



Newsletter of the
Amateur Telescope Makers of Boston
Including the Bond Astronomical Club
Established in 1934
In the Interest of Telescope Making & Using

Vol. 18, No. 4 April 2006

This Month's Meeting...

Thursday, April 13th, 2006 at 8:00 PM

**Phillips Auditorium
Harvard-Smithsonian Center for Astrophysics**

Parking at CfA is allowed for duration of meeting

The APRIL meeting will feature our members presenting short subjects. Several members will be reporting on and showing photographs of the March 29th Total Solar Eclipse. And, there will be non-eclipse related talks - for example, John Boudreau will discuss how he took the awesome photos of last year's Mars opposition and some of his other webcam work. Early in the meeting, we will be electing the Nominating Committee to propose next year's slate of officers.

If you'd like some time at the meeting, you must contact me in advance of the meeting

(volz@metrocast.net).

Please join together for a pre-meeting dinner at 5:45 PM (seating at 6:00 PM) at the Changsho Restaurant located at 1712 Mass Ave. in our fair city, Cambridge.

President's Message...

Greetings. I'm writing this month's message from my hotel room in Cairo after seeing the March 29th, 2006 Total Solar Eclipse yesterday. What an eclipse! And what a trip!

Most of the group landed in Cairo late on Sunday afternoon. Monday morning we boarded buses for a visit to Memphis, Saqqara, and the Pyramids and Sphinx. On Tuesday morning we boarded buses for our hotel "near" the eclipse site, a 250 mile bus ride, to Mersa Matrou, along the Mediterranean Sea. That evening, most of us checked out our gear and packed what we needed for the early morning ride to the eclipse site. We woke (if we managed any sleep) to a decent sky, but nowhere near cloud free. We boarded buses at 5:30 for the 130 mile ride to the eclipse site. During the ride the sky kept improving with gorgeous clear skies when we arrived in downtown Sallum. We noticed clouds on the Plateau just before the Libyan border. To our shock, that's just where we were headed - up to the cloud covered Plateau just between Sallum and the border! When we arrived at our designated site a bit after 8 AM, we were in the clouds (fog) and could barely see the sun. Luckily, it kept improving throughout the morning as we set up our equipment and tried to align our telescopes using the sun.

About an hour before first contact there was a lot of activity as the police lined the streets and helicopters flew in. Turns out that President Mubarak and many other Egyptian officials were viewing the eclipse and right next to our site!

By eclipse time it was perfectly clear and what a site! We spotted Venus long before second contact. Then totality! The eclipse was a classic solar minimum eclipse with beautiful streamers out the sides and prominent polar brushes. There were a few prominences, with a diamond ring at both second and third contact. I'm certain that you've already seen many of the wonderful photos people took and you'll have an opportunity to see some and hear more about the eclipse and the trip at the April meeting.

I must add that this is the first time I've seen a government go to this breadth and depth in preparations. And, they didn't just do this for our area because of President Mubarak's visit - they did this for the other sites that we drove by. The government had set up tents with chairs, bathrooms, and food and drinks. They had closed the roads to other traffic -- mostly there were just buses coming in and out of Sallum that day. While this was great for us, it does make me wonder whether the Egyptian people were hindered in seeing this event? Certainly those in the area did see it, but the average Egyptian that didn't go through channels may have been unable to see the event?

I'm flying back home tomorrow, but most others are headed for cruises down the Nile or to visit other parts of Egypt.

Regards,

Bernie Volz, President -

March Meeting Minutes. . .

Our featured speaker at the March meeting was Dr Leon Golub from the Harvard Smithsonian Center for Astrophysics who spoke to us about observing the X-Ray Sun. Dr Golub started out with some background on solar observing in general and the question of it's influence on climate, one of the primary reasons for wanting to understand the physics of the sun. It has been shown that although the solar output does vary it only varies by about 0.1% and there are still questions as to how this fairly small change in input can have such an influence on such a powerful mechanism as our varying climate. The mechanism of coupling these two entities is what still eludes scientists. In most cases solar observations are observations of magnetic fields or the influence of those fields. This can be visually as with sunspots or in other wavelengths such as ultra-violet (UV), extreme ultra-violet (EUV) or X-Rays which are emitted in the chromosphere and outer corona. Since these wavelengths don't penetrate the earths atmosphere but are instead absorbed by it, the only way to really see these wavelengths are with sounding rockets and space based telescopes. Dr Golub has had experience with both and showed us a movie of one of his experiences launching a sounding rocket with an X-Ray imager on board. He followed this with some spectacular close-up movie footage of solar flare activity taken with the Trace spacecraft. Dr. Golub ended his talk with a summary of some of the upcoming solar missions to look forward to. These included the Stereo mission to be launched in July 2006, and the Japanese Solar -B mission, a follow up to the Yokoh mission which provided spectacular X-Ray images of the sun, and Solar Dynamics Observatory (SDO) on which Dr. Golub is working on.

