



# PEDOLOGUE

• Fall, 2003

Newsletter of:  
Mid-Atlantic Association of Professional Soil Scientists

## In this issue:

- New Delivery System – Get your Newsletter from MAPSS Web Site – and new editor.
- Minutes of May 10, 2003, Meeting at University of Maryland
- President's Message
- How old is this soil? Guessing the age of soil examined at May 10 meeting
- MAPSS Fall Workshop/Field Trip in Delaware for Soil Scientists and Septic Installers
- Calendar of events of interest to MAPSS members and other soil scientists
- MAPSS scholarship Awardees for 2002-03 and 2003-04.
- Miscellaneous Editor's Comments

## **New Delivery System and New Editor**

For the first time with this issue, Pedologue is available from the MAPSS Web Site, <http://sawgal.umd.edu/mapss/>. We (the editor is writing this for the executive council) hope that you are getting this issue from the web site, however, we have a bit of a quandary because we don't have e-mail addresses for all MAPSS members -- so we can't inform everyone by e-mail of the availability of this document at the web site. As we go to "press" it is our intention to send a hard copy of this document to those members for whom we have no e-mail address. We request that member readers inform Jim Brewer [James.Brewer@md.usda.gov](mailto:James.Brewer@md.usda.gov) or Del Fanning (see e-mail and other addresses below) of your e-mail address so that notice of future issues that are on the web site can be sent to you by e-mail. We will also produce some hard copies to have available (from the editor) for giving out to interested individuals who may want to join MAPSS etc.

The main advantage of having the Newsletter available from the web site is the big saving in postage costs that we hope to achieve by not having to send it out by postal service. Also we will be able to put in color pictures etc. at low cost as we are doing with this issue

With this issue Del Fanning is starting to serve as your Newsletter Editor. For your information, Del is also serving as chair of the Education and Public Relations Committee. Other members of this committee are Phil Snow, Gary Jellick and Brian Needelman. We need information and stories for future Pedologue issues so we strongly encourage you to send such to Del at [df3@uemail.umd.edu](mailto:df3@uemail.umd.edu)

Postal Mail can be sent to Del at: Dr. Delvin S. Fanning, Department of Natural Resource Sciences and Landscape Architecture, University of Maryland, College Park, MD 20742-4452. Del can be telephoned at the university: 301-405-1308 or at home: 301-864-5561 (answering machine is for Aunt Emily's Dolls – Aunt Emily is Del's wife). Sometimes Del spends a couple of weeks at a time at his Lewis County, NY, alternate home. He may be reached there by phone at 315-688-2545 or by e-mail at DelvinDel@aol.com

### **May 10, 03, Gathering at the University of Maryland and Minutes of the Business Meeting**

At the meeting there was an opportunity for members to renew their membership and for new members to join. The program consisted of a presentation on the University of Maryland Soil Monoliths Collection by Del Fanning in celebration of the collection that was started 50 years ago in 1953 by Dr. Gerry Bourbeau. The presentation was followed by an opportunity to tour the collection and to visit the newly renovated soil science lab facilities in H. J. Patterson Hall where the meeting was held.

Before lunch a MAPSS business meeting was held at which new officers were elected to serve through 2004. Minutes of the meeting were kept (written) by Jim Brewer and are reproduced below for all to have an opportunity to read. Some who have looked at the minutes think that Jim's estimate of the number that attended is low. Perhaps the additional attendees, that brought the total number that attended to 40 to 50 were not all paid members so Jim didn't count them all. We owe Jim a big thank you for contributing these great minutes for the Newsletter.

## **MAPSS Membership Meeting 5/10/03 University of Maryland, HJ Patterson Hall**

Called to order 11:20 AM

Attendance: approx. 20 current members and 6 new student members

Martin Rabenhorst presided over the meeting

Jim Brewer gave a brief history of MAPSS. Most recently several charter members and past officers of MAPSS got together to revitalize the organization. At these meeting participants volunteered to be elected officers and head the standing committees. There were also discussions pertaining to the scholarship fund, a new web site, the Smithsonian Soils Exhibit, and future events.

Marty Rabenhorst conducted modified elections for officers which will cover 2003 and 2004.

Below are the results.

