



October 2018 - Volume 13, Number 10

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

► [News @ RASC.ca](#)

News from the Society Office

by [Randy Attwood](#), RASC Executive Director

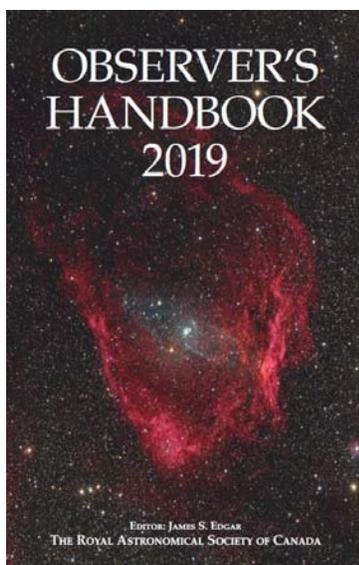
October Holiday- Society Office Hours 🍂

Please note: the RASC Society Office will be closed on **Monday October 8th** for Thanksgiving. Have a safe & happy holiday and clear skies!



Observer's Calendar 2019 Editor: Paul Gray

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!](#)



NEW Item: 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!](#)

Awards Deadline Reminder

The deadline to submit award nominations is fast approaching.

Here is an outline of the awards and their criteria:

CHANT MEDAL The Chant Medal is awarded based on a significant body of work of lasting value to the astronomical community and is named after C.A. Chant, a noted astronomer at the University of Toronto who helped to found the David Dunlap Observatory there.

KEN CHILTON PRIZE Established in memory of Ken Chilton, this prize is awarded for a specific piece of astronomical research or work carried out or published recently.

SERVICE AWARD The Service Award, established in 1959, is awarded to RASC members who have made significant contributions at the National and/or the Centre levels.

SIMON NEWCOMB AWARD The Simon Newcomb Award was established in 1979 for excellence in astronomical writing by an RASC member.

QILAK AWARD Established in 2011, this award is intended to recognize individual Canadian residents or teams of residents who have made an outstanding contribution during a particular time period either to the public understanding and appreciation of astronomy in Canada or to informal astronomy education in Canada and to promote such activities among the members of the sponsoring organizations.

FELLOW OF THE RASC Established in 2013, this award is given to recognize long-term commitment to the Society.

Please note: the deadline for submitting awards is 2018, December 31 not November 30 as stated in last month's *Bulletin* article.

Nominations for awards should be sent to the Awards Committee at awards20000@rasc.ca.

For more information on the awards nominations, see [RASC Awards](#).

RASC 150 Working Group

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

The weather is crisper as we enter the season of autumnal skies in our year of sesquicentennial celebrations. You are invited, as always, to check out our programs at www.rasc.ca/2018. Several projects are highlighted below.

RASC Mosaic

Those who attended this year's GA were lucky enough to see the RASC 2018 mosaic unveiled—now all members can see, and use it! The banner combines

images of your Centre's activities with those from across the country to form a visual representation across time and space (past–present–*future*) of the Society's style of astronomy. We are most grateful for your responses without which the mosaic could never have come into being! The banner in various formats is now available for download at www.rasc.ca/rasc-2018-mosaic.

Imagining the Skies

Our 150th astrophotography, sketching and creative arts contest is still open for submissions, and voting! Works can be entered, viewed, and voted on at the contest website <https://imaginingtheskies.ca/>. An inspiring variety of media are represented, and you may discover hidden talents possessed by your RASC neighbours in representing the cosmos. If you've never entered an astronomical art contest, now's the time! What better opportunity, than the Society's sesquicentennial.

Viewing the Moon Across Time

Have you ever wondered what it would be like to observe alongside our founding members in 1868-1869? If there was a way to stand under the vault of the sky alongside Andrew Elvins and his colleagues, it would make for memorable participation in the RASC sesquicentennial. How much can we do without a working steampunk time machine? Quite a lot, it turns out. If you're intrigued, check out the instructions and resources at www.rasc.ca/viewing-moon-across-time.

Cultural Connections—Science and Art: 150 Years of Astronomical Imagery

Inspired by Cultural Connections (www.rasc.ca/cultural-connections-resources) to partner with other local cultural intuitions, the Kitchener–Waterloo Centre has collaborated with the Homer Watson House & Gallery to present *Royal Astronomical Society of Canada || Science and Art: 150 Years of Astronomical Imagery*. The show features images spanning the entire period (some drawn from the RASC Archives), antique astrosketching tools of the sort used by astronomers when the RASC was young, and astrophotos by K-W Centre members. Jeff Dawkins' work is receiving special focus. And, for the first time ever, the original

painting of the 1913 Great Meteor Procession by Gustav Hahn will be displayed next to the coloured print published that year in JRASC. The show runs to October 21. For more details, see www.homerwatson.on.ca/current-exhibition/ .

