# CZO Metadata Worksheet

|  |  |
| --- | --- |
| Data File Names | SH\_TreeSurvey\_2008.xls, SSH\_TreeSurvey\_2012\_Updates.xlsx |
| Date Prepared | 1/21/2011 |
| Descriptive Title | Shale Hills Susquehanna Critical Zone Observatory Tree Survey Data |
| Update Frequency | Annual, as needed. |
| Abstract | Trees in the Shale Hills watershed were originally surveyed in 2008, with some updates in 2012. Tree survey data includes an assigned tree number with associated data including species, diameter, height (when available), and GPS coordinates (NAD 1983 State Plane Pennsylvania South FIPS 3702, units in meters).  This dataset has been registered with the EarthChem Library and assigned a dataset DOI. Please reference the associated DOI below for any research derived from this data.  SSHCZO Tree Survey (2008): [doi:10.1594/IEDA/100268](http://dx.doi.org/10.1594/IEDA/100268)  SSHCZO Tree Survey (2012 Updates): [doi:10.1594/IEDA/100516](http://dx.doi.org/10.1594/IEDA/100516) |
| Investigator  Contact Info | Dr. David Eissenstat, Professor of Woody Plant Physiology, The Pennsylvania State University, 201 Forest Resources Building, University Park, PA, 16802, 814.863.3371, [dme9@psu.edu](mailto:dme9@psu.edu).  Dr. Margot Kaye, Associate Professor of Forest Ecology, The Pennsylvania State University, 303 Forest Resources Building, University Park, PA, 16802, 814.865.4841, [mwk12@psu.edu](mailto:mwk12@psu.edu). |
| Data Value Descriptions | Tree ID: Tree identification number assigned  Species code: 4 letter code for species, see Species Codes sheet  DBH: Diameter at breast height (1.2 m from the ground) in cm Crown class: D = dominant, CD = codominant, I = intermediate, S = suppressed  X: X coordinate (GPS)  Y: Y coordinate (GPS)  Elevation: Elevation in meters |
| Keywords | trees, species, height, diameter, survey, |
| Methods | * Diameter at breast height (DBH): "Pro Tape" Diameter tape, Spencer Products Company * Tree height: Laser rangefinder, TruPulse 360 B, Laser Technology Inc. |
| Citation | The following acknowledgment should accompany any publication or citation of these data: Logistical support and/or data were provided by the NSF-supported Shale Hills Susquehanna Critical Zone Observatory. |
| Publications | * Meinzer, F.C., D.R. Woodruff, D.M. Eissenstat, H.S. Lin, T. Adams, and K.A. McCulloh, 2013. Above- and belowground controls on water use by trees of different wood types in an eastern United States deciduous forest. Tree Physiology, 1-12, doi:10.1093/treephys/tpt012 * Naithani K.J., D. Baldwin, K. Gaines, H. Lin, & D.M. Eissenstat, 2013. Spatial distribution of tree species governs the spatio-temporal interaction of leaf area index and soil moisture across a forested landscape. PLoS ONE, doi:10.1371/journal.pone.0058704 |
| Data Use Notes | The user of Shale Hills Susquehanna CZO data agrees to provide proper acknowledgment with each usage of the data. Citation of the name(s) of the investigator(s) responsible for the data set, in addition to the generic statement above, constitutes proper acknowledgment. Author(s) (including Shale Hills Susquehanna CZO investigators) of published material that makes use of previously unpublished Shale Hills Susquehanna CZO data agree to provide the Shale Hills Susquehanna CZO data manager with four (4) copies (preferably reprints) of that material for binding as soon as it becomes available. The user of Shale Hills Susquehanna CZO data agrees not to resell or redistribute shared data. The user of these data should be aware that, while efforts have been taken to ensure that these data are of the highest quality, there is no guarantee of perfection for the data contained herein and the possibility of errors exists. These data are defined as either public or private, such that a password may be required for access. |