



# Flight

The Journal for Canadian Aviation Enthusiasts  
Le magazine des passionnés d'aviation canadiens

JULY/AUGUST 2024

## SUSTAINABLE AVIATION RISING

How Sealand integrated  
its electric airplane



**THE NEXT GENERATION**  
*COPA'S 2024 SCHOLARSHIP WINNERS*

**MEET COPA'S NEW BOARD MEMBERS**  
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**PROFIL D'UN MEMBRE**  
*EMILIE PERRON*



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# 26

**ON THE COVER:** Photographer Tony Puerzer captures Sealand Flight's Pipistrel Velis Electro — Canada's first-ever commercial electric aircraft. Above: zero-emissions flight training begins in the scenic skies of Campbell River, British Columbia.

## PRESIDENT'S CORNER

**4 SUSTAINABLE AVIATION  
MEANS MORE THAN JUST  
THINKING ABOUT THE  
ENVIRONMENT**

**5 L'AVIATION DURABLE, C'EST  
PLUS QU'UNE SIMPLE RÉFLEXION  
SUR L'ENVIRONNEMENT**

## COMMUNITY

**6 LETTERS TO THE EDITOR**

**8 MEMBER PROFILE: EMILIE  
PERRON**

**9 PROFIL D'UN MEMBRE : EMILIE  
PERRON**

**10 MEET THE 2024 COPA  
SCHOLARSHIP WINNERS**

**12 MEET COPA'S NEW BOARD  
MEMBERS**

**34 WHY COPA MATTERS**

## OWNER & MAINTENANCE

**14 AIRCRAFT RENTING  
STRATEGIES**

## ADVOCACY

**16 UNDERSTANDING AI IN  
AVIATION**

**17 FLIGHT TRAINING  
IN CANADA**

## SPECIALTY FLYING

**20 COWBOYS OF THE SKIES**

**21 MODERN DAY BUSH FLYING**

**22 WHY WOULD I FLY AN  
80-YEAR-OLD AIRCRAFT?**

**23 ALTERNATIVES FOR FLIGHT,  
ULTRALIGHTS AND HOMEBUILTS**

**24 RCAF CENTENNIAL  
ANNIVERSARY, THE SNOWBIRDS**

**26 THE RISE OF SUSTAINABLE  
AVIATION**

## TRAVEL & LIFESTYLE

**28 CROSS COUNTRY PLANS,  
TALES OF ADVENTURE AND  
GRIT**

# SUSTAINABLE AVIATION MEANS MORE THAN JUST THINKING ABOUT THE ENVIRONMENT



**A term that circulates frequently in the aviation community and the industry at large is “sustainable aviation”. That term is often connected to alternate aircraft fuels, carbon footprint reduction, electric aircraft, and efforts to reduce the environmental impact. These are important points to consider as we move forward but I like to think of sustainability to mean much more than that.**

Sustainability means a state where we meet the needs of the present without sacrificing the needs of the future. There are other slightly differing politically charged definitions, but that

is not the purpose of my article.

From the perspective of private aviation, what we need is the ability to continue to fly our personal aircraft today, but be assured that we will still have private aviation in the future. I am not specifically meaning the same types of aircraft (technology is evolving rapidly), but the ability to still have private aviation as a tool at our disposal and our enjoyment. We want to see the advancement of technology and the delivery of the promised efficiencies. We also need to ensure that there are people trained to meet the future needs, and that there are airports and infrastructure in place for the future generation of Canadian aviators.

In essence, members of COPA are the self-proclaimed stewards of Canada's aviation industry of the future. We, the members of COPA, are responsible to make sure that private aviation and General Aviation continues to exist for future generations in Canada. COPA is where sustainable aviation in Canada starts.

General Aviation in Canada is the training ground for all the pilots and aircraft maintenance engineers (AME)

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*The members of COPA are responsible to make sure that private aviation and General Aviation continues to exist for future generations in Canada.*

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in Canada. Every major airport in Canada started as a small General Aviation airport. Without General Aviation today, there will be no aviation industry in Canada tomorrow. To prove my point, the reason we have so many foreign pilots training in Canada today is because in many countries General Aviation does not exist.

I thank you for being a member of COPA, and I ask you to share this message (and the magazine) with others you know who care about the future of aviation in Canada to consider joining us. COPA is the only national organization in Canada that represents the interests of General Aviation, and our strength is our membership. ✈️

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# L'AVIATION DURABLE, C'EST PLUS QU'UNE SIMPLE RÉFLEXION SUR L'ENVIRONNEMENT

L'expression "aviation durable" circule fréquemment dans la communauté aéronautique et dans l'industrie en général. Cette expression est souvent liée aux carburants alternatifs, à la réduction de l'empreinte carbone, aux avions électriques et aux efforts visant à réduire l'impact sur l'environnement. Il s'agit là de points importants à prendre en compte pour aller de l'avant, mais j'aime à penser que la durabilité signifie bien plus que cela.

La durabilité est un état dans lequel nous répondons aux besoins du présent sans sacrifier les besoins de l'avenir. Il existe d'autres définitions légèrement différentes et politiquement chargées, mais ce n'est pas l'objet de mon article.

Du point de vue de l'aviation privée, ce dont nous avons besoin, c'est de pouvoir continuer à piloter nos avions personnels aujourd'hui, tout en étant assurés que l'aviation privée existera toujours à l'avenir. Je ne parle pas spécifiquement des mêmes types d'aéronefs (la technologie évolue rapidement), mais de la possibilité de continuer à utiliser l'aviation privée comme un outil à notre disposition et pour notre plaisir. Nous voulons que la technologie progresse et que les gains d'efficacité promis se concrétisent. Nous devons également veiller à ce qu'il y ait des personnes formées pour répondre aux besoins futurs, et à ce qu'il y ait des aéroports et des infrastructures en place pour la future génération d'aviateurs canadiens.

Par essence, les membres de la COPA sont les gardiens autoproclamés de l'avenir de l'industrie aéronautique canadienne. Nous, les membres de la COPA, avons la responsabilité de veill-

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*Les membres de la COPA sont les gardiens autoproclamés de l'avenir de l'industrie aéronautique canadienne.*

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er à ce que l'aviation privée et l'aviation générale continuent d'exister pour les générations futures au Canada. Si vous êtes membre de la COPA aujourd'hui, c'est pour veiller à ce qu'il y ait une industrie aéronautique au Canada pour demain. La COPA est le point de départ de l'aviation durable au Canada.

