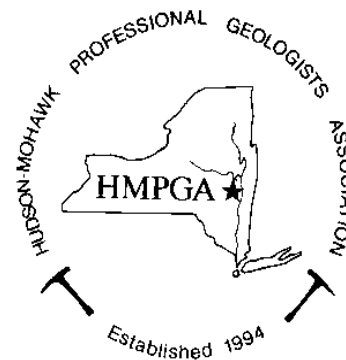


# Hudson-Mohawk Professional Geologists' Association

[www.hmpga.org](http://www.hmpga.org)



## February 16, 2005

### “Impact of Road Salt on Water Quality in Bedrock and Stream Base Flow”

Speakers: *Allan Randall and Paul Heisig*

**Abstract:** The quality of ground water in bedrock has been seriously impacted by highway salt application in a few upland localities in Rensselaer County. Each of these localities is along a major highway and occurs where bedrock is very thinly and discontinuously mantled by till. This syndrome may be widespread in New York, and if so, may warrant redesign of highway drainage systems and/or revision of highway maintenance practices.

Numerous measurements of conductance and/or chloride in streams of suburban areas in Putnam and Westchester Counties and in a few shallow wells, correlate with road-salt applications and with road miles. Current highway salting practices, along with some brine discharges from water softeners, are raising chloride levels above recommended limits for potable water in some localities. Remediation or replacement of affected wells can be quite costly.

**Also featuring:**

### “The Future of Private Wells in Areas of Expanding Public Water Supply”

Some government decision-makers in the Northeast are of the opinion that private wells are a temporary expedient, which should be replaced by public supply mains as soon as feasible. However, the water needs of a community could be satisfied in a cost effective manner by a system in which initial clusters of development, such as hamlets or other planned projects, are supplied by private wells, and remain separated by undeveloped areas until public-supply water mains are extended to those areas. However, further study of several clusters is needed to better estimate recharge to bedrock in upland areas as a constraint on population density or cluster size.

#### ***About the Speakers***

*Allan Randall has worked with the U.S. Geological Survey since 1953, chiefly on ground water resource appraisals and ground water/surface water relationships in New York and New England. Legally retired since 1991, he remains active with the USGS as a volunteer (mostly finishing reports that were scheduled for completion years ago) and does some private consulting.*

*Paul Heisig has worked as a hydrologist for the U.S. Geological Survey on Long Island and in Eastern New York since 1985. His work has focused on: (1) effects of point and non-point sources on quality of ground water and surface water, and (2) conceptualization of water resources in a variety of hydrogeologic settings. Paul earned a Bachelors and Masters degrees in geology at the State University of New York at Geneseo and the Ohio State University, respectively.*



## PRESIDENT'S MESSAGE

### Greetings:

Our January presentation by Don Siegel was well attended, interesting, and entertaining. We will continue our *Speaker* series this month with two respected geologists from the USGS. Allan Randall and Paul Heisig will present their collective findings on the "Impact of Road Salt on Water Quality in Bedrock and Stream Base Flow." We are very interested to see the turn out as we discuss existing facts regarding the application of road salt and its potential long-term impact(s) to critical water resources.

If you want to attend the dinner and/or talk please call Diane Welch at (518) 348-6995 for reservations. The cut-off will be **February 16** at noon.

Included in this newsletter is a brief contribution from two major (and underappreciated, I think) geologic resources right in our backyard. The U.S. Geological Survey is located at the RPI Tech Park (Jordan Road) in Troy, while the New York State Geological Survey is located at the State Museum in Albany. Special thanks to Robert Rogers (USGS) and Dr. William Kelly (NYSGS) for taking time out of their busy schedules to prepare an excellent overview of their respective Agencies.

HMPGA will be hosting a booth at the **New York State Gem & Mineral Show on February 26 and 27th**, which is to be held at the New York State Museum (upstairs on the terrace level). Come one, come all as it is a fun time for every age! It would be helpful if we could get some volunteers at our table. If you are interested in helping out for an hour or so please call HMPGA member Tom Ebert at (518) 457-1038 or via e-mail at [TEBERT@dot.state.ny.us](mailto:TEBERT@dot.state.ny.us). The hours are 10:00 to 5:00 each day, with a set-up on Friday evening, and a breakdown on Sunday evening.

It appears that positive things continue regarding HMPGA's efforts to support the NYSCPG in achieving Professional Geologist Licensure this legislative session. Our members have helped fund vital efforts as well as provide local support. Special thanks to our members who have written, e-mailed, or called their legislative representative to press them on the importance of passing *Bill A02271* this session. We will likely be at the Capital sometime in February to solidify our position with key members of the Assembly. We will keep you up-to-date regarding progress within the State Legislature.

