PRESIDENT’S MESSAGE

February - short days long evenings, time to sort rock boxes, tidy collections, (“Where did I find that one?”), and time to make plans. Plans for decorating the house! Plans for restocking the garden! Plans for that ultimate field trip! Oh! and what else? Yes! Plans on how I can help my club?

Why not put your mind on how we can inspire and educate the younger members of our organization? The junior members of our clubs are the lifeblood of our organization. We need to nurture and help them grow. Leona and Hugh Sheffield have spent a considerable amount of time and effort on promoting the Junior of the Year award and encouraging our youth to work towards earning a scholarship at one of the excellent workshops at William Holland or Wildacres. Check the Lodestar, the SFMS Website (see bottom of this page), or your club’s newsletter or bulletin for more information. Also, a letter has been sent to all Club Presidents containing this information.

Many of our clubs work hard at promoting programs for their junior members. To help in this endeavor, I recommend you to look at the Earth Digger Clubs, a program package produced by Diamond Dan, P.O. Box 143 Manchester, New York 14504, email: diamonddan@rochester.rr.com, with these programs we could inspire our young members to look and learn about our world. Happy sorting and planning!

Best wishes to all,
Eileen Price, President

2005 SFMS Workshop Update

The first date for submission of your Registration Forms for the 2005 Workshops will have passed by the time this issue of the Lodestar reaches you. We hope that you carefully read the Workshop Brochure sent out to the entire Lodestar mailing list in December. We learned that some persons had not received their copy by the second week in January. Such is the U.S. Postal Service.

We hope that club editors as well as others know that the entire Workshop Brochure as well as Registration Forms are available for downloading from the SFMS web site at the URL shown at the bottom of this page. Club editors please help us out by reprinting as much material as possible in your newsletter. Get in touch with our Registrars, Directors and/or the Education Chairman if you need additional information. Their email addresses are on page 2 of this Lodestar.

Next fall we plan to send out this Brochure for the 2006 season as part of the November 2005 Lodestar. Keep an eye out for it!

A LITTLE REMINDER FROM THE MAYO EDUCATIONAL FOUNDATION, INC.

The deadline for submitting completed applications for MEFI grants for the 2005-2006 school year is March 31, 2005. If you are applying for a grant, or your club is ‘sponsoring’ a student applying for a scholarship grant, please be aware that ALL forms and relevant documents should be received by the MEFI President no later than March 31. This allows time for copying all materials and sending them to the MEFI Directors for evaluation.

Thank you,
Diane Dare, MEFI President

Website: http://www.amfed.org/sfms
Email: sfms@amfed.org
## 2005 SFMS Officers

<table>
<thead>
<tr>
<th>Position</th>
<th>Name</th>
<th>Phone Number</th>
<th>Email Address</th>
</tr>
</thead>
<tbody>
<tr>
<td>President</td>
<td>Eileen Price</td>
<td>865.694.4071</td>
<td><a href="mailto:rfemprice@yahoo.com">rfemprice@yahoo.com</a></td>
</tr>
<tr>
<td>1st Vice President</td>
<td>Ann Monroe</td>
<td>204.591.5632</td>
<td><a href="mailto:acmonroe@bellsouth.net">acmonroe@bellsouth.net</a></td>
</tr>
<tr>
<td>2nd Vice President</td>
<td>Buddy Shotts</td>
<td>601.947.7245</td>
<td><a href="mailto:buddy@datasync.com">buddy@datasync.com</a></td>
</tr>
<tr>
<td>Secretary</td>
<td>Betty James</td>
<td>601.914.6747</td>
<td><a href="mailto:mineralaid@jam.rr.com">mineralaid@jam.rr.com</a></td>
</tr>
<tr>
<td>Membership Secretary</td>
<td>Leo Morris</td>
<td>770.445.9274</td>
<td><a href="mailto:memship4198@yahoo.com">memship4198@yahoo.com</a></td>
</tr>
<tr>
<td>Treasurer</td>
<td>Ken Anderson</td>
<td>803.547.5147</td>
<td><a href="mailto:27k.da66@rjsonline.net">27k.da66@rjsonline.net</a></td>
</tr>
<tr>
<td>Assistant Treasurer</td>
<td>David Katt</td>
<td>540.483.0823</td>
<td><a href="mailto:dkitkatt@direway.com">dkitkatt@direway.com</a></td>
</tr>
<tr>
<td>Editor</td>
<td>Carolyn Daniels</td>
<td>770.723.1359</td>
<td><a href="mailto:dpdaniels@mindspring.com">dpdaniels@mindspring.com</a></td>
</tr>
<tr>
<td>Immediate Past President</td>
<td>Bill Waggener</td>
<td>404.355.7377</td>
<td><a href="mailto:wwgagnerenri@bellsouth.net">wwgagnerenri@bellsouth.net</a></td>
</tr>
<tr>
<td>AFMS President-Elect</td>
<td>Jim Robinson</td>
<td>904.221.5038</td>
<td><a href="mailto:jhr30@netzero.net">jhr30@netzero.net</a></td>
</tr>
<tr>
<td>President-Mayo Education Found</td>
<td>Diane Dare</td>
<td>727.937.8080</td>
<td></td>
</tr>
</tbody>
</table>

## 2005 SFMS Committee Chairman

<table>
<thead>
<tr>
<th>Position</th>
<th>Name</th>
<th>Phone Number</th>
<th>Email Address</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nominations</td>
<td>Bill Waggener</td>
<td>404.355.7377</td>
<td><a href="mailto:wwgagnerenri@bellsouth.net">wwgagnerenri@bellsouth.net</a></td>
</tr>
<tr>
<td>Long Range Planning</td>
<td>John Wright</td>
<td>228.875.9192</td>
<td><a href="mailto:osbw@datasync.com">osbw@datasync.com</a></td>
</tr>
<tr>
<td>Bulletin Contest</td>
<td>Anna Denton</td>
<td>706.569.1219</td>
<td><a href="mailto:Anna.Denton@Excite.com">Anna.Denton@Excite.com</a></td>
</tr>
<tr>
<td>Constitution/By-Laws</td>
<td>Robert (Red) Walker</td>
<td>423.369.3077</td>
<td></td>
</tr>
<tr>
<td>Field Trips</td>
<td>Jim Flora</td>
<td>706.896.8040</td>
<td><a href="mailto:jlmflora@att.net">jlmflora@att.net</a></td>
</tr>
<tr>
<td>Education</td>
<td>Fred Sias</td>
<td>864.654.6833</td>
<td><a href="mailto:sfmsedchair@mindspring.com">sfmsedchair@mindspring.com</a></td>
</tr>
<tr>
<td>Historian</td>
<td>Charlotte Mayo Bryant</td>
<td>706.278.8344</td>
<td></td>
</tr>
<tr>
<td>Insurance Liaison</td>
<td>Ken Anderson (Acting)</td>
<td></td>
<td>See Treasurer</td>
</tr>
<tr>
<td>Publications</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Safety</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Slide/Video Programs</td>
<td>Freda Hull</td>
<td>321.725.0847</td>
<td><a href="mailto:freehull@juno.com">freehull@juno.com</a></td>
</tr>
<tr>
<td>Social Concerns</td>
<td>Edna Morris</td>
<td>770.445.9274</td>
<td><a href="mailto:memship198@yahoo.com">memship198@yahoo.com</a></td>
</tr>
<tr>
<td>Stamp Program</td>
<td>Jim Robinson</td>
<td>904.221.5038</td>
<td><a href="mailto:jr30@netzero.net">jr30@netzero.net</a></td>
</tr>
<tr>
<td>Supplies</td>
<td>Reba Shotts</td>
<td>601.947.7245</td>
<td><a href="mailto:rholland@datasync.com">rholland@datasync.com</a></td>
</tr>
<tr>
<td>Uniform Rules</td>
<td>Flora Walker</td>
<td>423.369.3077</td>
<td><a href="mailto:florallee@highland.net">florallee@highland.net</a></td>
</tr>
<tr>
<td>Ways &amp; Means</td>
<td>Frank Decaminada</td>
<td>770.992.8309</td>
<td><a href="mailto:carrie128@comcast.net">carrie128@comcast.net</a></td>
</tr>
<tr>
<td>Youth Resources</td>
<td>Hugh &amp; Leona Sheffield</td>
<td>727.894.2440</td>
<td></td>
</tr>
<tr>
<td>2005 Annual Meeting Hosts</td>
<td>William Harr</td>
<td>321.480.0375</td>
<td><a href="mailto:wharr@clfr.com">wharr@clfr.com</a></td>
</tr>
<tr>
<td>Wildacres Directors</td>
<td>David &amp; Barbara Tuttle</td>
<td>904.225.0689</td>
<td><a href="mailto:dtt@net-magic.net">dtt@net-magic.net</a></td>
</tr>
<tr>
<td>Wildacres Registrars</td>
<td>Kerri &amp; Bill Wetzel</td>
<td>864.306.6749</td>
<td><a href="mailto:wwetzel@earthlink.net">wwetzel@earthlink.net</a></td>
</tr>
<tr>
<td>Wm. Holland Director</td>
<td>Pat Davis</td>
<td>727.323.2147</td>
<td><a href="mailto:rocksnbeads@hotmail.com">rocksnbeads@hotmail.com</a></td>
</tr>
<tr>
<td>Wm. Holland Registrars</td>
<td>Dana &amp; Ray Gonzalez</td>
<td>706.327.4474</td>
<td><a href="mailto:drg@nmshsi.com">drg@nmshsi.com</a></td>
</tr>
</tbody>
</table>

