

# Smoky Mountain Astronomical Society



## Society's ChRonological Astronomical PaperS

Though my soul may set in darkness,  
it will rise in perfect light.  
I have loved the stars too fondly  
to be fearful of the night. ~Sarah Williams

### From the President - Lee Erickson

Volume 30, Number 4  
April 2007



My how time flies. Perhaps it is the early spring we seem to be having, but it seems that winter has vanished in the blink of an eye.

March 22 saw nice weather develop for our public outreach star party to students at Pellissippi State Technical Community College (PSTCC). With this behind us we can begin to look forward to a fall public outreach Star Party in the Great Smoky Mountain National Park. We are aiming for an October event again. I hope we can avoid an evening with all of the hay rides with which we had to contend for parking last year. (Of course our attendance may have benefited from the large crowd of people the hay ride drew into the park.) Since the phase of the moon approximately alternates from year to year we will have to choose a date earlier or later by about 2 weeks for the same night sky conditions as last year.

I would like those who participated in the PSTCC Star Party to speak at the next meeting about how it went: What they think the guests got out of it, what they got out of it, and how we might do it better.

April 13th is the meeting this month. This month's program will be a revisit to the spring galaxies by Michael McCulloch. Michael says he has more to say on the subject than he was able to cover in his presentation of two years ago. Hope to see you all there in room 223, Alexander building.

I hope April and May bring us some warm weather with clear skies for some deep sky observing. I encourage everyone to make the trip to Unicoi Crest when the weather is good. We can try to save on some of that expensive gasoline by meeting up with other members and car pooling where possible.

In June we'll have our annual picnic, which will again be at TAO. Keep an eye on the [www.smokymtnastro.org](http://www.smokymtnastro.org) web page for our events and if you can suggest improvements, please do.

## Agenda for April 13, 2007 Meeting

7:00 Meet and greet

Return checked out library books

7:30 Formal meeting begins.

New business Item: Review of PSTCC Student Star Party.

Program: Michael McCulloch on "Night Sky Redux: Spring Galaxies,  
from Canes Venatici to Virgo"

Gastronomy to follow meeting.

## The Ancient Astronomer's Computer Tools

G: Hey Paddywhack, I hate to think I need glasses, but do you have trouble reading the fine print in SCRAPs's pdf?

***P: Not any more, Giveadog. I learned the shortcuts!***

G: The whut?

***P: Ctrl plus. Hold down the Control key and hit the plus key. Each time you do, the font gets bigger. Ctrl minus makes it smaller.***

G: I'll be darned! I just tried it and it works.

***P: Not only that, I can make SCRAPs fill up the screen, just by holding down Ctrl and hitting the numeral 1 key.***

G: How do you get it back to where it was?

***P: The same thing makes it toggle back: Ctrl 1 (one)***

G: What if I want to jump whole pages?

***P: Ctrl Page Up and Ctrl Page Down.***

G: Dang, that Ctrl key works good! Guess I don't really need glasses after all.



SMAS sponsored a student star party on the evening of March 22nd in parking lot #8 at the Hardin Valley PSTCC campus. Several SMAS'ers setup telescopes by 8 PM including a 70mm Mak, 10" dob, 8" SCT, and the club's 20" dob named "Sasquatch". SMAS attendees included Mike Littleton, Michael McCulloch, Mike Naney, Kenny Pridgen (and Granddaughter Destine), and Lee Erickson.

As darkness approached, the nearly first quarter Moon was immediately apparent in the high, thin clouds. A little bit later, Venus popped into view as the clouds began to dissipate. At that point, about 20 or so students from Jim Robert's physics class joined the party. A handful of students exiting the parking areas also stopped for viewing.

The first views offered were those of the Moon. Many students seemed impressed and interested in the views. Lee Erickson described various visible features including Mare Crisium. The obligatory questions regarding observing the articles left by the Apollo missions were also addressed.