### *Inside the February 2005 Newsletter...*

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Finest Regards

(Mark Williams is the Manager of Environmental Services for Lansing Engineering, P.C.)

**About Our Meetings:**

**When:** February 16, 2005

**Schedule:**

**Holiday Inn Turf**  
205 Wolf Road, Colonie

Board Meeting at *Calaway Grill* 4pm  
Social Hour at *"205 at the Turf"* 5pm  
Dinner 6pm  
Program (*free*) 7pm

**Dinner:** \$10.00/person for student members  
\$20.00/person for members  
\$22.00/person for non-members

**Notes:**

Vegetarian or fish meals are available with prior request. Individual will be responsible for the cost of dinner unless a cancellation notice is received 24 hours prior to the meeting. Walk-ins will be charged an additional \$2.00.

**Reservations:** Reservations are required for dinner attendance. Call or e-mail Diane Welch at (518) 348-6995 or [dwelch@alphageoscience.com](mailto:dwelch@alphageoscience.com) by February 9, 2005. Please register even if you are only attending the Program.

Thank you in advance!

**Next Newsletter Deadline:**  
**March 3, 2005**

Send MS Word documents via e-mail to  
[mary\\_millus@urscorp.com](mailto:mary_millus@urscorp.com)

Any content that appears to express an opinion on behalf of HMPGA will be reviewed by the President prior to publication.

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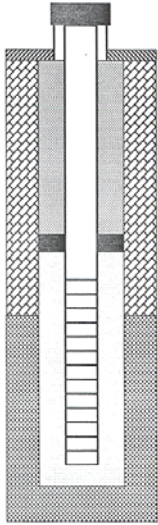
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## THE 12<sup>TH</sup> ANNUAL JAMES E. CAMPBELL GEM AND MINERAL SHOW!

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Sat./Sun. from 10:00am - 5:00pm



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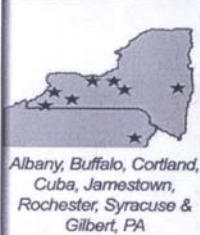
*Free parking available, but limited.*

For further information contact:

Mike Hawkins, Geology Collection Manager,  
(518) 486-2011 or (518) 473-7154; and via e-mail at  
[mhawkins@mail.nysed.gov](mailto:mhawkins@mail.nysed.gov)

or check out the museum link:

[www.nysm.nysed.gov/programs/minerals](http://www.nysm.nysed.gov/programs/minerals)



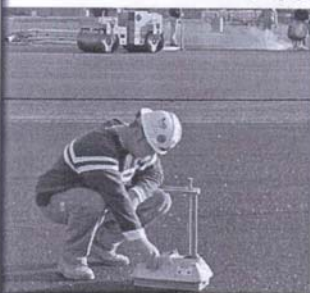
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## The U.S. Geological Survey (USGS) and Water Resources Programs in New York State

### *The USGS: What does it stand for?*

The U.S. Geological Survey (USGS) was created by an act of Congress in 1879 and has evolved over the ensuing 125 years. Today, the USGS stands as the sole science agency for the Department of the Interior and serves the Nation as an independent fact-finding agency that collects, monitors, analyzes, and provides scientific understanding about natural resource conditions, issues, and problems. The value of the USGS to the Nation rests on its ability to carry out studies on a national scale and to sustain long-term monitoring and assessment of natural resources. Because it has no regulatory or management mandate, the USGS provides impartial science that serves the needs of our changing world. The diversity of scientific expertise enables the USGS to carry out large-scale, multi-disciplinary investigations that build the base of knowledge about the Earth. The USGS is sought out by thousands of partners and customers for its natural science expertise and its vast holdings of earth and biological data holdings. It provides decision makers at all levels of government--and citizens in all walks of life--with the maps, reports, and information they need to address pressing environmental and societal issues.

The USGS is organized into four basic scientific disciplines – geology, water, geography (formerly mapping), and biology, and employs about 10,000 people nationwide. The diversity of scientific issues that demand attention has led the USGS to focus its efforts into four major areas: natural hazards, resources, the environment, and information and data management. You can learn more about the USGS disciplines and its many programs at [www.usgs.gov](http://www.usgs.gov).

### *The Water Resources Discipline*

The USGS Water Resources Discipline (WRD) has the principal responsibility within the Federal Government to provide the hydrologic information and understanding needed by others to achieve the best use and management of the Nation's water resources. WRD actively promotes the use of its information products by decision makers to:

- Minimize loss of life and property as a result of water-related natural hazards, such as floods, droughts, and land movement.
- Effectively manage ground-water and surface-water resources for domestic, agricultural, commercial, industrial, recreational, and ecological uses.
- Protect and enhance water resources for human health, aquatic health, and environmental quality.
- Contribute to wise physical and economic development of the Nation's resources for the benefit of present and future generations.