## 2005 MAYO FOUNDATION Officers/Directors

<table>
<thead>
<tr>
<th>Position</th>
<th>Name</th>
<th>Phone Number</th>
<th>Email Address</th>
</tr>
</thead>
<tbody>
<tr>
<td>President</td>
<td>Diane Dare</td>
<td>727.937.8080</td>
<td></td>
</tr>
<tr>
<td>Vice President</td>
<td>Eileen Price</td>
<td>865.694.4071</td>
<td><a href="mailto:rfemprice@yahoo.com">rfemprice@yahoo.com</a></td>
</tr>
<tr>
<td>Treasurer</td>
<td>Frank Decaminada</td>
<td>770.992.8309</td>
<td><a href="mailto:carrie128@comcast.net">carrie128@comcast.net</a></td>
</tr>
<tr>
<td>SFMS Education Chair</td>
<td>Fred Sias</td>
<td>864.654.6833</td>
<td><a href="mailto:sfmsedchair@mindspring.com">sfmsedchair@mindspring.com</a></td>
</tr>
<tr>
<td>Secretary</td>
<td>Ron Denton</td>
<td>706.569.1219</td>
<td><a href="mailto:ronnendent@earthlink.net">ronnendent@earthlink.net</a></td>
</tr>
<tr>
<td>Director</td>
<td>Charlotte Mayo Bryant</td>
<td>706.278.8344</td>
<td></td>
</tr>
<tr>
<td>Director</td>
<td>Jeanette Banks</td>
<td>770.948.8444</td>
<td><a href="mailto:onbanks2@comcast.net">onbanks2@comcast.net</a></td>
</tr>
</tbody>
</table>

### 2005 Lodestar Due Date

The article submittal due date for the March 2005 Lodestar is February 25, 2005.

Copyright © 2004 by the Southeast Federation of Mineralogical Societies, Inc. Except for items that are specifically copyrighted by their authors, other societies may use material published in Lodestar provided that proper credit is given and the sense or meaning of the material is not changed. Editor: Carolyn L. Daniels.
EDITOR’S RAMBLINGS

I have recently had several individual requests to mail information regarding SFMS Workshop information. A 2005 Workshop Brochure was mailed to the current Lodestar mailing list as of the first of December 2004. The mailing list includes past SFMS presidents; current SFMS officers; current subscribers; SFMS member club presidents, program chairs, secretaries, etc. Therefore, a minimum of three of your club officers (assuming that you do not have a club program chair) should have received a copy of the brochure and all issues of the Lodestar. Club officers, please share your mailings from SFMS with your membership!!

The Workshop Brochure was printed and distributed in an effort to reduce the size and therefore, the cost of producing and distributing the Lodestar by eliminating the need for printing many pages of workshop information each issue of the Lodestar. I have also been requested to cut expenses in producing the Lodestar wherever possible without reducing it’s quality or leaving out necessary information for distribution.

The mailing permit for the Lodestar only allows me to mail a minimum of 100 copies of the same publication at a time. Individual mailings must be mailed at a first class rate. In addition, it costs approximately $0.75 a copy to produce a 20 page document (the usual size of each issue of Lodestar in the past). (You can see how my budget could be seriously blown if I were to receive and fill many of the above requests without asking for reimbursement of some type.)

I currently have 29 copies of the Workshop Brochures in my possession. I will mail out these copies upon request until they are gone. Regarding past issues of the Lodestar or extra copies of the current issue, I will fill any requests for individual mailings until extra printed copies are gone and if I receive $1.40 (the approximate cost of producing and first class postage for one copy) with the request. I am also reprinting four pages of Workshop information in this issue of Lodestar. Copies of the current (and recently archived) issues of Lodestar and a copy of the Workshop Brochure can be accessed at the SFMS website. Specific questions regarding the SFMS sponsored workshops should be directed to the SFMS Education Chairman, Fred Sias (see page 2).

Thank you to everyone who has expressed an interest in the 2005 Workshops. I encourage everyone that can attend a workshop to do so.

Sincerely,
Carolyn L. Daniels, Lodestar Editor

YOUTH RESOURCES

Workshop Scholarship recommendations for our youth are due on March 1, 2005. Letters regarding SFMS awards and scholarships for our youth members were mailed to all club presidents in mid-January 2005. Any Youth Leaders and/or adults interacting with our youth, please contact your club president for details.

Hugh and Leona Sheffield
SFMS Youth Resources Chairmen

A CALL FOR VOLUNTEERS
(Reprinted from the January 2005 Lodestar)

I would like to invite all appointed Committee Chairs for SFMS committees and SFMS representatives to AFMS Committees to retain their positions for the year 2005. However, there are several vacancies to fill:

- One is for SFMS Insurance Liaison, and I would like to thank Dot Elam for taking care of that for us last year. Dot will help anyone who wishes to take over.
- I also need someone to take on responsibility for Safety, as both SFMS Committee Chair, and a SFMS Representative to the AFMS Committee.
- There is also a vacancy for the SFMS representative to the AFMS Rockhound of the Year Committee, my thanks to David Tuttle who is vacating that chair.
- David Tuttle is also vacating his position as SFMS representative to the AFMS Education—All American Club Committee and SFMS will need a volunteer for this position as well.

I would also like to thank Anna Denton for taking over from Diane Dare as the Bulletin Editors’ Competition Chairman. Thank you to Diane for contributing all her of her expertise and time.

Please let me know if you have any interest in the above vacant positions, I would love to fill these by the end of January 2005.

Many thanks,
Eileen Price, SFMS President

LIABILITY INSURANCE

Our insurance agency, Snellings Walters, has now noted that I will be receiving all information regarding our policy, payments, audits etc.

If Eileen Price (SFMS President) is successful in finding a volunteer for Insurance Liaison for 2005, I will work with that person for a seamless transfer.