L'aviation générale au Canada est le terrain d'entraînement de tous les pilotes et techniciens d'entretien d'aéronefs (TEA) au Canada. Tous les grands aéroports du Canada ont d'abord été des petits aéroports d'aviation générale. Sans l'aviation générale aujourd'hui, il n'y aura pas d'industrie aéronautique au Canada demain. Pour prouver ce que j'avance, la raison pour laquelle nous avons tant de pilotes étrangers qui s'entraînent au Canada aujourd'hui est que dans de nombreux pays, l'aviation générale n'existe pas.

Je vous remercie d'être membre de la COPA et je vous demande de partager ce message (et le magazine) avec d'autres personnes que vous connaissez et qui ont à cœur l'avenir de l'aviation au Canada, afin qu'elles envisagent de se joindre à nous. La COPA est la seule organisation nationale au Canada qui représente les intérêts de l'aviation générale, et notre force réside dans nos membres. ✈️



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## LETTERS TO THE EDITOR

Have a response to provide to the editor on articles or opinion pieces? Submit to us at [communications@copanational.org](mailto:communications@copanational.org). In some cases, we offer an opportunity for our contributors to provide clarification or add commentary.

### COMMENTS ON THE MAY/JUNE MAGAZINE ISSUE

Response to Mark van Berkel's, "Are we the last of our kind?"

**I recently received my copy of the May/June COPA Flight magazine. I truly appreciate COPA's commitment to providing this bi-monthly communication platform. Know that it does get read!**

I found your article "Are we the last of our Kind" particularly interesting. As the COPA FLIGHT 41 / EAA Chapter 1126 chair here in Timmins I share your perspective and thoughts on how we can and should reverse the trend. On the following page member Allan Stoller expressed his concerns with regards to the affordability and what he considers to be the end of an era. His frustrations are some that many would share but may not chime in on.

While I will agree that the cost of GA in Canada and around the world has increased. So has many other sports and activities that we might say compete with aviation. One solution we've found is shared ownership. This enables pilots to own a portion of an aircraft and the expenses that come with it. More often a much higher caliber or quality aircraft can be acquired with a group than they would otherwise be able to afford on their own. Many may want us to believe that partnerships are difficult to manage, and that too often scheduling conflicts will take away the benefits or spirit of shared ownership. From our experience this has not been the case. In fact, the opposite has been true. Some are early risers and just

want to clock in an hour before work. While others are retired and have the flexibility of choosing a mid-week day. And still others only want it to travel a couple of times a month which leaves numerous other available days for the rest. Like in any group there are those who take charge and help the group with tasks and managing the details that involve proper care and maintenance. A structure within the group is wise as is a partnership agreement. Like any group/club having good communication channels is key.

The shared model also opens the opportunity for those looking to obtain their PPL with the help of a freelance instructor. Although TC needs to consider expanding this access and encourage this option as more FTU's are closing up shop than will ever be starting up. Any inquiries to TC expressing interest in establishing FTU up-start better have patience and time to spare. The common thread with anything government managed or regulated entity has not bypassed General Aviation. And this at a time when the aviation industry is suffering from a lack of succession planning on all fronts. The time for making GA easier and more accessible has never been more important. The available remote ground school platforms, video seminars, zoom... and others should all be considered as legitimate means or qualified methods. I'm not saying an FTU is not required. I would say that for those who are not living in Oshawa or the GTA or Winnipeg may not have an alternative. Or

the alternative might be foregoing the thought of getting their PPL. Taking more people out of an eventual commercial avenue or prospect.

I just wanted to share some of what we are seeing in the way of creating small victories. Some of what is in fact, working. Make no mistake that leading any group in today's world is not easy. Competition with Netflix and other time burning activities is fierce. Service and volunteer clubs/organizations are all suffering from a shrinking membership and a lack of engagement. In many cases 10 per cent of the members to 90 per cent of the work! The problem is not unique to aviation. But we must push on. Onward and upward.

My goal as president of our club is to inspire more members to take on tasks that will see us grow our membership. Find ways to engage them without a "meeting" but rather an activity or event that comes across as non-committal using a softer approach. We can all think of things that will take the place of an official meeting but can get logged as a club benefit and our achieving goals.

Wishing you all of the best in your role at COPA and we will continue to do our part in seeing General Aviation in Canada and Northern Ontario not succumb to the proverbial "writing on the wall" But rather, buck the trend. 🛩️

**Rob Racine, President  
COPA Flight 41 - Timmins Flying  
Club/EAA Chapter 1126  
"The Lloyd Richards Chapter"**





# WHY SUPPORT COPA?

TO ENABLE THE FUTURE OF GENERAL AVIATION

While there is no one-size-fits-all reason to be a **COPA** member, the underlying goal is to protect every Canadian pilot's Freedom to Fly.



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# MEMBER PROFILE: EMILIE PERRON

## LIFE-CHANGING FIRST FLIGHT TRIGGERS INCREDIBLE PERSONAL JOURNEY

**Emilie Perron, a woman with an unwavering fascination for the sky, airplanes and flight, always dreamed about becoming a pilot and perhaps even an astronaut. Still, she thought of this aspiration as audacious, almost unobtainable. At the age of 16, an unexpected flight in a Piper Super Cub with COPA 23 Flight member Ron Miller set her journey in motion.**

Perron remembers that September 2020 day like it was yesterday: The impromptu invitation, arriving at the airport in her school uniform, having not planned for a flight that day, and then Miller taking her up for her first flight. This experience ignited a spark within her and propelled her on her journey to become a pilot. Embarking on her training in 2021, she passed her private pilot licence check ride just a year later, in August 2022.

What paved the way for Perron to embark on this life-changing journey? It was being awarded COPA's Neil J. Armstrong Ab-Initio Scholarship. Shortly after her initial flights, Miller and fellow pilot Bill Carswell saw the spark in her eye. They recognized her skill with the controls and eagerness to learn more during her familiarization flights. They encouraged her and helped her complete the scholarship application. When she learned she had won, she was ecstatic but almost couldn't believe it. "I called to make sure that I wasn't just a finalist.

"I don't know what my life would have looked like without COPA or aviation," Perron mused. "Without Bill and Ron's belief in my abilities, I would never have become a pilot. I quickly discovered all that COPA had to offer and I am very



proud to be a member of a club with such a welcoming group of people."

While Perron knew that she wanted to fly, becoming a pilot cemented her aim of a career in aviation. "As a high school student at the time, I was a bit lost and looking for a path forward with my post-secondary education," she continued. "Receiving the scholarship and pursuing my PPL, it was clear to me that I would go into aerospace engineering."

