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> **Geological Society** of Minnesota

> > **NEWS**

Geological Society of Minnesois

MINNEAPOLIS, MINNESOTA

GEORGE AND GOLDIE JOHNSON 5146 - 197th Avenue N. E. Wyoming, Minnesota 55092

FORWARD

MINNESOTA GEOLOGICAL SURVEY 2642 University Ave W 3t. Paul, MN 55114



Geological Society of Minnesota

1711 Marshall Avenue, St. Paul, Mn. 55104

OFFICERS:

Pres. Marian Marien V.Pres. Fran Corcoran Sec'y. Janet Mitchell DIRECTORS: Walt Blowers

Martha Collier Bob Gunville Goldie Johnson

Treas. Ed Huppler Goldie Johnson Bruce Leiding

NEWSLETTER: MAY, JUNE AND JULY 1988

We are now in our 50th year of existance as the Geological Society of Minnesota, and the

FROM - - - YOUR - PRESIDENT

organization is still going strong. I believe that this is because the people comprising all the committees - the ones who plan and carry out the things we dohave been so willing to work hard to make it all happen.

Interest in our lectures, labs, and field trips is high because these events are well planned and carried out. Our State Fair booth is always good looking and draws the attention of the public. I think we're doing well in our 50th year.

our lecture and lab series for the past year is completed, and we're looking forward to some great field trips this summer. These events are good ways to become acquainted with each other, while learning some fascinating geology. The field trip to Myoming in August for which Mary Kimball and Dick Uthe have done lots of hard work and detailed planning, looks to be a marvelous experience for everyone.

We look forward to seeing you this summer and also this fall.

-Marian Marien

"going along"



There will be an excellent variety of field trips this summer that will provide us with new experiences as well as a lot of fun. by the number of people on the trip, the number of days, etc.

For those members who signed up on the Field Trip Lists, watch for trip specifics in the mail or call Warren or Jan Mitchell (224-3242) to add your name to the list.

1. ST. CLOUD GRANITES - June 4 (Saturday)

Dr. G. B. Morey of the Minnesota Geological Survey will lead his highly acclaimed oneday field trip by car to St. Cloud and the surrounding area to study the Early and Middle Precambrian time. Last taken in the rain in 1982, this field trip investigates scattered remmants of Archean granitegneiss within superimposed Proterozoic rocks.

2. NORTH SHORE VOLCANICS - June 18 - 19
(Saturday - Sunday) - NOTE CHANGE OF
DATES

The geological story of the North Shore of Lake Superior will be taught by a leading authority, Dr. John Green of U.M.D. We can engage our intellects while enjoying the natural beauty of the lake shore. A pretrip slide presentation and discussion will review in general volcanic phenomena: Yellowstone Park, Mt. St. Helens, Hawaii, Columbian Plateau (presented by Bob Gunville for those attending the field trip).

Friday overnight: UMD, Duluth (optional) Saturday overnight: Grand Marais

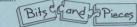
3. ROCK ELM, WI ASTROBLEME - July 16 (Saturday)

Dr. William Cordua of the University of Wisconsin-River Falls will lead us on a one day field trip by car to the Rock Elm disturbance. This disturbance is a nearly circular region of anomalous rocks and structures that is surrounded by little-deformed, essentially flat-lying shallow marine sedimentary rocks. Is it an astrobleme, a cryptovolcanic explosion or a nonviolent hydrotectonic event?

(This field trip was presented by Dr. Cordua to the Geological Society of America, North-Central 21st Annual Meeting in 1987)

4. ASPECTS OF THE GEOLOGY OF SOUTHERN WYOMING AND NORTHEASTERN UTAH August 1 - 11 (Monday - Thursday)

Dick Uthe and Mary Kimball, GSM Members, will be co-leaders of this eleven-day trip. Details have previously been presented at two pre-trip meetings. Don't forget to make your camping and lodging reservations soon.



"HINTS FOR FIELD TRIPPERS" - -

Since our field trips are primarily for working rather than sight seeing, the following suggestions are offered:

- Clothing: Casual and practical, preferably layers that can be added or removed for maximum comfort; comfortable walking shoes or boots. Plastic rain coat and hood.
- 2. Equipment: Plastic bags, masking tape, pens, notebook, geologists' hammer.
- Food and drink: We always have lunch in the field. Bring drinking water as well as other beverage.
- Optional items: Camera, field glasses, hand lense, rain boots. Rock or fossil identification guides.
- Overnight: In addition to usual items, plan for more meals in the field with canned or dry foods that do not need refrigeration.
- Plan to spend the whole day; schedules tend to be flexible. We will return when we arrive.