To meet this responsibility the Water Resources Discipline (WRD) of the USGS maintains a staff of about 4,300 employees and has established a network of offices across the country with one or more offices in every state.

### *The Cooperative Water Program*

Most of the work conducted by the WRD in New York State, and across the Nation, is funded through the Cooperative Water Program, which was established in 1895. This program is an ongoing partnership between the USGS and non-Federal agencies. The program jointly funds water-resources projects in every State, Puerto Rico, and several other U.S. Trust territories. Agencies, or "Cooperators," that participate in the Cooperative Water Program are primarily State, Tribal, county, and municipal agencies with water-resources management and policy responsibilities. In 2003, more than 1,400 Cooperators participated in the program nationally. More information about the Cooperative Water Program and other water programs can be found on the web at <http://water.usgs.gov>.

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The New York District of the WRD has cooperative funding agreements with about 50 Cooperators. The largest cooperative programs include those with the New York City Department of Environmental Protection, the New York State Department of Conservation (NYSDEC), and Suffolk and Onondaga Counties. Other sources of funding for WRD programs in New York include: (1) federal appropriations for USGS programs, such as the National Water Quality Assessment Program (NAWQA) and National Streamflow Information Program, and (2) funding from other federal agencies, such as the U.S. Environmental Protection Agency and Army Corps of Engineers. The budget of the New York District in federal fiscal year 2005 is about \$14.7 million, nearly 80 per cent of which is from the Cooperative Water Program.

***The WRD Program in  
New York State:  
Investigation and Research.***

The WRD accomplishes its missions in New York with a staff of about 110 scientists, technicians, and support personnel, which are located four offices: the District, or main, Office in Troy, Subdistrict Offices in Ithaca and Coram (Long Island), and a small field office in Potsdam. The work of the District can be grouped into two broad areas or programs: (1) the collection of basic hydrologic records (CBR), such as streamflow and ground-water levels, and (2) hydrologic investigations and research.

The New York District collects surface-water data at approximately 250 continuous streamflow sites and at almost 100 other sites, such as tide-stage and lake-stage sites. Flow data from nearly all the streamflow sites and stage data from the tide-stage sites and most lake-stage sites are served on the web in near-real-time and can found at <http://ny.water.usgs.gov/htmls/pub/data.html>.

Ground-water data are also an important part of the CBR program in New York. On Long Island, ground-water levels are measured monthly or more frequently at about 215 wells and annually at about 280 additional wells. The upstate ground-water program is much smaller by comparison but has grown appreciably in recent years through a cooperative agreement with NYSDEC. Currently, water-levels are continuously recorded at a network of 70 wells upstate and this number is will increase in the next year. Current ground-water levels at many upstate and Long Island wells are available (some in near-real-time) at the same web address given above for surface-water data.

All hydrologic data collected by the CBR program in New York are published annually in a three-volume annual data report. Large amounts of water-quality data collected by some of the interpretive studies are published in the annual report also. The report is available at the above web address, as are large amounts of historical hydrologic data.

The WRD New York District conducts a wide range of hydrologic investigations and research projects. Some of the projects are parts of larger national USGS programs, such as NAWQA, but the majority of projects are conducted through the Cooperative Water Program. The projects include aquifer mapping, ground-water modeling, surface-water modeling, aquatic habitat studies, acid-rain research, and surface-water and ground-water quality investigations. The projects are too numerous to list here, but a brief description of each can be found at <http://ny.water.usgs.gov/htmls/pub/projects.html>.

The findings of investigations and research projects are published in USGS report series and scientific journals. Recently published USGS reports are served on the web at [http://ny.cf.er.usgs.gov/biblio/search\\_biblio.cfm](http://ny.cf.er.usgs.gov/biblio/search_biblio.cfm), and a complete bibliography of USGS reports for New York can be searched at that site. Recently, some older, out-of-print USGS reports also have been made available at the web site and more will be added as resources allow.

Much more information about the USGS in New York, including the addresses and contact information for all WRD offices in the state, can by obtained from the District web page (<http://ny.usgs.gov>). Data, reports, and other information not available on-line can be obtained by clicking on "Ask USGS NY" on the District web page, e-mailing [askny@usgs.gov](mailto:askny@usgs.gov), or calling (518) 285-5602.