Heading into her third year at Polytechnique Montréal, Perron continues to volunteer with COPA, sharing her experiences with friends and fellow students, attending airport events, and contributing to a team at her school building remotely operated cargo airplanes. Hailing from North Bay, Ont., she works to finance her engineering education, a testament to her tenacity. Her active involvement in sports, particularly in male-dominated hockey, soccer and American football, taught her how to overcome adversity. As she progressed through the pilot's training regimen, Perron's perseverance and grit only grew stronger. "Flying helped me grow into a whole new person," she emphasized. "After that first flight, my life took a dif-

▲ Emilie Perron received COPA's Neil J. Armstrong Ab-Initio Scholarship.

ferent direction, and I knew I wanted to work in aviation and, hopefully, one day build my own airplanes." Last summer she went back home to North Bay to fly. This year, she has plans to continue her flying journey in Montreal.

The support and selflessness of COPA members made an indelible impression on Perron, one that drives her to advocate for aviation. "I have had immense support from pilots in my life — many of them COPA members — and they have never asked for anything in return. As a future engineer and pilot, I hope to find ways to influence and modernize aviation in my work, and to continue to pass on my experience to the next generation. Being a part of someone else's success story would be incredible," she concluded.

As to the future, flying is a fixture, but Perron has also developed a keen interest in RPAS, Remotely Piloted Aircraft Systems, which she says is a great way to be introduced to flying and for people who may have health issues and don't have the time or money to obtain their PPL. ✈️



# PROFIL D'UN MEMBRE : EMILIE PERRON

## UN PREMIER VOL QUI CHANGE LA VIE ET DÉCLENCHE UN INCROYABLE VOYAGE PERSONNEL

**Émilie Perron, une femme avec une fascination inébranlable pour le ciel, les avions et le vol, a toujours rêvé de devenir pilote et peut-être même astronaute. Pourtant, elle considérait cette aspiration comme audacieuse, presque inaccessible. À l'âge de 16 ans, un vol inattendu dans un Piper Super Cub avec Ron Miller, membre du club de vol 23 de la COPA, a mis son voyage en route.**

Mme Perron se souvient de ce jour de septembre 2020 comme si c'était hier : L'invitation impromptue, l'arrivée à l'aéroport en uniforme d'écolière, n'ayant pas prévu de vol ce jour-là, et Miller qui l'a emmenée pour son premier vol. Cette expérience a allumé une étincelle en elle et l'a propulsée sur le chemin de la formation de pilote. Elle a commencé sa formation en 2021 et a passé son examen de licence de pilote privé un an plus tard, en août 2022.

Qu'est-ce qui a permis à Perron de s'embarquer dans ce voyage qui a changé sa vie ? Elle a reçu la bourse Ab-Initio Neil J. Armstrong du COPA. Peu après ses premiers vols, M. Miller et son collègue pilote Bill Carswell ont vu l'étincelle dans ses yeux. Ils ont reconnu son habileté avec les commandes et son désir d'en apprendre davantage au cours de ses vols de familiarisation. Ils l'ont encouragée et l'ont aidée à remplir le formulaire de demande de bourse. Lorsqu'elle a appris qu'elle avait gagné, elle était folle de joie, mais n'arrivait pas à y croire. "J'ai appelé pour m'assurer que je n'étais pas seulement finaliste.

"Je ne sais pas à quoi ma vie aurait ressemblé sans la COPA ou l'aviation", se souvient Mme Perron. "Sans la confiance de Bill et de Ron en mes capacités,



▲ Grant Bailey, Emilie Perron et l'instructeur Andy Smith à North Bay.

ités, je ne serais jamais devenu pilote. J'ai rapidement découvert tout ce que la COPA avait à offrir et je suis très fière d'être membre d'un club avec un groupe de personnes aussi accueillantes.

Alors que Perron savait qu'elle voulait voler, le fait de devenir pilote a cimenté son objectif de carrière dans l'aviation. "En tant que lycéenne à l'époque, j'étais un peu perdue et je cherchais une voie à suivre pour mes études postsecondaires", a-t-elle poursuivi. "En recevant la bourse et en obtenant mon PPL, il était clair pour moi que je m'orienterais vers l'ingénierie aérospatiale".

À l'aube de sa troisième année à Polytechnique Montréal, Mme Perron continue de faire du bénévolat à la COPA, partageant ses expériences avec ses amis et ses camarades de classe, participant à des événements à l'aéroport et contribuant à une équipe de son école qui construit des avions-cargos télécommandés. Originaire de North Bay, en Ontario, elle travaille pour financer ses études d'ingénieur, ce qui témoigne de sa ténacité. Sa partici-

ipation active aux sports, en particulier au hockey, au football et au football américain, dominés par les hommes, lui a appris à surmonter l'adversité. Au fur et à mesure qu'elle progressait dans le programme d'entraînement des pilotes, la persévérance et le courage de Mme Perron n'ont fait que se renforcer. "Vol-er m'a permis de devenir une toute nouvelle personne", souligne-t-elle. "Après ce premier vol, ma vie a pris une autre direction et j'ai su que je voulais travailler dans l'aviation et, avec un peu de chance, construire un jour mes propres avions. L'été dernier, elle est retournée chez elle, à North Bay, pour voler. Cette année, elle prévoit de poursuivre son voyage en avion à Montréal.

Le soutien et l'altruisme des membres de la COPA ont laissé une impression indélébile sur Mme Perron, une impression qui la pousse à défendre l'aviation. "J'ai bénéficié d'un soutien immense de la part de pilotes dans ma vie - dont beaucoup sont membres de la COPA - et ils n'ont jamais rien demandé en retour. En tant que future ingénieure et pilote, j'espère trouver des moyens d'influencer et de moderniser l'aviation dans mon travail, et de continuer à transmettre mon expérience à la prochaine génération. Faire partie de l'histoire de la réussite de quelqu'un d'autre serait incroyable", conclut-elle.

Pour ce qui est de l'avenir, l'aviation est une évidence, mais Mme Perron a également développé un vif intérêt pour les SATP (système d'aéronefs té), qui, selon elle, constituent un excellent moyen de s'initier à l'aviation pour les personnes qui ont des problèmes de santé et qui n'ont ni le temps ni l'argent nécessaires pour obtenir leur PPL. 🛩️

# MEET THE NEXT GENERATION

## COPA SCHOLARSHIP WINNERS

This year, COPA received nearly 800 scholarship applications, reviewed by a dedicated committee of pilots.

Seven exceptional individuals were chosen to receive a combined total of \$32,000 in support for their flight training. Read about these remarkable individuals and their inspiring journeys in aviation below.



▲ Jacob Isotalo.

