

THE EVENT HORIZON



ST. LOUIS ASTRONOMICAL SOCIETY

Devoted to the Interest and Advancement of the Science of Astronomy

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The View from Saturn: A Decade of Discoveries

Richard Heuermann, will be featured at the December meeting of the St. Louis Astronomical Society. The meeting will begin at **7:30 PM Friday, December 18, in McDonnell Hall, Room 162, on the Washington University campus.**

NASA's Cassini spacecraft has been orbiting Saturn since 2004. Its robotic telescopes and sensors have monitored Earth-sized storms, changes in the rings, and geological activity on several of Saturn's moons. Cassini's European-designed probe landed on

the surface of Titan, a moon larger than Mercury. It found river valleys and lakes formed, not by water, but by liquid natural gas. Mr. Heuermann will talk about the spacecraft and some of its discoveries over the past decade.

Rich Heuermann was, until retirement, the Outreach Program Coordinator of the NASA Missouri Space Grant Consortium at Washington University, as well as the Administrative Officer of the University's Department of Earth and Planetary Sciences. He is a member of the Saint Louis Astronomical Society. He continues to work with astronomy outreach programs.

Mid States Region



SLAS to Offer Attendance Prizes by Brad Waller (Borg Collective)

We are pleased to announce in the year 2016 will we have ATTENDANCE Prizes!!! We also will conduct TWO Raffles for the year. The raffles will be similar to the VERY successful Tyson Raffle held this year. The pricing will be the same. 1 ticket \$2 or \$10 for 6 tickets.

Raffles

The first Raffle for 2016 actually starts this month. We will be raffling off TWO TICKETS to the lecture given by, Astronaut Capt James Lovell (USNR). The date for the lecture is, 15 April 2016 at SIU-E @ 1930. The raffle will run from December 2015 to March 2016. The drawing will be done at the March 2016 Meeting of SLAS.

The second raffle for 2016 will run from March to May 2016. This raffle is for all you MSRAL People. We will be raffling off one Registration Fee to MSRAL 2016!!! Even if you have purchased your fee, you can still take advantage of the raffle. If your ticket is pulled

and you have already registered for MSRAL 2016, just present your receipt and you will be reimbursed!!! The drawing for this will be at the May Monthly Meeting of SLAS.

Attendance Prizes

There will be 4 quarterly prizes given away this year. For each meeting, tickets will be given out as proof of your attendance. 1 ticket for each month you attend. So, the more meetings you attend, the better your chances are. Here is the twist. You need to be there for the drawing. So, even if you leave to get something to drink or go tinkle, if your ticket is pulled and you are not there, another ticket will be drawn. This is an ATTENDANCE PRIZE! We cannot have the winner of an attendance drawing NOT there to receive a prize for attendance. You might be asking yourself, "How can the Borg make this a little more Geekier" Well, take a look at the quarters.

Vernal Equinox: January to March
Summer Solstice: April to June
Autumnal Equinox: July to September
Winter Solstice: October to December

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Presidents Corner—Jim Small

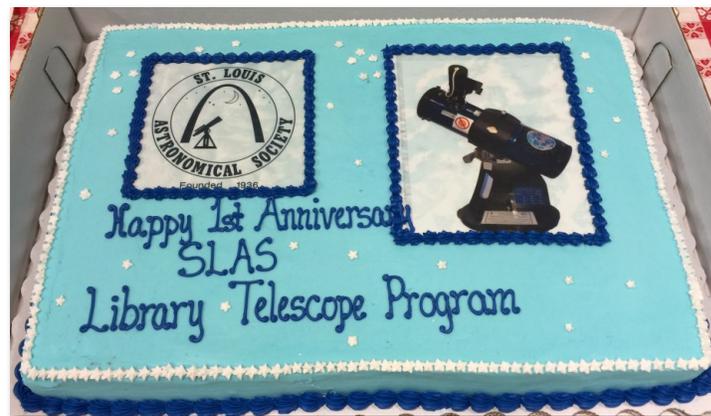
Keeping it brief again because of the budget being loaded into the newsletter. There are still TWO star parties left this year, and if you have 2 or more events toward a Night Sky Network Outreach Award Pin, if you attend both events, you can obtain the FIVE events needed in order to be eligible for the pin (the event on Saturday at UMSL counts double like an astronomy day event). See the article on page 7 for the current number of events and hours through November.

We will vote on the budget for 2016 at the December meeting. If you have questions, feel free to contact Bill Winningham or the appropriate committee chair.

We celebrated the ONE YEAR ANNIVERSARY of the SLAS LIBRARY TELESCOPE program last month at the regular meeting. Everyone enjoyed lots of cake after the meeting! Don't look now, but St. Louis County wants a telescope for every branch and St. Charles County System wants more telescopes, too. It looks like we will do another build of about 25 scopes!

Bill Breeden has graciously offered his services as Star Party Coordinator. MANY thanks to Bill for taking over this important position for the society! We look forward to making good use of his skills!

We will be discussing the movement of the meeting for April to the 22nd to avoid conflict with the James Lovell lecture which 26 (and maybe more!) members are attending. That way we can still have a meaningful meeting all who wish to can attend.



Assumption Summary – 2016

St. Louis Astronomical Society Annual Budget

Work began on the 2016 budget after the financial close for September 2015. The year to date information is therefore through September 30, 2015 with an estimated projection of activity from October 1, 2015 through December 31, 2015.

The budget information was assembled partially based on assumptions developed from the September 2015 year to date actual in areas such as membership information available at that time. The balances of the budgetary items were prepared on a line by line basis by the individual committees and committee chairpersons.