## The New York State Geological Survey - Past & Present

### Dr. William Kelly, State Geologist and Chief, NYSGS

#### *In the beginning...*

In 1834, the New York State Legislature responded to the entreaties of several organizations interested in the discovery of coal and directed the Secretary of State to develop a plan for a survey of the natural resources of New York. The Legislature appropriated a four-year total of \$104,000 to accomplish this task. In April of 1836, Governor William Marcy appointed the first staff of the New York Geological and Natural History Survey. *Although Marcy was responsible for establishing legislation that started the Natural History Survey, implementation of the plan was accomplished by the succeeding governor, William Henry Seward and the work is often referred to as the "Seward Survey".* The staff included six geologists, a mineralogist, a paleontologist, a civil engineer, a zoologist and a botanist. Thus commenced over a century and a half of geological research and service on behalf of New York's citizens by the agency currently known as the New York State Geological Survey (NYSGS). For the record, that makes the NYSGS the oldest continuously operating geological survey in the western hemisphere.

#### *The Museum Connection*

As scientists are wont to do, the staff of the 1836 Survey collected an enormous number of rock, mineral, fossil, and biological specimens in the course of their work. The practical solution was to start a museum so in 1843, the State Legislature established the State Cabinet of Antiquities, the forerunner of the New York State Museum although the latter appellation was not official until some years later. In 1845 the State Cabinet was placed under the control of the State Board of Regents and in 1870 the State Cabinet was legislatively renamed the New York State Museum of Natural History with geologist James Hall as Director. Hall retained his titles of State Geologist and State Paleontologist but this made him answerable to three separate entities: the Board of Regents as Museum Director, the Secretary of State as State Geologist and the Speaker of the Assembly as State Paleontologist. This situation was finally corrected in 1883 when the Legislature placed all the scientists in the State Museum under the Board of Regents. Through this circuitous route, the NYSGS became, as it is today, the geological research arm of the New York State Museum of the Office of Cultural Education in the State Education Department under the aegis of the Board of Regents.

#### *Our Mission*

The mission of the original Survey was "*to compile an accurate and complete geological Survey of the State, which shall be accompanied with proper maps and diagrams, and furnish a full a scientific description of its rocks, soils and minerals....*" This is, in effect, the mission of the modern NYSGS. The Survey conducts geologic research and makes the data and advice derived from that research available to State agencies, the educational community, industry and the public to benefit the health, safety, and economic welfare of the citizens of the State. Responsibilities of the NYSGS include maintaining a comprehensive inventory of geologic resources, evaluating geologic hazards, conducting research into the characteristics of, and processes operating in, the earth's crust, and making the resulting geologic knowledge readily available. Descriptions of various aspects of the State's geology are presented in the Museum's Bulletin, Memoir, Map & Chart, Miscellaneous and Circular series publications, in the mainstream geological literature and at scientific seminars and meetings. The NYSGS seldom becomes involved in site-specific investigations and then only at the request of another state agency such as the State Emergency Management Office. Requests for site-specific geological studies are generally referred to the consultant community.

#### *The Programs:*

The NYSGS has traditionally had several program themes which can be broadly characterized as research, public information and educational services, and governmental advisory support. Selected members of the Survey staff have always had responsibility for the Museum's geology collections as an adjunct to their other geological duties. The geologists serve as the content specialists on all of the State Museum's natural history permanent and temporary exhibits. The staff give lectures and seminars, direct field trips within and outside of the New York State, teach geology courses in local colleges, present workshops for secondary school teachers, and perform other public awareness functions. NYSGS staff serves as research advisors for M.S. and Ph.D. candidates, give interviews to the news media, supervise interns and student volunteers, and serve as officers for geological professional and scientific societies. A brief, and incomplete, review of the current NYSGS programs follows.

**Geologic Mapping Program:** The Geologic Map Atlas program was initiated in 1960 to produce a variety of maps including bedrock, surficial geology, geophysical, geochemical, and geologic hazards. The STATEMAP cooperative program with the USGS is mapping surficial and bedrock geology at a scale of 1:24,000. The State Geological Mapping Advisory Committee directs the State Geologist regarding mapping priorities. Regions with priority for mapping are those with rapidly growing populations, whether urban or rural, second-home development; transportation and energy corridors; and areas with the potential for industrial mineral development. Mapping projects are underway in central, eastern, and southeastern New York. In addition, thirty-five years of mapping by staff of the NYSGS and cooperating academic researchers is now being prepared for publication. A single map sheet encompassing the bedrock geology of six 1:62,500 scale quadrangles surrounding the Fulton Chain-of-Lakes in the west-central Adirondacks was published in 2002. Two larger compilations at similar scale are in preparation for the eastern Adirondack-Lake George region and the southern Adirondacks.