President – Martin Rabenhorst submitted his name for nomination

Asked for any other nomination, none received

Paper ballot voting

Bruce Bagley made a motion to conduct elections by voice vote; 2<sup>nd</sup> and approved

Elected unanimously by voice vote to the office of President

President Rabenhorst then appointed Gary Jellick as acting Past President

President Elect – Phillip King submitted his name for nomination

President Rabenhorst asked for any other nominations, none received

Elected unanimously by voice vote to the office of President Elect

Vice President – Brian Needelman submitted his name for nomination

President Rabenhorst asked for any other nominations, none received

Elected unanimously by voice vote to the office of Vice President

Secretary/Treasurer – James Brewer submitted his name for nomination

President Rabenhorst asked for any other nominations, none received

Elected unanimously by voice vote to the office of Secretary/Treasurer

Members At Large – Diane Shields, Carl Robinette submitted their names for nomination

President Rabenhorst asked for other nominations, Bruce Bagley submitted his name

Elected by secret ballot to Members At Large - Diane Shields and Bruce Bagley

Officers and Committee Chairs for 2003/04

President: Martin Rabenhorst-----Ex-officio member of all committees except Nominations.

Past President: Gary Jellick-----Chairperson of Nominations Committee

President Elect: Phil King-----Develops Program for this year

Vice President: Brian Needelman-----Chairperson of Membership and Ethics Committee

Sec./Tres.: James Brewer-----Ex-officio member of Finance Committee

Member at Large: Diane Shields

Member at Large: Bruce Bagley

Below is the list of chairpersons for the standing committees as appointed by the President

Finance -----William Effland

Constitution and By Laws -----Gary Jellick

Membership and Ethics-----Brian Needelman

Nominations-----Gary Jellick

Education and Public Relations---Delvin Fanning

Certification-----Vacant

## **COMMITTEE REPORTS**

### Finance

Gary Jellick gave the financial report for the past several years. Gary reported that no dues have been collected since 2000. There is presently \$600 in the checking account.

Gary wanted to maintain the scholarship funding for 2002 and 2003 so he contributed \$1000 of his own money, but would like to be reimbursed. \$440 has been collected today in membership dues. It was decided by the members present to reimburse Gary. (NOTE: At a reorganization meeting on 3/18/03, with past officers and charter members present, it was suggested that the dues for full members be increased to \$30 and for affiliate members increased to \$20. Student membership dues would remain at \$10. This would be the first increase in dues MAPSS would have since chartered.)

There was a question from the members present as to where our dues go. The collective response was: \$500 scholarship each spring to U. MD agronomy student; high school environthon program; Maryland land judging program to send the team to national contest; monies needed to organize a workshop/educational program.

#### Education and Public Relations

Del Fanning led a discussion about the MAPSS newsletter being put on the web page instead of paper mailed copies. Del requested articles from the members. Robert Hill stated the newsletter could be sent out via email to the members who could download it as a PDF or CMT file. Del requested help from any members with computer abilities. President Rabenhorst questioned the need for a hard copy. Gary stated a hard copy could be developed once a year for non members.

Ray Weil added in that hard copies are expensive and that emailings and the web site should be enough.

#### Program development for Fall 2003

President Elect Phil King led this discussion on a proposal for a workshop in Delaware for onsite waste water soil scientists. Vice President Brian Needelman suggested the workshop be open to septic system installers and other related workers to attract more participants. Phil requested from members that know cases of failure to use in the workshop presentations. It would be a two day session to receive 10 CEU credits. It would be sponsored by MAPSS with input from DNREC.

#### Web Site

Brian discussed the MAPSS web site that he and other U. OF MD personnel and students had developed. He wants to do a consultants list of some sort. Marty mentioned it was a great site and thanked them for their work.

#### Smithsonian Soils Project

Diane Shields has volunteered to head this "ad hoc" committee up. Discussion on what MAPSS could do: sponsor a state monolith; send out fliers for donations.

Marty reminded all that there would be a brief field visit to a floodplain soil on the campus with a friendly contest as to the age of the soil.

Meeting adjourned at 12:30 PM

## **President's Message**

From the President

MAPSS for the New Millennium

Our gathering on May 10 seemed by all accounts to be a great success! We had a wonderful opportunity to reacquaint ourselves with old and new colleagues alike. We elected a new slate of willing and able officers. We were able to get a look at the newly renovated soils facilities at UMD, and Carl Robinette got to eat real donuts to boot! Then we all did what most of us enjoy doing most -- we examined an interesting soil in the field. In this case it was a profile in a pit exposed along the flood plain of a tributary of Paint Branch Creek on the UMD Turf Facility. The soil was mapped in the Prince George's county soil survey as Bibb. We then debated its origins, classification, interpretations, and its age! – see subsequent story on how old is this soil.