Note: Minnesota Geological Survey has some booklets on mineral and fossil collecting.



1988 ROSTER AVAILABLE TO MEMBERS

The Geological Society of Minnesota Roster for 1988 has been printed and is available to all members. If you have not received yours yet, see Bob Handschin. A big THARK YOU to Warren Mitchell and Bob Handschin for compiling and producing the new roster. It is a very attractive roster. Thanks acadah. — Warren and Boy





The Program-Lectures Committee has put together the 1988-89 Public Lecture Series based on the general theme "Regional Geology of North America" and covers the physiographic regions of our continent.

Two labs are planned and will cover topo and geologic map reading.

Again outstanding speakers have been obtained, and bring a friend to the next season of lectures. You will be glad you did.





Once again, the Spring Banquet drew a full house at the Old Country Buffet in Maplewood. Dr. Terry Jones, Associate Professor of Astronomy at the University of Minnesota, was our special speaker at this popular annual CSM event.

Dr. Jones explained the origin of chemical elements in a manner that will long be remembered. We would like to thank Dr. Jones for the informative and entertaining evening. (A week later the article "Supernova - Death of a Star" in the May 1988 Issue of the National Geographic told a similar story). Thanks too to the Program and Social Committee for a great get together.



1988 PROJECTS

Ground Water-Our Vulnerable Natural Resource (REX 0120)
Increased competition for water is depleting the supply by disrupting the natural equilibrium, and leaking underground storage tanks, waste disposal, and agricultural chemicals are resulting in ground water contamination. Volunteers will assist a Minnesota Geological Survey team in determining geologic and ground water conditions, and in assessing impacts on land use and water

Participation limited to six volunteers.

Project leader: Professor Bruce Olsen, Minnesota Geological Survey
Assembly point: Minnesota Geological Survey Office, 2642 University Avenue E., St. Paul
Dates: Section 1--July 11-July 22, 1988; Section 2--September 12-23, 1988
Contribution: 3530—(accommodations; meals are the responsibility of the participant)





Orogenesis.—Early. History of the Rockies (REX. 0122)
Goodgast from the University of Womaning and the University of Minenous are conducting a field survey of the Seviet thrust belt area to determine timing, rate of movement, and mechanics of the graved deposits in that area. If this information can be accumulated, the data can be extrapolated to other monitations sites and their origins resolved. Volunteers will assist the project feader in the Participation Intelligent to two volunteers.

Project leader: Professor Chris Paola, Geology
Assembly: Denver, Colorado or Salt Lake City, Utah (to be determined)
Dates: July 1986 (exact date to be determined)
Contribution: \$600-(ravel costs are the responsibility of the participant; volunteers provide their own tent, camping, and clothing needs; meals are provided by the project.)

What is Research Explorations?

Research Explorations (REX), a program developed by Extension Classes of Continuing Education and Extension at the University of Minnesota, offers the opportunity for public participation in field and lab projects of University faculty

Research projects are scheduled throughout Minnesota, and exciting projects are also developing at other United States and international sites. Research volunteers can join an archaeological team in Maine, take part in a geological expedition in Wyoming, or study the effects of indigenous insecticidal plants in Rwanda, Africa, during summer, 1988. There are also many interesting local research projects dealing with the environment, natural resources. wildlife and resource management. social and health issues, architecture. and several other disciplines.

Volunteers apply for a project of choice. Applications are screened, and the project leader has final approval. Your willingness to assist faculty in University research, desire to see the environment from new perspectives, and curiosity and adaptability are important criteria for participation.

Selected individuals contribute their share of the cost of participating in the project, and are responsible for travel expenses. As a donation, your research contribution is taxdeductible. Team members are expected to share in the workload of the day under the guidance of the project leader and staff. This may include hiking, boating, climbing, digging, or whatever physical activity assist in data, in the contribution of the sast in data function, and the contribution, photography, sampling, questionnaires, interviews and



Experience the discovery and satisfaction of experiential learning while you advance important research, and expand your intellectual horizons!

To receive more information about specific projects, call Claire Walter-Marchetti, program director, at (612) 624-9345, or Susan Gorman, program secretary, at (612) 626-0214. You may write for more information or an application form to: Research Explorations, University of Minnesota, Continuing Education and Extension, 180 Wesbrook Hall, 77 Pleasant Avenue S.E., Minneapolis, Minnesota 55455.

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