### COPA NEIL J. ARMSTRONG AB-INITIO SCHOLARSHIP

Since 1995, this primary training scholarship dedicated to 16-to 21-year-olds has provided flight training aid to those who otherwise would not pursue their pilot's licence. Our 2024 recipient, **Jacob Isotalo**, is a 17-year-old student at Loyalist Collegiate and Vocational Institute in Kingston, Ont. His journey in aviation began with drone racing, where he quickly rose to become the junior pilot for Team Canada, ranking top three in Canada and top 100 globally. Additionally, Jacob is deeply involved in his community, mentoring fellow drone racers and actively participating in local aviation clubs. He holds multiple aviation certifications and is a flight instructor at his local Model Aeronautics Association of Canada (MAAC) chapter.

Jacob plans to use the \$14,000 schol-

arship award to pursue and complete his private pilot licence (PPL), enabling him to participate in personal aviation and integrate his passion for flight with his future studies in mechatronics engineering.

### COPA NEW WINGS SCHOLARSHIP

Introduced in 2023, this scholarship is generously supported by Diamond Doors and supports two Canadians 21+ to pursue their primary and advanced flight training goals, respectively.

**Sri Chandrapatla** is an aviation aficionado and aspiring Emergency Response pilot, currently pursuing his PPL and aiming to advance towards a CPL and other endorsements. Sri holds a bachelor's degree in commerce, and an MBA in Finance. He is currently the Territorial Safety Officer with Civil Aviation Search and Rescue Association (CASARA) Yukon, holds a VLOS RPAS Basic certificate, and is also an accred-



▲ Sri Chandrapatla.



▲ Amelia Walsh.

ited ROC-A examiner. Sri volunteers with multiple organizations, including roles with the Abbotsford International Airshow, West-end Community Policing Center, and various disaster relief roles throughout his life in India. With the \$5,000 COPA New Wings Scholarship award, Sri wants to advance his flight training, leveraging his skills to enhance emergency response operations, foster aviation safety, and contribute to the overall growth of General Aviation.

**Amelia Walsh** is a retired Olympic level cyclist and soon-to-be graduate of the University of Waterloo, where she pursued a degree in Geography and Environmental Management with a Minor in Psychology and a Diploma in GIS. Amelia independently completed all ground school studies and quickly earned her PPL from Pacific Flying Club in December 2023. She has logged just shy of 100 hours of flying. Inspired by her father's support, she aims to be a strong female role model for future generations, demonstrating that anything is possible with determination. Amelia is actively involved with The Ninety-Nines, currently with the Waterloo on the Grand chapter, and mentors PPL students. Through the \$2,500 COPA New Wings Scholarship award, Amelia wishes to continue her aviation adventure by obtaining her CPL, Multi-engine rating, Group 1 Instrument rating, Float Rating, and reaching 300 hours total flying time.





▲ Terra Samson.



▲ Andy Shold.



▲ Trevor Meek.

## COPA ADVANCED FLIGHT TRAINING SCHOLARSHIP

This scholarship was first established in 2021 through the generosity of the WestJet Pilots Association.

**Terra Samson's** journey from a snowboard coach to an aspiring medevac pilot is marked by her involvement in the General Aviation community. Obtaining her PPL in October 2020, Terra has logged over 165 hours of flying. She has volunteered extensively at women's shelters, hospitals and animal shelters, and has been instrumental in fundraising for BC Children's Hospital and breast cancer research. Her commitment to service also includes her involvement with the The Ninety-Nines, particularly in the Fly It Forward event, helping to inspire women and girls to pursue aviation. Through the \$2,500 COPA Advanced Flight Training award, Terra plans to obtain her Robinson 44 type rating, aiming to become a dual-rated helicopter and fixed-wing medevac pilot. This certification is vital for her work with BC Wildfire Services and the Helicopter Association of Canada's Mountain Course, enhancing her aerial fire surveys and medevac operations capabilities.

Growing up in an Air Force town on the West Coast, **Andy Shold** spent most of his childhood with his head craned skyward watching the military helicopters, big wings, and fast movers. Currently working with Royco Air Service, he obtained his PPL in April 2020 and has since logged over 270 hours of flight. Andy is active in his local community, regularly participating in events organized by the Three Hills Flying Club and the Red Deer Flying Club (COPA Flight 92). He also volunteers with CASARA. With the \$2,500 scholarship award, Andy received the advanced

flight training necessary to become a proficient agricultural pilot with Royco Air. His goal is to contribute to aerial application and firefighting, leveraging his skills to enhance safety and efficiency in these critical areas.

From a young age, **Trevor Meek's** dream of becoming a pilot was evident. Starting his training at 15, he earned his PPL and Night Rating by age 17, with over 220 flight hours logged. Trevor currently works at CAMX Aerospace where he supports technicians and ensures regulatory inventory. Trevor volunteers with the Sudbury Pilots Association where he advocates for GA and works to counteract restrictive fees and measures. He is spearheading efforts to revive COPA Flight 13 in Sudbury and is organizing a fly-in at Sudbury Airport (CYSB). Trevor has attended EAA AirVenture every year since 2016, where he feels at home among fellow aviation enthusiasts. With the \$2,500 scholarship award, Trevor is eager to advance his skills by obtaining his Instrument Rating. Ultimately, Trevor would like to complete his CPL and ATPL and fly for commercial airlines.



▲ Ifeoluwa Olaitan.

## COPA DRONE PILOT SCHOLARSHIP

This scholarship was first established in 2021 through the generosity of the WestJet Pilots Association.

**Ifeoluwa Olaitan** is a civil/structural engineer from Québec City. With 45 flying hours logged towards his PPL, Ifeoluwa also holds a Basic Operations Drone Licence. His fascination with drones stems from their pivotal role in modern aviation. Ifeoluwa looks to integrate cutting-edge technology into his work, recognizing the transformative potential of drones in building inspections. He utilizes drones to conduct efficient and safe inspections of hard-to-reach areas.

Ifeoluwa actively contributes to the Urban Pilots Network (UPN) and is currently training to be a virtual controller at VATCAN, the Canadian division of Virtual Air Traffic Simulation Network (VATSIM). Ifeoluwa is also part of the Mid-Atlantic Pilots Association, participating in seminars on pilot safety and technology use in aviation. With the support of the COPA Drone Scholarship, Ifeoluwa aims to complete his advanced drone training, enhancing infrastructure inspection while also reducing the risk of work-related accidents.

Thank you to Kyle Fraser, Bill Carswell, Ronan Court, Robert Jaap, Raquel Lincoln, Clive Wilkins, Tim Suderman, and Trekker Armstrong for your countless hours reviewing each scholarship application. Your commitment to this program enables future generations of pilots in Canada.