In the meantime I will be acting Insurance Liaison for our Federation.

Ken Anderson, SFMS Treasurer
modified from an email received by the editor on 1/27/05
At the Southeast Federation of Mineralogical Societies Annual Meeting held on December 11, 2004, the attached operating budget was approved.

Income for Fiscal Year 2005 should be $16,550. This sum includes SFMS Membership dues of $7600 and expected Workshops auction income of $8100. These incomes along with $750 from investment interest earnings and $100 from supplies constitute our funding sources. Note that the $100 shown for supplies sales is offset by the cost of purchasing these supplies. Exclusion of $100 leaves a working income of $16,450.

Expenses are divided into three categories:

1. Officer and staff committee expenses of $2700 (Staff committees support the officers. Ways and Means is an example of such a committee.)
2. Program Committee expenses of $17,300. (Program Committees are those which directly impacts our members.)
3. Miscellaneous expenses of $7050. (Primarily American Federation of Mineralogical Societies costs.)

Program committee expenses are the largest funded category. The largest part of every year is the cost for publication and mail-out of Lodestar. Other expenditures for bulletin contest, slide show/videos are in line with prior years and with expectations for 2005. The high dollar value shown for publications is for printing and mail-out of the SFMS Directory.

It should be noted that the 2005 Fiscal Budget continues the financial policy cap of $60,000 that was put in place at the 1999 SFMS annual meeting. As you recall three new line items were added for Fiscal Year 2001. For Fiscal Year 2005 these line items are funded as follows:

1. $5500 to the Education Committee for the SFMS William Holland and Wildacres Workshops. Included within these funds are $100 for Youth Scholarships and $500 for printing and mail out of a Workshop Booklet. The balance of the funds are to be spent by the Education Committee as best fits the needs of the workshops. Disbursements are to be from the Treasurer. Note that the $5500 budgeted is in line with Fiscal Year 2004.

2. $900 to the three societies/clubs who hosted the Executive Board and the Annual Meetings of the Southeast Federation of Mineralogical Societies. Funds are to be used to cover club expenses and to assist the show Judges with their expenses. The $900 are to be distributed: (1) $550 for the annual meeting and (2) $175 for each Executive meeting. Note that the additional $150 that has been added for the Annual Meeting is to cover anticipated increased costs for SFMS case ribbons, trophies and related judging supplies. Payments are to be made by the SFMS Treasurer only after actual expense invoices are submitted by the hosting clubs.

3. $350 for Youth Resources to enable assistance to the Societies/Clubs to improve their Juniors program.

Under Miscellaneous Expenses are the $0.50 dues SFMS pays to the AFMS. Also included are travel expenses to the AFMS annual meeting to be held in St. Louis, Missouri, August 16 thru 21, 2005 and a donation of $500 to the Mayo Educational Foundation, Inc.

The budget impact will be to create a $10,500 operating deficit for Fiscal Year 2005. Most of this amount is for Education. It should be noted that Education is more than the workshops, i.e., promote the educational, scientific and recreational aspects of the Federation (SFMS By-Laws Article IX Section 6C). The undersigned believe that it will be put to good use by the Education Committee as it was in 2001 thru 2004 when funds were used for workshop improvements, instructors’ spouse expenses while attending workshops, workshop slide programs/booklets and your workshop attendance.

Respectfully submitted,  
Frank Decaminada, Chair; Ken Anderson, Treasurer;  
David Katt, Assistant Treasurer

YOU WON’T WANT TO MISS THIS!

As the new year begins, your AFMS Endowment Fund Committee has already been hard at work for several months lining up some ever-more-spectacular prizes for the 2005 AFMS Endowment Fund Raffle to be held at the 58th AFMS Convention in St Louis, on August 20, 2005.

Your regional committee chairmen will shortly begin selling tickets so that you, too, can participate in this drawings for these great prizes offered in the annual fund-raiser to benefit the AFMS Endowment Fund. For the updated listing of who your regional chairman is, and color pictures and descriptions of all prizes being offered, Marty Hart, AFMS webmaster, assures us he will have the latest updates posted on the AFMS website at: http://www.amfed.org.

(Continued on Page 6)
# SOUTHEAST FEDERATION OF MINERALOGICAL SOCIETIES, INC.

## Operating Budget for 2005

### INCOME

<table>
<thead>
<tr>
<th></th>
<th>2002 Actual</th>
<th>2003 Actual</th>
<th>2004 Budget</th>
<th>2005 Budget</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dues</td>
<td>7601</td>
<td>7761</td>
<td>7600</td>
<td>7600</td>
</tr>
<tr>
<td>Interest</td>
<td>673</td>
<td>2234</td>
<td>750</td>
<td>750</td>
</tr>
<tr>
<td>Wildacres</td>
<td>6066</td>
<td>5526</td>
<td>4500</td>
<td>4850</td>
</tr>
<tr>
<td>Wm. Holland</td>
<td>2788</td>
<td>2746</td>
<td>3000</td>
<td>3250</td>
</tr>
<tr>
<td>Supplies</td>
<td>184</td>
<td>169</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td><strong>TOTAL INCOME</strong></td>
<td>$17,312</td>
<td>$18,436</td>
<td>$15,950</td>
<td>$16,550</td>
</tr>
</tbody>
</table>

### OFFICERS’ EXPENSES

<table>
<thead>
<tr>
<th></th>
<th>2002 Actual</th>
<th>2003 Actual</th>
<th>2004 Budget</th>
<th>2005 Budget</th>
</tr>
</thead>
<tbody>
<tr>
<td>President</td>
<td>0</td>
<td>3</td>
<td>200</td>
<td>200</td>
</tr>
<tr>
<td>1st V.P.</td>
<td>0</td>
<td>0</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>2nd V.P.</td>
<td>0</td>
<td>0</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>Secretary</td>
<td>0</td>
<td>939</td>
<td>1300</td>
<td>1300</td>
</tr>
<tr>
<td>Membership Secretary</td>
<td>52</td>
<td>276</td>
<td>350</td>
<td>350</td>
</tr>
<tr>
<td>Treasurer</td>
<td>34</td>
<td>145</td>
<td>150</td>
<td>150</td>
</tr>
<tr>
<td>Other Officers</td>
<td>0</td>
<td>0</td>
<td>500</td>
<td>500</td>
</tr>
<tr>
<td><strong>OFFICER’S SUBTOTAL</strong></td>
<td>$86</td>
<td>$1363</td>
<td>$2700</td>
<td>$2700</td>
</tr>
</tbody>
</table>

### COMMITTEE EXPENSES

<table>
<thead>
<tr>
<th></th>
<th>2002 Actual</th>
<th>2003 Actual</th>
<th>2004 Budget</th>
<th>2005 Budget</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bulletin Contest</td>
<td>654</td>
<td>652</td>
<td>700</td>
<td>700</td>
</tr>
<tr>
<td>Editor (<em>Lodestar</em>)</td>
<td>5595</td>
<td>5913</td>
<td>6850</td>
<td>6850</td>
</tr>
<tr>
<td>Computer System</td>
<td>1496</td>
<td>(50)</td>
<td>350</td>
<td>350</td>
</tr>
<tr>
<td>Publications</td>
<td>1673</td>
<td>1462</td>
<td>1700</td>
<td>1700</td>
</tr>
<tr>
<td>Insurance (net)</td>
<td>1553</td>
<td>(1170)</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Supplies</td>
<td>0</td>
<td>4</td>
<td>400</td>
<td>400</td>
</tr>
<tr>
<td>Slide Programs</td>
<td>250</td>
<td>374</td>
<td>400</td>
<td>400</td>
</tr>
<tr>
<td>Education</td>
<td>4560</td>
<td>4437</td>
<td>5000</td>
<td>5500</td>
</tr>
<tr>
<td>Federation Meetings</td>
<td>350</td>
<td>497</td>
<td>900</td>
<td>900</td>
</tr>
<tr>
<td>Youth Resources</td>
<td>206</td>
<td>99</td>
<td>250</td>
<td>350</td>
</tr>
<tr>
<td>Social Concerns</td>
<td></td>
<td></td>
<td>150</td>
<td>150</td>
</tr>
<tr>
<td><strong>COMMITTEE SUBTOTAL</strong></td>
<td>$16337</td>
<td>$12218</td>
<td>$16700</td>
<td>$17300</td>
</tr>
</tbody>
</table>