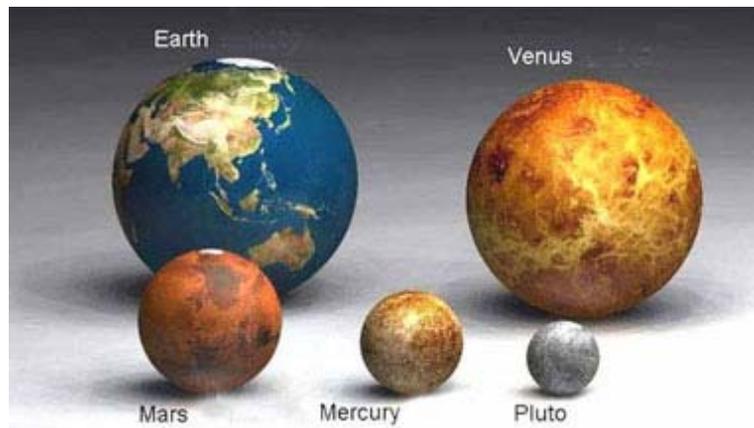
Sasquatch was certainly popular among the students as they lined up to climb the ladder and have a look. After everyone had observed the Moon, a few wanted to see Venus. Of course, Venus displayed no detail but the gibbous shape of the planet was easily observed at about 130x in Sasquatch. The runaway greenhouse effect on Venus was explained to the students as well as how Venus is continuously shrouded in thick clouds.

*Continued next page*

***Think ya got a pretty good idea of how big a Red Giant star is, huh?***

***Follow these comparisons for the next five pages.***

***Then answer SCRAPs Question of the Month on the sixth illustration.***



As the evening progressed, a couple of female students that displayed much interest in the proceedings spotted Saturn. Sasquatch was pointed toward the ringed planet via their direction and all had a first view at 130x. There were many exclamations and, yes, some mention of a "faked" image. Some students said Saturn looked like a drawing and it didn't seem real. SMAS'ers assured them the view was genuine.

The seeing conditions supported higher-powered views, so the view of Saturn was increased to 260x for a second round of viewing. Many students took advantage of the second view of the planet and many picked out the moons of Saturn that were visible. It was explained that the brightest moon was Titan and that the Huygens probe from the Cassini mission had recently landed on its surface.



The final views of the night were offered to the most interested students that stayed until about 9:15 PM. A binoviewer at about 300x was used to get the closest view of Saturn. One student visitor was most impressed and said that it was the first view of a planet in a telescope he had ever had with his own eyes. One can only hope he wasn't too spoiled by his first view from a 20" telescope!

*by Michael McCulloch*

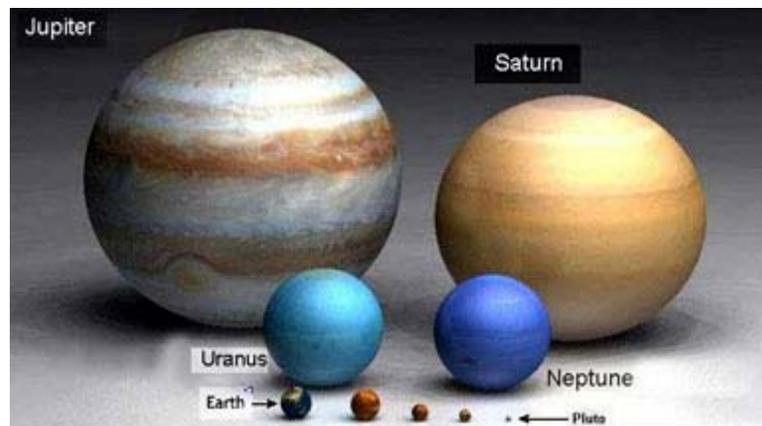
SCRAPS depends  
Upon its friends

Help!  
Help!

SCRAPS depends  
Upon its friends

Help!  
Help!

