

Metadata Records
Irrigation Innovation Consortium-Supported Project Datasets

Please use a separate sheet for each dataset. Answers are automatically saved.
 Questions? Contact Diane DeJong: diane.de_jong@colostate.edu.

Thank you!

Question	Answer
Project name	Extension Outreach Tools to Improve Adoption of Irrigation Management Technologies in the Texas Panhandle
Project background	The specific objectives of our project are to 1) develop a user friendly, online decision tool aimed at producers for optimizing acreage of multiple irrigated and dryland crops, 2) evaluate reduced tillage (no-till and strip-till) for improving crop water use efficiency and corn yields, and 3) develop a soil moisture sensor selection and assessment tool to aid producers with informing irrigation decisions.
Dataset name	Soil moisture sensor data - forage sorghum
Primary author Include first & last name, institution affiliation, and email address.	David Parker, West Texas A&M University, dparker@wtamu.edu
Primary contact The primary contact may be the same or different from the primary author. Include first & last name, institution affiliation, and email address.	David Parker, West Texas A&M University, dparker@wtamu.edu
Dataset description Please provide a brief, clear summary description of the dataset contents. Indicate as applicable: purpose and scope; time period; areas of investigation; and any other special characteristics.	One year of data using three types of soil moisture sensors on irrigated forage sorghum. A total of 6 AquaSpy sensors, 2 GroGuru sensors, and 9 Acclima TDR sensors were installed. The experiment had five irrigation treatments of 0, 0.5, 1.0, 1.5, and 2.0 inches per week. In the AquaSpy, moisture content and temperature were measured in 4-inch increments, to 48 inch total depth (12 depth locations per sensor). In the GroGuru, moisture content and temperature were measured in 4-inch increments from 16 to 48 inches. In the TDR sensors, moisture content were measured in three locations at depths of 6, 12, and 24 inches.
Spatial coverage Please be specific as possible about the geographic coverage of your data, and record the information according to defined standards, such as FGDC or the Getty Thesaurus of Geographic Names. You can enter lat/long data, county names, state names, etc.	Located in Randall County, Texas. Approximately 6 miles northeast of Canyon, Texas, near intersection of South Washington Street and West McAfee Road. Lat/Lon=35.05905392400982, -101.84851990989506
Temporal coverage Describe the temporal coverage of your dataset: Start: Time of day, Date, Month, Year Finish: Time of day, Date, Month Year	July 7, 2023 - November 17, 2023, Data recorded every 15-60 minutes. On-site weather station data is available.
Re-use limitations Describe known problems or caveats that would limit reuse of the data (e.g., uncertainty, sampling problems, blanks, quality control samples) and/or that future potential users of your dataset should know about. Or indicate "None."	

<p>Citations Please include full citations and DOIs for articles published based on or related to this dataset. Or indicate "None."</p>	
<p>Keywords Please add a few appropriate National Agricultural Library keywords: https://agclass.nal.usda.gov/vocabularies/nalt</p>	<p>soil moisture content; irrigation management; extension education; Texas; corn; sorghum; irrigated farming; dryland farming; center pivot irrigation; no-tillage; strip tillage</p>
<p>Tags Please add a few of your own user-defined tags that would be useful to others who might use your dataset in the future.</p>	<p>decision tool; crop water use efficiency</p>
<p>Acronyms & abbreviations Please define any acronyms, site abbreviations, or other project specific designations used in your dataset. Or indicate "none."</p>	
<p>Other dataset storage location Has this dataset already been uploaded elsewhere? Yes or No</p> <p>Reasons may include a requirement as part of publishing a paper or storing data on GitHub or other locations to make accessible to others.</p> <p>If yes, please provide the link or other information to explain where the dataset is located and where or how it can be accessed.</p>	<p>Data has not been uploaded elsewhere. Data is on the PI's personal computer. Contact the PI for further information and for access to this data.</p>