### MISC. EXPENSES

<table>
<thead>
<tr>
<th></th>
<th>2002 Actual</th>
<th>2003 Actual</th>
<th>2004 Budget</th>
<th>2005 Budget</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dues Am. Federation</td>
<td>3898(a)</td>
<td>3759 (a)</td>
<td>3800(a)</td>
<td>3800(a)</td>
</tr>
<tr>
<td>Officer Travel, AFMS</td>
<td>2129</td>
<td>1180</td>
<td>1800</td>
<td>1800</td>
</tr>
<tr>
<td>Awards</td>
<td>856</td>
<td>709</td>
<td>700</td>
<td>700</td>
</tr>
<tr>
<td>Mayo Ed. Foundation</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>500</td>
</tr>
<tr>
<td>Miscellaneous</td>
<td>196</td>
<td>195</td>
<td>250</td>
<td>250</td>
</tr>
<tr>
<td><strong>MISC. SUBTOTAL</strong></td>
<td>$7079</td>
<td>$5843</td>
<td>$6550</td>
<td>$7050</td>
</tr>
</tbody>
</table>

### OVERALL SUMMARY

<table>
<thead>
<tr>
<th></th>
<th>2002 Actual</th>
<th>2003 Actual</th>
<th>2004 Budget</th>
<th>2005 Budget</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Income</td>
<td>$17312</td>
<td>$18436</td>
<td>$15950</td>
<td>$16550</td>
</tr>
<tr>
<td>Total Expenses</td>
<td>$23502</td>
<td>$19424</td>
<td>$25950</td>
<td>$27050</td>
</tr>
<tr>
<td><strong>DIFFERENCE</strong></td>
<td>($6190)</td>
<td>($988)</td>
<td>($10000)</td>
<td>($10500)</td>
</tr>
</tbody>
</table>

*(a) Based on Current Dues of $0.50 per member*
YOU WON'T WANT TO MISS THIS
(cont. from page 4)

As of the first of December, we already had four great prizes donated by AFMS members for the 2005 raffle. Thanks to Dee Holland (NFMS) and Shirley Leeson (CFMS), we have two more beautiful opal pendants, crafted from stones in the Endowment Fund inventory by Dee and Shirley, and set in 14k gold. We also have a gorgeous necklace of Pecos “Diamonds,” from Howell Whiting, past president of RMFMS, (see picture). Howell says he wants people to know that Herkimer “Diamonds” are not the only “Diamonds” in the USA, and he wants everyone to see the western version!

Bural LaRue, of CFMS, has promised to send us another of his famous gold lost-wax casting pieces, and although we don’t yet know just what this year’s contribution will be, we know it will be a spectacular piece of jewelry! We will shortly be showing pictures of his gift and more in this newsletter, and on the website, and will be giving details about all the prizes as we receive them.

Our goal is to have at least one item from each of the seven regional Federations, and we’d like to invite anyone who is interested in contributing a special prize this year to contact us as soon as possible. If you or your club would be interested in sending a special prize for this worthy effort to help build the AFMS Endowment Fund, please get in touch now. We thank you all for your help.

Joy Bourne, AFMS Endowment Fund Chair
RR #1, Box 159A, Towanda, PA 18848-9739
570.265.6454 or csprings@epix.net

from an e-mail from Carolyn Weinberger, AFMS Editor

Robert Cranston
1927-January 2, 2005

Bob Cranston of Grand Junction, Colorado, passed away January 2, 2005, and the rockhounds of America lost a tireless worker for their cause. He personally, probably did more in the effort to keep public lands open and available for the collection of the rocks, minerals and fossils that rockhounds enjoy than any other one individual. He will be missed.

Bob was a member of the Grand Junction Gem and Mineral Club (Colorado) and served for a number of years as the Rocky Mountain Federation’s Assistant State Director for Colorado and the Federation’s Colorado representative on their Public Lands Advisory Committee. He was also long-time Secretary for the American Lands Access Association (ALAA), and it was in this position that he made his greatest contribution to our hobby. By prolific use of the e-mail system, he kept people on his long address lists currently informed of threats to collector access to public lands. Despite his seriously deteriorating health in recent months, he continued to use his information sources and computer skills to provide this current and useful information. His last article for the A.F.M.S. Newsletter appeared in the December-January (2005) issue.

His yeoman-like service to the rockhound cause was recognized by the Rocky Mountain Federation several years ago when he was presented with their Gold Pan Award. This is a special award that is made when the occasion calls for an especially deserving individual to be recognized, and is not something that automatically happens annually.

Bob’s health had been bad for a number of years. He had had three coronary by-pass surgeries, suffered from diabetes, had a serious interaction problem with prescription drugs that caused macular deterioration and recently was diagnosed with lung cancer. The final blow was when he fell and broke an arm, after which he was hospitalized and developed pneumonia, from which he didn’t survive.

(continued on next page)
ROBERT CRANSTON  
(continued from previous page)  

He was 77 years old and is survived by Shirley, his wife of 54 years, one daughter and one granddaughter, all of whom live in Grand Junction.

Contributions in Bob’s memory should be directed to the AFMS Scholarship Foundation, c/o your Regional Scholarship Coordinator or to the Hospice of your choice.

John Alf  
from the A.F.M.S. Newsletter (12/05)

SFMS STATE DIRECTOR PASSES AWAY

I have regretfully received the sad news of the passing of Sidney Drouant, SFMS Louisiana State Director, on January 26, 2005 at 4:15 A.M. Sadly, his wife, Nora (who does not see well) fell and broke her hip and was also hospitalized elsewhere at the time of his passing.

Our love and heartfelt sympathy goes to their only child, Sid Jr. Nora is currently in rehabilitation. (Unfortunately, I do not know the name of the hospital.)

This information came to me from Buddy Shotts, John and Billie Wright, and Olin Banks. Thanks to all who contacted me.

Edna Morris  
SFMS Social Concerns Chair

2005 NOMINATIONS COMMITTEE

I would like to thank Beryl Ferguson, Arthur Mott, Leo Morris, and Mark Easterbrook for agreeing to serve on the 2005 Nominations Committee. These folks will be working with me to fill the slate for 2006.

Bill Waggener, 2005 SFMS Nomination Committee Chairman

THE MAYO EDUCATIONAL FOUNDATION, INC. – DONATIONS

We need to thank all individuals and Southeast Federation of Mineralogical Societies affiliated Clubs/Societies that contributed to the Mayo Educational Foundation, Inc. in Fiscal year 2004. Twelve donations totaling $3,637 were received.

Contributors were:

- Cobb County G.M.S. (Georgia)
- Columbia G.M.S. (South Carolina)
- Georgia Mineral Society (Georgia)
- Henderson County G.M.S. (North Carolina)
- Jacksonville G.M.S. (Florida)
- Knoxville G.M.S. (Tennessee)
- Mississippi Gulf Coast G.M.S. (Mississippi)
- Pinellas Geological Society (Florida)
- Southern Appalachian Mineral Society (North Carolina)
- SFMS Annual Meeting Raffle

In addition, Kim Cochran and Charlotte Mayo Bryant gave memorial donations.

