

Saskatoon **SKIES**

Newsletter of the Saskatoon Centre of the Royal Astronomical Society of Canada
May 1997. Vol. 28, No. 5



**The Regina Centre T-Shirt: Get one at SSSP '97!!!
It will be their tenth Anniversary and our First!**

Presidential Ramblings by Richard Huziak, President

Saskatoon Centre Committees:

HELP Wanted: the Saskatchewan Summer Star Party Committee needs YOU! We now involve a dozen members, but with registration shooting past a hundred, we could easily use twice that many. We are now meeting weekly to prepare for the runaway success that the star party is becoming. Detailed announcements in the current issues of **Sky & Telescope** and **Astronomy** have followed our article in **Sky News**: this may lead to another flood of registrants. It also means that the eyes of the whole amateur astronomy community will be on us. This is our chance to show just how dynamic and effective our Centre is. Please contact **Kim Mysyk** or **Erich Keser** to find out how you can help! Volunteers are urgently needed, so don't be shy about taking on any necessary job either in Saskatoon or for the Star Party itself! Suggestions are also appreciated.

Next SSSP Cmtee meeting: Tues June 17th, 8 PM.

The **Building Committee** is busy planning the new Sleaford Observatory. Land acquisition by the University of Saskatchewan is underway, and I am finalizing the Partnership Agreement. Our planning of the observing site is graduating from exciting games with scale models to an actual on-site survey and examination of the schoolhouse and other facilities at **2:30 PM, Sun. June 22nd**. Please contact **Gord Sarty** or **Rick Huziak** to participate in car pool.

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Welcome New Members and Stay in Touch with Distant Ones!

Welcome to new youth member **Alexandra Frischholz**, Site 315, Box 50, RR#3, Saskatoon (Pike Lake), SK, S7K 3J6, tel. (306) 978-8888. Welcome aboard!

Jim Patterson -anyone who wants to contact our most distant Member, Jim Patterson at Cambridge Bay, NWT, can do so at **patterjp@polarnet.ca**

*******Notice*******

June 1997 General Meeting of the RASC COME ONE, COME ALL! LAST MEETING UNTIL SEPTEMBER (Everyone welcome: COFFEE, DONUTS, GREAT SPEAKERS, no admission!)

Winston Quan - The Steward Mirror Spinning Laboratory in Arizona

Veteran stargazer Winston Quan and two friends drove to Arizona and toured and took pictures of the revolutionary facility which produces mirrors that dwarf even Winston's own 17.5".

Les Dickson-The New Generation of Space Telescopes What comes after Hubble?

When: Monday, June 16th, 1997, 8:00 p.m.

Where: The National Hydrology Research Institute Building, Innovation Place

Please remember to park **only** in the NHRI parking lot as all other locations in Innovation Place require 24-hour parking permits, and you will be ticketed. On entry and exit of building, please register with the commissioner. He will have a membership list to quicken this process. Non-members will just sign the guest book. There is ground-level access, and coffee will be served! Bus service is close by, but anyone who needs a ride, call me at 665-3392 well before and to arrange pickup. Remember to bring your RASC Handbook!

Executive members will meet at 7 p.m. in the NHRI boardroom.

Saskatoon Centre

Royal Astronomical Society of Canada
P.O. BOX 317, RPO University
Saskatoon, SK, S7N 4J8
Web: <http://maya.usask.ca/~rasc/rasc.html>
Email: huziak@sedsystems.ca Phone: (306) 665-3392

Honorary President: Prof. J. E. Kennedy
President: Richard Huziak
Vice-President: Erich Keser
Secretary: Dr. A. Hartridge
Treasurer: M. Williams
National Rep. Dr. Gord Sarty
Editors: Sandy Ferguson
Erich Keser
Photo Ed.: Dr. A. Hartridge

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NOTE: The DEADLINE for the next (Aug/Sept) issue will be August 10th !