To those already dreaming of next year's scholarship program, our next scholarship application window will open in January 2025 — keep an eye out for updates! 🇨🇦

# GOVERNANCE: MEET COPA'S NEW BOARD MEMBERS

COPA is pleased to announce its new slate of directors. This governing body will have significant opportunities to contribute towards the future of General Aviation in Canada. Thank you to all who stepped up to help COPA navigate the challenges and opportunities of on our horizon, and thank you to our outgoing board members Jim Bell, Brian Pinsent, David Sprague, Henry Vos, and Ken Zachkewich for your dedication and leadership.

## ROBERT JAAP, DIRECTOR FOR ALBERTA AND THE NORTHWEST TERRITORIES

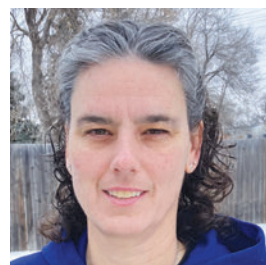


Robert took his first flight the day he was born on the first air ambulance to Coronation Hospital in Alberta in 1975. With nine years as a recreational pilot, he has logged over 650 hours of flying. Joining the Innisfail Flying Club in 2016, Rob has been Co-captain for five years and

Captain for almost four years. Through COPA, he has met many new friends and organized various events.

Rob enjoys flying in the mountains and backcountry in his 1956 Cessna 172. He is passionate about aviation, especially grassroots flying and preserving airstrips. Rob loves sharing his photography and flying experiences, regularly posting pictures on social media.

## BECKY DUECK, DIRECTOR FOR MANITOBA AND NUNAVUT



Becky began flying over 10 years ago, currently owning and flying a Zenair 601. She is an active executive volunteer at the Springfield Flying Club at Lyncrest Airport (CJL5), regularly participating in local activities and taking her Zenair to fly-ins.

An avid Young Eagle pilot, Becky

has flown over 50 young people, often for their first flight, and enjoys mentoring new pilots. When not flying, Becky works as an agricultural research technician, managing field studies. She enjoys the outdoors, travelling, basketball, and family time.

## GRANT BAILEY, SECRETARY OF THE BOARD AND DIRECTOR FOR NORTHERN ONTARIO



Grant is a recreational pilot who has been flying for 48 years. He has logged over 1,500 hours as pilot-in-command and holds both night and seaplane ratings. Grant has owned multiple airplanes including his current airplanes, a 1956 Piper PA-22 Tripacer, a 1946 Aeronca 7AC Champ, and a 1971

Bellanca 7ACA Champ project airplane. He is intimately familiar with Northern Ontario, having lived and worked in both Thunder Bay and North Bay.

Throughout his career, Grant worked for over 40 years in the rail industry as a professional engineer with extensive experience in operations, maintenance, regulatory affairs, and senior management.

## STEPHEN WILCOX, DIRECTOR FOR SOUTHERN ONTARIO



As President of Total Aviation & Airport Solutions, Stephen currently serves as the Airport Manager for the Oshawa Executive Airport. Wilcox was instrumental in the establishment of the Oshawa Airport Hangarminium Condo Corporation, which includes a complex of over 150 hangar units,

taxiways, and common element utility services. He has served as Chair for the Nav Canada Advisory Committee and Chair of the Airport Management Council of Ontario (AMCO). Stephen recently completed a 4-year term on the board of Directors of Airports Council International North America, representing the Canadian Small Airport Caucus.



### CANDACE PARDO, DIRECTOR FOR SASKATCHEWAN



Candace is the Head of Training at Super T Aviation, with a comprehensive background in aviation. She has served as a CFI, ambassador for Elevate Aviation and sits on the Hope Air Advisory Council. With over 3,000 flight hours, Candace is also a Transport Canada Flight Instructor, Authorized Person, Examination Invigilator, and Industry Canada ROC-A Examination Invigilator.

### BILL MAHONEY, PAST CHAIR AND DIRECTOR FOR NEWFOUNDLAND AND LABRADOR



Bill is a pioneer in Newfoundland and Labrador's telecommunications industry, playing a key role in developing cable television and high-speed internet coverage throughout the province. Serving on the COPA board since 2016, Bill was the Chair from 2020 to 2022. He served 26 years in the Royal Canadian Air Force Reserves, holding several staff and command positions before retiring in 2004. He remains active in many civic and military organizations.

Royal Canadian Air Force Reserves, holding several staff and command positions before retiring in 2004. He remains active in many civic and military organizations.

### DR. STEPHEN MCCARTHY, DIRECTOR FOR NOVA SCOTIA, PRINCE EDWARD ISLAND AND NEW BRUNSWICK



Stephen has been a pilot since 1997 and holds a CPL with IFR rating. Along with his wife, Dr. McCarthy owns a Cessna 182Q. Dr. McCarthy is also a Civil Aviation Medical Examiner for Transport Canada.

Stephen will be serving his second term on the COPA Board of

Directors. He acknowledges the ongoing pressures felt by small airports across Canada from various government and private agencies which threaten the viability of these aerodromes. A good example of these challenges is the efforts to redefine visibility requirements for VFR flight.

Stephen looks forward to continuing his efforts to assuage these threats by supporting the advocacy efforts of COPA. His aim is to help Canadian regulatory agencies shift their focus from being solely on commercial carriers and try to enact policies that help and support General aviation across Canada. "We all need COPA's advocacy to prevent further erosion of our freedom to fly."

### ROBERT HAMMOND, DIRECTOR FOR NOVA SCOTIA, PRINCE EDWARD ISLAND, AND NEW BRUNSWICK



Robert holds a CPL with endorsements for Seaplane and Class 1 Group 3 Instrument, amassing 2,460 hours of flight time. He owns a Cessna 150G with two partners and is currently the Co-Captain of COPA Flight 27 in Havelock, N.B.

With over four decades of aviation experience, Robert brings a

wealth of experience to the board. Apart from working as a commercial pilot, he also has ATC experience, having worked as an enroute and terminal controller, and an instructor and approach controller in Baghdad, Iraq.

Robert is committed to working with the board to address the challenges of declining membership and external threats to the freedom to fly. His long-standing commitment to COPA and his active involvement in the aviation community highlight his dedication to addressing these challenges.

COPA welcomes these new directors and look forward to working with them to promote, advance, and preserve Canadians' freedom to fly. ✈️

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# AIRCRAFT RENTING STRATEGIES

BY PHIL LIGHTSTONE

In Canada, there are a total of 37,191 aircraft and rotorcraft as of the end of 2023 and 24,980 licenced or permitted pilots at the end of 2021. Of these aircraft, 34,922 weigh less than 12,500 pounds and 12,611 are in the ultralight and amateur built categories. Over the past decade, the trend has been a rapid decline in both pilots and aircraft. As a result of the pandemic, some flight schools are not keen on taking on recreational pilots or renting aircraft, because they are overloaded with students on the commercial ATP path.

