

# Sixty-First Annual Meeting of the Soil Science Society of North Carolina

“to increase and disseminate knowledge of soils of the  
State and their uses”

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## Tuesday Morning, January 16, 2018

- 7:30 Room 1CD: Poster and Exhibit Setup
- 8:00 Meeting Registration Opens in Lobby
- 8:00 Room 1CD: Soil Texture Contest  
Conducted by Nick Howell
- 8:00 - 9:00 Room 4  
Consulting Soil Scientists of the Carolinas  
Annual Meeting  
CSSC President, Presiding

### OPENING SESSION

- 8:30 - 9:40 Room 1CD: Exhibits, Vendors and  
Posters

### DIVISIONAL MEETINGS

- 9:00 - 9:10 Room 1A: Bus., Consulting and Industry  
Room 4: Governmental Agencies
- 9:15 - 9:25 Room 1A: Public Health  
Room 4: Academic and Research

- 9:30 - 9:40 **BREAK** - Room 1CD: Exhibits,  
Vendors and View Posters

- 9:40 - 11:00 **SOCIETY BUSINESS MEETING**  
**Room 1A**  
President Steve Broome, Presiding

- 11:00 - 12:00 **KEYNOTE SPEAKER – Room 1A**  
*Landslides*  
Dr. Ken Taylor, LG  
State Geologist, NC Geological Survey

- 12:00 Room 2C: **LUNCHEON**

Tuesday Afternoon, January 16, 2018

## Session 1: AGRONOMIC SCIENCE Room 1A

- 1:15 *Soil Testing in North Carolina: Building on a  
Great Heritage in Continuing Excellent Service  
for Agriculture’s Future.* David H. Hardy,  
Director of Soil Testing, NCDA Agronomic  
Services
- 1:40 *Models or Phosphorus Indices: A Southern  
Saga.* Deanna Osmond, Crop and Soil Sciences,  
NCSU
- 2:05 *Enriching Soil, Enhancing Life: Taking Action  
for Soil Health.* Steven R. Shafer, Chief  
Scientific Officer. The Soil Health Institute
- 2:30 *Phosphate Solubilization from Ferrihydrite, Fe  
and Ca Phosphates in the Presence of AVAIL®  
Polymers.* Sarah Doydora, Margaret Thompson,  
and Dean Hesterberg Crop and Soil Sciences,  
NCSU
- 3:00 **BREAK AND POSTER REVIEW**
- 3:15 *Role of Soil Quality in Achieving Global Food  
Security.* Robert Patterson, Crop and Soil  
Sciences, NCSU
- 3:40 *Achieving soil health in cotton production  
systems.* Alan Franzluebbers, Crop and Soil  
Sciences, NCSU
- 4:05 *Growing Grass for Biofuel on Marginal Land:  
Comparative Assessment of Greenhouse Gas  
Emissions of Annuals vs. Perennials.* B.S.  
Farmaha<sup>1\*</sup>, J.J. Volenec<sup>2\*</sup>, S.M. Brouder<sup>2</sup>. <sup>1</sup>Dept  
of Plant & Environmental Sciences, Clemson  
University. <sup>2</sup>Dept of Agronomy, Purdue  
University.
- 4:35 *Nutrient Management and North Carolina  
Biofuel Cropping Systems.* Carl R. Crozier and  
T. Jot Smyth. Crop and Soil Sciences, NCSU

- 5:00 **SOCIAL HOUR and POSTER SESSION**  
**With Authors Present – Room 1CD**

Tuesday Afternoon, January 16, 2018

## Session 2: ONSITE WASTEWATER RULES AND SOIL EVALUATION Room 4

- 1:15 *General Geology and Rock Types – North  
Carolina Piedmont.* Phil Bradley, PG, NC  
Geological Survey
- 1:40 *System to Site Morphology Considerations.*  
Patrick Eaton, REHS, Durham County Health  
Department
- 2:05 *A Water Person’s Perspective on Geology and  
Soil Education.* Diana Rashash, PhD EI, NC  
Cooperative Extension
- 2:30 **BREAK AND POSTER REVIEW**
- 3:00 *Soils, Geology and Geomorphology of the NC  
Mountains.* Stan Crownover, LSS, REHS,  
Buncombe County Environmental Health
- 3:25 *Construction Site Stormwater Management.*  
Richard A. McLaughlin, Crop and Soil Sciences,  
NCSU
- 3:50 *Special Site Evaluations, Mass Loading, and the  
New .1948(d) – Changes in the Proposed 18E  
Rules that could impact LSS and LG* Tricia  
Angoli, PE, NC Department of Health and  
Human Services
- 4:30 *NCDA&CS Division of Soil and Water  
Conservation Program Update.* Vernon Cox,  
Director, Division of Soil & Water Conservation,  
NCDA
- 5:00 **SOCIAL HOUR and POSTER SESSION**  
**With Authors Present – Room 1CD**