Following our main speaker we heard from Rick Fienberg – Chief Editor of Sky and Telescope who spoke to us about the sale of the magazine to “New Track Media” with assurances that the quality of the magazine will certainly remain the same if not improve. We then heard from Bob Naeye, also from Sky and Telescope who talked a bit about the latest developments in the astronomy world including some unfortunate mission cancellations by NASA, which will directly impact astronomical research. These included Dawn, Sophia, NewStar and Terrestrial Planet Finder.

The business meeting followed with standard reports by committee members. Dan Winchell indicated that the membership count was up to 299. John Reed announced the upcoming work party. Virginia Renhan announced that there were 10 star parties coming up and asked that before you commit our club to your school for a star party that you check with her and/or commit to coordinating the star party yourself. (Virginia can only do so much folks.) Bernie talked about the installation of the new C14 up at the clubhouse and announced that Bruce Berger has successfully acquired a donation for a SBIG ST7 CCD camera. Bernie also announced that the next Executive Board meeting will be on April 20th at the clubhouse. Fred

Ward announced that Rivers Camera will have a Meade representative available for questions on April 8th. Paul Valleli Spoke about the Schuppmann refurbishment and indicated that primary optics were good but that the field mirror will need recoating. A spare field mirror is also going to made. Mario Motta informed us that the Massachusetts Dark Sky bill is effectively dead for now as it has been sent for “study” but countered that in Gloucester, at least, the plans for implementing a lighting ordinance are going forward in earnest. Glen Chaple gave an update on the talk by Storey Musgrave in Groton and lastly Paul Valleli showed us some pictures of his trip to Winter Star Party this year.

Bruce Berger ran another club fund raiser with a box of networking equipment donated by Fred Ward which brought in about \$140 dollars for the club.

– *Michael Hill* -

Membership Report...

The new members to ATMob are;

FRANCIS EDWARDS from Grafton
JOSEPH GILDEN from Cambridge
PAUL GAGNON from Billerica
SHAUN KELLER from Lexington
JACOB PINNOLIS from Newton
ARTHUR SCHNEIDERMAN from Boxford:

- *Dan Winchell* -

International Heliophysical Year - 2007

Next year – 2007, NASA is celebrating The International Heliospherical Year. Information can be found at: <http://ihy.gsfc.nasa.gov>. The page has many facets and links. An interesting one is "Getting Involved." Under this link is the IGY (International Geophysical Year.) Moonwatch 1957 was the event in which our club participated. Check the link that says IGY/Gold. This is a membership for people that were in the Moonwatch Program. If you were one of these people and are reading this newsletter you might want to register. There are requirements. You might want to print out the application and think about what you want to say before you register. I was told that it is OK to submit your own name for the IGY/GOLD. There is no rush to register since it is 2006 and you have all year. For others, there are additional links for Outreach.

Historian-Anna Hillier

Upcoming Star Parties '06

Star Party Coordinator – Virginia Renehan
(978) 283-0862 vrenehan@gis.net

Do not hesitate to contact me with questions regarding any of the events. .

April 10th (cloud date April 11th) Bowman School, 9 Philip Road, **Lexington**

April 24th (cloud date). Winn Brook Elementary, 97 Waterhouse Road, **Belmont**.

May 6th – National Astronomy Day – Clay Center Observatory, Dexter-Southfield School, **Brookline**. Solar and evening observing, demonstrations, planetarium shows, rocketry, stunt kites, celebrity appearances, educational activities for all ages. For details go to www.claycenter.org Join us for our third year! The event will be held rain or shine.