Revenue / Income:

The primary source of Revenue for the Society stems solely from membership fees that are assessed on an annual basis that is based on the member's individual anniversary date. The current fee structure was adopted in 2004 where the "Family Membership" was created and set at an annual rate of \$40.00 per year. At the same time, the fees for the Youth membership were decreased from \$15.00 to \$10.00 per year.

The total revenue from the membership fees for 2016 is based on:

Regular (Adult) Memberships	107 @ \$25.00/year	\$2,675
Youth Memberships	5 @ \$10.00/year	50
Family Memberships	25 @ \$40.00/year	1,000

As indicated in the budget, this will provide operating revenues in the total of \$3,725 for 2016. The actual revenues that will be realized during the calendar year may be different due to any changes in the actual membership numbers.

Magazine subscriptions are referenced as a memo item. The Society acts solely as an agent in these transactions as a conven-

ience to the membership. It should be noted that the same "Club" rates for the subscriptions are available to each member in good standing through the Night Sky Network for those who choose that option.

Albeit that the Society does receive donations for the outreach activities, these donations have been ignored for the purpose of the 2016 budget due to the uncertainty. The donations are solely for the purpose to contribute to the cash flow and offset a portion of any deficit.

Operating Expenses:

These are expenses that are incurred to run the Society on a month to month basis to provide goods and services to the membership. Some of the expense categories are required to meet specific obligations that enable Society to function as an organization. The balance of the expense categories are considered discretionary and may be adjusted accordingly. The items that will be discussed in detail are the discretionary items.

Starting with 2015 the printing expenses for both the newsletter and brochures, along with the general administrative printing have been combined into a single item under operating expenses. This allows us to better track printing resources, since the functions utilize the same printing resources. The overall budget for printing expense has been increased to reflect an anticipated higher volume of brochure printing for 2016.

Events

The Homemade Fest budget remains \$100. This budget is primarily used to purchase refreshments, plates, plastic ware and door prizes. SLAS hopes to continue getting the meeting room free of charge from the Science Center or the Kirkwood Community Center. Kirkwood waived the fee in 2015 because of our hosting telescope viewing at Kirkwood Park at least twice a year.

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The Star-B-Que has been kept at a constant level as the previous year budget. This event will again be member pot luck with SLAS providing the meat, paper goods, and trivia quiz prizes. SLAS hopes to continue getting the picnic pavilion free of charge. This is normally a \$80 charge, but Babler has waived the fee because of our hosting Night Skies Over Babler twice a year.

The members in attendance will be asked to provide items as with the Homemade Fest to complement the main course provided by SLAS. This will require that the membership provide their RSVP and number of attendees so the event can be planned accordingly.

Library Telescope Program:

The SLAS Library Telescope program's was launched into the St. Louis area on November 10, 2014. Just one year from our launch, there are now 57 telescopes in the area wide program. The public's response to the program has been very positive with nearly 1,000 library patrons are on a waiting list to "checkout" these telescopes with some library locations reporting a waiting list of 90 or more people.

By the end of 2015, we estimate that the telescopes already in the program will have circulated to more than 1,400 families. We estimate another 2,000 families will checkout the telescopes in 2016 as we get our first full year of circulation of the 57 telescopes. Based on current statistics, each new telescope placed into circulation will circulate to an additional 40 families each year.

The Library Telescope Committee requests \$200 in operating expenses for use in promoting the program and purchasing of supplies to fix minor issues with the telescopes to keep them in good working order. This equates to less than \$4.00 per telescope. Parts for major repairs are considered the responsibility of the libraries and are not budgeted.

The Library Telescope Committee also requests that SLAS make an additional investment in the library telescope program escrow by funding \$1,000, as a below the line (other) expense, with the funds used to reduce the significant waiting times for library locations already in the program. The specific locations will be determined by working with library executives to determine the most effective allocation of the telescopes to reduce patron waiting times.

2017 Eclipse Workshop:

SLAS will budget \$200 towards registration fee and/or travel expense for a SLAS representative to attend one of the American Astronomical Society eclipse workshops/conferences in 2016.

2017 Eclipse Committee:

An \$800 allocation is budgeted as a below the line (other) expense for the funding the 2017 Eclipse Committee. These funds represent an investment in a once in a generation opportunity for SLAS to help educate our community leaders in preparation for the historic eclipse. \$300 of the allocated funds is for sponsoring workshops for local community leaders to help them prepare for the eclipse. The remaining \$500 is for task force expenses, including \$168 for constant contact email service and \$332 for promotional materials (glasses, handouts, posters, and mailers).

Meeting Expense:

Meeting expense is comprised of Meeting Refreshments and Meeting Speaker Fees. The meeting refreshments are self-

explanatory and have been budgeted at \$350, \$100 lower than the 2015 budget level. The amount was lowered to be consistent with actual expenses for the last two years. The Meeting Speaker Fees are used primarily to present honorariums to guest speakers and occasionally to partially offset travel expenses. The speaker budget has ranged between \$250 and \$500 in recent years. The 2016 speaker budget remains unchanged from 2015 at \$250.

Membership Initiatives:

Membership Initiatives started holding, "Welcome Aboard" Meetings for New SLAS Members. These meetings take place before the Monthly Meeting. New SLAS Members are given a SLAS Informational Folder containing information about SLAS resources and other related Astronomy topics.

Membership Initiatives plans to follow-up with the successful Tyson ticket raffle with two or more additional raffle events during 2016 as opportunities arise. Planned raffles include two tickets for the astronaut James Lovell appearance at SIUE on April 15, 2016 and a SLAS sponsored registration for MSRAL 2016.

