Percentage of Surface Drinking Water from Intermittent, Ephemeral, or Headwater Streams in Arizona

Legend: This map highlights regional patterns of dependence on intermittent, ephemeral, and headwater streams for surface drinking water in Arizona. In Arizona, 8,101 total miles of streams provide water for surface water intakes supplying public drinking water systems; of this, 6,381 miles, or 79%, are intermittent, ephemeral, or headwater streams. Over 3.2 million people in Arizona receive drinking water from public drinking water systems that rely at least in part on intermittent, ephemeral, or headwater streams. This analysis compared the stream length of intermittent, ephemeral, and headwater streams to total stream length within all mapped Source Protection Areas (SPAs) for each county. A SPA is an area upstream from a drinking water source or intake that contributes surface water flow to the drinking water intake during a 24-hour period. This is based on data that generally do not include streams less than one mile in length. Intermittent streams are streams containing water for only part of the year. Ephemeral streams flow in response to precipitation events. First-order streams have been used to represent headwater streams.

Data Sources: National Hydrography Dataset Plus at medium resolution; Federal Safe Drinking Water Information System 4th Quarter 2006 Data.