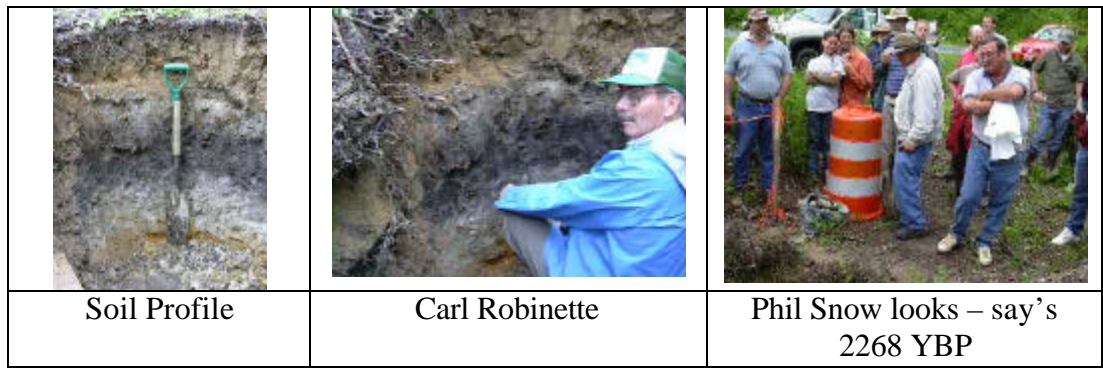
Through most of its existence, MAPSS has enjoyed vital activity and interest, and we are expecting, during the next year and a half, to reestablish MAPSS as an organization that is current, important and serving the interests of its members. We are already in the process of planning several events for the coming year that we hope you will find useful, interesting and enjoyable. One of these events (in mid-October) will be a workshop designed to provide training for Site Evaluators in DE. President-Elect Phil King is heading this up and I am sure we will hear more about this from Phil in the coming weeks (*editor's note* -- there is a notice about it in this issue of the newsletter). While this is primarily an educational and service-oriented event, it will undoubtedly assist us financially and will help us to continue to do such things as support the Soil Science Scholarship. We also are planning a retreat and field outing where we will have the chance to study some interesting soils, hopefully accompanied by data and with some stories to go along. We will try to find a nice setting for this event with good scenery and good soils to go along with a good time together. We'll let you know more about this as soon as we get things lined up.

This era is a busy time, and this region is a busy place. We all face too many demands. For MAPSS to thrive, it must be an organization that you find helpful professionally, and also enjoyable. That is what we want it to be. In this newsletter you will find a list of the officers and also the names of Committee chairs (see the minutes of the May 10 meeting). If you would like to be involved in any aspect of the organization, you would be most welcome. Just give us a call or drop us an email. MAPSS will be whatever we make it!

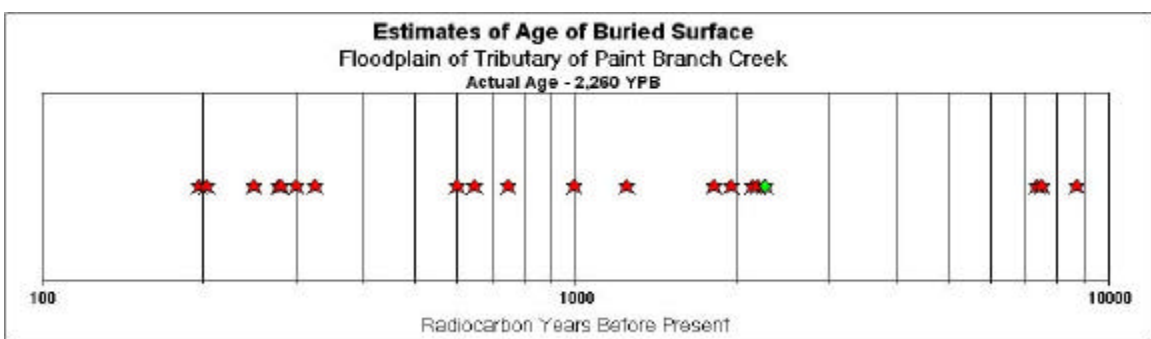
## **How Old is this Soil?**

How often have you asked yourself this question as you were in the field, examining an