Special Thanks

to Ellen Dickson, who did the folding and stuffing for last month's Saskatoon Skies,
and to Mike Williams for services above and beyond the call of duty.

Saskatoon Skies is produced by volunteer labour on a monthly basis with summer double-issues. We welcome letters and submissions (articles, images cartoons, drawings and diagrams are all welcome!) Contact Sandy Ferguson (931-3184) or Erich Keser (374-4262) for further details. Text may be e-mailed in *plain unformatted ASCII text with line returns at paragraph breaks only, and images in UUEncoded form* to keser@duke.usask.ca Signed articles do not always represent the opinion of the Centre.

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MORE Presidential ramblings...

SEDS Contest for Amateur Computer Scientists

I would like to inform you of a contest that we are organizing. The challenge is to create a web document about space and to explore the possibilities of conveying information via multimedia. There is \$1200 in prize money to be won. Contest details are at <http://www.seds.ca/Contest/> on the web. I can also mail/email you the contest details as well as posters to distribute. I would greatly appreciate it if you could mention our contest to your members.

For your information, Students for the Exploration and Development of Space (SEDS) is a student-run space education and exploration group for Canadian students from Gr. 7 - Ph.D..

Our homepage URL is <http://www.seds.ca/>. I hope that teachers and students in your membership will participate in our contest and our organization. Ideally, the contest would involve not only students in Computer Science and Science courses, but also students taking English and Art. For more information about the contest or SEDS-Canada, please contact me.

Sincerely,
Calvin Li
SEDS-Canada, Vice-President
ccli@cantor.math.uwaterloo.ca

NASA Eclipse Circular Available

The NASA eclipse circular on the August 1999 total eclipse over Europe, the Middle East and India has arrived on my doorstep and I now have 500 copies to distribute. You can get one for free, provided you send me a SASE with \$3.10 in stamps for delivery in Canada or \$4.85 for US delivery. Foreign delivery is \$8.05. It's a big one this time - 121 pages.

For those outside of Canada with no access to Canadian stamps, I'll accept any form of negotiable paper: international postal coupons (make sure they're stamped by the originating post office - they're worth .90 each in Canada), cash (round off to the nearest dollar and make sure you convert to Canadian dollars), or a small chicken. (Halifax and other east coast residents can send a cod or small lobster). Mail to:

Jay Anderson
Environment Canada
123 Main Street, Suite 150
Winnipeg, MB R3C 4W2

I have arranged for all RASC Centres to receive a copy directly from NASA. Please advise me of any address changes by e-mail (jander@cc.umanitoba.ca). I also have a goodly supply of 1998 circulars remaining (the Feb. 26, 1998 Caribbean eclipse), with similar mailing costs.

Jay Anderson
Winnipeg Centre, RASC

Rick Huziak, President

Editorial Exhortations

Why Star Parties...and why our Star Party:

For an increasing number of the citizens of our ever-more-crowded world, the opportunity to gaze at star-filled skies no longer exists. The current (August) **Sky & Telescope** has an article on an expedition by The Astronomical Society of Singapore to Hawaii's volcanic mountains --seeking dark skies. What a demonstration of why star parties are becoming so popular! We certainly have evidence of this: with more than three weeks to go, registration for SSSP, has already topped a hundred! Who could have dreamed of such a response a year ago, as we hurriedly threw together a leaflet for the Edmonton General Assembly.

Have we had inquiries!...from Montreal to Vermont to New Mexico. Many hours, even days before the July 4-6th weekend, people on Vancouver Island, in Bismark, North Dakota, in Edmonton and Winnipeg will be cramming sleeping bags into telescope tubes and that last eyepiece or gadget between their socks, and heading off to join us in quest of the fine viewing and general experience we've promised them at Cypress Hills Park.

Our very success with SSSP poses a BIG challenge. The beauty of the park will help, and we've told no lies about its skies. But 150 or more people may be coming: keeping them happy will be a huge job for a Center of 60, and one half as big--especially when weddings, anniversaries and work will limit some of the most eager participants to short visits. Please come, please pitch in! We'll waive the late registration surcharge for Centre members (and others) who pitch in and sign up for one 4 hour or two 2 hour shifts.

