Where Is Uranium Found in Texas?

Uranium is a naturally occurring constituent of various rock types, such as granite and silica-rich volcanic rocks. Weathering of these rocks releases uranium into the environment, where it may be concentrated into a uranium deposit. Uranium also occurs in association with igneous and metamorphic activity. In the United States, most commercial uranium deposits occur in sandstones. The major uranium-producing states are New Mexico, Wyoming, Texas, Utah, and Colorado.

The main uranium-producing area in Texas is the South Texas Uranium Province, where uranium is produced from Tertiary-age sandstones (typically less than 1,000 feet deep). Small quantities of uranium have also been mined from sediments of the Triassic Dockum Group (below the Ogallala Aquifer) in the panhandle region and near-surface volcanic deposits west of the Pecos River, but all commercial uranium production has taken place in south Texas. Uranium deposits in the South Texas Uranium Province extend from Starr County at the international border with Mexico northeastward through Zapata, Jim Hogg, Brooks, Webb, Duval, Kleberg, McMullen, Live Oak, Bee, Atascosa, Karnes, Wilson, Goliad, and Gonzales counties. Figure 1 illustrates the status of in-situ uranium mines in the South Texas Uranium Province.

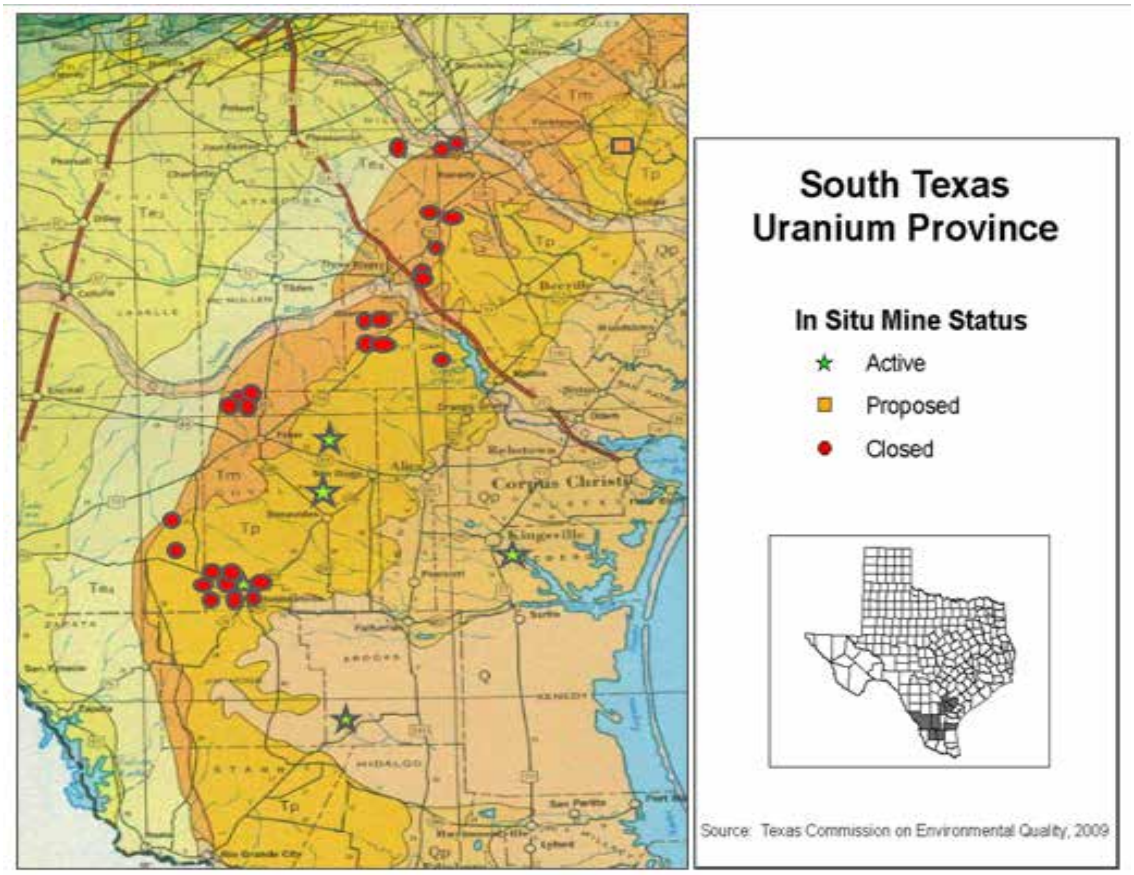

Figure 1. South Texas Uranium Province and Surface Geology

Resources and Useful Links

- Texas Commission on Environmental Quality (TCEQ) Source Material Recovery and By-Product Material Disposal, https://www.tceq.texas.gov/permitting/radmat/uranium/uranium.html
- TCEQ In Situ Leach and Conventional Uranium-Recovery Methods, https://www.tceq.texas.gov/permitting/radmat/uranium/process.html
- U.S. Environmental Protection Agency Class III Injection Wells for Solution Mining, https://www.epa.gov/uic/class-iii-injection-wells-solution-mining
- U.S. NRC NUREG 6870: Consideration of Geochemical Issues in Groundwater Restoration at Uranium In-Situ Leach Mining Facilities, https://www.nrc.gov/docs/ML1512/ML15128A764.pdf
- Texas A&M AgriLife Extension Service (TAES) *Drinking Water Problems: Radionuclides* (B-6192), https://agrilifeextension.tamu.edu/asset-external/drinking-water-problems-radionuclides/
- Texas Department of Water Resources, Report 291, Underground Injection Operations in Texas – A Classification and Assessment of Underground Injection Activities, 1984, https://www.twdb.texas.gov/publications/reports/numbered_reports/doc/R291/report291.asp

Other Frequently Asked Questions (FAQs)

To find additional FAQs visit the Texas Groundwater Protection Committee's FAQ webpage at https://tgpc.texas.gov/frequently-asked-questions-faqs.