In addition, membership initiatives is planning attendance prizes to be awarded quarterly to encourage participation in SLAS's monthly general meetings. Planned prizes include signed books, CDs, movie tickets, and an Ottewell calendar.

Membership Recognition:

Two membership recognition programs have been budgeted for 2016. For 2015, 14 members were recognized for their Outreach activities. An engraved plaque has been awarded to recognize the long term efforts of a member for their service to SLAS and the community, with two more awards planned for the end of the year.

The membership recognition will budget \$260. This will include \$60 for Night Sky Network pins and certificates. The remaining \$200 will be budgeted for recognition of members for contributing their time for other SLAS functions. A membership recognition committee has been formed and an email address, recognition@slasonline.org has been set up so that recommendations can be submitted to the committee. The committee has proposed using a combination of certificates, service pins and custom made name badges to recognize members who have maintained their membership for 10, 20 or 30 or more years. The allocated budget will be used to purchase these items.

Merchandise:

A budget of \$45 has been established to cover the setup fees for embroidery/silkscreen. Several local retailers are being considered based on overall price, quality, and convenience.

Library:

Library expenses for 2016 will be for the purpose of purchasing the latest CDs available for both Sky & Telescope and Astronomy Magazine at an estimated cost of \$30 each. \$40 is budget for the purchase of books with and an emphasis on beginners.

Loaner Scope Program:

SLAS has in its inventory, telescopes ranging from 13" to 75mm. This includes five Dobsonian reflectors, two Refractors, two ETX Maksutovs, one Schmidt-Cassegrain, one 20x80mm binocular, one Hydrogen-alpha, and one white light solar telescope. These are housed in a storage shed when not checked out by members. The current year Loaner Scope budget will be \$50 for maintenance/repair of the telescopes and upgrade of some accessories. Projected purchases for 2016 include eyepiece cases.

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ST. LOUIS ASTRONOMICAL SOCIETY						
PRELIMINARY OPERATING BUDGET - 2016						
	Actual	Budget	Projection		Budget	
	Year to Date	Year to Date	Oct-15 to	Year to date	Annual	Annual
	Sep-15	Sep-15	Dec-15	Dec-15	2015	2016
Income						
Magazine Subscription						
Astronomy Magazine Sales	\$ 510.00	\$ 476.00	\$ 306.00	\$ 816.00	\$ 782.00	\$ 680.00
Sky & Telescope Sales	787.85	724.90	527.20	1,315.05	1,252.10	1,054.40
Total Magazine Subscription	\$ 1,297.85	\$ 1,200.90	\$ 833.20	\$ 2,131.05	\$ 2,034.10	\$ 1,734.40
Membership Dues	\$ 3,065.00	\$ 2,560.00	\$ 880.00	\$ 3,945.00	\$ 3,440.00	\$ 3,725.00
Merchandise Sales	389.48	-	-	-	-	-
Total Income	\$ 4,752.33	\$ 3,760.90	\$ 1,713.20	\$ 6,076.05	\$ 5,474.10	\$ 5,459.40
Cost of Goods Sold						
Magazine Subscriptions						
Astronomy Magazine Cost	\$ 510.00	\$ 476.00	\$ 306.00	\$ 816.00	\$ 782.00	\$ 680.00
Sky & Telescope Cost	787.85	724.90	527.20	1,315.05	1,252.10	1,054.40
Merchandise (tyson tickets)	135.35	-	-	-	-	-
Total Cost of Goods Sold	\$ 1,433.20	\$ 1,200.90	\$ 833.20	\$ 2,131.05	\$ 2,034.10	\$ 1,734.40
Gross Profit	\$ 3,319.13	\$ 2,560.00	\$ 880.00	\$ 3,945.00	\$ 3,440.00	\$ 3,725.00
Operating Expense						
Programs & Events						
Home Made Fest	94.28	100.00	-	94.28	100.00	100.00
Star BBQ Expense	168.81	175.00	-	168.81	175.00	175.00
Library Scope Program Escrow	600.00	600.00	-	600.00	600.00	200.00
Eclipse Workshop Dues	-	200.00	-	-	200.00	200.00
2017 Eclipse Committee	-	200.00	-	-	200.00	-
Meeting Expenses						
Meeting Refreshments	173.62	337.50	60.00	233.62	450.00	350.00
Meeting Speaker Fees	134.49	187.50	60.00	194.49	250.00	250.00
Total Meeting Expenses	\$ 308.11	\$ 525.00	\$ 120.00	\$ 428.11	\$ 700.00	\$ 600.00
Membership Initiatives (excludes "profits")	\$ 100.68	\$ 150.00	\$ 80.00	\$ 180.68	\$ 200.00	\$ 200.00
Merchandise	\$ 16.52	\$ 90.00	45.00	61.52	\$ 120.00	45.00
Membership Recognition	26.00	150.00	150.00	176.00	200.00	260.00
Programs & Events	\$ 1,314.40	\$ 2,190.00	\$ 395.00	\$ 1,709.40	\$ 2,495.00	\$ 1,780.00
Newsletter Postage	\$ 86.32	\$ 135.00	\$ 20.00	\$ 106.32	\$ 180.00	\$ 200.00
Total Newsletter	\$ 86.32	\$ 135.00	\$ 20.00	\$ 106.32	\$ 180.00	\$ 200.00
Library expense	\$ 199.95	\$ 225.00	\$ 100.00	\$ 299.95	\$ 300.00	\$ 100.00
Astronomical League Dues	690.00	650.00	-	690.00	650.00	695.00
Loaner Scopes**	1,027.24	1,150.00	-	1,027.24	200.00	50.00
Insurance	380.00	380.00	-	380.00	380.00	380.00
Website	131.88	135.00	-	131.88	135.00	150.00