**Devonian Geology:** Roughly one-half of New York State is underlain by Devonian rocks. Project research ranges across a broad spectrum of geologic problems including sequence stratigraphy, tectonics and sedimentation, sedimentary basins, high resolution event and cyclic stratigraphy, and both marine and terrestrial systems. A chief research interest is K-bentonites (ancient volcanic ash layers) and the full range of processes involved in their sedimentology and stratigraphic (preservational) history.

**Abandoned Underground Mines:** In cooperation with MSHA and DEC Mineral Resources, this is a multi-year project to inventory and geo-reference all underground mines in New York. The recent Quecreek incident and concerns for land stability related to new construction initiated this program at the NYSGS. When completed, mine maps and data will be available on the DEC Division of Mineral Resources website. The inventory of mines is nearly complete and the search for maps is in progress.

**De-Glacial Chronology:** The program involves correlation of Woodfordian drainage events in the Hudson-Champlain Trough with events that occurred in the Northwest Atlantic Ocean. Evidence of drainage events is present in cores obtained in Glacial Lake Albany lacustrine silts and clays recovered near Plattsburgh, Troy, and Annandale-on-Hudson. The research supports the recently revised chronology of de-glaciation for the Hudson Valley.

**Economic Mineralogy:** Geological studies of rock of appropriate age in the Hudson Highlands recognized a distinct class of iron deposits with complex mineral compositions. Their geological features suggest a relation to the planetary-scale rifting events of the continental crust of a Proterozoic supercontinent and the rocks containing the iron deposits may represent relics of Proterozoic continental crust. This project also involves mantle-derived inclusions in Mesozoic ultramafic (kimberlitic) rocks in central New York long rumored to contain diamonds.

**Hydrocarbon Reservoir Characterization Program:** The Empire State Oil and Gas Information System (ESOGIS) provide users with access to all of New York's publicly available oil and gas data. It is the responsibility of the Reservoir Characterization Group to maintain New York's collection of oil and gas data (paper files, logs, samples, well core, etc.) and also to perform and promote research in New York's potential for oil and gas development and storage. Data available for download currently includes general well information, production data, formation tops, paper files, rasterized well logs, and digital well logs for those wells which are considered deep (reaching the Trenton). The Reservoir Characterization Group is performing petrographic and geochemical analysis of Lower Paleozoic carbonate rocks in the Mohawk Valley. Surface structures are being studied as analogs to the deeper, fault-induced, hydrothermal diagenesis of dolomite that is the basis for the largest natural gas play seen in New York in decades.

**Advisory Services:** Activities fall into two broad categories: single, individual requests for geologic information or advice, and continuing advisory service projects related to specific State or Federal programs. The Advisory Services unit has a database for storage, search and retrieval of over 5,000 Open File listings accessible by author, subject matter, project, or geographic area of the state. Through scientific advisory committees, the program serves approximately twenty-five New York State and eleven regional or national agencies or associations. In support of these services, the NYSGS has performed studies related to radioactive and toxic wastes disposal, power plant siting, slope stability, lake acidification, and the geochemistry of heavy metals in streams.

# FEBRUARY

Mon	Tue	Wed	Thu	Fri	Sat
	<b>1</b> <i>Deadline for title submission to LIAPG for April Conference.</i>	<b>2</b> <i>Deadline for entries submitted to Mary Millus for the February HMPGA Newsletter!</i>	<b>3</b> <b>NCSE Conference on Forecasting Environmental Changes</b> Washington, DC 2/3-2/4	<b>4</b> <b>Capital District Breakfast Club Presentation:</b> "Supervisor EHS Metrics: Driving Increased Accountability for Environmental, Health & Safety Performance" GE Energy Systems at the Holiday Inn Turf	<b>5</b>
<b>7</b> <i>Deadline for registration for the Northeast GSA Annual Meeting in Saratoga Springs</i>	<b>8</b>	<b>9</b> <i>RSVP to Diane Welch for upcoming HMPGA Meeting!</i>	<b>10</b>	<b>11</b>	<b>12</b>
<b>14</b>	<b>15</b> <i>Deadline for registration to the Midwest GeoSciences Group workshop in Las Vegas, NV</i>	<b>16</b> <b>HMPGA PRESENTATION:</b> <i>See Front Page</i> <b>Speaker: Allan Randall and Paul Heisig at the Holiday Inn Turf , 7pm</b>  <b>AWMA NE Section Presents:</b> "Overview of DEC Air Programs" at the Holiday Inn Turf	<b>17</b> <b>CNYAPG</b> <i>"The Paleogene Greenhouse-to-Icehouse Transition in Antarctica: A Paleontological Perspective"</i> Linda Ivany at the Ramada Inn, N. Syracuse	<b>18</b>	<b>19</b>
<b>21</b>	<b>22</b>	<b>23</b>	<b>24</b>	<b>25</b>	<b>26</b> <b>Gem and Mineral Show, NYS Museum</b> 2/26-2/27
<b>28</b> <b>2005 GW Industry Legislative Conference</b> 2/28-3/1 Washington, DC					

calendar of events....