exposed soil profile or making a description from an auger boring? Usually we can do nothing more than offer an educated guess, based on our experience and maybe a few limited opportunities to get radiocarbon dates, or to locate some other kind of identifiable markers within the soil. On May 10, as we met at the Turf Farm for the MAPSS kickoff, we had the chance to apply our pedo-chronological skills in estimating the age of a soil formed along a tributary to Paint Branch Creek. The profile was beautiful (see photo) and it contained a nice buried A horizon at a depth of 56 cm. In anticipation of the meeting, we isolated some charcoal from the Ab horizon, on which we were able to get a radiocarbon date. While not necessarily giving us an absolute age for the overlying soil, it does provide a maximum age.



To test everyone’s skills, we had a raffle, where for a nominal fee, one could register one’s “best professional judgement” on the age of the soil. There were 20 brave soil scientists who were willing to go on record using their BPJ. The results are listed below (with names omitted, except for those closest, to protect our egos.) The results were very interesting. The answers fell into 4 basic groups, which likely reflected the judgements and assumptions made by those individuals.



One group viewed this soil as the result of an early Holocene event and therefore estimated ages in the range of 7-9Ky. They may have interpreted the higher clay content of the Bg horizon as the result of illuviation and as an argillic horizon, and therefore probably viewed the setting as a stream terrace, rather than an active floodplain. A second group clearly thought that the material above the buried A, was the result of post Colonial settlement and therefore estimated the age to be in the 200-350 yr range. A

third group, which estimated ages in the 600-1000 yr range, may have also been thinking that this represented deposition following post Colonial settlement, but may have been trying to consider the mean residence time of the organic materials in the Ab horizon. Then there was a small group who correctly estimated the age at approximately 2000 yrs. The individuals in this group were Phil King (1966YBP), Barry Glotflety (2150YBP), Carl Robinette (2200YBP) and Phil Snow (2268YBP). The Beta Analytic C date was 2260YBP. When Phil Snow was asked to explain his rationale for selecting an age of 2268, he provided such an interesting and entertaining saga which included a discussion of Vikings, that we were a little disappointed that he was a full 8 years off! At our next meeting, you may want to ask Phil or one of these others what went into their thinking and how they managed to arrive at such a close estimate.

By Marty Rabenhorst

MAPSS

# Fall Field Trip

*October 13, 2003*  
Dover, Delaware

## Agenda (Draft)

**Registration (7:30 to 8:00 am) – Meet at Dunkin Donuts, 1230 Forest Ave. (Rt. 8), Dover, Delaware – Coffee and Donuts provided.**

**8:00 - 9:30** *Problematic soils – Anomalous Bright Loamy Soils (ABLS)*  
Morphology, Genesis, Geomorphology and Classification -  
Dr. Marty Rabenhorst (Prof.) and Phil Zurheide, (M.S. Candidate) Univ.  
of Maryland

**9:30 - 10:30** *New Soil Series Blackiston – Fragiaquult*  
Morphology, Genesis, Regional Distribution and Interpretation -  
Diane Shields and Phillip King, NRCS Soil Scientists

**10:30-12:00** *Compaction – lot inspection, identification, and remedial activity*  
Field inspection methods, reporting protocol and Installation problems -  
Bruce Bagley and Jack Hayes, DNREC Soil Scientists and Diane Shields,  
NRCS Soil Scientist

**12:00 (?)** *Lunch – Bruce Bagley’s Farm (Cook Out)*  
(Lunch is provided by MAPSS) hamburgers,  
Hot dogs, sodas, BEER

**1:30-4:00** *Alternative technology for Denial soils*  
Micro-drip, Sand filters, Peat beds etc. What soils are suitable for  
innovated technology - Bruce Bagley and Jack Hayes, DNREC Soil  
Scientists

**Who should attend?** Soil Scientist (Class D) Septic Installers (Class E)

MAPSS  
**Fall Field Trip**  
*October 13, 2003*  
Dover, Delaware

**Application Form**

Name \_\_\_\_\_

—

Business \_\_\_\_\_

\_\_\_\_\_

**Address** \_\_\_\_\_ **City** \_\_\_\_\_ **State** \_\_\_\_\_ **Zip** \_\_\_\_\_

Phone Number ( ) \_\_\_\_\_

E-mail \_\_\_\_\_

Member and Affiliate \$75.00

Non-member \$100.00

Students \$20.00

Make Checks payable to Mid-Atlantic Association of Professional Soil  
Scientist (MAPSS)

