Rochester Academy of Science P.O. Box 92642 Rochester, NY 14692-0642

Change Service Requested

NON-PROFIT ORG. U.S. POSTAGE PAID ROCHESTER, N.Y. PERMIT NO. 220

Rochester Academy of Science

BULLETIN

"An organization of people in the Natural Sciences"

RAS FALL PAPER SESSION

The 35th Annual Fall Scientific Paper Session of the Rochester Academy of Science will be hosted by Nazareth College on Saturday, November 1, 2008

This session provides a forum for Academy members, the collegiate community and others engaged in scientific research to present their results in an venue that promotes discussion and interaction.

Schedule

Smyth Hall East Wing, Second Floor 8:30 Registration and

- Refreshments 9:00 Oral Presentations Rooms 225, 247 and 249
- 11:30 Poster Session Second and Third Floors

Shults Center

- Forum Room
- 12:30 Lunch
- 1:30 Larry King Memorial Lecture

The Larry King Memorial Lecture will be given this year by William D. Middleton, PhD, Department of Material Culture Sciences, RIT. His lecture is titled "Satellite Archaeology: Exploring the Ecology of State Formation in Ancient Mexico from Space."

"Over the past few decades,

developing a novel and gain a better environment."

Ouestions can be directed to Dr. William Hallahan at (585) 389-2552, <whallah3@naz.edu> or Fern Cardella at (585) 389-2667 <fcardel7@naz.edu>

Attendance at the Paper Session is free and open to the public.

November, 2008 - Vol. 62, #9, Page 4

ABOUT THE **ACADEMY** - The Rochester Academy Of Science, Inc. is an organization which has been promoting interest in the natural sciences since 1881, with special focus on the western New York state region. Membership is open to anyone with an interest in science. Dues are minimal for the Academy, and are listed in the membership application. Each Section also sets dues to cover Section-related publications and mailings.



For applications and/or more information contact membership chairman Stephen Busschaert, 54 Keswick Rd., Rochester, NY 14609: by telephone 288-5683: or by e-mail <sbusschaert@msn.com>.

The *Academy* Internet web page is http://www.rasny.org

The Astronomy Section Information phone number is (585) 987-5330. The Astronomy Section Internet web page is http://rochesterastronomy.org

This "BULLETIN" is produced monthly, except July and September, by the Astronomy Section, Rochester Academy of Science. The editor is Frank Boy, 16 Gladbrook Rd., Pittsford, NY 14534 Phone (585) 422-9910 (days) and (585) 385-1518 (evenings), e-mail <editor@rasny.org>

ROCHESTER ACADEMY OF SCIENCE OFFICERS

| | | | Phone | | |
|---------------------|---------------------|---------|---------|----------|--|
| | (585 | 5) | home | work | |
| Stanley Spector | President | 46 | 51-1272 | | |
| Charles Hiler | Vice President | 92 | 24-7496 | | |
| Frank Bov | Secretary | 38 | 35-1518 | 422-9910 | |
| William Hallahan | Treasurer | 62 | 24-1628 | 389-2552 | |
| Stephen Busschaert | Membership | 28 | 38-5683 | | |
| Matthew P. Sinacola | Past President | 42 | 26-0815 | 340-2315 | |
| Karen Wolf | Anthropology | 67 | 70-9709 | 273-4500 | |
| Carol Latta | Astronomy | 39 | 92-7241 | | |
| Karen Wolf | Life Sciences | 67 | 70-9709 | 273-4500 | |
| John Handley | Fossil | 80 |)2-8567 | 265-8900 | |
| Al Mura | Mineral | 22 | 27-9931 | | |
| Elizabeth Pixley | Herbarium | 33 | 34-0977 | | |
| Jutta Dudley | Publications | 38 | 35-2368 | | |
| Frank Bov | Bulletin | 38 | 35-1518 | 422-9910 | |
| William Hallahan | Student Grants | 62 | 24-1628 | 389-2552 | |
| Paul Dudley | Web Site Coordinato | or 38 | 35-2368 | | |
| Jutta Dudley | Director '11 | 38 | 35-2368 | | |
| Helen D. Haller | Director '11 | 38 | 37-9570 | | |
| Kym Pocius | Director '10 (ce | ell) 80 |)2-8566 | | |
| Jeff Gutterman | Director '10 | 39 | 92-8299 | 359-6054 | |
| Dan Krisher | Director '09 | 29 | 93-9033 | | |
| Frank Bov | Director '09 | 38 | 35-1518 | 422-9910 | |

