



March 2019 - Volume 14, Number 3

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

► [News @ RASC.ca](#)

Editor's Corner

by **David Garner**, Bulletin/NNL Editor

We would like to form an Editorial Panel made up from your Centre Newsletter Editors (and any other interested RASC members) to provide regular and timely articles for the Bulletin and National Newsletter (NNL).

As a national organization it is important that we are aware of the activities in other Centres. It not only unites us but also gives us ideas about outreach events that we could hold in our own Centres.

I look forward to hearing from you so, if this is something you would like to be a part of please contact me (bulletin@rasc.ca) and/or Randy Attwood (attwood@rasc.ca) .

Clear Skies,
Dave Garner

News from the Society Office

by **Randy Attwood**, RASC Executive Director



Observer's Calendar 2019 Editor: Paul Gray

ON SALE Now \$12.55

A beautiful calendar showcasing RASC members' astro-images with information on what's-up in the sky tonight. A perfect gift for the beginner and a must-have for the experienced observer. IN STOCK. [Available for order!](#)

Observer's Handbook 2019 Editor: James Edgar

The Observer's Handbook: a 352-page guide published annually by The Royal Astronomical Society of Canada, has come to be regarded as the standard North American reference for data on the sky. The Handbook material is of interest to astronomers, scientists, teachers, students, science writers, campers, Scout and Guide leaders, and interested readers. The Handbook forms the basis of many secondary and university astronomy courses, and it should be in every library. Also available: US Edition. [Order Here!](#)

150th Value Pack



Score this amazing RASC 150th Value Pack: Our 150th Sticker, 150th lapel pin and 150th crest. Makes an amazing gift for a budding astronomer or treat yourself! Valued at over \$20.00, but on sale for 12.50.

****Hurry while supplies last!**** [Order Here!](#)

Annual Report 2018

A note to Centre Treasurers and Secretaries: please note the deadline for reports to the AR2018 was **2019 February 28**. Please send outstanding Treasurer reports to Madison Chilvers mempub@rasc.ca and Secretary reports to James Edgar jedgar@rasc.ca

Please include the number of participants reached through outreach events and number of youth 21 and under reached (if tracked, or an estimate) in the Secretary reports.

Youth Astronomy Day – Youth Committee Updates

Jenna Hinds, Youth Outreach Coordinator

The Youth Committee has new plans for youth engagement. We are planning to run a Youth Astronomy Day in September of 2019. This will involve events planned by youth and for youth, all across the country. It will align with Science Literacy Week (September 16-22), but we haven't chosen a specific day yet.

We are hoping for some evening hands-on activities and presentations planned by youth members at your centres and in the community, followed by an evening of observing.

If you are interested in planning events, helping out, advertising on social media, organizing venues in your city, or any other aspect, please contact

jenna.hinds@rasc.ca or call me at 416.924.7973 ext4. We need all the help we can get to make this a nation-wide event!

2019 General Assembly Update



The 2019 General Assembly will be held in Toronto at York University from June 13 to 16. The theme will be Education, Public Outreach and Citizen Science in Astronomy. The General Assembly will be held jointly with members of the American Association of Variable Star Observers (AAVSO).

Highlights of the 2019 General Assembly include:

- Two days of paper sessions by invited speakers and RASC and AAVSO members.
- A half day of workshops for members to discuss various outreach and astronomy activities: Education; Public Outreach; Citizen Science; Light Pollution Abatement; Member Retention; Running a Centre; and more.
- The Ruth Northcott lecture will be given by James Hansen, author of *First Man: The Life of Neil A. Armstrong* (2005). It is a biography of the first man to walk on the Moon. A movie based on the book was released in 2018.
- Longtime RASC member David Levy's autobiography, *A Nightwatchman's Journey*, will be introduced.

- During the weekend, a program will be offered to members of the public. Families will be invited to attend hands-on astronomy activities and introductory lectures as part of a Father's Day Weekend Astronomy Adventure.
- Evening observing at York University's Allan I. Carswell Observatory.
- After the General Assembly, there will be tours to local sites, such as the David Dunlap Observatory.

Recently, two subway stations were opened at the north and south ends of the campus, making York University accessible from all over the city. This also means that downtown Toronto is a short subway ride from the campus.