RSVP by Oct 1, 2003

There will be a registration cap of 35 participants

Contact:

Phillip S. King

10912 Old Furnace Road

Seaford, DE 19973

(W) 302.856.3990 x. 126

(H) 302.628.8290

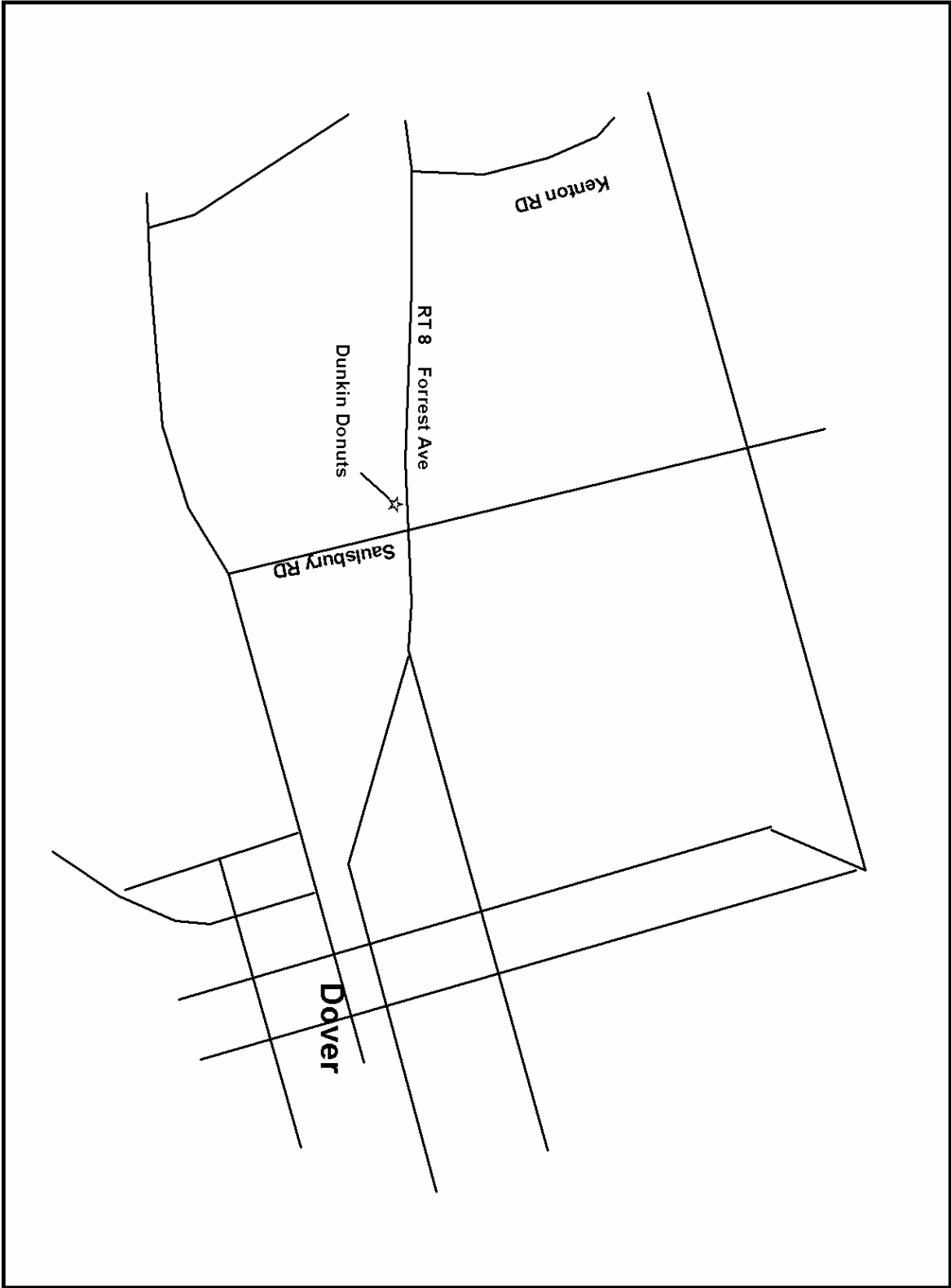
[Kingdirtman@aol.com](mailto:Kingdirtman@aol.com)

MAPSS home page

<http://www.sawgal.umd.edu/mapss/>

### ***Location Map***

See next page



## **Calendar of Some Events of Interest to MAPSS members during Fall 2003**

Fall Semester at University of Maryland Started: Tues., Sept. 2.