# MARCH

Sun	Mon	Tue	Wed	Thu	Fri
		1 <i>Deadline for abstract submission to LIAPG for April Conference.</i>	2 <i>Deadline for entries submitted to Mary Millus for the March HMPGA Newsletter!</i>	3	4 <b>Capital District Breakfast Club Presentation:</b> "Soil Vapor Intrusion" Gary Litwin, NYSDOH
6	7	8 <b>Midwest GeoSciences Group: Workshop</b> in Las Vegas, NV 3/8-3/10	9 <i>RSVP to Diane Welch for upcoming HMPGA Meeting!</i>	10	11
13	14 <b>Northeast GSA Annual Meeting</b> in Saratoga Springs 3/14-3/16	15	16 <b>HMPGA PRESENTATION:</b> "A Case Study: Ramifications from Improperly Constructed Water Wells" Lawrence LaChance at the Holiday Inn Turf, 7pm  <b>AWMA NE Section Presents:</b> "DEC Enforcement Initiatives" Steve Hamilton (NYSDEC) at the Holiday Inn Turf	17	18
20 <i>Deadline for final paper submission to SMRI for April Conference.</i>	21	22	23	24 <b>CNYAPG</b> "Climate Change Research in the Tropical Andes: Science and Adventure Travel" by Donald Rodbell	25
27	28	29	30	31 <i>Deadline for 2005 REVEL application (NSF-funded program for teachers)</i>	



## CAPITAL DISTRICT BREAKFAST CLUB

Topic: "Supervisor EHS Metrics: Driving Increased Accountability for Environmental, Health & Safety Performance"  
 Speaker: Douglas Schultz, Peggy Dwyer, GE Energy Systems  
 Date and Time: **Friday, February 4, 2005 at 7:30am**  
 Location: Holiday Inn Turf, 205 Wolf Road, Colonie  
 Cost: \$12.00, payable at the door. Make checks payable to YOUNG, SOMMER...LLC. To help us plan, please make a reservation. The registration fee will be \$14.00 for walk-ins. The Federal Register Summaries (optional) are \$5.00 each.  
 RSVP: [bpopolizio@youngsommer.com](mailto:bpopolizio@youngsommer.com)

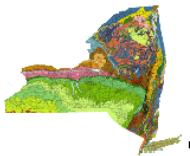
Check out the Capital District Environmental Breakfast Club website:  
[www.youngsommer.com/CM/Custom/TOCEnvironmentalBreakfastClub.asp](http://www.youngsommer.com/CM/Custom/TOCEnvironmentalBreakfastClub.asp)

### Buffalo Association of Professional Geologists (BAPG) "Successful Remediation Project at a Typical Brownfield Site with Tight Soil Matrix"



Speaker: Richard T. Cartwright, P.E., CHMM Senior Vice President, MECX, LLC  
 Date: **February 16, 2005**  
 Where: Sheraton Four Points  
 2040 Walden Avenue (Thruway Exit 52)  
 Cheektowaga, NY 14225  
 Time: 6:00 PM: Social Hour/Cash Bar (in the meeting room)  
 6:45 PM: Sit-down Dinner with Program to follow  
 Cost & RSVP: \$20/Members; \$23.00/Non-Members; \$10.00/Students  
 Contact Jill Howell at 716-655-8842, or [jhowell@tvga.com](mailto:jhowell@tvga.com)

### Central New York Association of Professional Geologists (CNYAPG) "The Paleogene Greenhouse-to-Icehouse Transition in Antarctica: A Paleontological Perspective"



Speaker: Linda Ivany  
 Date: **February 17, 2005**  
 Where: Ramada Inn  
 1305 Buckley Road  
 North Syracuse, NY  
 Time: 5:30 p.m. social hour  
 6:30 p.m. buffet dinner  
 7:30 p.m. featured speaker  
 Cost & RSVP: Bonnie at Parratt-Wolff (315) 437-1429 or via e-mail at [bolney@pwinc.com](mailto:bolney@pwinc.com)



### AIR AND WASTE MANAGEMENT ASSOCIATION (AWMA) NORTHEAST SECTION:

Topic: "Overview of DEC Air Programs"  
 Speaker: Rob Sliwinski, NYS DEC  
 Date and Time: **February 16, 2005 at Noon**  
 Location: The Holiday Inn Turf, Colonie, NY  
 RSVP: AWMA by **February 11, 2005**  
 c/o Janis E. Fallon, Secretary at Whiteman Osterman & Hanna LLP  
 (518) 487-7648 or via e-mail [jfallon@woh.com](mailto:jfallon@woh.com)  
 Cost: \$20.00/AWMA Members; \$30.00/All Others (cost includes a membership)



2005 Ground Water Industry Legislative Conference:  
“NGWA Legislative Fly-in”  
Holiday Inn on the Hill · Washington, D.C.