Accommodation will be available in student residences on campus and at a hotel off-site on the Toronto subway line.

Look for registration information this month on the 2019 General Assembly website: <https://rasc.ca/ga2019>

See you in Toronto in June!

EPO & Public Outreach Update

by **Curt Nason**, EPO Committee Chair

Mission of the RASC: To enhance understanding of and inspire curiosity about the Universe, through public outreach, education, and support for astronomical research.

Last month I noted that only half of the 28 RASC Centres reported outreach events through the Society website in 2018. Here is a breakdown, in alphabetical order by Centre, of the 485 outreach events that were reported in 2018.

Edmonton (1); Halifax (2); Kingston (17); London (62); Mississauga (12); Montreal (17); New Brunswick (182); Okanagan (160); Ottawa (3); Regina (3); St. John's (5); Sunshine Coast (16); Victoria (1); Vancouver (4).

In 2017 the number of outreach events reported was 16% higher but they were from only 13 Centres. No doubt, far more outreach events than these numbers indicate are being performed by RASC Centres and unattached members. If your

Centre is missing or underreported in the results above, please determine why that is. The Society and the EPO Committee can use the information you provide in outreach event reports to support grant applications, keep track of outreach support materials such as Star Finders and Moon Gazer's Guides, and determine what areas of outreach require improvement and assistance.

The link to the Outreach Event Reporting form is under Resources at the bottom of the RASC website page. It only takes a few minutes to complete the form. Please, make outreach event reporting a necessary part of your outreach activities.

Imagining the Skies RASC 150 Contest Winners Announced!

by [Randall Rosenfeld](#), Chair, History Committee

The Royal Astronomical Society of Canada (RASC) is pleased to announce the winners of Imagining the Skies, the astrophotography, sketching & creative arts contest celebrating the RASC's 150th year!

We were gratified by the number, variety, and quality of the entries. We are beholden to all the artists who submitted their work, the audience at large who participated by voting for their favourite pieces, and the expert panel of judges. Without them, Imagining the Skies would never have happened.

Winning submissions were selected in two ways, by popular vote through the website, or by our panel of three experienced judges.

The winners chosen by public vote are Ryan Fraser (London ON) in the category Astrophotography–Experienced, for “Andromeda M31”, Stephan Hamel (Hanwell NB) in the category Astrophotography–Intermediate, for “The Moon shows us its Real Colours”, Josephine Christensen (Toronto ON) in the category Astrophotography–Novice, for “Eye of the Beholder”, Eileen McGann (Vancouver Island BC) in the category Creative Works–Experienced, for “Randy's Moon in Uclulet”, Trinley Dorje (Toronto ON) in the category Creative Works–Intermediate, for “We are Stardust 1.0”, and the Vikisnath Family Group (Artash, Arushi, Rati, and Vikas, Toronto ON) in the category Creative Works–Novice, for “Trappist-1 Pinball Light and Sound Model: Singing to Survive”.

Those chosen by the panel of judges are Kathy Walker (Kentville NS) in the category Astrophotography–Experienced, for “M13, The Great Hercules Cluster”, Nic Annau (Victoria BC) in the category Astrophotography–Intermediate, for “Waterfalls”, Adrian Aberdeen (Toronto ON) in the category Astrophotography–Novice, for “M24 Sagittarius Star Cloud”, Janet H. Tulloch (Burlington ON) in the category Creative Works–Experienced, for “Twilight of the Gods”, Trinley Dorje (Toronto ON) in the category Creative Works–Intermediate, for “Stellar Jewels”, and Jason Worobec (Saskatoon SK) in the category Creative Works–Novice, for “A Cool, Cool Full Moon”.

Silvia Graca (Winnipeg MB) won the Special Award for Sketching for “In the Neighbourhood”. W. John MacDonald (Victoria BC) received an Honourable Mention in the Experienced category, for “Sketching at the 25”, Tim Yaworski (Saskatoon, SK) received an Honourable Mention in the Intermediate category, for “Lunar Eclipse over Borden Bridge”, Samer Hobeika (Montreal QC) received an Honourable Mention in the Novice category, for “Had to stop there for a photo”, and Emile Cormier (Moncton NB) received an Honourable Mention in the Sketching category, for “M13 Hercules Cluster Sketch”.

