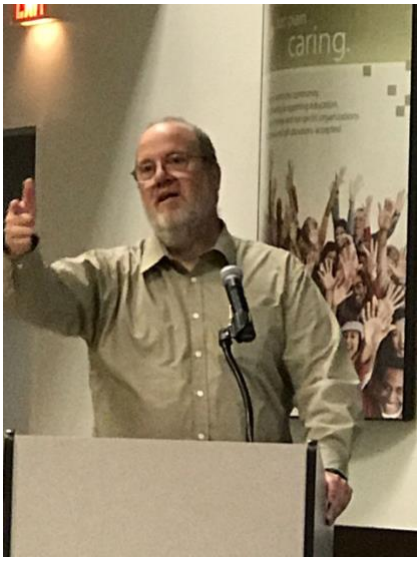
The CCCA's **May 2019** guest was Geary Schindel, Chief Technical Officer for the Edwards Aquifer Authority and President of the National Speleological Society.



Mr. Schindel's enthusiasm for caves began on a visit to Mammoth Cave in Kentucky as a young some states define caves according to a minimum length and depth.

At 22 miles long, Honey Creek Cave in Comal County is the longest cave in Texas. It lies in proximity to Guadalupe River State Park and the Honey Creek State Natural Area. It reaches a depth of 150 feet, and following its vertical shaft, the first approximately 2.5 miles of the cave are water filled. The caves in the Hill Country are dissolution caves, formed by the action of weak carbonic acid, the product of water and carbon dioxide combining.

Likewise, karst topography is formed by this dissolution process, most commonly in limestone, gypsum, and halite. Twenty percent of the United States is karst landscape, and several major water sources are located in karst formations. Here in the Hill Country, water moving across the Edwards Plateau (the contributing zone) reaches the Balcones Fault Zone, where it percolates through the karst of the Edwards and Glen Rose formations (recharge zone), and from there flows into the Edwards Artisian Aquifer. Comal and San Marcos Springs are the largest of the springs (in discharge).

The Edwards Aquifer system is biologically very diverse, with about 60 species associated with it. Many of these species are cave specific, and some are endangered, such as the blind Texas salamander. There are also species found at the surface, such as the fountain darter, which also is endangered. Untreated sewage and other pollutants are a threat to the aquifer as they can enter it rapidly through recharge features. Such threats endanger both our water supply and the home of the aquifer's diverse species assemblage.