ST. LOUIS ASTRONOMICAL SOCIETY						
PRELIMINARY OPERATING BUDGET - 2016						
	Actual	Budget	Projection		Budget	
	Year to Date	Year to Date	Oct-15 to	Year to date	Annual	Annual
	Sep-15	Sep-15	Dec-15	Dec-15	2015	2016
Administrative Expenses						
Corporate Filings	-	-	-	-	-	20.00
Office Supplies/banking fees	21.40	123.75	10.00	31.40	165.00	165.00
PayPal Fees	26.22	30.00	10.00	36.22	40.00	40.00
Postage	49.00	56.25	30.00	79.00	75.00	90.00
Printing / Copying Expense (combined 2015)	573.17	666.00	150.00	723.17	888.00	1,115.00
Administrative Expenses	\$ 669.79	\$ 210.00	\$ 200.00	\$ 869.79	\$ 1,168.00	\$ 1,430.00
Total Operating Expense	\$ 4,499.58	\$ 5,075.00	\$ 715.00	\$ 5,214.58	\$ 5,508.00	\$ 4,785.00
Net Income/(Loss) From Operations	\$ (1,180.45)	\$ (2,515.00)	\$ 165.00	\$ (1,269.58)	\$ (2,068.00)	\$ (1,060.00)
Other Income / Expense						
Other Income						
Donations						
SLAS Club Members	1,100.00			1,100.00	-	-
Donations - Other	600.00		310.00	910.00	-	-
Total Donations	\$ 1,700.00		\$ 310.00	\$ 2,010.00	\$ -	\$ -
Interest Income	\$ 31.98	\$ 75.00	\$ 10.66	\$ 42.64	\$ 100.00	\$ 100.00
Non-Operating Income (Astro Mag Award)	2,500.00			2,500.00	-	-
Total Other Income	\$ 4,231.98	\$ 75.00	\$ 630.66	\$ 4,552.64	\$ 100.00	\$ 100.00
Other Expense						
Physical Inventory Adjustment	\$ 203.69			\$ 203.69	\$ -	\$ -
Astro Mag Award Disbursements	1,756.47		\$ 743.53	2,500.00		
2017 Eclipse Escrow Funding						\$ 800.00
LTP Escrow Funding						\$ 1,000.00
Total Other Expense	\$ 1,960.16	\$ -	\$ 743.53	\$ 2,703.69	\$ -	\$ 1,800.00
Net Other Income / (Expense)	\$ 2,271.82	\$ 75.00	\$ (112.87)	\$ 1,848.95	\$ 100.00	\$ (1,700.00)
Net Income / (Loss)***	\$ 1,091.37	\$ (2,440.00)	\$ 52.13	\$ 579.37	\$ (1,968.00)	\$ (2,760.00)

Donald Ficken	63	events	153	hours
Cook Feldman	43	events	134	hours
John Beaury	40	events	130	hours
Larry Campbell	31	events	71.5	hours
Frank Mack	28	events	65.5	hours
Mark Jones	27	events	83.5	hours
Rick Menendez	22	events	55.5	hours
Rich Heuermann	18	events	46	hours
Jim Trull	17	events	41.5	hours
James Small	16	events	51.5	hours
Richard Fefferman	15	events	31	hours
Eric Kovach	13	events	4	hours
Richard Jennings	12	events	35.5	hours
Sharon Bertram	12	events	27.5	hours
Ann Trull	11	events	26	hours
Bill Breeden	10	events	36	hours
Randy Gettman	9	events	17	hours
Bill Biermann	8	events	17.5	hours
Benjamin Winningham	7	events	19	hours
Brian Mills	7	events	18.5	hours
William Winningham	7	events	19	hours
Lee Halbeck	6	events	15.5	hours
William Neubert	6	events	16.5	hours
Colleen O'Toole	5	events	17	hours
Dale Engelbrecht	5	events	10	hours
Rita Breeden	5	events	17.5	hours
Daniel Corso	4	events	9.5	hours
Angie Johnson	4	events	8	hours
Bradley Waller	4	events	9	hours
James Twellman	4	events	5	hours
Jerry Loethen	4	events	11.6	hours
Doug Blum	3	events	6	hours
Eddie Agha	3	events	15	hours
Gaylene Engelbrecht	3	events	7.5	hours
Gregory Rigelman	3	events	11	hours
Steve Sands	3	events	14	hours
Tom Keutzer	3	events	7.5	hours
David Ebers	2	events	10	hours
Edward Frey	2	events	8.5	hours
Jeremy Gibson	2	events	4	hours
John Boncek	2	events	4	hours
Lynn Fee	2	events	7.5	hours
Marcos Do Olival	2	events	4.5	hours
Mark Fedde	2	events	8	hours
Nicholas Kirschman	2	events	3.5	hours
Renee Mettle	2	events	9	hours
Robert Fischer	2	events	5	hours
Roy Lieberman	2	events	6	hours
Brent Buch	1	events	6	hours
Dan Duffy	1	events	3	hours
Evan Schmitz	1	events	2	hours
Gary Holt	1	events	3	hours
Gregory Gaines	1	events	3	hours
James Griffith	1	events	1.5	hours
Joe McHugh	1	events	3	hours
Karen Loethen	1	events	4	hours
Kelly Robinson	1	events	5	hours
Michael Callaghan	1	events	2	hours
Mike Saville	1	events	3	hours
Patrick Smith	1	events	6	hours
Wayne Clark	1	events	6	hours

November Volunteer Hours

So far in 2015, 61 SLAS members have volunteered for Outreach Events. The total number of volunteer hours is 1396 hours over 99 different events! We have 3 events remaining in 2015. Members volunteering for 5 or more events qualify for the Night Sky Network 2016 pin seen below. Check NSN for opportunities and sign up today. If you are a members with 4 or less events logged this year there is still time to volunteer. The remaining dates are December 19, an expo for Scouts at UMSL (this event will count as TWO events!) and December 22, a library star party at Schlafly Library.