Note that all contributions are placed in government issued money accounts and only interest earned is given out each year in scholarships to financially aid qualifying young men and women to acquire academic degrees in Earth Sciences and for financing of educational projects of exceptional meritious value. For Fiscal Year 2004, four scholarships totaling $7400 were awarded from the M.E.F.I. asset base of $243,922.55.

We all need to consider increasing the M.E.F.I. asset value. There are eighty two (82) Clubs/Societies in the SFMS. Only nine contributed in Fiscal Year 2004 to the M.E.F.I. Just think if contributions per year would double to $8,000, that in ten (10) years the M.E.F.I. assets would increase by 25% and this would increase scholarships by a similar percentage.

Frank Decaminada  
MEFI Treasurer

LEWIS & CLARK UPDATE

The long-awaited AFMS booklet on the Lewis & Clark Expedition is now available on the AFMS Website. Edited by Brenda Hanins with lots of research provided by individuals from each of the Regional Federations, the booklet is a great guide for kids traveling the trail.

You can download a copy for yourself or your club by visiting www.amfed.org and following the links.

from the A.F.M.S. Newsletter (2/05)
SFMS EXECUTIVE BOARD MEETING
Hosted by
The Memphis Archaeological & Geological Society
Memphis, TN

Saturday, April 23, 2005

Hotel and Meeting Room
Comfort Suites Thousand Oaks
2575 Thousand Oaks Cove
Memphis, TN

For reservations call: 1.901.365.2575, FAX: 901.368.1617 or E-Mail: gm.tn397@choicehotels.com.

For participants to earn the special group rate of $65.00 for single or double, each reservation must be booked using the Group Name: Southeast Federation. Reservations must be completed prior to March 22, 2005.

The Memphis Archaeological & Geological Society invites Executive Board Meeting participants to attend a complimentary pot luck dinner on Friday, April 22 at 6:30 p.m. featuring famous Memphis Bar-B-Q. Arrangements will also be made for meeting participants to obtain free entrance into the Mid-America Fossil, Mineral and Jewelry Show.

Directions to the Comfort Suites and the Rock Show:

Please see future issues of Lodestar for additional information. If you have any questions, please contact Cornelia McDaniels at cfmcDaniel@worldnet.att.net or 901.274.7706.
2005 Wildacres Workshop Registration Form

<table>
<thead>
<tr>
<th>Session:</th>
<th>April</th>
<th>August</th>
<th>September</th>
<th>Accommodations:</th>
<th>Lodge</th>
<th>Day Student</th>
</tr>
</thead>
<tbody>
<tr>
<td>(A) Name</td>
<td>Mr</td>
<td>Mrs</td>
<td>Ms</td>
<td>SFMS Club</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>PLEASE PRINT NAME(S) AS YOU WANT IT TO APPEAR ON YOUR NAME TAG</td>
<td></td>
<td></td>
</tr>
<tr>
<td>(B) Name</td>
<td>Mr</td>
<td>Mrs</td>
<td>Ma</td>
<td>Phone</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Email</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Address: ____________ Street ____________ City ____________ State Zip ____________

Is this the first time you will attend William Holland? (A) Yes No (B) Yes No
Have you attended any other SFMS Workshop? (A) Yes No (B) Yes No
Do you wish to be placed on Stand-by if there are no vacancies when your application arrives? Yes No

Class Choices

<table>
<thead>
<tr>
<th>First Choice</th>
<th>Second Choice</th>
<th>Third Choice</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td></td>
<td></td>
</tr>
<tr>
<td>B</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

(*) Check box if you have previously taken this course at an SFMS Workshop

Room Assignment for Single Applicants only:
1) Do you have a friend with whom you wish to room?

2) Do you smoke? __________ Do you wish to room with a non-smoking person? __________ yes __________ no preference.

3) Are you an early riser __________ or a Night Owl __________

INSTRUCTIONS

1) Applications will be accepted beginning on February 15, 2005 for all sessions. The postmark date on or after this determines the order of acceptance. First-time attendees have an extra priority.

2) Your Club Membership Dues must be current and your club’s dues to the Federation must also be paid before you will be accepted.

3) Cost per person for this session is $280, double occupancy with private bath. (Single room cost is $420) $115 for day students. Meals are not included for day students.

A reservation deposit of $30 must accompany this form. You may, and are encouraged to, pay the full amount with this application. If the full amount is not paid with this application, the balance will be due four weeks prior to the workshop. No notice will be sent.

4) Cancellation Policy: There is a $30 nonrefundable charge to cover administrative costs and an additional $30 charge for canceling less than 4 weeks before the session begins. No refund will be given for cancellations received less than 7 days before the session. There are no adjustments for late arrivals or early departures.

Amount submitted with application: $ __________

Make Check Payable to: SFMS Wildacres Workshop

Mail check and this form to:
Kerri and Bill Wetzell
5010 Sunset Drive, Easley, SC 29642
Phone: 864-306-6749 Email: wketzel@earthlink.net

FOR REGISTRAR’S USE ONLY

<table>
<thead>
<tr>
<th>Postmark Date:</th>
<th>Check #:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Deposit #:</td>
<td>Amt. Paid: $</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Accept. Mailed:</td>
<td>Balance due: $</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Standby Mailed:</td>
<td>Bal. Check #:</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Deposit #:</td>
<td>Bal. Amt. Pd: $</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Cancel Date:</td>
<td>Total Paid: $</td>
</tr>
<tr>
<td>- Cancel. Fee:</td>
<td>Refund: $</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>Refund Chk #:</td>
<td>Refund Mailed:</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
</tbody>
</table>
SFMS 2005 Wildacres Workshop at Little Switzerland, NC
2005 Workshop Dates

April........Monday, April 18 to Sunday, April 24, 2005

August     Monday, August 22 to Sunday, August 28, 2005

September..Monday, Sept. 19 to Sunday, September 25, 2005

Wildacres Retreat is a conference center dedicated in 1946 by I.D. Blumenthal and Madelyn Blumenthal of Charlotte, NC, to the improvement of human relations. It is situated on 1400 acres at an elevation of 3,300 feet atop a mountain called Pompey’s Knob. It is in Little Switzerland, approximately half way between Asheville and Blowing Rock, NC just off the Blue Ridge Parkway. There are two lodges, a dining hall, where meals are served family style, a library/auditorium building, mineral and lapidary shops plus a pottery studio.

Fees

Lodge accommodations: $280 per person (double occupancy), including meals. A limited number of single rooms are available at $420 per person. There are no facilities for camping or Recreational Vehicles.

Day Students: $115 per person, no meals are included. (Individual meals my be purchased directly from the Wildacres Retreat.)

Registration Procedures

Applications from members of SFMS clubs will be accepted first; however, members of other AFMS clubs may apply and will be scheduled following SFMS applicants.

Applications will be accepted beginning on February 15, 2005 for all sessions. At that time a $30 Administrative fee should be submitted. The postmark date on or after this date determines the order of acceptance. First-time attendees at SFMS Workshops have an extra priority.

Students under age 18 are welcome, but they must be accompanied by a responsible adult and must be approved by the workshop director and instructor.

Reservation Deposit

A deposit of $30 must accompany all applications. The full amount may be remitted with the application if the applicant wishes. (It is easier for the Registrar.) The balance is due 4 weeks before the workshop begins. No reminders will be sent.