Pedology and Associated Soil Science Research Meetings at the University of Maryland will be on Tuesday mornings at 9am in room 1129 H. J. Patterson Hall starting on September 23, but will not be held during national ASA/SSSA meetings.

Somerset County Soil Survey Field Review: October 6-8.

MAPSS Workshop/field trip (in DE) for Sanitarians etc.: Monday, Oct. 13.

Northeast Soil Judging Contest in Rhode Island, October 14-18.

National ASA/SSSA Meetings in Denver, CO, Nov. 2-6.

MAPSS Fall Meeting and Field Trip: When? Where? Remains to be scheduled

Thanksgiving Recess at UM: Nov. 27-30

Last Day of Classes for Fall Semester at UM: Dec. 12.

## **MAPSS scholarship awardees at University of Maryland for 02-03 and 03-04**

It was announced at the MAPSS meeting on May 10<sup>th</sup> that the scholarship awardee for 02-03 was Bryan Strong and that the awardee for 03-04 is Allison Anne Arnold. Both awardees were soil judges on the team that went to the national contest hosted by Texas A&M in April 2003 and Bryan is judging again this fall, preparing for the contest to be hosted by the University of Rhode Island.



Allison Arnold (left) and Bryan Strong (middle) are recognized on May 10<sup>th</sup> as MAPSS scholarship winners by Dr. Brian Needelman (right). Needelman coached both on Maryland's 02-03 soil judging team.

## **Miscellaneous Editor's Comments**

This issue is truly an experiment to see if we can do an electronic issue and make it so MAPSS members can get it and read it ok etc. Readers (and those if any who can't get it) are requested to let those of us who have put it together know what you think. There are a lot of you out there who are more experienced with the computer game than me so I expect I'll be getting some advice – just don't hit me too hard.

There are some of our members who have gone on to promised-land or have otherwise passed from our midst since Pedologue last appeared -- including our revered past editor George Demas. Is there anyone out there who can do cartoons or compose funny stories to help keep us smiling and laughing like George used to do? I would be pleased to have someone come forward to help with those important things. On a sad note, do we need a necrology column? I didn't know that John Trach had passed on until I learned it from his old colleague Forest Miller when we were organizing the May 10 meeting. Anyhow please keep me informed with the sad news as well as the bright side so we can circulate our MAPSS family news to each other.

It has come to my attention from Gary Jellick as well as from CSA News and Valerie Breunig of the Agronomic Science Foundation (ASF) that there will be a Soil Professionals Roundtable at the ASA-SSSA-CSSA meetings in Denver (see dates for that meeting mentioned in calendar above). It will be on Tuesday night, November 4<sup>th</sup>, at 7:30pm and will now be in the Denver Convention Center, Room A209, which is a different location than what appeared earlier in the CSA News organs. This round table is being sponsored by the United States Consortium of Soil Science Associations, USCSSA, and one objective stated in the news items about the round table is to encourage field soil scientists to participate in the state/regional soil scientists associations (like MAPSS). We should encourage any of our members who go to the meetings in Denver to attend this roundtable. Unfortunately, Dr. Rabenhorst, who will be going to Denver, has indicated that he will be at another meeting at the time of the round table. That's all the more reason for other MAPSS members to participate if the opportunity is there for you to do it. I wasn't planning to go to Denver, but am toying with changing my mind.

I would also like to mention, as was done on May 10<sup>th</sup>, that one thing that got MAPSS off the ground this year was the call from SSSA and ASF for state soil associations to sponsor the monolith of their state soil in the Smithsonian Museum of Natural History. This could be a problem for MAPSS because we represent more than one state. The suggested price tag to sponsor the monolith of a state soil in the Museum is \$10,000. Can MAPSS raise such amounts? Some states (e.g. Missouri) have already done it. I guess this once more raises the issue of getting an official (state-legislature-blessed) state soil of Maryland. We need more work on these things. By the way, there is a now a web site [www.soils.org/smithsonian/](http://www.soils.org/smithsonian/) for the planned Smithsonian soils exhibits. Please visit the

site and help in any way you can to bring soil science to the nation and the world at the Smithsonian.

Yours, Del Fanning