***This looks about right,  
if I remember correctly...***



## Minutes of March Meeting

The SMAS Meeting was held March 9, 2007 in Room 223 of the Alexander building at Pellissippi State Community College at Harden Valley campus . There were 12 members in attendance, plus 3 visitors: Nick and Mary Schepis (Maryville) and Corey Jones (friend of Scott Byers).

We watched a :20 minute video presentation from NASA, named "Cosmic Collisions". It had excellent graphics and discussed the origin of the Moon, solar wind, the meteor collision that caused species extinction, a potential solution to a large meteor collision with Earth, and the future of the Milky Way Galaxy. It was narrated by Robert Redford.

Bill Burgess discussed the future of astronomy equipment markets, and gave us some insight into the dimensions of the Chinese industry. They currently dominate not only the US market, but the entire world market; they are even the hidden manufacturer of the famed German optics products bearing the Carl Zeiss brand name. Bill predicts the continued demise and/or consolidation of many US retailers and manufacturers.

Bill showed us his newest eyepiece, the long-awaited 40mm TMB Paragon, and his Planetary eyepiece line (available to SMASers at huge savings). He also told about his new 40" mirror blank and plans to build a self-contained trailer/telescope around this astounding mirror. He also carries a line of Chinese cruise missiles. (That's a joke, son.)

### Old Business:

One of SMAS's 6" dobs (Telescopes for Kids) has found a home, Ridgeview Elementary school in Rockwood. Target date for the presentation is April 20.

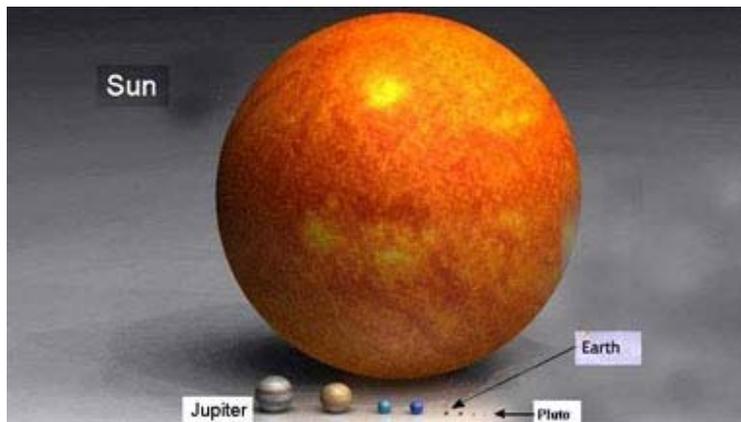
### New Business:

A motion for *standing authority* for the Treasurer to pay insurance premiums when due was approved without objection. (Previously, each annual payment had to be approved by a separate membership vote.)

*The end*

**Ha! In 2010 *Odyssey Two*, they poured countless monoliths into Jupiter to increase its mass enough to start nucleosynthesis.**

***I don't think so...***





Venus will dominate the night sky throughout April (and beyond. It doesn't reach maximum eastern elongation until June 9.) In mid-April, it will be passing through Taurus, at magnitude -4.1, the brightest thing in the night sky (not counting the moon).



The night of April 19 will see Venus very close to the crescent moon, the classic juxtaposition celebrated in the national flags of Algeria, Azerbaijan, Malaysia, Mauritania, Tunisia and Turkey.



Did you get the answer to SCRAP'S March Question of the Month, "What is the shortest day of the year 2007?"