The last report produced by InterVISTAS Consulting and prepared for COPA in 2017, found that the average Canadian General Aviation (GA) aircraft flew roughly 16 hours per year. With such a small number of hours, there is room for aircraft owners to rent their aircraft and help reduce their Total Cost of Ownership (TCO). The challenge for aircraft owners is trusting the renter with their aircraft. Over time, the relationship between the renter and owner will deepen, but will the relationship blossom or just be an interim fling?

For renters, the strategy begins with embedding yourself into your local airport's pilot community. This can be done using an old-school approach, showing up on weekends for coffee and hangar talk. COPA Flight 44, the Buttonville Flying Club, would meet on the weekends for coffee at the Toronto Buttonville Municipal Airport (CYKZ) and using a "have a seat need a seat", rarely would anyone be left behind for the \$100 hamburger. This allowed owners and renters to get to know each other and begin the relationship building process. Aviation social networks are thriving on Facebook, LinkedIn, PilotLife and others, providing an opportunity to interact with pilot owners. It goes without saying that you should join your local COPA Flight chapter.

Renters need to understand the owner's psyche and approach to maintaining their aircraft. Essentially is it safe to fly, or is the owner doing the bare minimum to keep the aircraft airworthy? That is a question of how much maintenance is the AME allowing the owner to differ to subsequent years. Which begs the next question, how competent are the AMEs or apprentices at a specific shop? While Transport Canada (TC) sets standards for licenced shops and mechanics, the quality gap between shops can be quite large. Is the aircraft that you are going to be renting a basic Cessna 172 or a state-of-the-art Cirrus Aircraft SR22 Generation Seven? Two completely different aircraft, designed for different missions



▲ Ryan Isaacs (left) of Cirrus Aircraft and Ed Pasquale at the introduction of the SR22 G7 at RCCLUB in Toronto.

at different costs, with different maintenance needs.

Social media networking is the 2020's replacement to the old-school airport bulletin board. Bulletin boards are an effective way for renters and owners to come together, but takes more time and effort, especially for the renter. Flight Club was launched in 2019 creating a virtual bulletin board but delivers much more. To date, Flight Club has over 70 aircraft owners and 3,040 renters on the platform. The platform provides many capabilities, including billing and credit card payment processing simplifying the collection of the hourly rate, with flexibility allowing the aircraft owner to determine how and when they get paid. In 2023, the platform added an insurance option for aircraft owners. CEO Mat Fernandez reports: "Our member's aircraft on average fly between 150 and 250 hours annually, depending on the owner's desire for their aircraft productivity. We had one pilot/owner who was uncertain about our platform, joined Flight Club, resulting in doubling the hours flown on the aircraft while reducing his out-of-pocket net costs by 50 per cent."

Many aircraft owners take pride in their aircraft, which manifests itself in many ways: clean on the inside and out; hangared; well maintained; avionics panel upgrades; staying ahead of TC's mandatory requirements; ADS-B OUT equipage for U.S. and Canadian airspace; ADS-B IN or SiriusXM Weather; scheduling system; maintenance scheduled in advance; and the list can be almost endless. A new renter needs to be cognizant of these factors and leave the aircraft in the




same condition after a flight as they got it before the flight. The renter adds value through investing time into activities like: updating the avionics databases, washing the aircraft; participating in the annual inspection; keeping track and reporting issues or squawks; and helping clean the hangar. Ideally, flying with the owner to events like AirVenture, SUN n' FUN, COPA fly-ins, airshows, aerospace museums and, of course, the \$100 hamburger.

One challenge faced by many renters is the perception of losing their block time when advising the owner(s) of aircraft defects. A renter who recently purchased a 10-hour block on a Piper aircraft was dismayed by the strong odour of cat urine. The odour was so strong that the renter's wife was not willing to fly in the aircraft. The renter dismissed the issue balancing access to an aircraft with known defects. Interestingly, this is not an issue for the owner of the aircraft. The renter is concerned that if he brings this up to the owner that the owner may cancel his agreement. The good news is that the owner recognized the problem (when advised by the renter) and is installing new carpeting.

"I was renting a Cessna C182, but, after it's sale, I went back to renting from a flight school at the Toronto Island Airport," says Shahin Moshtagh, a 300-hour renter pilot. "While per-

fect for one-hour flights and staying current, it does not provide the flexibility for an overnight trip or a three-hour block of time for lunch. Now that we are into better flying weather, I'm looking for a block-time arrangement, ideally in a Cessna 172 or 182. While I have been using the usual tools to find an aircraft, word of mouth seems to be the best way to find an aircraft which is well maintained, and the owners and I are compatible."

Finally, there are small flying clubs which own and operate an aircraft to the benefit of their members. The Guelph Flying Club (COPA Flight 1) has between 10 and 12 members and owns a Cessna 172M. The onetime cost is roughly \$3,500 with a monthly cost. For pilots who can afford the capital buy in, this is a cost-effective approach to maintain currency, building hours and enjoying that \$100 hamburger.

With aircraft TCO on the rise and buying out of reach for many pilots given the higher aircraft valuations, renting and block time will be on the rise. Greater demand and lower supply will make finding an aircraft to rent challenging, especially for low-time pilots. For Type A pilots, their interpersonal skills may not be the limiting factor to finding their next ride. No doubt change is in the wind, with all the regulatory and cost hurdles faced by owners. 

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# UNDERSTANDING AI IN AVIATION

BY MARK VAN BERKEL, PRESIDENT AND CEO

**Lately it seems you can't read an article without the mention of Artificial Intelligence (AI). To some, AI is a scary concept. The robots will rule the world!**

Where I think the confusion often exists is on meaning, 'what is intelligence?'

Intelligence is the ability to take information and synthesise it into something that can be used to make informed decisions. Knowledge — an important skillset for a pilot!

Flying requires the pilot to digest lots of different types of information from many different sources. The weather, our aircraft performance, the airspace we are flying in, the airport procedures, the relevant NOTAMS and PIREPS, and so much more. Pilots can sometimes spend as much time flight planning as it takes for the actual flight.

The ability to take large amounts of information (in all media — e.g., written, visual, and verbal communications) and then contextualise for human consumption it is the concept behind Large Language Model (LLM) based AI such as OpenAI's ChatGPT model. If you have had a chance to interact with ChatGPT, it's remarkable at how good the tool is developing. I am not one that is easily impressed with technology, but I am with the OpenAI model.

