



Base from U.S. Geological Survey
1:24,000 quadrangles

Hydrology by M. E. Cooley, 1976

EXPLANATION

- Water well.
- Flowing artesian well.
- Spring.
- 43 Well showing thickness in feet of alluvial deposits obtained from driller's log. A plus (+) sign indicates that the well did not penetrate the entire thickness of the alluvial deposits. A plus and minus (±) sign indicates the thickness is approximate.
- <40 Well completed in sedimentary rocks underlying alluvial deposits where only total depth of well is known. Number indicates depth of well in feet. The symbol (<) indicates thickness of alluvial deposits is less than depth of well.
- ▼ 06277500 Chemical quality-of-water station. Number is USGS station number.
- ▲ 8 Location of specific-conductance measurement listed in table 4 and selected chemical analysis listed in table 2. Numeral indicates station number.
- ◆ 3-49 Location of a series of surface-resistivity measurements in area of inset 1 shown on main plate. Upper numeral indicates range in depth in feet of geoelectric horizons interpreted to be base of alluvial deposits. Lower numeral denotes number of measurements.
- ◆ 37 Location of surface-resistivity measurement on main plate and in inset 1. Numeral indicates depth in feet of geoelectric horizon interpreted to be base of alluvial deposits.
- Area most favorable for development of ground water from deposits comprising the alluvial aquifer.
- Area where water-yielding sandstone beds of Fort Union, Lance, Meeteetse, and Mesaverde Formations are present at shallow depths in bottom land along Greybull River.
- Canal, showing direction of flow.
- Approximate direction of movement of ground water in alluvial aquifer.
- Area of flood-plain alluvium containing temporary ponds and marsh-like areas caused by accumulation of irrigation tail water.
- 6 Terrace eroded from Burlington, Greybull, and McKinnie terrace deposits, flood-plain alluvium, or alluvial-fan deposits. Numeral is height in feet of terrace above subjacent lowland. Wells may obtain water at a shallow depth in alluvial deposits forming the terraces. Upstream of abandoned Fenton School where terrace borders the flood-plain alluvium, wells probably encounter water in deposits of the terrace only in area near the flood-plain alluvium.
- Bench-like feature 20-40 feet high bordering flood-plain alluvium in area upstream of abandoned Fenton School (includes also western part of the Burlington Terrace). Unless permeable sandstone beds are present, wells will not encounter water at a shallow depth in sedimentary rocks forming the bench-like feature.
- ||||| Margin of bottom land.

Plate 2.--Map showing thickness data, location of wells, surface resistivity measurements, and stream-sampling sites in the Greybull River Valley