What is a Groundwater Management Area (GMA) ?

The Texas Water Development Board (TWDB) designated Groundwater Management Area (GMA) boundaries in response to legislation passed in 2001. The GMAs were to cover all major and minor aquifers in the state. The objective was to delineate areas considered suitable for management of groundwater resources. A GMA should ideally coincide with the boundaries of a groundwater reservoir or a subdivision of a groundwater reservoir, but it may also be defined by other factors, including the boundaries of political subdivisions. In December 2002, the TWDB designated 16 GMAs covering the entire state. Only one area, Groundwater Management Area 5, does not include any Groundwater Conservation Districts (GCDs, also known as "districts").

Originally, the GMAs were useful for determining which GCDs needed to coordinate joint planning by sharing their management plans. In 2005, the Legislature changed the direction of groundwater management. The new requirements, codified in Texas Water Code Chapter 36.108, required joint planning in GMAs among GCDs. The new requirements indicated that:

> "The district representatives shall meet at least annually to conduct joint planning with the other districts in the management area and to review the management plans, the accomplishments of the management area, and proposals to adopt new or amend existing desired future conditions."
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> "Not later than September 1, 2010, and every five years thereafter, the districts shall consider groundwater availability models and other data or information for the management area and shall establish desired future conditions for the relevant aquifers within the management area."

This means that, rather than individual GCDs determining how much groundwater was available, the GCDs would meet together, at least annually, to decide what is now called desired future conditions (DFC). Desired future conditions are the desired, quantified conditions of groundwater resources (such as water levels, spring flows, or volumes) at a specified time or times in the future, or in perpetuity. This description is a precursor to developing a volumetric number called the modeled available groundwater. The DFC must be adopted by a two-thirds vote of the GCD representatives present at a GMA meeting where at least two-thirds of the GCDs are present. Both the Texas Commission on Environmental Quality (TCEQ) and the TWDB have developed processes and rules for the purpose of appealing the DFC, the joint planning process, and a district's actions.

The TWDB is responsible for providing each GCD and Regional Water Planning Group (RWPG), located wholly or partly in the GMA, with modeled available groundwater quantities. Groundwater availability models and other data or information help in establishing modeled available groundwater for the relevant aquifers within the GMA. Once the modeled available groundwater is determined, the GCDs consider modeled available groundwater, among other criteria, to issue groundwater withdrawal permits

consistent with the DFC of the aquifer. These permits and associated monitoring help the districts track the withdrawals to support achieving the DFC established by the GMA.

For additional information on GMAs, go to:

- TWDB's GMAs webpage at http://www.twdb.texas.gov/groundwater/management_areas and,
- TWDB's GMAs map at http://www.twdb.texas.gov/mapping/maps.asp under the "Administrative Boundaries" heading.

For additional Frequently Asked Questions (FAQs) related to groundwater quantity, groundwater quality, septic systems, water wells, administrative entities, and publications, visit the Texas Groundwater Protection Committee's FAQ webpage at http://tgpc.state.tx.us/frequently-asked-questions-faqs/.