Sky and Telescope Magazine Wants Your Astro Sketches by Bill Neubert

In a recent issue of the Event Horizon I challenged us to sketch the Andromeda Galaxy. Now there is a renewed request. The December 2015 Sky & Telescope magazine, on page 70, requests us to send them our best astronomical sketches. If they receive enough quality drawings, they will publish some of them. I am thrilled they are making this request! I see many exceptional images by readers having very dark skies, high-end CCD cameras and telescopes beyond my price range. As a result, I have become more interested in those who simply sketch what they see.

If you are new to astronomy and in an urban area, with only binoculars or a small telescope, I suggest you try sketching the moon. After some practice, you can try a bright open cluster such as M45, which is bright and high in the winter skies. If you can venture out to a Star Party at Babler or Danville, then try a bright nebula. M42 (the Great Orion Nebula) is an obvious choice. This is also an excellent time to try seeing your first comet: C/2013 US Catalina (<http://www.skyandtelescope.com/astronomy-news/observing-a-predawn-peek-of-comet-catalina-12032015/>)

Everyone will have their own technique. Before heading out, I like to make a large circle on a white sheet of paper. This represents my binocular or telescope field-of-view. Then, at the eyepiece, I use a pencil to sketch first the bright stars I see. Then I fill in the dimmer stars. Finally, I sketch in the nebulosity. Just after I finish, I add the object's name, the date, time (including time zone) and my location. After I get back in a warm area, I sometimes ink over the sketch with a pen for permanence. Though, I usually now just scan the sketch.

If you submit your sketches to Sky and Telescope, the instructions are to send them to gallery@skyandtelescope.com (include "sketch" in the subject line).

They don't provide additional instructions, but I assume you can scan your sketch, or photograph it with your mobile phone. Again, it doesn't specify the requirements but I would think it best to save it as a 200 dpi JPG file, not more than 500K in size and not more than 1000 x 1000 pixels (just my guess based on their on-line photo submission limits).

Many excellent images from our power-imaging members have been published nationally, and internationally (you know who they are). It would be great if we had a few sketches also published.

**SLAS Executive Board Meeting
2015****November 9,**

1. Opening Activities: Attendees: Jim Small, Bill Winningham, Paul Baldwin, Brent Buch, Larry Campbell, Mark Jones Meeting opened 7:25pm. October minutes read, Paul motioned to approve, second by Bill, minutes approved

2. External Business Upcoming memorandum from SLSC. Cook will review the document then review with Board.

Next board meeting: Dec 10, 2015. Dates for 2016: Jan 7, Feb 11, Mar 10, Apr 7, May 12, June 9, July 7, Aug 10 (Wed), Sep 8, Oct 6, Nov. 10, Dec 7. Jim Small will send dates to Don Ficken and ask they reserve the meeting room at the YMCA.

3. Director Reports:

President: Goals for 2015 and beyond. The beginnings of a strategic plan

1. Attract new members – This has been successful primarily from our Library Telescope Program and First Friday events. **2. Retain members** – Place higher emphasis on retention with membership initiatives headed by Brad Waller. A new member survey has been implemented and is sent to all new members. There is also a, “Welcome Aboard” meeting for new SLAS members. This meeting occurs before the Monthly SLAS Meeting. **3. Get members involved** – Place higher emphasis on retention with membership recognition headed by Larry Campbell.

Vice President –Paul Baldwin: November – Valerie Fox, Mars and the Curiosity Rover December - Rich Heuermann - Cassini-Jan- Possibly Mike Malolepszy

Astro 101: November – Mark Jones decided to change topic to describe the SLAS Loaner Telescope Program. Original topic “Visit to The Headlands, Michigan’s Dark Sky Preserve” will be deferred to another month. Dec – Members should bring their favorite telescope or favorite astro gadget Jan – Favorite NSN toolkits

Secretary – Mark Jones no report

Treasurer/ALCor – Bill Winningham Budget approval. Bill presented budget and narrative for 2016. Next year’s will have a budgeted net loss \$1060. 2015 budget had a budgeted net loss of \$2068, but donations and other income we now expect a profit of approximately \$1000. Additional below the line expenses of \$1800 for Library Telescopes and 2017 escrow accounts. Motion by Mark Jones and second Paul to accept the budget for submittal to the general membership. Motion passed and budget will be published in November newsletter and presented at the November meeting.

Hospitality – Larry Campbell. In recognition of the one year anniversary of the Library Telescope Program we will have a special cake at this month’s meeting.

Board member at large reports

Brad Waller: (2016) Working on membership initiatives including tickets for Astronaut Jim Lovell talk at SIU-E on April 15th, 2016

Tom Nickelson: (2017) no report

Brent Buch (2018) Welcome Brent as our new Board Member

4. Committee Reports: If needed

Library Telescope Program: Waiting list has grown to more than more 900 people waiting to check out telescope from all the libraries

Membership – Don Ficken sent separate report submitted. SLAS has 163 members, 34 new members since beginning of 2015.