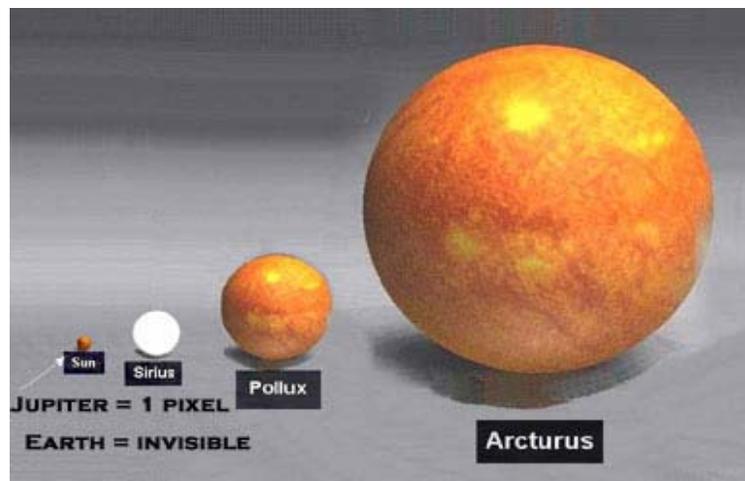
If you said December 22, the winter solstice, well, that wasn't it. That may have the shortest daylight, but the question asked for the shortest day.

That was Sunday, March 11, the day we lost an hour because of daylight saving time. Yes, it was only 23 hours long, not the usual 24. Of course we'll make it up on November 4, when we set the clocks back an hour.

That's right, November 4 will be the longest day of 2007, 25 hours long.

The unclaimed prize money has been donated to the SMAS library. This month's question is on the next page.

***Oops, where'd that big brute come from?***



Tim Hunt



Tim Hunt joined SMAS one year ago. A native of Whittier, CA, Tim's job with Sanford Brands (formerly Rubbermaid) brought him to Blount county. He lives in Louisville, has a decent view of the night sky from his backyard.

He has been interested in astronomy for the past three years, owns a 12" dob, a 4.5" newtonian, and a PST. Tim likes the fine viewing at Unicoi Crest, and was previously a member of the Orange County Astronomers (southeast side of LA).

Holy mackerel, andy.  
Ya gotta be kiddin'

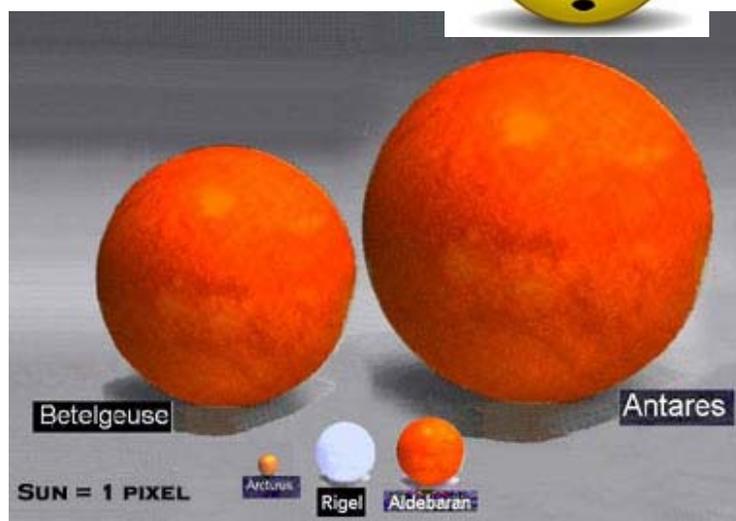


**Here's the question:**

***If Antares was centered on our sun, how much of our solar system would it occupy?***

Submit answers to Editor,  
201 Willard St, Maryville, TN 37803  
or  
smokymtnastro Yahoo group

Winners will be announced  
in the May Edition



# April 2007

SUN	MON	TUE	WED	THU	FRI	SAT
1 Hi, fool!	2	3	4	5	6 UTK	7 TAO
8	9	10	11	12	13 SMAS meeting 7 pm PSTCC	14 SMAS 2007 Season Opener Star Party at UC
15 Last day U-No-What	16	17 New moon	18	19 	20 UTK	21 SMAS Star Party at LR1
22	23	24	25	26	27	28
29	30			UTK—roof of Neilson Physics Building on The Hill at UT 1st & 3rd Fridays TAO—Tamke-Allan Observatory Public Stargaze Watts Bar Lake, Roane County 1st & 3rd Saturdays		