RASC Astrophotography Certificates

by **James Edgar**, Vice-Chair Astroimaging Committee

Astroimagers - earn a certificate while you learn your craft. You can apply for three different certificates: Wide Field, Solar System, and Deep Sky. A certificate suitable for framing comes with a showcase of your winning photos on the RASC Zenfolio site. Have a look at some of the certificate earners' great images at <http://rascastroimaging.zenfolio.com>.

Go to www.rasc.ca/astro-imaging-certificate for the different category requirements and submission details.

Note from the Education and Outreach Committee

by **Curt Nason**, Education & Public Outreach Committee

The EPO Committee has the mandate to provide members with materials for outreach and education. This summer the committee produced a brochure for the Mars opposition, which is available for downloading from the RASC website under Observing -> Special Projects. Also, a subset of the IYA astronomy cards was revised, printed and shipped directly to those Centres that requested them. Hopefully, most were received in time for the National Star Party. The subset includes Jupiter, Saturn, the Moon and the Sun. These are intended as keepsakes after a person has viewed the object through your telescope, but they are also useful for pointing out features to look for before observing it. For first time observers, let them have that WOW moment of discovery and then point out a feature for a second look. The back of the cards includes links to the RASC Facebook page and the Discover the Universe website, as well as a hashtag for

each object. It would be helpful to make the people aware of these features when you hand them the card.

We continue to provide Star Finders (planispheres) and Moon Gazer's Guides, which are available in French or English, and Getting Started in Astronomy pamphlets. The first two are great for handouts when visiting schools and youth groups, especially if your presentation includes the constellations (Star Finders) or the solar system (Moon Gazer's Guides). If you hand out the Star Finders we recommend that you take a few minutes to explain how to use them. The Getting Started in Astronomy pamphlets are great handouts at exhibitions. All of these and the astronomy cards are available through the National Office for the cost of shipping only. When you perform an outreach event, please report it via the Outreach Event Reporting tab at the bottom of the RASC website Home page.

Member Discount for SkyTools 3

by **Blake Nancarrow**, RASC, Toronto Centre

The special member discount for SkyTools 3 Standard and SkyTools 3 Professional planning software is concluded. With the recent SkyTools 4 Imaging release and the impending launch of SkyTools 4 Visual, our program is in a holding pattern. ST4V should be released in the fall of 2018, possibly over the winter. Once it is officially released, we will resume a discounted purchase program for RASC members. Contact Blake Nancarrow (astronomy@computer-ease.com) for more information.

National Council, CASCA, Asteroids with a Canadian Connection

by **Eric Briggs**, National Council Co-chair

RASC National Council

The RASC National Council met by teleconference on September 16th. The National Council's role is to advise the Society's Board and Committees in matters of interest to Centres and the Society in general and to help facilitate the Society's

goals and mission. Each RASC centre should be represented on the council. The reports circulated at the September 16th meeting from RASC officers and committees have been uploaded to the website members section:

<https://rasc.ca/council/reports/2018>

Canadian Astronomical Society Newsletter

Le bulletin d'information de la Société Canadienne d'Astronomie (CASCA) a été publié sur l'équinoxe d'automne. Ce journal comprend des mises à jour d'astronomes universitaires canadiens sur des projets nationaux et internationaux. Particulièrement, CASCA aimerait offrir à votre communauté ou organisation la possibilité d'accueillir une conférence Westar. Cette programme offre aux communautés isolées (Dans ce cas, Ashcroft et Cache Creek à l'intérieur de la Colombie-Britannique) l'occasion d'entendre parler du meilleur de l'astronomie. Dans le cadre de son engagement à partager la science avec le public, CASCA fournira le financement nécessaire à un astronome canadien distingué pour visiter la communauté pour un séjour de deux jours.

<http://casca.ca/?p=10751>

Asteroids with Canadian Connections

The following has been added to the list of asteroids with Canadian connections:

(516560) Annapolisroyal = 2006 XL67

Discovered 2006 Dec. 12 by D. D. Balam at Mauna Kea.

The Town of Annapolis Royal, Nova Scotia, is recognized as the cradle of the Canadian nation for its prominent role in the country's early origins and remains influential as a leader in heritage stewardship and preservation.