This will be a great opportunity to show what our Centre(s) can do: the whole amateur astronomer community is aware of our SSSP thanks to the generous coverage in **Sky News** and full notices, alongside such established biggies as Starfest and Mt. Kobau in both **Astronomy** and **Sky & Telescope**.

A photo in the latter's article on the Singaporian "star party" shows the impressive array of equipment its president brought along. Envy faded on reading of the price our colleagues pay for this affluence: only the brightest stars remain visible anywhere ON Singapore.

These people had to fly thousands of miles in search of the same experience--star-filled skies-- for which people are flocking to our star party. How lucky we are that Cypress Hills is only four hours away. How foolish it would be to miss such an opportunity!

Ten years ago the Regina Centre first held a star night for campers at **Lookout Point** and they've repeated it and camped at this beautiful Park every year since the launching of the world-class **Saskatchewan Summer Star Party** will be a wonderful way of marking this anniversary! Please come if you possibly can...even if just for a day.

NOTE: Single Day Admission: As a special courtesy to very busy people from our own Centre, as well as those from such nearby communities as Medicine Hat, we have decided to charge a flat fee of \$10 for Single Day admission. erich keser

New Observatory Committee Report

PLANNING FOR NEW DARK SITE BUILDING BEGINS

With the acquisition of the Sleaford dark site imminent, a building committee has been formed within the Centre. The first meeting was reported on in the last issue of Saskatoon Skies. The second meeting took place at Bob Christie's house at 8 PM on May 20. Present were Merlyn Melby, Bob Christie, Al Hartridge, Erich Keser, Rick Huziak and myself. Bob had built excellent scale models of the site's proposed buildings and we played with various building configurations. Merlyn had fairly detailed site measurements that we used in our overall layout. Nothing has been decided upon yet except that we will probably use the Rystrom warmup shelter as part of the building for the new 16 inch telescope.

The purchase of the Sleaford site by the university is still pending; apparently there has been a small legal hitch. Also we will probably need to know what the university's funding situation is like before we can bring in the foundation contractors. Merlyn has also suggested that our Centre approach some of the local corporations for funding once we get under way. Merlyn has a list of companies we could contact and anyone with fundraising experience is asked to come forward to help us out with this task.

In the meantime, assembly of the metal dome for the 16 inch telescope now residing in Al Hartridge's garage would be a good weekend (probably several weekends) project. Anyone interested in helping to assemble the dome is asked to contact myself (**665-2332**) or Al Hartridge (**373-0034**) at home or at the next general meeting.

by **Gord Sarty, Chair-Building Committee**

UPDATE:

A further meeting was held at Gord Sarty's on June 11th meeting, and attended by the same five Center members, plus Yannis Pahatouroglou, the University of Saskatoon Physics Department's Senior Administrative Assistant. Yannis reported that the purchase was going slower than anticipated, but proceeding. There was discussion over whether the degree of obstruction of the existing line of trees warrants their removal, and to what degree they should be tampered with; over the degree to which the existing schoolhouse should be repaired and used, and whether special 'heritage' foundation funds might be available for this; and a spirited debate over the outhouse and toilet technology. It was generally agreed that:

- we should attempt to contract foundations for our Warmup shelter and domes
- we should attempt to move the Warmup shelter and 16' dome out to the site
- we need to survey, measure and examine the site and schoolhouse more closely
- work parties should start right after the completion of the SSSP

Rick reported that there should be enough money in our observatory account to fund such projects, and Yannis indicated that Physics Dept. may be able to supply a similar amount. Matching funding was also discussed. Our next meeting will be at the Sleaford School Site, so that all interested can examine it in detail and from their own opinions **Sunday, June 22nd, at 2:30 PM.** Call Rick (**665-3392** if you want to car-pool or need a ride)

e. k.