February 28-March 1, 2005

For more information:

<http://info.ngwa.org/servicecenter/Meetings/MeetingDetail.cfm?meetingid=564&feecatuid=1762&datecatuid=963>

## LONG ISLAND ASSOCIATION OF PROFESSIONAL GEOLOGISTS CALL FOR PAPERS 12<sup>th</sup> Conference on “Geology of Long Island and Metropolitan New York”

Abstracts due to Gilbert Hanson ([gilbert.hanson@sunysb.edu](mailto:gilbert.hanson@sunysb.edu)) by **March 1, 2005**.

Topics include:

- Geology
- Earth Science Education Programs
- Glacial Geology
- Stratigraphy
- Sedimentology
- Coastal Geology
- Applied Geology
- Environmental Geology
- Engineering Geology
- Hydrology
- Bedrock Studies Emphasizing the Geology of Long Island and Metro NY

Major goals are to inform participants of ongoing research, to promote further research and collaboration among researchers, to define important areas where research is needed, and to encourage further research on Long Island and in Metropolitan New York.

Check out the Long Island Geologists website:

<http://pbisotopes.ess.sunysb.edu/lig/Conferences/abstracts05/call-for-papers-05.htm>



**Conference Date:** April 16, 2005  
**Location:** SUNY Stony Brook



## SOLUTION MINING RESEARCH INSTITUTE CALL FOR PAPERS: Preliminary Conference Announcement

Final Call: Papers for upcoming conference due to Roger Blair ([blair@pbworld.com](mailto:blair@pbworld.com)) by **March 20, 2005**. Check out the SMRI website at: [www.solutionmining.org](http://www.solutionmining.org)

**Roger Blair**  
**PB Energy Storage Services, Inc.**  
**11757 Katy Freeway, Suite 600**  
**Houston, TX 77079**  
**Tel: 281.589-5826**  
**Fax: 281-589-5865**

**Conference Date:** April 17-20, 2005  
**Location:** Radisson Marx Hotel & Conference Center in Syracuse, New York

**THE MIDWEST GEOSCIENCES GROUP WORKSHOP:  
Improving Hydrogeologic Analysis of Fractured Bedrock Systems with a Field Trip inside YUCCA  
MOUNTAIN on the Nevada Test Site**

Date: **March 8-10, 2005**  
 Location: University of Nevada, Las Vegas  
 U.S. Department of Energy Test Site  
 Cost: \$1,295 (**before February 15, 2005**)  
 RSVP: Midwest GeoSciences Group  
 6771 County Road 8 SW  
 Waverly, Minnesota 55390  
 Fax: (763) 658-1539  
[www.midwestgeo.com](http://www.midwestgeo.com)

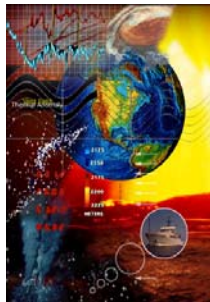


**THE GEOLOGICAL SOCIETY OF AMERICA (GSA)  
NE SECTIONAL MEETING: 40th Annual Meeting**  
 in Saratoga Springs, New York

Conference Date:  
**March 14-16, 2005** • Prime Hotel and Conference Center • Saratoga Springs, New York

**Registration rates increase after February 7, 2005!**

Check out details on their website: [www.geosociety.org/sectdiv/northe/05nemtg.htm](http://www.geosociety.org/sectdiv/northe/05nemtg.htm)



**THE REVEL PROJECT 2005**

*The Research and Education: Volcanoes, Exploration and Life (REVEL) Project invites 7-12 grade science teachers to bring cutting-edge earth and ocean research into their classrooms.*

This NSF-funded program is a personal and professional development program for educators. Through the program teachers are immersed in the scientific process as they explore the seafloor of the Juan de Fuca Plate in the Northeast Pacific Ocean.

Participants are involved in sea-going field research alongside scientists. In addition professional development opportunities are offered to help teachers increase their content knowledge, and enhance their science inquiry teaching skills. Members of a network of researchers and education colleagues passionate about Earth and ocean sciences, REVEL teachers transfer their experience to the classroom, many colleagues and their communities.