Recognition committee – Larry Campbell, Wayne Clark and Thane Bopp have formed a committee and are working on plans

Merchandise – Jim will verify if we need to pay setup fee to Johnny Macs

Telescope Making – no report submitted

Librarian – Will update app for cataloging books and videos and begin the process after November 21st. Goal is to have process completed by end of January. Purchased the following: “Total Skywatchers Manual”, “Ottewell 2016 Calendar”, “RASC Observer’s Handbook for 2016”, “50 Objects for Small Scopes”. Last year for Ottewell Calendars, see the Reflector Magazine for October. **Newsletter** – Needs articles for November newsletter.

Website – www.slasonline.org/joomla Don and I will try to get the new site up by the end of the year

Night Sky Network – New tool kit available soon for field testing. There is a bug on NSN map access for directions.

SLASdialogs – Jim to clean out emails going to Moderator account. Also, need help posting events and reminders on dialogs.

Dark Site – Next event on Nov 12.

Loaner – no report. Camera to be purchased with profits from auction.

Publicity – press release in work

Observing Programs – no report

Star Parties: Still would be great to have someone volunteer for Star Party Coordinator. Check calendar for upcoming star parties.

MSRAL 2016 ASKC voted on and approved seed money for MSRAL. Conference call set up for Nov 23. Cook setting up Commerce Bank Account for MSRAL. Bill sent check to Cook for \$1000 seed money.

5. Old Business No old business

6. New Business Motion to make \$1000 for Library telescopes a separate item from the budget. Motion withdrawn.

7. Closing Activities Motion to adjourn the meeting by Paul sec-

(Continued from page 3)

SLAS also added four “Library Telescopes” to its inventory for the exclusive use of SLAS members during 2015. These scopes are available for checkout at the monthly general meeting. Board member Brad Waller is in charge of checking out the “Library Telescopes” to members.

SLAS Brochures:

Brochure printing expense was combined with the newsletter printing expense starting with the 2015. The brochures contain information about the Society that is distributed to the general public at all outreach events. Brochure paper requirements are estimated at 12 reams of “astro-bright” premium paper at a cost of \$120.

Summary:

The board and participating committee members have decreased several budget items where the budgeted has not been his-

torically spent as well as for programs that are under-utilized. In addition, funding for two key long term initiatives, the 2017 Eclipse Escrow and the Library Telescope Escrow have been categorized as investments and we be recorded as below-the-line (other) expenses. The net result is 2016 budget as presented equals a net loss from operations of \$1060 for 2016, down from a net loss of \$2,068 for the 2015 budget. Meeting the projected expenses for the upcoming year will require supplementing the operations from cash reserves to the extent donations do not make up the shortfall. The below the line expenses for the 2017 Eclipse Escrow and the Library Telescope Escrow total \$1,800. All attempts have been made during this process to continue to provide valued programs for the membership.

If you have questions about the amounts presented in this budget, please direct them to the individual committee chairs. They will be the best source to address these questions. Respectfully,

**St. Louis Astronomical Society
Balance Sheet
As of November 30, 2015**

	Dec 31, 14	Nov 30, 15
ASSETS		
Current Assets		
Checking/Savings		
Astronomy Magazine Award**	0.00	521.45
Checking - First Bank	5,161.12	2,891.20
Deposit, Certificate of	20,068.06	20,098.09
Library Telescope Escrow ¹	1,660.10	387.66
Merchandise Change Fund	20.00	20.00
PayPal	82.81	0.00
Savings - First Bank	3,359.27	5,361.67
SLAS Eclipse Conference Escrow***	0.00	539.12
YMCA Trout Lodge Escrow	542.87	542.87
Total Checking/Savings	30,894.23	30,362.06
Other Current Assets		
Inventory Asset	1,614.22	1,410.53
Investment in Mid-States 2016	0.00	1,000.00
Undeposited Funds	261.95	0.00
Total Other Current Assets	1,876.17	2,410.53
Total Current Assets	32,770.40	32,772.59
Total Fixed Assets	0.00	0.00
TOTAL ASSETS	32,770.40	32,772.59
LIABILITIES & EQUITY		
Liabilities		
Current Liabilities		
Accounts Payable		
Accounts Payable	167.90	0.00
Total Accounts Payable	167.90	0.00
Total Current Liabilities	167.90	0.00
Total Liabilities	167.90	0.00
Equity		
Opening Bal Equity	8,137.66	8,137.66
Retained Earnings	22,221.50	24,464.84
Net Income	2,243.34	170.09
Total Equity	32,602.50	32,772.59
TOTAL LIABILITIES & EQUITY	32,770.40	32,772.59

¹ Funds restricted for the Library Telescope Program. \$1,660 was carried over from the end of 2014.