Updated SSSP Schedule

Please Note: there have been many minor changes since Bob Christie prepared his attractive brochure for us. Periodic updates have been E-mailed out: this is the latest version.

Friday July 4th:

4 PM Registration opens at Recreation Hall (MAY be possible earlier at Meadows).

Setup of campsites, 'scopes and security roster at the Meadows

We will try to watch over telescopes (DO NOT LEAVE EYEPIECES, ETC.), but will need *YOUR* help. IF you wish to leave your 'scope set up, then please also volunteer for a shift (2 X 2 or 1 X 4 hour) maintaining security. Register with our **Security Supervisors: Darrell Chatfield&Brian Friesen** for times. (You will NOT miss the Saturday presentations: The Park has kindly agreed to maintain security for these times.)

7:30-10:00 informal talks and presentations at Recreation Hall.

YOU are invited to give a 5-15 minute presentation. Slide projector, PA system and Video facilities are available.

10:00 PM Setup of Public Star Night on Lookout Point - Regina RASC

(contact Ross Parker Email RParker136@aol.com if you want to participate)

10:30-1:00 AM Public Viewing at Lookout Point* (subject to Saturday "Cloud date")

Observing at Meadows...likely until dawn!

Saturday July 4th - Recreation Hall

10:00-11:30 AM Blueberry Pancake Breakfast (free with registration)

1 PM talk: Geologist Kim Mysyk "The MORP Fireball Recovery Program"

2 - 4 PM Meteorite search (may be moved to Sunday if conditions necessitate)

4 - 5 PM Photo Display and Swap Table.

6 PM Pitchfork Fondu Dinner Banquet (pre-registration necessary)

7:30 PM Keynote talk: Fr. Lucian Kemble - "24 hour Observing"

8:30 PM Astrophotography Panel Presentation- Bob Christie (Saskatoon) and Al Andrews (Regina), further expert participants welcome!

9:15 PM Binocular Talk - Murray Paulson (Edmonton)

9:45 PM Display of best slides and photos, judging of best overall award.

10 PM Binocular Starwalk- Murray Paulson, at Meadows

10:45 PM - dawn RASC Observing at Meadows

Sunday Activities - Hiking, guided nature tours, pool and lake swimming, Sauna, Hot Tub, riding, park tours, golf, paddleboats are all available around the Park. Possible group drive to Fort Walsh and the West Block (this is a major historical site, and would be a 3 hour activity). Extension of Meteor search is also possible.

10:30 PM to dawn last night of RASC observing at Meadows campground.

CHILDREN: had a great time at our 1996 trial run. Park programs for them, including a fossil hunt and Campfire Night on Saturday. IF enough of parents are willing to participate, children's activities of our own may be organized.

Laird Sees the Universe

As a part of the Innovator's program, Laird Elementary School was fortunate to have **Rick Huziak**, the RASC Saskatoon Centre's President, lead our community in some hands-on astronomy. Throughout the first few weeks of May, Rick led kindergarten children on a tour of the observatory at the University of Saskatchewan, and then a public seminar, complete with slide presentation and solar telescope observation, concerning "Amateur Astronomy and Our Place in the Universe".

This was followed by a public star party on the following night, with over fifty guests from Laird, Carleton, Waldheim, and Rosthern attending. RASC members led observations, using five telescopes of varying apertures, of Mars, Comet Hale-Bopp, and several distant galaxies and nebulae. The enthusiasm of the crowd was everywhere obvious, and we are grateful to Rick, and all other RASC members who so generously gave of their time and expertise; especially **Sandy Ferguson, Brian Friesen, and Les and Ellen Dickson** and **Gord Sarty**, who all came out and either helped the observing or with the planning of this very successful event.

Dale Jeffrey, RASC Saskatoon Centre member, Laird

Photo Opportunities for RASC Astrophotographers

I will be selecting photos for the 1998 RASC Calendar in mid July. Submissions should be sent so as to arrive by July 11 to:

2478 W. 1st Avenue

Vancouver BC V6K 1G6

Electronic images may also be sent as email attachments to gupta@math.ubc.ca or mailed on diskette. Submissions can also be made to me in person at the General Assembly in Kingston.

