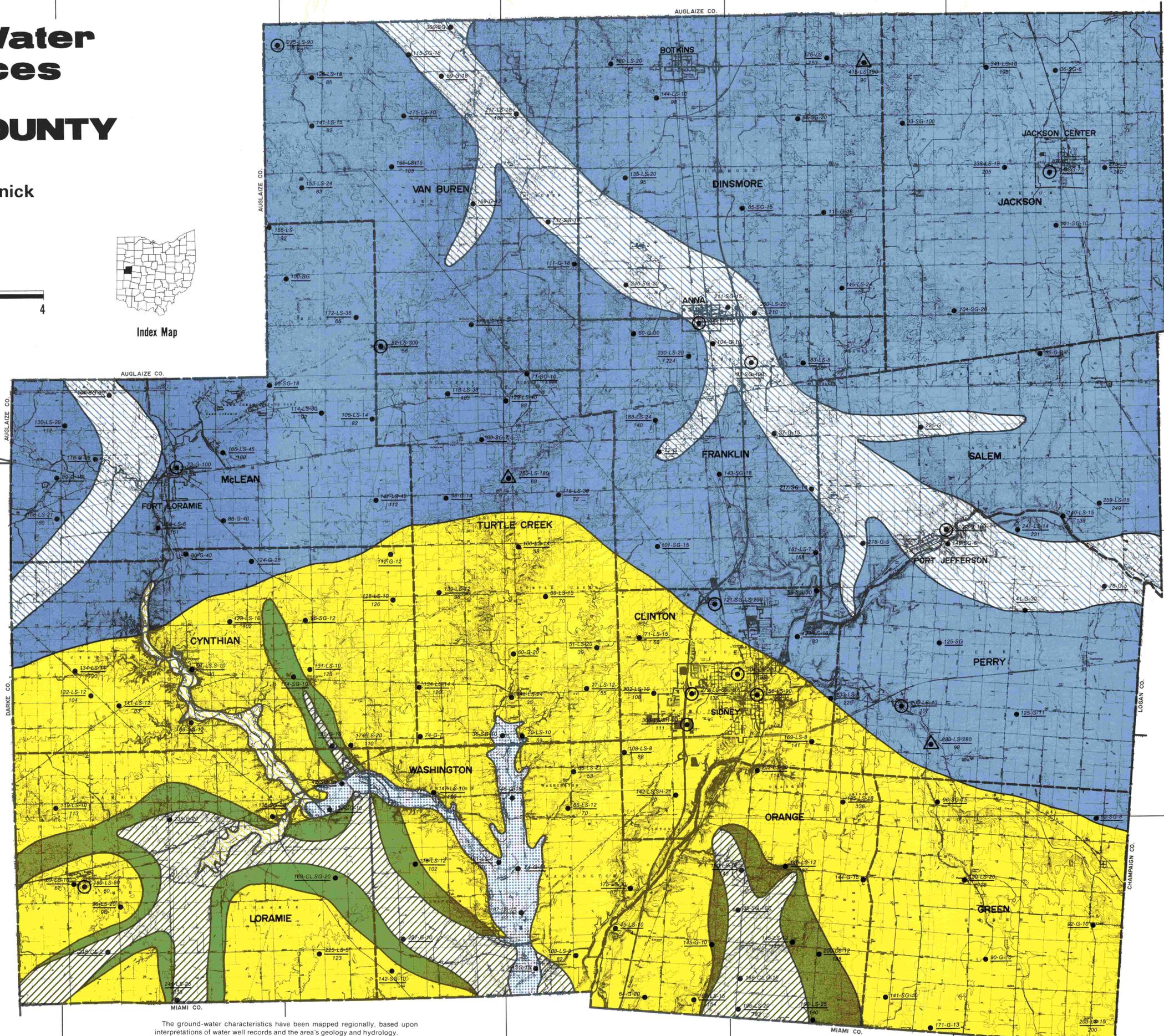
- Domestic Well
- ⊙ Public or Industrial Well
- △ Test Well

## FORMATIONS

- SG - Sand and Gravel
- LS - Limestone
- SH - Shale
- G - Gravel
- CL - Clay

**ODNR**  
OHIO DEPARTMENT OF  
NATURAL RESOURCES

Cartography: Douglas E. Keen



The ground-water characteristics have been mapped regionally, based upon interpretations of water well records and the area's geology and hydrology. Well log data on the map were selected as typical for the areas shown. Information regarding specific sites may be obtained from the Division of Water.

Published, 1983