2012 Hydric and Subaqueous Soil Committee Report

Jim Turenne and Jim Brewer Chairs

Rob Tunstead recorder

Hydric Soil Committee

- Election of Chairs for 2014 (VT/NH?) – Rob Tunstead and Jim Brewer.
- Red Soil Study – Don Parizek
- Mesic Spodic TA-6 - Jim Turenne
- IRIS Tube Standard
- NEHSTC Updates – Jim Turenne
- Mid-Atlantic Updates – Jim Brewer
- Hydromorphology of Holocene Dune Landscapes – Marty Rabenhorst

Hydric Soil Committee

- Discussion on becoming a Standing Committee on Hydric and Subaqueous Soils (send to Bylaws).
- Epi saturation in soils with densic layers.
- Discussion on determination of SOC in hydric soils.
- Need for clarification on terms for organic soil materials.
- EPA NWCI – not discussed.

Red Soils

- Issue discussed at 2010, Northeast presented support data to move TF-2 to be moved to an approved indicator.
- F-21 came out (June 2010 errata) as replacement for TF-2.
- Data shows TF-2 works better for younger glacial soils.
- A proposed F-22(?) will be drafted and sent to National for 145/144A.

Mesic Spodic

- Review of TA-6 for 144A/149B/145.
- 4 study sites have been monitored for two years results show TA-6 works well.
- Final data plots will be sent to National for adoption to A-? In V 8

IRIS Tube Standard

- Recommendation to change technical standard from 30% removal in a 15 cm zone w/in 15 cm to 20% in 10 cm zone (90% confidence soil is reducing).

Epi saturation & densic layers

- Issue: soils developed in lodgement till with densic materials not being classified as epi-saturated.
- Propose removing densic from page 31 in Taxonomy. Change the definition of epi to include densic materials. Currently densic materials aren't considered diagnostic and there are not used in taxonomic placement

b. Episaturation.—The soil is saturated with water in one or more layers within 200 cm of the mineral soil surface and also has one or more unsaturated layers, with an upper boundary above a depth of 200 cm, below the saturated layer. The zone of saturation, i.e., the water table, is perched on top of a relatively impermeable layer such as a densic layer or fragipan.

Pg 24 Keys 11th

In the "Key to Soil Orders" and the other keys that follow,

the diagnostic horizons and the properties mentioned do not

include those below any ~~densic,~~ lithic, paralithic, or petroferric

contact.

Clarification on Terms for Organics

- There is a need for a resolution to correct the current discrepancy between the National Indicators, Regional Supplements, and the field book for describing and sampling soils. The field book on page 2-34 from September of 2002 describes soil materials for Histic epipedons and Histosols as muck, mucky peat, or peat and for mineral soils as slightly, moderately, and highly decomposed plant materials. The later disagrees and contradicts the National hydric indicators, regional supplements, and NASIS data nationwide may need to be changed as well.

Subaqueous Report

- Ongoing discussion on adding new orders to Wass or limit SAS to Ent/Hist/Incept.
  - Leaning to modifying “The Soils We Classify” section to include section on SAS (after buried soils) – submergence = time zero??
- Proposal to to add 2 new suborders - Terric Sapric Frasiwassents and Terric Sapric Sulfiwassists.
- CMECS “we lost the battle but won the war”. The NRCS soils approach is recommended for use if further classification of the water system is required…