Cancellation Policy

There is a $30 nonrefundable charge to cover administrative costs. An additional $30 charge will be assessed for cancellations made less than 4 weeks before a session begins. No refund will be returned for cancellations by the student within 7 days of the start of a session. There will be no fee adjustment for late arrival or early departure.

*Note: Advanced courses with prerequisites are designated with an asterisk.
**SFMS 2005 William Holland Workshop at Young Harris, Georgia**

**2005 Workshop Dates**

**June** .............. Sunday, June 12 to Saturday, June 18, 2005  
**October** ........ Sunday, October 9 to Saturday, October 15, 2005

Check in is on Sunday after 3 p.m. and departure is Saturday morning after breakfast.

The William Holland School of Lapidary Arts is situated on a mountain in north Georgia near the North Carolina border. The facility includes a two-story main building known as the Sparks Lodge. The upper level is motel-like with 29 air-conditioned bedrooms, with private baths and two beds. Two rooms are equipped for the handicapped.

The lower, ground level houses 13 classrooms, the kitchen, and dining room. This floor is completely air-conditioned, and a new elevator permits easy access to both floors.

There are two other buildings that makeup the retreat complex: the Seabolt Building, which houses the George Kasper Memorial Library as well as showers and restroom facilities for the campground, and Mary Lou’s Cottage, built in 2001, to house the instructional staff. The campground has 10 full hook-up spaces for RV’s up to 40 feet in length.

**Fees**

**Lodge accommodations:** $280 per person, including meals. **Single room:** add $140 ($420).

**Day Students:** $115 per person, no meals are included. **Campground Students:** $98 hookup, $115 per person for classes. No meals are included but are available directly from the retreat.

**Registration Procedures**

Applications from members of SFMS clubs will be accepted first; however, members of other AFMS clubs may apply and will be scheduled following SFMS applicants.

Applications will be accepted beginning on February 15, 2005 for both sessions. The postmark date on or after this date determines the order of acceptance. **First-time attendees have an extra priority.**

Students under age 18 are welcome, but they must be accompanied by a responsible adult and must be approved by the workshop director and instructor.

**Reservation Deposit**

A non-refundable administrative fee of $30 must accompany all applications. The full amount may be remitted with the application if the applicant wishes. (It is easier for the Registrar.) The balance is due 4 weeks before the workshop begins. **No reminders will be sent.**

**Cancellation Policy**

There is a $30 nonrefundable charge to cover administrative costs. An additional $30 charge will be assessed for cancellations made less than 4 weeks before a session begins. No refund will be returned for cancellations within 7 days of the start of a session. A minimum of three students must be enrolled in a particular class to support the cost of the class. No fee will be charged if a class is canceled. No adjustment will be made for late arrival or early departure.

**Workshop Director**

Pat Davis  
4642 North Street  
St. Petersburg, FL 33713  
Phone: 727-323-2147 Email: rocksnbeads@hotmail.com

**Workshop Registrar**

Dana and Ray Gonzalez  
6226 Seaton Drive  
Columbus, GA 31909

**Session 1: June 13-19, 2006**

<table>
<thead>
<tr>
<th>Cabochon, beginning</th>
<th>Chainmaking, beginning</th>
<th>Channelwork</th>
<th>Fused Glass</th>
<th>Lost-wax Casting</th>
<th>Opal cutting</th>
<th>Silversmithing, advanced*</th>
<th>Silversmithing, beginning</th>
<th>Stained Glass</th>
<th>Wirecraft, intermediate*</th>
<th>Wirecraft, Sculpture*</th>
</tr>
</thead>
</table>

**Session 2: October 9-15, 2005**

<table>
<thead>
<tr>
<th>Chainmaking, beginning</th>
<th>Fused Glass</th>
<th>Jewelry Repair*</th>
<th>Lost-wax Casting</th>
<th>Mineral Identification</th>
<th>Opal Cutting</th>
<th>Seed Beading</th>
<th>Silversmithing, beginning</th>
<th>Wirecraft, advanced*</th>
<th>Wirecraft, beginning</th>
</tr>
</thead>
<tbody>
<tr>
<td>John Runkle</td>
<td>Addy DePietro</td>
<td>Dan Haga</td>
<td>Fred Sias</td>
<td>Bruce Siegfried</td>
<td>Joe DePietro</td>
<td>Jo Harrison</td>
<td>Mack DePietro</td>
<td>Dawn Thornton</td>
<td>Lisa Roberts</td>
</tr>
</tbody>
</table>

Note: * indicates advanced course with prerequisites.
**2005 William Holland Workshop Registration Form**

**Session:** □ June 12-18 □ October 9-15  
**Accommodations:** □ Lodge □ Campground □ Day Student

(A) □ Mr  
Name □ Mrs  
□ Ms  
SFMS Club___________________________

PLEASE PRINT NAME(S) AS YOU WANT IT TO APPEAR ON YOUR NAME TAG  
SPELL OUT CLUB NAME INITIALS NOT ACCEPTED

(B) □ Mr  
Name □ Mrs  
□ Ms  
Phone___________________________

Email___________________________

Address: ____________________________________________________________

STREET  
CITY  
STATE  
ZIP

Is this the first time you will attend William Holland?  
(A) □ Yes □ No  
(B) □ Yes □ No

Have you attended any other SFMS Workshop?  
(A) □ Yes □ No  
(B) □ Yes □ No

Do you wish to be placed on Stand-by if there are no vacancies when your application arrives?  
□ Yes □ No

**Class Choices**

| First Choice | * | Second Choice | * | Third Choice | *
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td></td>
<td>B</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

(*) Check box if you have previously taken this course at an SFMS Workshop

**INSTRUCTIONS**

1) Applications will be accepted beginning on February 15, 2005 for all sessions. The postmark date on or after this determines the order of acceptance. First-time attendees have extra priority.

2) Your Club Membership Dues must be current and your club's dues to the Federation must also be paid before you will be accepted.

3) Cost per person for this session is $280, double occupancy with private bath. (Single room cost is $420.) $98 for camp site for 1 or 2 people, plus $115 per person for workshop classes, and $115 for day students. (Meals are not included for campers or day students.)

A reservation deposit of $30 must accompany this form. You may, and are encouraged to, pay the full amount with this application. If the full amount is not paid with this application, the balance will be due four weeks prior to the workshop.

4) Cancellation Policy: There is a $30 nonrefundable charge to cover administrative costs and an additional $30 charge for canceling less than 4 weeks before the session begins. No refund will be given for cancellations received less than 7 days before the session. There are no adjustments for late arrivals or early departures.

**Special Needs:**

4) Do you need a handicap room? Yes____ No_____  
5) Special Dietary needs: Diabetic____ Other____

Campers: Type_________________ Length________

Campsite preference (if any):___________________________

**Make Check Payable to:**

SFMS William Holland Workshop

Mail check and this form to:

Dana and Ray Gonzalez,
6226 Seaton Drive
Columbus, GA 31909
Phone: 706-327-4474 Email: drg@mchsi.com

FOR REGISTRAR'S USE ONLY

<table>
<thead>
<tr>
<th>Postmark Date:</th>
<th>Check #:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Deposit #:</td>
<td>Amt. Paid: $</td>
</tr>
<tr>
<td>Accept. Mailed:</td>
<td>Balance due: $</td>
</tr>
<tr>
<td>Standby Mailed:</td>
<td>Bal. Check #:</td>
</tr>
<tr>
<td>Deposit #:</td>
<td>Bal. Amt. Pd: $</td>
</tr>
<tr>
<td>Cancel Date:</td>
<td>Total Paid: $</td>
</tr>
<tr>
<td>- Cancel. Fee: $</td>
<td>Refund: $</td>
</tr>
<tr>
<td>Refund Chk #:</td>
<td>Refund Mailed:</td>
</tr>
</tbody>
</table>
ENHYDROS
Terminology That's All Wet
by
Julian C. Gray, Georgia Mineral Society Member
(1st Place Advanced Adult Article, 2004 SFMS Bulletin Contest and 4th Place Advanced Adult Article, 2004 AFMS Bulletin Contest)

Mineral dealers at rock shows will occasionally offer specimens labeled enhydros for sale. What they are selling are typically quartz crystals with liquid inclusions. Within the liquid is a tiny bubble and if you tip the crystal back and forth the bubble will move. The dealers will often circle the bubble and if you cannot find the bubble, the dealer will spend a lot of time searching with you. Most require that you use a magnifier. So what are these things?