The preferred form for non-electronic images is an 8x10 inch print. Electronic images may be sent in any standard image format. Do not send original slides or negatives. Colour images are preferred, but high-resolution black-and-white images will also be considered. My goal is to include a wide variety of images: prime-focus, piggyback, fixed-tripod; deep-sky, lunar/solar/planetary. If you have any questions about a possible submission, please contact me.

Rajiv Gupta Vancouver Centre, RASC

RASC Promotional Items Available from National

1. 11 cm circ. cloth RASC Crest, background-white, stitching-Royal Blue. \$10.& \$1.ship.

2. New item: "**The Firelamp**" is a light emitting diode (LED) that produces a deep red light to preserve night vision. The LED extends battery life 20 times compared with ordinary lamps.

Please check out the National Web page, <http://www.rasc.ca/promo> for a picture, information and prices.

Thank you, and happy night vision.

Kim Hay, National Promotions kimhay@adan.kingston.net
[or call Rick Huziak - we could arrange a bulk order if there is interest].

UPCOMING EVENTS***

*****PLEASE REFER TO INSERTED LEAFLET for DETAILS**

Saskatchewan Summer Star Party: July 4-6, 1997 Cypress Hills Provincial Park.
Please register ASAP Call Erich Keser 374-4262 Email keser@duke.usask.ca

Summer Public Starnights:

Friday, July 25th (Rain date: Sat. July 26th) at Beaver Creek Conservation Area.

Friday, September 5th (Rain date of Saturday, September 6th) at Beaver Creek.

Dates to be confirmed. Help and telescopes needed. Jobs will be organized by phone a week before. Call Brian Friesen at 384-2963 or Sandy Ferguson at 931-3184 for details.

3rd Annual NORTHERN PRAIRIE STAR FEST - Aug. 1-3, Sarles, N. D. By Saskatoon Centre Member John Leppert Single registration is \$20. (CDN) and family \$27. (Cdn). (Delicious!) Barbecue Banquet is extra. Discount for registering before July 15th. Contact John Leppert, 1101 Westwood Street, #209, Bismarck, N.D. 58405-6292 or e-mail 73424.3533@compuserve.com.

ALBERTA STAR PARTY - Aug. 29th-Sept 2nd, Eccles Ranch.
contact Rick or Carol Weis at (403) 286-4347 or e-mail weisc@cadvision.com or Murray Paulson at (403) 459-1168. Rick Huziak has the registration brochures.

Lake Namekus camping weekend - Aug. 29-September 1st: near Prince Albert Park, Call David Cornish at 242-7125 or Bob Christie at 931-2115 for details.

Sandy Ferguson

Centre Library Report:

Former Member Percy Crosswaite has donated some new books to our library. I will be bringing them the June 16th General meeting so that you can check them out. Titles include:

Foundations of Astronomy, Michael A. Seeds, 1984. (currently on loan)

Norton's 2000.00: Star Atlas and Reference Handbook, ed. Ian Ridpath, 1989.

Asimov on Astronomy, Isaac Asimov, 1979.

The Dark Side of the Universe: A Scientist Explores the Mysteries of the Universe, James Trefil, 1988.

Planet Earth: The Companion to the PBS Television Series, Jonathan Weiner, 1986.

Any member can borrow these books, or any others, from our library. Our library is located downstairs at the University of Saskatoon Observatory, and we can make arrangements to visit it at any convenient time. A complete list of library materials is being compiled, and should be available in the fall. For access to the Library, please call Sandy Ferguson at 931-3184.