The Academy Postal address is P.O. Box 92642, Rochester, NY 14692



November, 2008 - Vol. 62, #9

satellites have become an increasingly important tool in archaeological research. An interdisciplinary team of scientists from RIT, the University of Colorado at Boulder, Cornell University, and others has been application of hyper-spectral, satellite image analysis to *explore the relationship between the ancient Zapotec* state (ca. 250 BC-AD 750) and its environment in *Oaxaca, Mexico. We are* using hyper-spectral imagery, geomorphology, and paleobotany to model ancient landscape change in Oaxaca understanding of how ancient human activity both has impacted, and been impacted by, a changing environment. Answers to these questions will help us to better understand the role of human activities in today's changing



PRESIDENT'S REPORT NOVEMBER, 2009

The Annual Fall Scientific Paper Session is Saturday, November 1st and we hope you will consider attending for at least a part of it. While we would love if everyone showed up for the entire day, we realize that some of you may have busy schedules. Please consider coming for the Larry King Memorial Lecture for what sounds like a great presentation. An abstract is included here. We will also have some great posters which you can check out during the scheduled times. Remember that admittance is free so don't be afraid to drop by for just an hour to show your support for all of the people who are presenting. I hope to see you there.

President's Report (continued) Community Outreach Fund

All of our Sections have done an excellent job working at events to demonstrate science to new members, especially young scientists. Many of the Section members have used their own money to buy small give-a-ways and educational material to be used as prizes. This year we have established a new fund to support these community outreach expenses. You will see a new row on the membership form that will allow you to make a donation (probably a tax deductible gift) to this fund so members who tirelessly give their time won't also be the ones who dig into their pockets for the small funds needed to make these science events memorable to our youth. Please consider giving a small donation to this fund if you can.

Stan Spector President, RAS

* * *

ARCHAEOLOGICAL **INSTITUTE OF AMERICA** LECTURE

Thursday, November 13, 2008 at 7:30 PM at the Memorial Art Gallery Auditorium.

The Rochester Society of the Archaeological Institute of America and The Memorial Art Gallery present an archaeology lecture: "How Did The Maya Feed The Multitudes?"

Speaker: Professor Payson Sheets, Dept. Of Anthropology, University Of Colorado at Buffalo, CO.

Primary archaeologist for the University of Colorado's excavations at the El Salvador site of Ceren, known as the "Pompeii of the Americas," Dr. Sheets found exceptional preservation of the villages after eruption of the nearby Loma caldera volcanic vent. With hundreds of people per square kilometer, he needed to know what was intensively cultivated to maintain those early population centers. Remote sensing and applied archaeology found interesting answers.

The lecture is free and open to the public with a reduced \$6 MAG admission charge after 5:00 PM on Thursdays. Members of the sponsoring organizations and U of R students enter free. Wheelchair accessible. For further information, call 585-381-9034.

HELP WANTED

The RAS is in need of a volunteer Website content coordinator. This volunteer would decide what should be published on the site, collect the information from the relevant parties and submit it to the Webmaster for publication. This information includes the Section calendar events and Academy announcements. Other ideas for content are articles from Section newsletters, articles submitted by RAS members, RAS photographs (e.g., depicting section activities or a photograph of the month taken of a scientific subject by an RAS member) or any other content the coordinator feels will help increase visits and usefulness of the Website. If interested, contact Stan Spector at <president@rasny.org>

Sat 01 LIFE SCIENCES MEETING

Following the Larry King Lecture at the Fall Paper Session, we will discuss future strategies and directions. Please contact Karen Wolf at (585) 670-9709 or <karenwolf@frontiernet.net> with any suggestions and ideas even if you do not attend the paper session.

Tue 04 FOSSIL WORKSHOP

7:30 PM Community Meeting Room, Brighton Town Hall, 2300 Elmwood Ave. Gerry Kloc, Geological Technician in the Department of Earth and Environmental Sciences, U of R, will give a workshop on fossil preparation. This is a worthwhile opportunity for both new collectors and those with more

experience to learn tips and techniques for preservation of their finds. Visitors are welcome. Dinner with the speaker for this meeting will be at 5:30 PM at the Distillery, 3010 Winton Rd. South. Please contact Anne-Roth Blizzard at

<annethefossil@aol.com> or John Handley at (585) 802-8567 for more information.