<https://rasc.ca/asteroid/516560>

The Magic of Keji

by **Dave Chapman**, RASC Halifax



At September's RASC Halifax meeting, member Jerry Black revealed his latest time-lapse offering: "The Magic of Keji at Night" featuring original piano music by Rachel LaFond: vimeo.com/290203445

The video was shot in Kejimkujik Dark-Sky Preserve at backcountry site 15, a favourite spot for many Keji visitors. I've been there with my family countless times, and in the last two Septembers my wife and I camped there with Jerry and Judy Black to create events I call the 1st and 2nd Big Muise Island Star Parties. We must paddle our canoes out there, and we allow ourselves only minimal equipment.

The night of 2018 September 9/10 was remarkable: no Moon, no wind, not too chilly, quiet, and dark: I measured readings of 21.85 to 21.89 on my Sky Quality Meter at 4:00 a.m. Jerry's video evokes pleasant memories of the entire night! We hope you enjoy it.

The music is also special: Rachel LaFond is a young American composer, classically trained, who I met by chance at a family wedding. She played piano for us one

afternoon, and I was drawn to her playing. She now lives in New Zealand, where she is following her dream.

It struck me that her music might be a good pairing with a Jerry Black time-lapse. I'm so pleased that two friends of mine who live on opposite sides of the planet were able to collaborate on this way, even though they've never met!

Please take a few minutes to watch Jerry's video and his Vimeo channel:

<https://vimeo.com/album/5424854>

Also, please visit Rachel's website: www.rachellafond.com/albums/ (you can also find her on Spotify).

The Yukon Centre's New Observatory

by [Charles Ennis](#), RASC, 2nd VP

Back in September 2016 members of the Yukon Astronomical Society stood on a hillside with me in Takhini Springs, south of Whitehorse, and told me how they intended to build an observatory there. Two years less three weeks later it gave me great pleasure to stand in that same spot to see them open that observatory.



Figure 1: The Yukon Centre's observatory in Takhini Spring nearing completion.

The Yukon Centre received just over \$50,000 through Yukon's Community Development Fund to build this observatory. In September they'll begin the construction of a warm room/classroom on the concrete pad next to the observatory to facilitate operations in winter. The property is part of a hot springs resort owned by Garry Umbrich, who purchased a used 3-metre-diameter dome observatory 15 years ago and set aside waiting for someone to come along and show him what to do with it. When the Yukon Astronomical Society was formed three years ago they entered negotiations with Umbrich, who donated the land the observatory is situated on and gave them this used dome. Two years ago, the concrete pad was poured. The original dome understructure was set aside and a new dome base built for the refurbished dome and a washroom facility built on site. The dome houses an 11-inch Celestron Schmidt Cassegrain telescope. Several enthusiastic members of the Yukon Centre volunteered for many hours of work parties and as a result they made the observatory opening event possible in time for the Centre's annual Star Party which started 2018 August 24.



Figure2: L to R- Charles Ennis, David Millar, and Chris Lomas in the interior of the observatory

The site is far enough from Whitehorse to be free of any light pollution and the long winter nights are ideal for projects such as observing long exoplanet transits. Zsohar hopes that the public and local schools will use the facility to further astronomical education.



Figure 3: L to R- Charles Ennis (2nd VP RASC), Vikki Zsohar (Yukon Centre President), Paolo Gallina (MLA Porter Creek Centre), and Gary Umbrich (property owner) cutting the ribbon for the grand opening August 24.

Food for the Soul

by **Paul Heath**, RASC, Halifax Centre

I would like to announce that my first book,

Food for the Soul: Poems for Star Gazers

is now on sale on amazon.com, both paper back and e-book.

Nana and the Night Sky: A Profile of RASC Member, Colleen O'Hare

by **Zena Ryder**, RASC, Okanagan Centre

It's 1964. Nine-year-old Colleen gets up for breakfast, and finds her mom still in her nightgown, fast asleep on the brown chesterfield in the living room. Her mom had gotten up before dawn, as she had done many times before. Not because she'd been tending to the needs of Colleen or one of her five siblings — but

because she had been bitten by the bug of astronomy. Enthralled by the 1960's space program, Colleen's mom would wake up hours before everyone else in the household to witness the drama of a NASA launch on TV, hoping that *this* time it would be successful. A couple of days later, she would see the exciting new pictures of the moon's surface — its craters, valleys, and mountains — transmitted from 380,000 kilometres, all the way to the corner of her living room in Surrey, B.C.

Although Colleen grew up with a mother who was into astronomy, she doesn't remember stargazing as a child. "Why didn't I ever think to go outside and look at the stars?!... Well, you didn't argue with bedtime!"

Colleen didn't find her passion for astronomy until later in life. Science had always interested her, though, and she briefly thought about becoming a doctor — but decided she didn't have the stomach for it. Instead, she took medical laboratory technology at the BC Institute of Technology in the 1970s, satisfying both her interest in science and her desire to work in a medical profession. She worked as a medical lab technologist and then as a medical office assistant until 2005.