Applications for the 2005 REVEL sea-going season are available on line at <http://www.ocean.washington.edu/outreach/revel>.

Applications must be postmarked by **March 31, 2005**.

Interested teachers are encouraged to explore the past programs on the web site.

Applicants must be employed in a K-12 public, private or parochial school in the United States. Minority applicants are especially encouraged to apply. **For more information, contact Véronique Robigou at [vero@ocean.washington.edu](mailto:vero@ocean.washington.edu).**

POSITION OPENING: Applied Geohydrology Summer Research Assistantship for the Kansas Geological Survey and The University of Kansas in Lawrence, Kansas

THREE KGS Applied Geohydrology Summer Research Assistantship positions are available during the summer of 2005. The positions are available for graduate students and upper-level undergraduates with an interest in learning more about recent developments in hydrogeological field methods. Positions are open to students at any university.

Position: KGS Applied Geohydrology Summer Research Assistantships  
Starting Date: Positions available after May 16, 2005.

Application Deadline: First consideration given to application material received by **March 1, 2005**.

Salary: Salary \$5,880 for each 12-week assistantship. Expenses of travel to and from Lawrence are not provided. All work-related travel expenses will be provided by the Kansas Geological Survey.

Application Procedure: Apply online at <http://jobs.ku.edu>; search for this position by department name "KS Geological Survey" and then select position number **66146**. Complete online application, provide contact information for three professional references, attach resume, and mail official college transcripts to: Annette Delaney, Kansas Geological Survey, The University of Kansas, 1930 Constant Ave, Lawrence, KS 66047; PH: (785) 864-2152, FAX: (785) 864-5317, [adelaney@kgs.ku.edu](mailto:adelaney@kgs.ku.edu). For further technical information contact Jim Butler at the above address or at [jbutler@kgs.ku.edu](mailto:jbutler@kgs.ku.edu). Additional information about the type of work to be done can be found at <http://www.kgs.ku.edu/General/Personnel/abc/butler.html>.

<p><b>Geologists</b></p> <p><b>Scientists</b></p> <p><b>Planners</b></p> <p><b>Traffic Engineers</b></p> <p><b>Environmental Engineers</b></p> <p><b>Data Managers</b></p>	<p>Albany - Buffalo - New York City - Plattsburgh - Rochester</p> <p><b>URS</b></p> <p><b>28 Corporate Drive, Suite 200</b> <b>Clifton Park, New York 12065</b> <b>Tel: 518.688.0015</b> <b>Fax: 518.688.0022</b></p> <p><b>www.urscorp.com</b></p>
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**POSITIONS OPEN:**

**HYDROGEOLOGIST -- ENTRY-LEVEL**

Recent grad to 2 yrs. exp. Responsibilities to include field data collection, contractor oversight, data evaluation, and report preparation. BS degree in geology or hydrogeology required; MS preferred.

**HYDROGEOLOGIST -- MID-LEVEL**

4-8 yrs exp. Responsibilities to include client interaction, proposal and work plan preparation, and project management. Expertise in site investigation and remediation required. Water supply experience a plus. BS required; MS preferred. Strong writing skills required.

**WETLAND/ENVIRONMENTAL SCIENTIST**

2-5 yrs exp. in Environmental Permitting and Review. Experience in wetland delineation; wetlands regulations; and SEQRA process on complex development projects. Responsibilities include wetland delineation, assessment, habitat evaluation, and report preparation. Strong writing skills required. BS required (MS and/or PWS/WPIT a plus).

We offer full benefits: overtime compensation, and educational assistance.  
Resumes should be sent to: 43 British American Boulevard, Latham, NY 12110 or fax to (518) 782-0500.

# GEO CROSSWORD PUZZLE ANSWERS

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Do you have questions or comments about this month's newsletter?

Send your suggestions my way!

Mary Millus at (518) 688-0015 or via e-mail: [mary\\_millus@urscorp.com](mailto:mary_millus@urscorp.com)

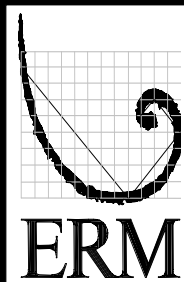


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DISTRICT MANAGER

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FAX: 518/295-8289  
EMAIL: srclayne@midtel.net

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<i>Tom Johnson, Secretary</i>	<i>(518) 348-6995</i>	<i><a href="mailto:tjohnson@alphageoscience.com">tjohnson@alphageoscience.com</a></i>
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**HMPGA**  
**P.O. Box 5506**  
**Albany, NY 12205-0506**

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