May 12th – Murdoch Middle School, **Chelmsford**.

June 6th – Harvard Center for Astrophysics – Garden Street, **Cambridge**.

June 10th – Christa McAullif Center Family Space Day. Framingham State College, **Framingham**. Solar observing, mirror grinding, activities, speakers. Saturday from 10-2pm.

Donation of Science News Subscription to Local Schools/Libraries

You may remember, that John Reed had mentioned at one of the meetings last year that, if anyone receives a promotional subscription notice to Science News magazine and doesn't use it, it might be used to subscribe a student, teacher or school.

This is just what has happened to me recently. I received one such subscription voucher; I handed it over to John at last month's meeting; and he talked to Science News subscription service. What they did was to let John subscribe a school teacher and also provided him with a perpetual student subscription code which amounts to \$29 for a year (which regularly costs \$150/year). That's great news! Anybody who wants to have an educational institution subscribed to Science News, can now make it so by using that special code/number.

Since we now have that code if anyone is willing to donate the small subscription fee, we can help students in our community to get quality science information for very little cost.

For details please feel free to contact John.

Haldun Menali.

Clubhouse Saturday Schedule

April 8	Phil Rounsville	Brian Leacu
April 15	Closed for Work Party	
April 22	Shilpa Lawande	Nitin Sonowane
April 29	Steve Herzburg	Jack Drobot
May 6	Tom Wolf	Dave Prowten

**May Star Fields deadline
Saturday, April 29th**

**Email articles to Mike Hill
at noatak@aol.com**

POSTMASTER NOTE: First Class Postage Mailed April 4th, 2006

Amateur Telescope Makers of Boston, Inc.
c/o Dan Winchell, Membership Secretary
20 Howard St.
Cambridge, MA 02139-3720

FIRST CLASS

EXECUTIVE BOARD 2005-2006

PRESIDENT: Bernie Volz (603) 968-3062
president@atmob.org

VICE PRES: Virgina Renehan (978) 283-0862
SECRETARY: Michael Hill (508) 485-0230
MEMBERSHIP: Dan Winchell (617) 876-0110

TREASURER: Gary Jacobson (978) 692-4187
MEMBERS AT LARGE:

Bruce Tinkler (781) 862-8040
Dave Prowten (978) 369-1596

PAST PRESIDENTS:
2004-05 Bruce Berger (978) 256-9208
2002-04 Eileen Myers (978) 456-3937
2001-02 Bob Collara (781) 275 9482

COMMITTEES

CLUBHOUSE : Paul Cicchetti (978) 433-9215
John Reed (781) 861-8031
Steve Clougherty (781) 784-3024

HISTORIAN: Anna Hillier (781) 861-8338

OBSERVING: Virginia Renehan (978) 283-0862

How to Find Us...

Web Page www.atmob.org

MEETINGS: Held the second Thursday of each month (September to July) at 8:00PM in the Phillips Auditorium, Harvard-Smithsonian Center for Astrophysics, 60 Garden St., Cambridge MA. For INCLEMENT WEATHER CANCELLATION listen to WBZ (1030 AM)

CLUBHOUSE: Latitude 42° 36.5' N Longitude 71° 29.8' W

The Tom Britton Clubhouse is open every Saturday from 7 p.m. to late evening. It is the white farmhouse on the grounds of MIT's Haystack Observatory in Westford, MA. Take Rt. 3 North from Rt. 128 or Rt. 495 to Exit 33 and proceed West on Rt. 40 for five miles. Turn right at the MIT Lincoln Lab, Haystack Observatory at the Groton town line. Proceed to the farmhouse on left side of the road. Clubhouse attendance varies with the weather. It is wise to call in advance: (978) 692-8708.

Heads Up For The Month . . .

To calculate Eastern Standard Time (EDT) from Universal Time (UT) subtract 4 from UT.

April 5 First Quarter Moon
April 8 Mercury at greatest Western elongation
April 13 Full Moon
April 17 Mars is $\frac{3}{4}$ ° North of M35 (Open cluster)
April 18 Venus and Uranus are only 18' apart at 10h UT
April 20 Last Quarter Moon
April 22 Lyrid Meteor Shower
April 27 New Moon