Colleen went through a divorce around this time. One of her adult daughters was already married, and the other about to leave home too. Colleen was ready for a new chapter in her life. She spotted a small ad in the paper inviting guests to a meeting of the Okanagan Centre RASC. Since she was interested in science, and thinking that she knew quite a bit about astronomy, she decided to go.

Colleen says she was welcomed into "a group that was intelligent, kind, knowledgeable, helpful, and totally into astronomy. I heard words I had never heard before and they patiently explained them to me. I realized two things — that I knew hardly anything about astronomy and that I wanted to know everything!"

Colleen became a member that same night and bought her first beginners' astronomy book right away. She then began participating in Sidewalk Astronomy events. She enjoyed introducing the wonders of the night sky to members of the public who thought they were just popping to the mall for coffee.

She learned from other club members, read voraciously, and took astronomy

courses. It wasn't long before she joined club members giving talks in schools. Initially, she silently held up pictures, while someone else did the talking. But her courage grew and she started saying a few words. Soon she was leading talks herself, and eventually became the Kelowna outreach coordinator for the Okanagan Centre. She can reflect with satisfaction that she fulfilled her goal of personal growth after her divorce.

Colleen now spends much of her time infecting others with the astronomy bug, in her outreach role. Her enthusiasm is contagious, and she can educate and inspire a rambunctious crowd of elementary school kids or a quiet group of seniors.

During one evening of public viewing, Colleen recalls an elderly woman, whose vision was failing, saying that she wanted to see as many stars as possible — before she could no longer see any at all. The evening was cloudy, but she and Colleen persisted. They stayed out as late possible, glimpsing star after star whenever there was a gap in the clouds. This episode reminded Colleen how precious it is to be able to see — even the “ordinary” stars.

Also lodged in Colleen's memory is a fidgety, somewhat disruptive third grader. He appeared not to be paying attention to her presentation. But it turned out he knew all there is to know about neutron stars and was as fascinated by astronomy as Colleen!

Colleen now fully appreciates the excitement her mom felt watching the NASA launches more than 50 years ago. And, these days, Colleen is passing the astronomy bug on to the next generation of her family.

A few months ago, the night Colleen's second grandchild was born, Colleen took care of her first grandchild, three year old Sage, during the birth. It was a chilly night, and Sage was holding her Nana's hand as they walked outside in the crisp air. Sage exclaimed as she looked up at the night sky, and invited her Nana to look with her at the beautiful "twinkly stars".

There are billions of stars in our vast universe... but only one night when Colleen and Sage hold hands as a new baby is born into their family of stargazers.

Many thanks to Colleen O'Hare, Donna Nelson, and Carol Lynn Schafer.

RASC Montreal Centre Upcoming Events

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

Wednesday, October 3, 7:30 – 11:00 pm: Members observing at the Morgan Arboretum Conservation Centre. The Bellevue Observatory will be open, but you can also bring your own telescope or binoculars (weather permitting).

Saturday, October 6, 7:30 – 11:00 pm: Members offsite observing at WoollyWoods 45 Rang Saint-Antoine, Saint Chrysostome (weather permitting).

Wednesday, October 10, 7:30 – 11:00 pm: Members observing at the Morgan Arboretum Conservation Centre. The Bellevue Observatory will be open, but you can also bring your own telescope or binoculars (weather permitting).

Saturday, October 13, 7:30 – 11:00 pm: Public Event, Fall International Astronomy Day at the Morgan Arboretum. Presentation at 8 pm, Observing afterwards (weather permitting).

Wednesday, October 17, 7:30 – 11:00 pm: Members observing at the Morgan Arboretum Conservation Centre. The Bellevue Observatory will be open, but you can also bring your own telescope or binoculars (weather permitting).

Wednesday, October 24, 7:30 – 11:00 pm: Members Library Clubhouse at John Abbott College Room H355. Presentation at 7:30 pm. RASC members only. Can borrow and return books. Talk with other members, show and tell, etc..

Friday, October 26, 7:30 – 11:00 pm: Public Event "Halloween Under the Stars" at the Morgan Arboretum. "Spooky & Starry Scavenger Hunt" at 6:30 pm. Presentation following Scavenger Hunt. Observe the Moon Night after the presentation (weather permitting).

Wednesday, October 31, 7:30 – 11:00 pm: Members observing at the Morgan Arboretum Conservation Center. The Bellevue Observatory will be open, but you can also bring your own telescope or binoculars (weather permitting).

Thank You to our Sponsors!

by **Julia Neeser**, 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.



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