First of all they are fluid inclusions, not enhydros, and they are also much more common than you might imagine. I will define both, but here is how fluid inclusions form. Minerals grow by adding elements to their surfaces, edges, and corners. Quartz crystals grow in many environments, but they commonly form by growth out of a hydrothermal solution – hot ground water containing dissolved silica. Growth rates and mechanisms are complex subjects and some scientists spend years on this single area of research. It is enough for our purposes here to know that different parts of a single crystal or crystal face can grow at different rates. When this happens microscopic pits develop in the crystal faces. These become the vessels for our bubble bearing liquid. Think of the hopper shaped halite or copper crystals that you’ve seen or those deep cavities or the faces of some Brazilian quartz. As the crystal grows larger, the next layer or several layers of crystal growth can cover these pits trapping liquid in the process. Now the fun begins!

When a liquid is heated it expands, when it cools it contracts. Solids like quartz also expand and contract, but to a much smaller degree. An everyday example of expanding and contracting liquids is the liquid in a glass thermometer. The glass in a thermometer also expands and contracts, just not nearly as much as the mercury or colored alcohol in the tube. When our quartz crystal is finished crystallizing it cools down (and so does the liquid in the inclusion). The cooling liquid contracts and may pull away from the sides of its tiny quartz container forming a vapor bubble.

Scientists call these trapped liquids and their bubbles fluid inclusions. They are quite common and very fascinating. The white color of milky quartz is due to thousands or perhaps millions of microscopic fluid inclusions. Gemologists see inclusions when they look at certain gemstones (emerald is a good example) with a microscope. The liquid is not always water. A common fluid in ore forming processes is salty water. In general, hot water can dissolve a lot more salt than cold water can. Quartz growing in hot salty water may trap some of that salt water in inclusions. When the salt water in the inclusions cools and contracts, it too will form a bubble. But another interesting thing happens; because the water has cooled down it can no longer hold as much salt as it did when it was hot. Salt begins to crystallize out as a halite crystal within the fluid, which in turn is trapped in the quartz crystal. Imagine peering into a microscope and seeing an inclusion with a tiny vapor bubble and microscopic halite crystal! (micromounters eat your heart out.) Other things found in these fluid inclusions are carbon in fluids in Herkimer diamonds (doubly terminated quartz crystals from Herkimer, New York) and oil in fluorite from Elmwood, Tennessee. (Oil often fluoresces – check out your fluorite!) There are many more examples of wild stuff trapped in minerals (Roedder, 1972).

And let’s think about this for a minute: the fluid in the inclusion is an actual sample of fluid in which the mineral was growing! For this reason fluid inclusions are geochemical time capsules for scientists. Techniques have been developed to study these inclusions and determine their composition and the exact means of trapping (Roedder, 1962 and 1984). They tell us how minerals grow, how ore deposits form, and even guide us to oil or metal deposits. They also add or detract from the value of gemstones. And they are simply entertaining to watch. I have a large inclusion in amethyst from the pegmatites in Brandenburg, Namibia. You can see the inclusion through a prism face of the amethyst without out a magnifier. The bubble will move around its triangular home in the amethyst when you rotate the crystal 360 degrees.

So what is an enhydros? The American Geological Institute’s Glossary of Geological Terms (Bates and Jackson, 1987) defines an enhydros as “a hollow nodule or geode of chalcedony containing water, sometimes in large amounts.” This is different from the fluid inclusions that we have been talking about thus far. Remember that chalcedony is a microcrystalline, fibrous variety of quartz. Chalcedony is made up of hundreds or thousands of tiny elongated quartz crystals. These fibrous crystals grow from ground water flowing through a rock, commonly basalt or other volcanic rock. The silica-bearing ground water begins precipitating quartz when it enters a cavity. The chalcedony may entirely fill the cavity forming a nodule or it may leave a void in the center to form a geode. If it forms a geode, then some of the remaining liquid may become trapped in the void. Everyone is familiar with geodes and we all know that the crystal-lined voids in the center can be several inches in diameter – they could hold a lot of water! Mineral dealers who sell true enhydros cut the water-containing geode so that they miss the center of the geode, which would release the water. If you see an enhydros it will look like a chalcedony nodule, but if you shake the enhydros the water will move around.

(continued on next page)
Scientists call the quartz with moving bubbles fluid inclusions. That is what they are and that is what we should call them - fluid inclusions. Geodes with water are called enhydros. It would be better to call the things we see at gem shows "bubbles" than enhydros. Not a single article or book on fluid inclusions that I have seen even mentions the term enhydros.

There is a significant difference between enhydros and fluid inclusions. While enhydros may form by trapping water at the time they are formed, the walls of the geode are porous and water can leave or enter the enhydros. This happens in nature before we find and collect the enhydros. Ground water may continue to flow in and out of enhydros until we collect them, then water only seeps out. Some books warn that enhydros should be sealed to prevent leaking (not to worry, this process is very slow). This means that the water in the enhydros may not be the same water that was trapped when the geode grew (Matsui et al., 1974). Fluid inclusions trap water from which the mineral grew. The walls of a fluid inclusion are solid and non-porous. Only under special, but not completely uncommon, circumstances will a fluid inclusion leak (Roedder, 1984). The water in the fluid inclusion is commonly the water that was trapped when the crystal grew. Some scientists have examples of fluid inclusion dating back to the early Precambrian. That's amazing. These Precambrian fluid inclusions may hold water that is over three billion years old!

Can fluid inclusions leak? Yes, but this happens rarely and typically if a crystal is fractured at some point. Careful examination of the crystals with a microscope can reveal clues as to whether a fluid inclusion is primary and has not leaked. Minerals that exhibit cleavage are more susceptible to leakage: calcite, barite, and fluorite for instance.

Enhydros are scientific curiosities; fluid inclusions are a scientific research tool. It's sort of like the fluid equivalent of the difference between a rock and a mineral. It is incorrect to label a mineral with a fluid inclusion an enhydros. A label calling attention to the fact that a mineral bears fluid inclusions is correct and should even increase the value of a specimen because of the scientific value and unique circumstances under which these formed. Now get busy changing those labels!

References:

From Tips & Trips (7/03)
The Georgia Mineral Society
**LOOKING AHEAD**

**2004/2005 REGIONAL FEDERATION SHOWS & CONVENTIONS**

**California Federation**
Hosts: Roseville Rock Rollers
Roseville, California
June 10-12, 2005

**Eastern Federation**
Hosts: Che-Hanna Rock and Mineral Club
Sayre, Pennsylvania
March 19-20, 2005 (Federation Annual Meeting on March 18)

**Midwest Federation & American Federation**
Hosts: Greater St. Louis Assoc. of Earth Science Clubs
St. Louis, Missouri
August 16-20, 2005

**Northwest Federation Annual Convention & Show**
Hosts: Williamette Agate and Mineral Society
Albany, Oregon
August 5-7, 2005

**Rocky Mountain Federation Annual Convention & Show**
Hosts: Colorado Springs Mineralogical Society
Colorado Springs, Colorado
June 17-19, 2005

**South Central Federation Annual Convention & Show**
Hosts: Austin Gem & Mineral Society
Austin, Texas
December 2-4, 2005

**Southeast Federation Annual Convention & Show**
Hosts: The Canaveral Mineral & Gem Society
Melbourne, FL
November 12-13, 2005

---

**CLUB & SOCIETY SHOWS/SWAPS**
(check with show contact for admission charges, if any)

February 11-13, 2005, Merritt Island, FL - Central Brevard Rock & Gem Club. Annual Symphony of Gemstones Show, Kiwanis Island Park, 950 Kiwanis Park Road. Hours: 11th, 1:00 P.M.-5:00 P.M.; 12th & 13th, 10:00 A.M.-5:00 P.M. Contact: George E. Tolson @ 321.783.4795.