**Wednesday Morning, January 17, 2018**

**7:30 CONTINENTAL BREAKFAST  
Room 1CD**

**Session 3: GEOLOGY AND SOILS  
Room 1A**

9:00 *Mountain Colluvial Soil & Landslide Case.*  
Barrett Kays, Landis

9:30 *Utilization of Soil Surveys in Geological  
Investigation of Late Cenozoic Estuarine-Marine  
Sediments in the Upper Tar River Watershed.*  
Steve Stadelman, NC LSS

**10:00 BREAK AND POSTER REVIEW**

10:15 *Nutrient and Bacteria Attenuation in Soil and  
Groundwater Beneath Three Large Onsite  
Wastewater Systems.* Charlie Humphrey and Guy  
Iverson, East Carolina University

10:45 *Soils & Geology in North Carolina.* Joe Kleiss,  
Retired Professor, Soil Science Department, NC  
State University

11:15 *Geology, Soils, and Land Use Limitations of the  
Deep River Triassic Basin of NC* – Rich Hayes,  
NC LSS, Retired, NCDENR

**Wednesday Morning, January 17, 2018**

**Session 4: GROUNDWATER AND SOILS  
Room 4**

9:00 *Groundwater Aquifer Testing.* Ed Andrews, NC  
LSS, Ed Andrews & Associates

9:30 *Groundwater Modeling.* Ed Andrews, NC LSS,  
Ed Andrews & Associates

**10:00 BREAK AND POSTER REVIEW**

10:15 *Designing Soils for Longwood Gardens.* Barrett  
Kays, Landis

10:45 *Designing Soils for NMCA.* Barret Kays, Landis

11:15 *Land Application of Concrete Residuals.* Sheri  
Knox, PG, AMEC, Rob Willcox, LSS, Willcox  
& Mabe

**12:00 ANNUAL AWARDS BANQUET  
Room 2C**

President Steve Broome, Presiding

- ❖ Hands of the Master Award  
Nick Howell
- ❖ Hubert J. Byrd Scholarship
- ❖ Annual Achievement Award
- ❖ Special Recognitions

**Wednesday Afternoon, January 17, 2018**

**Session 5: CLOSING PROGRAM  
Room 1A**

1:15 *Soils and Hemp.* Matt Collogan, Hemp Farmacy

1:40 *Clay Mining in North Carolina.* Steve  
Blankenbeker, Clay Products, Inc.

2:05 *Clay Mining & The Pottery Industry.* Ben Owen  
III, Ben Owen Pottery, Inc.

**2:30 BREAK AND POSTER REVIEW**

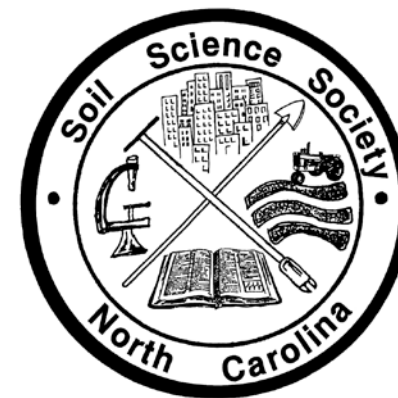
2:45 *Update on NRCS Soil Science Division Plans  
and Activities.* Greg Taylor and Debbie  
Anderson. USDA, NRCS

3:15 *The Past Thirty Years: Perc Test to  
Permeameter.* Alan Clapp, Retired - Orange  
County Health Department, and Scott Greene,  
NCDHHS

3:45 DISCUSSION

4:00 ADJOURN

# Soil Science Society OF NORTH CAROLINA



Sixty-First Annual Meeting

January 16-17, 2018

Jane S. McKimmon Center  
Raleigh, NC

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President	Steve Broome
Past President	Jeff Vaughan
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Thank you for attending!  
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