February 2014 - Volume 9, Number 2

David Garner, Editor

We welcome your comments on the Bulletin. Email them to the Editor at bulletin@rasc.ca.

A **PDF** version of the *Bulletin* is available <u>here</u>. A **Web-based** version of the *Bulletin* is available <u>here</u>.

# > Editor's Notebook

by David Garner

## February's Sky

During the first week of February, Mercury is fading in the evening twilight. A week after inferior conjunction on the 15th, Mercury will reappear in the dawn sky. Also on the 15th Venus will be at its maximum brightness (mag -4.9). Jupiter is well placed in the evening sky and can be easily viewed throughout the month. On the 21st, for some observers, the Moon will occult Saturn. The Full Moon occurs on the 14th. For more details check the *2014 Observer's Handbook*. Don't forget to check out Gary Boyle's **Northern Skies**.

# News @ RASC.ca

## **The 2014 General Assembly**

by Paul Schumacher, Victoria Centre, Co-chair of 2014 GA Organizing Committee



1914 - 2014

## 2014 GA: Victoria Centre: June 26 - June 29

Join the members of Victoria Centre as we celebrate 100 years of being a RASC centre at our 2014 RASC General Assembly. To add to the festivities, we will also be celebrating the 100th anniversary of the Dominion Astrophysical Observatory, located in Saanich, B.C., just to the north of downtown Victoria.

The 2014 General Assembly will showcase the DAO, University of Victoria's new observatory located on the campus, which is our assembly headquarters, a wide-ranging scientific and cultural program for

your entire family, and all this conducted against the spectacular natural beauty of Canada's West Coast. Guest Speakers include Dr Laura Ferrarese, Bob McDonald of CBC's *Quirks and Quarks*, and RASC's own Peter Broughton.

Victoria is serviced by both of our domestic air carriers and can be reached by convenient car ferry service connecting Victoria to Vancouver, B.C. and Seattle, Washington.

From on-campus accommodation at the University of Victoria to nearby hotel and RV facilities, there are many lodging options available in the Greater Victoria for RASC members.

Registration will go live 2014 March 1 at RASC.ca.

Please join us in Victoria, June 26 to June 29 for the 2014 GA.

#### RASC VICTORIA CENTRE

#### 2014 General Assembly Organizing Committee

Mark Bohlman, Co-Chair mbohlman@shaw.ca

Paul Schumacher, Co-Chair docpschu@shaw.ca

### Call for Papers for the 2014 General Assembly

by Lauri Roche, Victoria Centre, Past President

It's time again for the Call for Papers for the annual General Assembly of the Royal Astronomical Society of Canada. If you are considering taking in the beautiful surroundings of Victoria, B.C. at the end of June 2014, why not think about a topic that you would like to share with fellow astronomers. The papers can be about some observational research you may be involved with, the photographs of a trip you've taken, or a new outreach program that has been started by your centre. Have you done some historical research, worked on a new educational program or have a unique point of view on an astronomical topic? We are looking for presentations that represent a wide variety of topics generally related to astronomy and would love to have you involved.

Our paper presentations will be held on Saturday, June 28 and will be, as in the past few years, 15 to 20 minutes in length. They are one of the showcases of the annual General Assembly and are eagerly anticipated by the delegates. I hope you will consider a proposal. On Sunday, June 29th we will be having an afternoon forum that has as its theme the RASC's intentions for programs and initiatives for UNESCO International Year of Light, 2015.



An International Year of Light will allow the universality of light and the variety of its applications to be appreciated via many and varied themes covering broad areas of interest, supported by cross-cutting themes addressing essential issues to be included in all activities.

The four main themes will be Light in Science, Technology, Nature and Culture with the cross-cutting themes of Sustainability and Development, Education, History and Young People.

You may wish to refer to the following website for more information and details: http://c.ymcdn.com/sites/www.eps.org/resource/resmgr/events/EPS\_IYL2015prospectus.pdf.

Please send your intentions to present for either the Saturday Paper Sessions or the Sunday IYL 2015 forum to the following webpage. Deadline is 2014, February 28.

https://www.rasc.ca/events/call-for-papers.