Fri 07 ASTRONOMY **GENERAL MEETING**

7:30 PM at RIT, Gosnell Hall, room A300. The main speaker is Paul Helfenstein of Cornell University. His topic will be Cassini's Enceladus Encounter, describing how the Cassini orbiter was maneuvered through a water jet from one of Saturn's moons.

EVENTS for NOVEMBER 2008

(For updates to events, check the Academy web site, http://www.rasny.org, or appropriate Section web site.)

We'll also have a short talk by Brad Timerson on his amateur seismograph station. Visitors are always welcome. For information, contact Carol Latta at 230-9548, or <cosmos@rochester.rr.com>

Thu 13 ANTHROPOLOGY LECTURE

7:30 PM at the Auditorium of the Memorial Art Gallery, 500 University Ave. The speaker will be Professor Payson Sheets, Dept. Of Anthropology, University Of Colorado at Buffalo, CO., speaking on "How Did The Maya Feed The Multitudes?" The lecture is free with museum admission. Call 585-381-9034 for more information.

Sat 15 RAS BULLETIN

Deadline for event notices and articles for the December issue.

Sat 15 LIFE SCIENCE / **ANTHROPOLOGY** FIELD TRIP

10:00 AM Letchworth State Park. Members from Rochester will meet at the Big Tree Inn on Jefferson Road at 9:00 (sharp) to car pool to Letchworth. We will join their Interpretive Programs for a hike in the Old Growth Forest in Trestle Woods. Meet at the visitor Center at Letchworth at 10:00 to car pool to the Woods. Bring lunch-3 hours walk 1-2 miles. After lunch we will visit Mills Mansion in Mt. Morris to observe progress on their dig site and recent findings.

Tue 18, LIFE SCIENCES WORKSHOP

10:00 AM to 2:00 PM at the RAS Herbarium, Rochester Museum and Science Center (RMSC). We will continue work on replacing torn and damaged genus folders, as well as repairing specimens as needed. With a collection of approximately 60,000 specimens, this is an on-going project. It is also a great way to get a look at very interesting plants from around the world! No experience needed! Plan to come and help with this valuable collection – and learn about plants in the process. If you plan to attend, please send an RSVP to Elizabeth Pixley. Then, at RMSC, go to the front desk and ask a person there to call ext. 368, the phone in the Herbarium. You can either bring a lunch or purchase food at the RMSC café. For more information, contact Elizabeth Pixley, herbarium curator (334-0977 or epixley@rochester.rr.com).

Tue 18 MINERAL MEETING

7:30 to 9:30 PM, Community Meeting Room, Brighton Town Hall, 2300 Elmwood Ave. This month's program will be a talk by Paul Merkel on Fluorescent Minerals. The club's new ultraviolet display light will be available for viewing your fluorescent minerals - or to see if you have any. Mineral of the Month will be fluorescents. For more information, call Bob Hiler

at (585) 787-1584 or check the RAS web page for any updates.

Wed 19 RAS BOARD MEETING

7:00 PM Brighton Town Hall, 2300 Elmwood Ave., in the Stage Conference Room. Everyone welcomed.

Sat 21 ASTRONOMY **STAR PARTY**

8:00 to 10:00 PM at Northampton Park, Hubbell Road, near the ski lodge parking lot. Join us for views of Venus, Jupiter and deep sky objects in members' telescopes. Come early, before completely dark, to chat with members as they set up their scopes. Stay a while for best telescopic views. Dress very warm as evenings may be very chilly! For information, contact Jim Seidewand at 723-6225.

EVENTS IN EARLY DECEMBER

Tue 02 FOSSIL MEETING

7:30 PM, Community Meeting Room, Brighton Town Hall, 2300 Elmwood Ave. Thomas Whitely, collaborator on the book "Trilobites of New York", and lifetime collector, will give a talk titled "Trilobite Evolution." Visitors welcome. Please contact Anne-Roth Blizzard at <annethefossil@aol.com> or John Handley at (585) 802-8567 for more information.