We congratulate all the winners!

For 150 years the RASC has been encouraging and enabling people to engage in the direct experience of celestial phenomena, in the belief that science can enrich our lives. Imagining the Skies continues the legacy of science inspiring art.

The winning submissions along with the other entries can be viewed at <https://imaginingtheskies.ca/>.

Call for Images 2020

by **Paul Gray**, Editor, *Observer's Calendar*

Astronomical images and sketches of all types are invited for consideration for publication in the 2020 RASC Observer's Calendar including: deep sky, wide field, Solar System, astronomical sketches, 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 3825 x 3028 pixels for the print ready tiff. 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 website, send me the link, but **please also direct me to your recent 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 the past 3 years.

Please email submissions to me at snpgray@gmail.com. While I have a bottomless email box, it's best to send me jpegs first. If your image is selected, we will request a full resolution tiff version. Full resolution tiffs will be required for use in print. **The deadline for submissions is March 31**. If you have any questions, please don't hesitate to contact me at the above mentioned email address.

Observing News

by [Dave Chapman](#), Chair, RASC Observing Committee



The RASC has over 600 members who have distinguished themselves by earning observing certificates. See www.rasc.ca/certificate-programs for more details.

Recently, the following observing certificates have been awarded:

Explore the Universe: Berta Beltran (Edmonton); Massimo Dopson, Domonic Dopson, and Paul Dopson (Sarnia—completed in September 2018)

Isabel Williamson Lunar Observing Program: Kirby Alguire (Unattached). Kirby also photographed all the objects—well done!

New Observing Pin—Explore the Moon



The RASC Observing Committee decided to create a new observing pin for the ever-growing number of RASC members who have earned the certificate for Explore the Moon—Telescope. A rough design was worked out by the committee, and we thank Michael Gatto for once again revising his artwork for the Moon image that is used in both the RASC Observer's Handbook and the Explore the Universe Guide (2nd Edition). All this was passed to Ted Dunphy (who created the final graphics for the original observing pins a decade ago) and he adapted the design to work as a pin. The order has been sent to Just Direct Promotions, and we'll soon have the new pin! RASC will ensure that previous recipients of Explore the Moon—Telescope certificates will also receive pins.

RASC Observing Program Videos

The three videos describing the seven RASC observing programs with certificates (<https://www.rasc.ca/certificate-programs>) have earned 1200+ views since they were released in January. Several RASC Centres report showing them at recent meetings, and we have been getting favourable fan mail. RASC Youth Programs Coordinator Jenna Hinds had the idea of linking each observing program online to

the specific location in the corresponding video that describes that particular program. RASC Website Manager Walter MacDonald figured out how to do it!
Thanks Jenna and Walter!

These videos were created for the members and centres of the RASC to promote observing. Feel free to use them! If you have a YouTube account, please Like, Share , Subscribe!

General Announcements

Occasionally, communications to the Observing Committee go astray because people are using old application forms and observing lists. Please ensure that you are using the latest versions when you apply, see www.rasc.ca/certificate-programs.

On Twitter, please follow @RASC using the hashtag #RASCobserving for announcements of earned observing certificates and special observing opportunities. RASC also has a Facebook Page where we announce observing news.

Also, please let us know of RASC members earning observing distinctions from other societies, such as the Astronomical League, AAVSO, and so on.

50 Things To See On The Moon

by **Dave Chapman**, Chair, RASC Observing Committee

RASC Halifax member and accomplished author John Read has recently released the latest in his “50 Things...” series, an 80-page practical introduction to observing the Moon that is appropriate for the youthful astronomer and beginners of all ages.