February 18-20, 2005, Vero Beach, FL - The Treasure Coast Rock & Gem Society. Gem and Jewelry Show, Vero Beach Community Center, 14th Avenue and 23rd Street, Downtown Vero Beach. Hours: 18th, 12 Noon-5:00 P.M.; 19th, 10:00 A.M.-5:00 P.M.; 20th, 10:00 A.M.-4:00 P.M. Contact: Pedro Araoz, 608 Arcadia Road, Vero Beach, FL 32963 or 772.231.0005.

February 26-27, 2005, Jackson, MS - Mississippi Gem & Mineral Society. 46th Annual Gem, Mineral, Fossil and Jewelry Show, A&I Buildings, State Fairgrounds at High Street. Hours: 26th, 9:00 A.M.-6:00 P.M.; 27th, 10:00 A.M.-5:00 P.M. Contact Ashley Redden, 601.925.8272 or aredden@netzero.com.

March 4-6, 2005, Largo, FL - Suncoast Gem & Mineral Society. 35th Annual Gem & Mineral Show, Minnreg Building, 6340 126th Avenue N. Hours: 4th & 5th, 10:00 A.M.-6:00 P.M.; 6th, 10:00 A.M.-5:00 P.M. Contact: Sue Black @ 727.345.8994

---

**REMEMBER** - To insure your show is listed here, send a written notice to the Lodestar Editor: Carolyn L. Daniels, 3660 Prince Way, Tucker, GA 30084-8317 or email at: dpdaniels@mindspring.com. ALL SFMS CLUBS ARE ALSO ENCOURAGED TO REGISTER THEIR EVENT LISTINGS ON THE SFMS WEBSITE AT: http://www.amfed.org/sfms. Choose “Submission Guidelines” under the SFMS Shows Column heading to find out how to apply.

---

March 11-13, 2005, Augusta, GA - Aiken Gem, Mineral and Fossil Society with the Augusta Gem and Mineral Society. Gem & Mineral Show. Julian Smith Casino, 2200 Broad Street Augusta, GA 30904. Hours: 11th & 12th, 10:00 A.M.-7:00 P.M.; 13th, 10:00-11:00 A.M.-5:00 P.M. Email contact: wkkw@bellsouth.net.

April 23-24, 2005, Memphis, TN - Memphis Archaeological and Geological Society. 26th annual Mid-America Mineral, Fossil, Jewelry Show. Pipkin Building, Midsouth Fairgrounds (corner of East Parkway and Central Avenue). Hours: 23rd, 9:00 A.M.-6:00 P.M.; 24th, 10:00 A.M.-5:00 P.M. Contact: W.C. McDaniel, 901.274.7706, or cfmdaniel@worldnet.att.net. **All members of a SFMS club will be admitted free to show with proof of club membership.**

May 6 - 8, 2005, Marietta, GA - The Georgia Mineral Society. 37th Annual Gem and Mineral Mother’s Day Weekend Show. Cobb County Civic Center, 548 S. Marietta Pkwy, (at Fairground St.). Hours: 6th & 7th, 10:00 A.M.-6:00 P.M.; 8th, Noon-5:00 P.M. Contact: Jay Gordan, 1690 Granger Ct., Chamblee, GA, 30341; 770.986.0822, or email to mayshow@gamineral.org.

June 4-5, 2005, Birmingham, AL - Alabamam Mineral & Lapidary Society. 32nd Tannehill Gem, Mineral, Fossil, and Jewelry Show. From Birmingham, take I-20/59S to Exit 100 or Exit 1 off I-459 and follow the signs. Hours: 9:00 A.M.-5:00 P.M. Contact: Rick Kittinger, 1812 Colesburg Circle, Hoover, AL 35226, rickkittinger@bellsouth.com.

October 1-2, 2005, Lexington, KY - Rockhounds of Central Kentucky. 15th Annual Show. National Guard Armory, Airport Road. Hours: 1st, 10:00 A.M.-6:00 P.M.; 2nd, 12:00 Noon-5:00 P.M. Contact Bekki Miracle (502) 863-1485.

November 5-6, 2005, Winter Haven, FL - Imperial Bone Valley Gem, Mineral & Fossil Society. Gem, Mineral & Fossil Extravaganza! The Nora Mayo Hall - 500-3rd Street NW. Hours: 5th, 9:00 A.M.-5:00 P.M.; 6th, 10:00 A.M.-4:00 P.M. Show Contact: Susie Percefull, Show Chair @ 863-858-1846 or Misubrea@aol.com.

November 12-13, 2005, Melbourne, FL - Canaveral Mineral & Gem Society. 29th Annual "Parade of Gems" Show and Southeast Federation of Mineralogical Societies Annual Meeting. Melbourne Auditorium, 625 Hibiscus Avenue. Hours: 10:00 A.M. – 5:00 P.M. Show and Dealer Chairpersons: Bruce and Anita Lane @ 321.723.0742. Contact for SFMS activities is Bill Harr @ 321.777.1171.

November 25-27, 2005, Columbia, SC - The Columbia Gem and Mineral Society. 38th Annual Gem, Mineral, and Jewelry Show. South Carolina State Fairgrounds in the Moore Building, corner of Rosewood Dr. and Assembly Street. Hours: 25th, 10:00 A.M.-7:00 A.M.; 26th, 10:00 A.M.-6:00 P.M.; 27th, Noon-5:00 P.M. Contact: Susan Shrader, 803.736.9317, ashrader@mindspring.com.
## Lodestar Subscription

<table>
<thead>
<tr>
<th>Field</th>
<th>Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name:</td>
<td></td>
</tr>
<tr>
<td>Telephone:</td>
<td></td>
</tr>
<tr>
<td>Club/Society Affiliation:</td>
<td></td>
</tr>
<tr>
<td>Mailing Address:</td>
<td></td>
</tr>
<tr>
<td>Email Address:</td>
<td></td>
</tr>
<tr>
<td>City:</td>
<td></td>
</tr>
<tr>
<td>State:</td>
<td></td>
</tr>
<tr>
<td>Zip Code (plus four):</td>
<td></td>
</tr>
</tbody>
</table>

**Special Interests:**

Check all that apply:

- New Subscription
- Renewal
- Address Change

Subscription rates are **$10.00** per year for 10 issues –**New Subscription Rate**. (Not published in June or August)

- Make checks payable to Southeast Federation

Mail to SFMS Editor: Carolyn L. Daniels, 3660 Prince Way, Tucker, GA 30084-8317

**Recorded:**

**Date Entered:**

**To Treasurer:**

---

**THE SOUTHEAST FEDERATION OF MINERALOGICAL SOCIETIES, INC.**
Carolyn L. Daniels, Editor
3660 Prince Way
Tucker, Georgia 30084-8317

---

**Non-Profit**
U. S. Postage Paid
Tucker, Georgia
Permit No. 317