What can this mean for aviation? I must think that AI will find its way into the flight decks of the future. I can foresee a time before the forecasted pilotless aircraft (which is the day when I stop flying in airplanes) that there will be a human pilot and an AI-based virtual co-pilot. The AI virtual co-pilot will be loaded with all the aircraft performance data, pilot operating handbook, normal and emergency checklists. The



▲ Flight planning with tools like Garmin Pilot will be a key use of artificial intelligence for pilots.

virtual AI copilot will be ready to assist the human pilot-in-command with mundane tasks of running checklists, setting headings, tuning frequencies, and possibly assisting in the execution of the emergency procedures, if needed. I could also foresee that the virtual AI co-pilot could also be loaded with the relevant accident data and could assist the pilot in not making the same mistakes as others have done.

The human pilot must maintain command-and-control, which is key to how we use AI as a tool. AI can help the humans make decisions, but the humans must maintain the authority over the AI and be the ultimate decision maker (the PIC). This is an important distinction. The "I" in AI is "intelligence" which is the gathering of information for the use of the human pilot to act upon.

Another area that I can see AI making inroads into aviation is in flight planning. This will happen much sooner than the virtual AI co-pilot. As I mentioned at the beginning of this article,

flight planning can consume a lot of time for those of us who do not have the luxury of a dispatcher. I could envision that flight planning software developers incorporating AI models (some likely already have elements of AI incorporated) into their application to help pilots make more efficient flight plans. Taking advantage of planning routes that have more advantageous winds aloft, predictive routing around weather, icing, and turbulence. Again, not taking the pilot out of the decision making, but helping digest and contextualize the copious amount of information to help make better decisions.

While the future of aviation that is aided by AI will not happen tomorrow, it isn't as far off as we think. The key is to not let AI remove the humans from the decision making. The pilot-in-command must be you. 🛩️





# FLIGHT TRAINING IN CANADA

## PAST, PRESENT AND FUTURE

**D**espite the adage that Canadian flight training has stayed the same since the 1980s, advances, some subtle and others more pronounced, have generated change over the last 10 years. Technology is a distinct driver, encouraging regulatory developments and pushing for a more sustainable aviation ecosystem, which is particularly critical for Canada's next-generation pilots. Regulations need to catch up, but a rise in new training methods and Transport Canada's initial work with flight schools to test electric aircraft are a start.

Canada's flight training history goes back 107 years, starting with the First World War, when the country's first aviation school was set up by Curtiss Aeroplanes and Motors in May 1915. WWII saw Canada accelerate its training capabilities with the British Commonwealth Air Training Plan. More than 130,000 crewmen and women were trained between 1939 and 1945. Since then, the number of flight training facilities nationwide grew exponentially. Unfortunately, the COVID-19 pandemic caused a significant drop in the number of pilot licences issued.

Opinions on the advancement of Canada's flight training regimen vary, but most agree that it needs to evolve more rapidly. Maintaining a safety culture is Transport Canada's top priority. Evaluating new technology takes time, which can mean a slower tempo than the aviation community might

▲ Matt Scheben, WWFC's Chief Flight Instructor (in orange) and on his left is Harrison Freer, Pipistrel dealer for New England.

like. It's a complex ecosystem to change.

Conrad Hatcher, argues that training needs to be brought into the twenty-first century more quickly: "We do a good job of training people, but we haven't necessarily evolved to the point where learning to fly with new technologies, such as GNSS — that's GPS in North America — is accepted by the aviation authority and students given credit for those hours."

### INTEGRATING NEW IDEAS AND METHODS

One solution to the pilot shortage could be competency-based training combined with traditional training. "There are limitations to traditional training programs that grant licences based on hours-flown," notes Suzanne Kearns, Associate Professor, aviation at the University of Waterloo in Waterloo, Ont. "The problem with hours is that there is no way to make the hour go faster, when time is the defining metric of training — new approaches and technologies can't improve efficiency."

A former commercial airplane and helicopter pilot, Kearns is Founding Director of WISA, the Waterloo Institute for Sustainable Aviation. She emphasized, "One challenge we are facing is that the industry's growth is outpacing our ability to

## ADVOCACY

train enough commercial pilots. It's also expensive to become a pilot in Canada. Pilots bear the costs themselves, starting from small aircraft, doing their hours and transitioning up. And because of this, you regularly hear of people abandoning flight training because of costs."

Jean Baptiste Carré, VP of Operations at Gatineau, Québec's Collège Select Aviation, agrees, adding that scenario-based training is a crucial. "The last 10 years of technological, regulatory and curriculum changes are having an effect. For example, simulation and scenario training provide a foundation for competency-based training," he observed. "It enables students to experience conditions that would otherwise be unavailable during a typical flight. In the event of an error, the simulation can be paused, providing an opportunity to debrief and analyze the situation."

Another potential solution to the pilot shortage is to incorporate policies that have arisen in Asia due to the rapid growth of its aviation industry. Kearns observes, that in many Asian markets, ab-initio pilots progress much more quickly from the street to the flightline. "They have introduced cadet programs where the students receive a multi-crew pilot's licence for a specific airline rather than the traditional Airline Transport Pilots Licence. The airline pays for their training and within 18 months they complete airline-focused training and begin working as a second officer."



▲ Elaine, the Waterloo Wellington Flight Centre's (WWFC) Class 1 Supervising Flight Instructor, takes a seat in the Pipistrel Velis Electro.

Jean-Baptiste points out that the college is also focused on addressing the situation, with particular emphasis on providing support, guidance, and especially attention to the mental health aspects of flying. "Our partnership with Porter Airlines allows Select Aviation College to offer a mentorship program to its students," he explained. Eligible students are paired with experienced working pilots who provide guidance throughout their time at the college. This valuable learning experience may even lead to an interview and potentially a position as a co-pilot."

Despite the slow pace of change, an exciting new development is in the works. Kearns notes that the aviation industry is also evolving to prioritize sustainability, which was the impetus for creating WISA. "My students are die-hard aviation enthusiasts but are concerned about the environmental impact of flying," she noted.

### SUSTAINABLE FLYING OPTIONS

"Pilot projects focused on training in electric aircraft are currently being conducted in two distinct regions in Canada – one in Ontario and the other in the Pacific region," said Sophie Dufresne, Transport Canada, Program Manager, Pilot Training and Licensing. "The Pacific project has recently received approval to commence ab-initio training. Transport Canada recognizes the significance of participating in environmentally sustainable initiatives, which, in this instance, also encompasses a social acceptability component by reducing noise pollution within airport environments."