Silent Sky

by **Walter MacDonald**, Kingston Centre

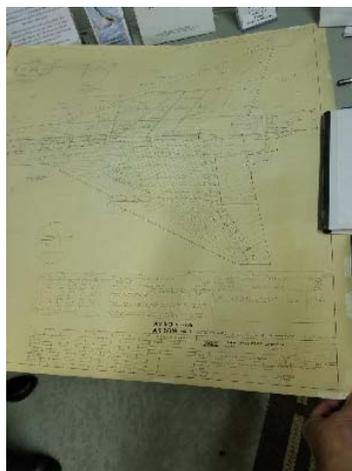
A new play for Northumberland Players in Cobourg titled *Silent Sky* by Lauren Gunderson will open at the Firehall Theatre in Cobourg and runs from March 22 to April 7 with evening and matinee performances.. The play is about Henrietta Leavitt, and her colleagues Annie Cannon and Willamina Fleming at the Harvard Observatory. You can buy tickets and get a quick summary of the story at http://concerthallatvictoriahall.com/VHshow_silentsky.html.



Avro Arrow Historical Photos

by **Neel Roberts**, Calgary Centre

Neel has quite a collection of Avro Arrow photos. Please contact him if you are interested.



and many more.

RASC Montreal Centre Upcoming Events

by [Carl Jorgensen](#), Secretary, Montreal Centre

Wednesday, March 6, 7:30 – 11:00 pm: Members Arbo Clubhouse at the Morgan Arboretum Conservation Centre, 150 Chemin des Pins, Sainte-Anne-de-Bellevue. Observing with your own telescope or binoculars(weather permitting). The Bellevue Observatory is closed.

Friday, March 8, 7:30 – 11:00 pm: Members observing at the Morgan Arboretum Conservation Centre. Members only. Talk with other members, show & tell, etc.. Maybe a short presentation by a member. Observing with your own telescope or binoculars (weather permitting). The Bellevue Observatory is closed.

Wednesday March 13, 7:30 – 11:00 pm: Members observing at the Morgan Arboretum Conservation Centre. Observing with your own telescope or binoculars(weather permitting). The Bellevue Observatory is closed.

Friday, March 15, 7:30 – 9:30 pm: Public Event (Talk by Pierre Paquette)at John Abbott College Penfield–204, 21275 Rue Lake-shore, Saint-Anne-de-Bellevue. Doors Open at 7:30. Talk by Pierre Paquette "Aurora 360 - A new way to see the Northern Lights" at 8:00 pm.

Wednesday, March 20, 7:00 – 9:30 pm: Members Library Clubhouse at John Abbott College, H-355, 21275 Rue Lake-shore. Members only. Can Borrow & Return books. Talk with other members, show & tell, etc.. Short presentation on the RSpec spectral analysis from JAC students using Montreal Centre equipment.

Saturday, March 23, 7:30 – 11:00 pm: Members Arbo Clubhouse at the Morgan Arboretum Conservation Center. Members only. Talk with other members, show & tell, etc.. Maybe a short presentation by a member. Observing with your own telescope or binoculars (weather permitting). The Bellevue Observatory is closed.

Wednesday, March 27, 7:30 – 11:00 pm: Members Winter Movie Night at John Abbott College, H-355, 21275 Rue Lake-shore. Movie *First Man*: Story of NASA's mission to land a man on the moon, focusing on Neil Armstrong and the years 1961-1969. A visceral, first-person account, based on the book by James R.

Hansen, the movie will explore the sacrifices and the cost—on Armstrong and on the nation—of one of the most dangerous missions in history.

Thank You to our Sponsors!

by [Madison Chilvers](#), RASC Marketing Coordinator

The Royal Astronomical Society of Canada has a unique partnership with our friends in the astronomy industry. We are now offering companies the distinction of becoming a charter sponsor of the RASC, Canada's pre-eminent amateur astronomy organization. This offer is available only to those industry leaders who recognize the value in being associated with the amateur astronomy community.

www.rasc.ca/rasc-sponsors.





What's New in the Sky

Members are encouraged to check out the [Northern Skies](#) section of the RASC website. Thanks to Gary Boyle for keeping us all in the know.



The Royal Astronomical Society of Canada
203 – 4920 Dundas St W, Toronto ON M9A 1B7 CANADA
Tel: (416) 924-7973, Fax: (416) 924-2911

Member Service: nationaloffice@rasc.ca

Visit Us at: www.rasc.ca

The *Bulletin* of the Royal Astronomical Society of Canada
is a benefit of membership in the Society.

© 2019 Royal Astronomical Society of Canada