



## **The History of Soil Science in Mexico**

J.M. Gonzalez (1), E. Ventura Jr. (2), J.Z. Castellanos (3), and E.C. Brevik (4)

(1) Appalachian Farming Systems Research Center, USDA-ARS, Beaver, WV, USA, (2) Facultad de Ingenieria, Universidad Autónoma Queretaro, Queretaro, Mexico, (3) Campo Experimental El Bajío, Instituto Nacional de Investigaciones Forestales, Agrícolas, y Pecuarias, Celaya, Gto, Mexico, (4) Departments of Natural Sciences and Agriculture and Technical Studies, Dickinson State University, Dickinson, ND, USA

There is a lack of information concerning the history of soil science in developing countries such as Mexico. Soil knowledge in the pre-Colombian era was a notable attribute of indigenous people in Mexico. Mayas and Aztecs classified soils based on properties and land use and developed a terminology still used by locals. International organizations and institutions advocating modern agricultural practices have played an important role in the development of soil science in Mexico, in conjunction with the Green Revolution in which the use of fertilizers for crop production was implemented. Soil fertility, as an area of study, has developed significantly in the country. One of the most significant impacts of the Green Revolution on the development of soil science in Mexico was through academic exchange, in which Mexican soil scientists obtained graduate-level degrees in the United States and later returned to Mexico to conduct research programs. Although Mexico has a long history of soil knowledge, soil scientists are facing several challenges today, including a lack of communication between farmers and scientists, soil erosion, soil contamination, and water usage. Some researchers have suggested that ethnopedological knowledge should be incorporated into modern Mexican soil science.