If you have any questions please contact Lauri Roche at: <a href="mailto:pastpres@victoria.rasc.ca">pastpres@victoria.rasc.ca</a>

## **AstroCATS 2014 Trade Show - News Update**

by Gary Bennett, Chairman, AstroCATS, RASC Hamilton Centre

Saturday May 3 - 10:00 AM - 6:00 PM

Sunday May 4 - 10:00 AM - 4:00 pm

David Braley Athletic & Recreation Centre, Mohawk College,

135 Fennell Ave W., Hamilton, ON L9C 1E9

**Prize Update:** Some of our Sponsors have announced prize contributions. In particular, MallinCam will be giving away 10 cameras (over \$ 6K worth). More to come...

**Solar Star Party:** Lunt Solar Systems and Stephen Ramsden of the Charlie Bates Solar Astronomy Project have teamed-up to put on a spectacular Solar Astronomy program.

**Special Hotel Rates:** For out-of-town attendees, Mohawk Residence & Conference Centre is offering 2-bedroom suites for only \$ 79.00/night. Includes continental breakfast, parking, WiFi.

Keep an eye on the website as more exhibitors, guest speakers, and prizes are added in the coming months:

http://www.astrocats.ca.

AstroCATS is hosted by RASC Hamilton Centre.

### Call for Images for 2015 Calendar

by Paul Gray, Observer's Calendar Editor

Astronomical images and sketches of all types are invited for consideration for publication in the 2015 RASC Observer's Calendar including: deep sky, solar system, and dramatic astronomically themed landscapes.

Images can be prime focus, piggyback, eyepiece projection, or fixed tripod; and recorded on a digital/CCD camera, film, or Webcam. Submitted images must be of sufficient quality and resolution to reproduce well at 9.5" x 12" and must be compatible with the "landscape" orientation of the calendar images. Generally, this will mean a resolution of at least 1200 pixels tall. We will also consider making a quilt or mosaic of lunar/planetary Webcam captured images (so as not to over magnify an individual image for publication).

If you already have a gallery of images on your Web site, send me the link, but please also direct me to your favourites. Both well-known and obscure objects are published in the calendar, so to avoid having the same objects used too often, I will be screening for those that may have appeared in recent years.

Please email submissions to me at <a href="mailto:snpgray@gmail.com">snpgray@gmail.com</a>. While I have a bottomless email box, it's best to send me jpegs first. If your image is selected, I will request a full resolution tiff version. Full resolution tiffs will be required for use in print. The deadline for submissions is 2014 April 30. If you have any questions, please don't hesitate to contact me at the above mentioned email address.

### **Looking for Images of Transit of Venus Goggle-Users**

by Mary Lou Whitehorne, RASC Past President

Many of you will remember how RASC partnered with the Dunlap Institute and the FAAQ to produce safe solar viewing goggles and informative educational materials for the Transit of Venus event in 2012. Our Web site features a number of excellent images of the event from locations across Canada.

Our Dunlap Institute contact, Bryce Croll, is hoping to track down a few more images of people wearing our very stylish goggles while viewing the transit. This will aid us in fundraising for future outreach opportunities as well as building a solid archive of the event. If you have any shots you think are suitable, please email them directly to Bryce at this address: croll@space.mit.edu

## A Note from Peter Broughton

by Peter Broughton, Fellow of the RASC, Past President

After not hearing for a couple of years, I was delighted to get an e-mail from Damien Lemay (RASC President 1990-92). As always, he has been very busy. He and Lise have moved to a new place in the country outside Rimouski. With the help of friends and family, Damien has just finished building a three-storey observatory. You can see the process at:

#### http://astrorimouski.net/damien/observatoire2013/imagettes/index.htm.

He is planning to continue using his CCD to observe variable stars and hopes to be able to detect transits of exoplanets. Damien says that he and Lise would be happy to see any RASC members who might be planning a vacation in the Gaspe or travelling to the Maritimes.

### The Top Canadian Astronomy Stories of 2014

by Roland Dechesne, Chair, Membership and Development Committee

In the December 2013 edition of the Bulletin, I asked you to vote on your favourite astronomy stories of the year, with a number of stories that had a Canadian connection. Here is your list:

- 1. The Great Russian Meteor of 2013 explosion above Chelyabinsk, Siberia on Feb 15 while the world's telescopes were pointed the other way for the close pass of asteroid 2012 DA14.
- 2,3. A tie, between two very Canadian stories, one of which even had a RASC connection.
- 10-year-old Nathan Gray, youngest discoverer of a supernova, kept it 'in the family' as his older sister had previously found a supernova, much to the pleasure of proud dad and prominent RASC member, Paul Gray.
- Canadian astronaut Chris Hadfield commands the International Space Station and becomes a social-media star.
- 4,5. Also a tie, this time between two interplanetary vagabonds, one natural and one man-made.
- Comet ISON tantalized, then disappeared and appeared to resurrect, phoenix-like, after close encounter with Sun, but ultimately perished.
  - Thirty-five years after launch, Voyager 1 appears to finally have exited the heliosphere.
- 6. Reminiscent of the 'Pale Blue Dot', tiny Earth was captured in Cassini's glorious image of Saturn.
- 7. A comet that did not disappoint, C/2011 L4 PanSTARRS, developed a broad dust tail and even sported an apparent anti-tail for a while.
- 8. NASA's Kepler Mission discovered hundreds of new planet candidates, suggesting that at least 100 billion planets populate the galaxy.
- 9, 10, 11. A three-way tie.
- New Dark-Sky Preserves in Wood Buffalo National Park, Alberta & Northwest Territories and in North Frontenac Township, Ontario.
  - City of Calgary passed comprehensive Light-Pollution Bylaw.
- Ancient supernova material found in meteorites: Supernova may have been the one that triggered the formation of the Solar System.

Thanks to all those who voted. The randomly chosen winners of the excellent "Skyways Astronomy Handbook for Teachers" (ou, en francais, "Explorons l'astronomie") by Mary Lou Whitehorne, are: Nicholas Hesse, Elaine Pelletier, and Caroline Lane.

#### **Asteroids with a Canadian Connection**

by Eric Briggs, Toronto Centre

A few new asteroids have been named to the List of Asteroids with Canadian Connections:

(15359) Dressler = 1995 GV2

Discovered 1995 Apr. 2 by Spacewatch at Kitt Peak.

Burkhard Dressler (b. 1939) is a Canadian geologist who has made significant contributions to the field of impact cratering with meticulous field observations at Sudbury, State Islands, Manicouagan and Ries. He documented the core samples from the Chicxulub impact crater that led to confirming the KT age of this feature.

MPC 86714

http://www.rasc.ca/content/asteroid-15359

(15364) Kenglover = 1996 HT2

Discovered 1996 Apr. 17 by Spacewatch at Kitt Peak.

Ken Glover (b. 1964) is a Canadian space historian. He is the co-editor of the Apollo Lunar Surface Journal. He has served as an on-set consultant for the IMAX film *Magnificent Desolation* and as a caption writer for the Taschen book, *Moonfire*.

MPC 86714

http://www.rasc.ca/content/asteroid-15364

(358376) Gwyn = 2006 XT67

Discovered 2006 Dec. 13 by D. D. Balam at Mauna Kea.

Stephen Gwyn (b. 1968) is an astronomer working for the Canadian Astronomy Data Centre. In 2009, he created the Solar System Object Image Search tool, which allows astronomers to find images of moving objects.

MPC 86717

http://www.rasc.ca/content/asteroid-358376

(378204) Bettyhesser = 2006 YF49

Discovered 2006 Dec. 26 by D.D. Balam at Mauna Kea.

Betty Hinsdale Hesser (b.1938), passionately curious about, and gifted in languages, music and science, generously shares in an easily accessible manner her extensive knowledge, particularly about astronomy and reptiles, with people of all ages to address common misunderstandings and stimulate broader comprehension of nature.

MPC 86718

http://www.rasc.ca/content/asteroid-378204

These are listed on the Web site, <a href="www.rasc.ca/canadian-asteroids">www.rasc.ca/canadian-asteroids</a>.

## ➤ Across the RASC

### **Toronto Centre Telescope Clinic**

by Blake Nancarrow, RASC, Toronto Centre

The Toronto Centre is once again conducting a telescope clinic for new telescope owners at the David Dunlap observatory. This free walk-in clinic is open to all.

What - new owners telescope clinic

Why - free walk-in clinic to learn how to use your new gear

When - Saturday 2014 February 8, 1:00 PM to 4:00 PM

Where - David Dunlap Observatory, Richmond Hill, administrative building, main floor

Who - anyone, anyone who has a telescope and doesn't fully understand it

How much - free, registration required

Parking - free

For more information or to register, visit: <a href="http://rascto.ca/content/learn-how-use-your-telescope">http://rascto.ca/content/learn-how-use-your-telescope</a>

## What's New in the Sky

Members are encouraged to check out the **Northern Skies** section of the RASC Web site. Thanks to **Gary Boyle** for keeping us all in the know.



#### **The Royal Astronomical Society of Canada**

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