** Funds from Astronomy Magazine Award, available until 4/10/2016.

*** Registration fees and donations for SLAS sponsored eclipse seminars

7:58 AM
12/10/15
Accrual Basis

**St. Louis Astronomical Society
Profit & Loss Budget vs. Actual
January through November 2015**

	Jan - Nov 15	Budget	\$ Over Budget
Ordinary Income/Expense			
Income			
Events Income****	3,061.94	0.00	3,061.94
Magazine Subscription	1,331.85	1,335.85	(4.00)
Membership Dues	3,510.00	2,905.00	605.00
Merchandise Sales			
General Merchandise**	239.48	0.00	239.48
Merchandise Sales - Other	150.00	0.00	150.00
Total Merchandise Sales	389.48	0.00	389.48
Total Income	8,293.27	4,240.85	4,052.42
Cost of Goods Sold			
Magazine Subscriptions	1,331.85	1,335.85	(4.00)
Merchandise			
General Merchandise	135.35	0.00	135.35
Merchandise - Other	16.52	90.00	(73.48)
Total Merchandise	151.87	90.00	61.87
Total COGS	1,483.72	1,425.85	57.87
Gross Profit	6,809.55	2,815.00	3,994.55
Expense			
1-Programs & Events	1,858.73	2,568.45	(709.72)
2-Newsletter	115.72	165.00	(49.28)
3-Library expense	300.10	225.00	75.10
4-Astronomical League Dues	690.00	650.00	40.00
5-Loaner Scopes*	1,054.22	1,150.00	(95.78)
7-Insurance	380.00	380.00	0.00
8-Website	131.88	135.00	(3.12)
9-Administrative Expenses	1,025.47	1,070.66	(45.19)
Total Expense	5,556.12	6,344.11	(787.99)
Net Ordinary Income	1,253.43	(3,529.11)	4,782.54
Other Income/Expense			
Other Income			
Donations	2,085.05	0.00	2,085.05
Interest Income	32.43	91.00	(58.57)
LTP Receipts	12,928.21	0.00	12,928.21
Non-Operating Income**	2,500.00	0.00	2,500.00
Total Other Income	17,545.69	91.00	17,454.69
Other Expense			
Astro Mag Award Disbursements	1,978.55	0.00	1,978.55
Eclipse Escrow Disbursements	2,289.54	0.00	2,289.54
LTP Disbursements	14,157.25	0.00	14,157.25
Non-operating Expense	203.69	0.00	203.69
Total Other Expense	18,629.03	0.00	18,629.03
Net Other Income	(1,083.34)	91.00	(1,174.34)
Net Income	170.09	(3,438.11)	3,608.20

* Budget reflects membership vote to purchase 4 Orion Starblasts for the Loaner Program

** Non-operating income includes a \$2,500 award from Astronomy Magazine. \$1,978.55 of the award proceeds have been spent to date, the remaining proceeds must be spent by April of 2016.

*** Tyson Raffle, net proceeds of \$104.13 available for Membership initiatives.

**** Events Income includes \$231 of SLAS telescope auction net profit and \$2,830.94 in SLAS Eclipse Conference fees and donations. The auction proceeds are to be used for the purchase of a video camera for recording General Meetings.

Wanted: Newsletter Articles!

The Event Horizon needs articles from people like YOU!

Interviews, current astronomy topics, historical articles, you name it, we can use it! Send what you have to: newsletter@slasonline.org

Wanted: Volunteers!

Be sure to sign up on Night Sky Network for upcoming star parties. Lead volunteers need to know who will be there so they can tell where we are falling short. If you aren't sure how to RSVP, please ask anyone at the meeting and we can show you how on the computer after the meeting. Or contact any board or committee member to find out. See you at the next star party!

Upcoming Star Parties and Other Events

For details on these and other upcoming events, check out the Night Sky Network Calendar linked on the Home Page for SLAS at <http://www.slasonline.org>

SLAS Executive Board Meetings *Location will be at the Edward Jones YMCA* All meetings are on Thursdays unless noted.

Jan 7, Feb 11, Mar 10, Apr 7, May 12, June 9, July 7, **Wed, Aug 10**, Sep 8, Oct 6, Nov. 10, Dec 7

Dark Sky Observing Dates

See you in April!

Francis Park Events: These events are on Thursdays the week nearest the first quarter Moon

4/14/2016, 5/12/2016, 6/9/2016, 7/7/2016, 8/11/2016, 9/8/2016, 10/6/2016

SLSC Public Telescope Viewing Events: These events are held the first Friday of the month

Planetarium shows start at 7pm

1/1/2016

YMCA Edward Jones Star Parties (generally third Mondays)

3/21/2016, 4/18/2016, 5/16/2016, 6/20/2016, 7/18/2016, 8/15/2016, 9/19/2016, 10/17/2016,

Pattonville Observatory Public Viewing Dates

1/8/2016, 1/22/2016, 2/5/2016, 2/12/2016, 3/4/2016, 3/17/2016, 4/8/2016, 4/22/2016, 5/6/2016, 5/19/2016

Broemmelsiek Astronomy Park Public Viewing

Every Friday night with ASEM members

SLAS EVENTS

December

18 Fri SLAS Regular Meeting
19 Sat STEM University
22 Tue Schlafly Branch SLPL

January

1 Fri Public Telescope Viewing SLSC
7 Thur SLAS Board meeting
8 Fri Pattonville Observatory
14 Thur Brentwood Recreation Star Party
22 Fri Pattonville Observatory

Ordering Ottewell Calendar and RASC Handbook

Order the Ottewell Calendar directly from Universal Workshop and get the club discount of \$19.95 shipping included! This will be the last year for the Ottewell Calendar! Here is the link:

http://store.universalworkshop.com/category_s/49.htm

RASC Handbooks get a discount if you order 2 or more. They will be \$27 shipping included with this discount.

Here is the link:

https://secure.rasc.ca/rasc/RASC/Store/Store_CURRPUB.aspx?Category=CURRPUB

SLAS Merchandise:

Soon to be available at Johnny Mac's Sporting Goods!

Watch for notification through NSN and the website!!