Minutes of the General Meeting

- 1. Meeting called to order at 8:10 PM.**
- 2. Laird Starnight May 6 & 7:** See Executive Minutes.
- 3. Observer's Group Report, Darrell Chatfield:** the May 2nd starnight at the new site was very successful. He showed pictures of a fire near the site around midnight and spoke of the great dark skies at the site. Next Observing Session is June 6 or 7.
- 4. Youth Group Report:** Sandy Ferguson gave a short report on the Centre Junior Astronomers. Dale Jeffrey mentioned the interest in Laird and suggested that our Centre promote astronomy through school boards.
- 5. New Observatory Update:** Rick Huziak gave a short report (See Executive Minutes). The next meeting will be on May 20th at Bob Christie's.
- 6. Cypress Hills Star Party Report:** See Executive Minutes.
The next meeting will be at Erich Keser's on May 17th.
- 7. New Business:** See Executive Minutes.
Les Dickson suggested that the pot lights in front of the Beaver Creek building be covered with red shades in the future.
Fundraising suggestions of a bottle drive and sale of Comet Hale-Bopp (or other suitable) photos were put forth by Kim Mysyk and Ellen Dickson.

8. Program Presentations

- 1. Using the Handbook:** Gord Sarty gave his monthly talk on the **Observers' Handbook:** Jupiter and how to use handbook graphs to observe its satellites from night to night. He also described how to find the GRS and adjust for equatorial and polar longitudes.
- 2. Mystery Presentations:** Rick Huziak and Gord Sarty presented each other with **Messier Certificates**, earned by observing all 104 Messier objects and submitting their applications to National Office. Rick also showed an old slide of Gord at SED in the early 1980's, when Gord was working as an engineer on a program for the shuttle.
- 3. FEATURED SPEAKER:** Dr. Garry Davis, Institute of Space & Atmospheric Studies, U of S, gave a fine presentation regarding his work with a long wave-length spectrometer satellite over the past 10 years. This equipment was launched in 1995 and uses the European Infrared Space Observatory (ISO) satellite to study Jupiter's atmosphere. The equipment was built by a consortium of institutions from France, Italy and America and the mission will end in December. Dr. Davis described the spectrograph's optical layout and inner workings, plus some of the problems that arose during the development with clarity, warmth and humour. He also presented some of the results they are receiving from the equipment and described some future plans for studies of Mars, Titan and the Great Planets, and a profile of Saturn's atmosphere which will include its temperature and chemical make-up and spectrum.
- 9. The meeting then adjourned to Tim Horton's on 33rd Street, in the usual manner.**