SLAS Merchandise Available

SLAS merchandise is now set up for embroidery at Headz n Threadz at <https://hnt.threadthis.com/>

There are two locations:

Galleria: 2495 St. Louis Galleria, St. Louis, MO 63117

Telephone: 314.862.2695
galleria@headznthreadz.com

Delmar: 6662C Delmar Blvd St. Louis, MO 63130 Telephone: 314.863.2695
delmar@headznthreadz.com

[Delmar Map](#)

Simply take the garment, hat, etc you wish to have embroidered and they will take care of it. They have the SLAS logo on file. You may make modifications to the colors if you wish.

SLAS Logo is also available at Infini-tees and Johnny Mac's



LET US KNOW YOU ARE COMING!

To RSVP for any of these events log in to the Night Sky Network and submit your RSVP. If the event is canceled, you will be notified immediately according to the preferences you have selected.

SLAS MEMBERSHIP APPLICATION



Name: Last _____
 First, Middle Initial _____
 Address _____
 City, State, Zip Code _____
 email address _____

Youth @ \$10.00 / 1 year (18 yrs or younger) \$ _____
 Individual @ \$25.00 / 1 year \$ _____
 Family @ \$40.00/1 year \$ _____
Publications with discount available with your SLAS membership:
 Sky and Telescope @ \$32.95 / 1 year \$ _____
 (S&T may also be renewed at their website:
<http://www.skyandtelescope.com>)
 Astronomy @ \$34.00 / 1 year \$ _____
TOTAL ENCLOSED \$ _____

Please send completed form with check (no cash please) made payable to
 St Louis Astronomical Society
 Don Ficken, Membership
 13024 Barrett Crossing CT
 St. Louis, MO 63122

Check all that apply:
 Renewal
 Address Change Only
 Please send my newsletter by regular mail
 New Member!

SLAS OFFICERS

President	Jim Small	314-307-0692
president at slasonline.org		
Vice President	Paul Baldwin	314-781-4080
vicepresident at slasonline.org		
Secretary	Mark Jones	636-394-2342
secretary at slasonline.org		
Treasurer	Bill Winningham, (Don Ficken - membership)	636-225-0269
treasurer at slasonline.org		
Hospitality	Larry Campbell	636-244-2867
hospitality at slasonline.org		
Board Members at Large:		
	Brent Buch	314-239-0329
Board18 at slasonline.org		
	Tom Nickelson	314-346-9565
board17 at slasonline.org		
	Bradley Waller	314-481-7250
board16 at slasonline.org		
ALCOR	Bill Winningham	636-225-0269
(Astronomical League Correspondent) treasurer at slasonline.org		
MSRAL Rep.	Jim Small	314-909-7211
msral_rep at astroleague.org		

COMMITTEE CHAIRS

Dark Site Coordinator	Mark Jones	636-394-2342
darksite at slasonline.org		
Librarian	Jim Small	314-909-7211
librarian at slasonline.org		
Library Telescope Program	Don Ficken	636-851-9630
lirbrarytelescope at slasonline.org		
Loaner Equipment	Greg Gaines	314-277-3082
loaner at slasonline.org		
Merchandise	Vacant	
merchandise at slasonline.org		
Membership	Don Ficken	636-225-0269
membership at slasonline.org		
Newsletter Editor	Jim Small	314-909-7211
newsletter at slasonline.org		
Observing Programs	Jerry Loethen	314-329-8008
observing at slasonline.org		
Publicity	Rich Heuermann	314-962-9231
publicity at slasonline.org		
Recognition	Larry Campbell	636-244-2867
recognition at slasonline.org		
'SLASdialogs' Moderator	Mark Jones, Rhonda Whelan	
dialogsmoderator at yahoo.com		
Star Party Coordinator	Bill Breeden	314-276-3613
starparty at slasonline.org		
Telescope Making	Bill Davis, Jim Melka	314-469-3061
telescope at slasonline.org		
Webmaster	Jim Small	314-909-7211
webmaster at slasonline.org		

Devoted to the Interest and Advancement of the Science of Astronomy

ST. LOUIS ASTRONOMICAL SOCIETY

We're on the Web!
<http://www.slasonline.org>

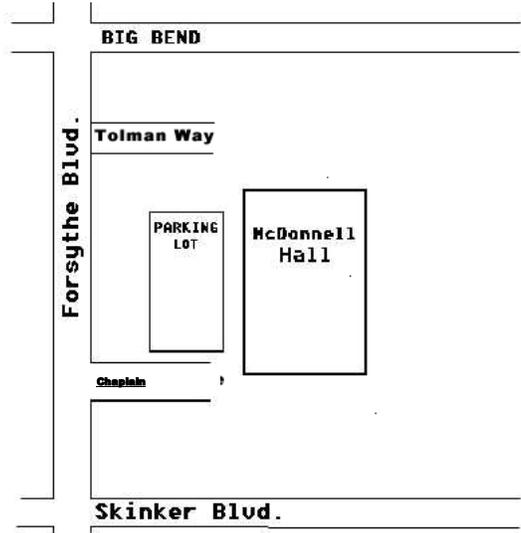


Who We Are and What We Do

St. Louis Astronomical Society is a not-for-profit organization established in 1936. SLAS is devoted to the interest and advancement of the science of astronomy. Our mission is to promote an understanding of the science of astronomy to our members and to the public. Membership is open to anyone with an interest in astronomy.

For more information contact any SLAS officer or visit our website listed above. SLAS is affiliated with the Astronomical League, Night Sky Network and the Mid-States Region of the Astronomical League.

Meetings are held the 3rd Friday of each month at McDonnell Hall at Washington University. See the map to the right for directions.



St. Louis Astronomical Society

Jim Small
13128 Cozyhill Drive
St. Louis, MO 63122