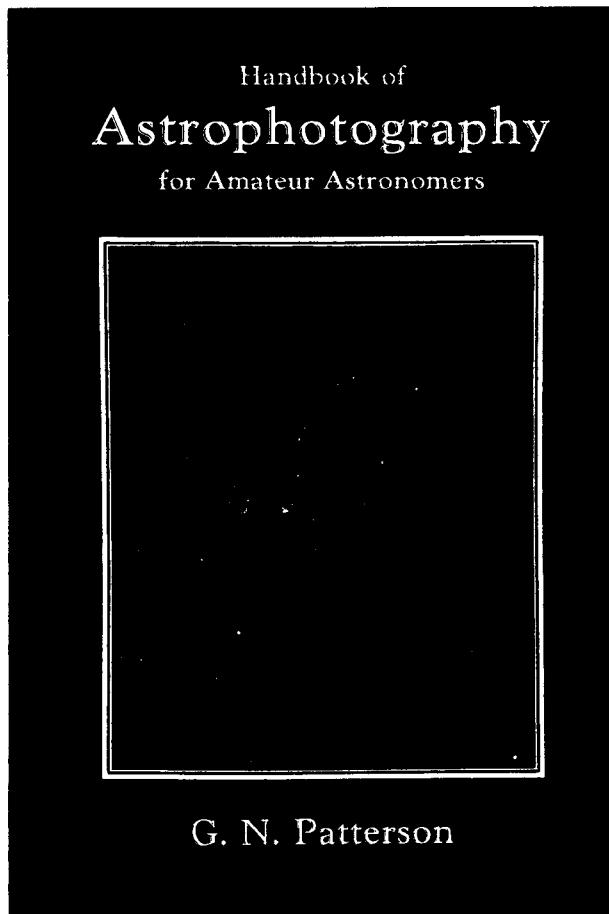
MINUTES OF May 12th, 1997

EXECUTIVE MEETING

1. Meeting called to order at 7:05 PM.
2. **Laird School Lecture & Starnight:** In the afternoon of Tuesday, April 6, Rick Huziak gave an astronomy lecture to the students. In the evening Les and Ellen Dickson, Sandy Ferguson and Gord Sarty drove out to Laird to be part of a planned starnight, which was canceled due to bad weather. Rick and Brian Friesen went out again on Wednesday, April 7 to coordinate a successful starnight. The Centre received a donation \$50.00 from the Laird School in appreciation for helping with the evening.
3. **Astronomy Classes:** Erich Keser began these at Lakewood Civic Centre on May 7th.
4. **Eyepieces for Loaner Scopes:** \$150.00 was budgeted for eyepieces for scopes in the loaner program. **Motion:** Erich Keser **Seconded:** Darrell Chatfield, **Carried.**
5. **Rystrom Power Bill:** \$50. is to be paid to the Rystroms for our power bill. Our usage is less, but we want to show appreciation. **Motion:** E. Keser **Seconded:** B. Friesen, **Carried.**
6. **New Observatory Building Committee Report:**
The University of Saskatchewan Board of Governors has approved the purchase. Erich and Rick met with the University to review the Partnership Agreement. Changes made:
 - Centre to coordinate maintenance duties, to be shared with U of S;
 - A limit to the number of sets of keys distributed outside each party.Minor corrections were also made. There was discussion of key access to each other's buildings and joint ownership of any clubhouse. Savings may be possible by using the old school and pouring a new foundation. Grants available from National Office are on a matching basis, so we must fundraise to increase their size. Grant may also be available through the University.
7. There was an opportunity to buy a 10' Andrews satellite dish for \$40.00 for use on the new site (no antenna or receiver). Discussion followed and it was decided not to buy it.
8. **Cypress Hills Star Party Report:** 21 registrants were recorded so far, with \$506.00 in our account. We need approximately 12 more helpers for activities. Most will be last minute helpers. Re: security in the Meadows area: those with scopes are to take turns. We may offer children's programs if the parents will get involved. **Jim Saville of the Spring Valley Guest Ranch** has been contracted to do his **Pitchfork Fondue** for the Saturday evening dinner. This will simplify logistics and provide a local delicacy at a bargain price. Our free labour on all other meal items will keep our costs a dollar or two below the \$12.00 charge.
9. **New Business: Astronomy Day Starnight** - Rick Huziak gave a slide presentation indoors at Beaver Creek, as the sky was poor. Around 10:15 PM it cleared and the 30 people attending observed until midnight.
10. Meeting was adjourned at 7:55 PM.

Executive and General Meeting Minutes
were submitted by Sandy Ferguson

A legacy from the person who did so much for this the Saskatoon Centre:



Gordon Patterson's book is 121 pages, conveniently spiral bound to lay flat, and includes an exposure calculator. \$15 per copy, plus \$3 shipping from Rick Huziak at (306) 665-3392 or E-mail huziak@sedsystems.ca

Become a Member

Get the RASC Handbook and Journal, plus Sky News and Saskatoon Skies mailed to you regularly. Use the Rystrom Observatory and our new Sleaford dark site and participate in the many activities of the Saskatoon Centre of the Royal Astronomical Society of Canada. Join Now!

Regular	\$ 40.00	Youth (21 and under)	\$ 22.50
Lifetime	\$900.00	Newsletter only	\$ 12.50

Make cheques payable to RASC Saskatoon and send them to RASC Saskatoon Centre, PO Box 317, RPO University, Saskatoon, SK, S7N 4J8, or pay at the Gen'l Meeting