Kearns' team at WISA, in cooperation with the Waterloo Wellington Flight Centre and Nancy Marshall's team at Seal and Flight in Campbell River, B.C., are the first two flight schools to participate in Transport Canada's (TCCA) pilot project. Of course, change doesn't come without some challenges. Marshall, the company's manager, outlines some growing pains with what she and her team call 'The Great Event.'

"Our chief pilot flew the first 'commercial' flight of a type certified electric plane in Canada in June. Before that, much work had to be done," she said. "Sorting out the bat-



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tery charging was an issue. Weight restrictions and range anxiety are also concerns.” Still, Marshall is optimistic. “These aircraft are a game changer if we can work out all the bugs. An hour and a half flight time is acceptable, and the CARs must change. For example, e-planes don’t have oil pressure gauges, which are specified in the CARs.”

While electric aircraft are one new option, they are not the only possibility for sustaining aviation, and the realized future state of aviation may evolve from the electrification of aircraft.

### STANDARDIZATION SAFETY

Another observation is the potential gap between flying clubs and new aviation colleges and universities due to the regulatory changes currently being drafted by Transport Canada. The integrated ATPL training (iATPL) and Approved Training Organizations (ATOs) require a complex structure that may be unaffordable for smaller entities. Jean-Baptiste explained the differences between modular programs in aero clubs and collegial programs. “In a modular environment, you will have around 150 hours of ground school and 200 hours of flight training to become a professional pilot. At colleges, on average, you will receive more than a thousand hours of ground and flight training, with extended programs in simulators. Over the past ten years, technology and standardized training programs have helped create safer pilots. Glass cockpits with advanced avionics, like our brand-new Piper Seminole equipped with G1000, allow us to train students to integrate more easily into the airline pilot market.”

Addressing challenges such as a shortage of instructors, regulatory readiness and adaptation, the high cost of training programs, and modernizing training practices takes time. The lack of instructors is due to several factors. “Although the number of flights has increased and even surpassed pre-pandemic levels, the number of pilots has not kept pace. As a result, airlines are lowering their minimum entry hours from 1,500 down to 800, and in some

cases, even to 500 hours,” Jean-Baptiste said. “Being a flight instructor is often viewed as a stepping stone to becoming a commercial pilot, making it difficult for colleges and flying clubs to retain them. Additionally, in Quebec, students face an added layer of complexity with government-mandated French language proficiency test requirements.”

As to the future of flight training, Dr. Chioma Onyedikachi Okoro, a private pilot, COPA member and engineer, sums it up: “Lots of new types of aircraft using alternative fuels are underway. Electric, advanced air mobility, hybrid and hydrogen are all up-and-coming alternatives, which will lead to a shift in the way that flight training is conducted.” ✈️

PHOTO: COLLÈGE SELECT AVIATION

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# COWBOYS OF THE SKIES

## HOW BUSH FLYING OPENED THE CANADIAN NORTH

In 1920, the Canadian North was something of a “wild west” — rugged, uncharted territory that was hard to get to and barely explored. Bush flying changed that, opening up the wilderness in new ways. While aviation was relatively new, World War I pushed its development, leaving Canada with improved technology and newly experienced pilots and aircraft mechanics returning home from war.

Unlike the U.K. and U.S., which quickly repurposed military aviation technology for commercial use, Canada hesitated. With a smaller population and less immediate economic benefit, the Canadian government was reluctant to subsidize a fledgling aviation industry. However, one thing was needed: a way to traverse the vast and largely uncharted North.

“Bush flying was primarily about natural resource management and exploitation,” explains Erin Gregory, Curator of Aviation and Space at the Canadian Aviation and Space Museum in Ottawa. “The first bush plane in Canada was a Curtiss HS-2L called *La Vigilance*.”

The surplus war aircraft was initially used to monitor forestry holdings of Laurentide, a pulp and paper company. “Throughout the 1920s, bush planes were used to explore and service the northern areas of the country that were not accessible by other means of transportation,” Gregory says.

These versatile “flying trucks” quickly became indispensable for a variety of rural tasks, from firefighting to monitoring illegal logging and managing natural resources. “Their rugged and versatile design, often equipped with floats or skis, allowed them to land almost anywhere, making them perfect for the challenging Canadian terrain,” Gregory says.

Even the Royal Canadian Air Force (RCAF) recognized its value, as military pilots, referred to as “bush pilots in uniform,” became adept at navigating the remote northern wilderness.

Today, a faithful reproduction of *La Vigilance* is on display at the museum, alongside the recovered hull of the original plane. The original aircraft crashed in 1922 and was considered disappeared until its wreckage was recovered from Foss Lake, Ont., in 1967. It took nearly two decades to restore using parts from three other planes and original materials.

*La Vigilance* is far from the only bush plane you’ll see at the museum, among its 8,500 objects including over 130 aircraft. The museum’s bush flying collection, part of the “Bush and Northern Flying gallery,” showcases aircraft evolution to meet changing needs. The Noorduyn Norseman, developed in 1935, filled a crucial gap as bush flying needs evolved and supported Canada during World War II. Its robust design made it more of a “flying truck” with robust radial engines, large doors, and the ability to be fitted with skis or floats, ideal for mining and



▲ A de Havilland DHC-6 Twin Otter on display at the Canadian Aviation and Space Museum in Ottawa.

▼ The Bush and Northern Flying gallery focuses on northern development through aviation.



remote access.

Another iconic aircraft is the De Havilland Canada Beaver, developed in the 1940s. “The Beaver is arguably Canada’s

most successful bush plane,” says Gregory. Designed initially as a civilian bush plane, even the U.S. military ordered it and used it during the Korean and Vietnam wars. The Beaver’s all-metal construction, special flap design for short takeoff and landing, and cargo capacity made it a flying pickup truck. Over 1,600 Beavers are still in operation worldwide, one with a fully electric engine owned by Harbour Air.

This development wasn’t limited to Canada. Countries facing similar geographic challenges, including Russia, Australia, and the northern US, also innovated bush flying techniques.

The Canadian Aviation and Space Museum hosts famous bush planes, highlighting their role in developing the North. In the coming years, the museum will be delving deeper into the human stories behind bush flying, including Indigenous contributions. Gregory emphasizes the importance of these stories, saying, “These people flying north were brave, but they weren’t completely alone. Indigenous people often saved these pilots when things went wrong and those stories get lost.” Like much of Canada’s history, the impact on Indigenous communities in the region is complex. The museum aims to share a balanced view, recognizing these various aspects of bush flying’s legacy. 🇨🇦



# MODERN BUSH FLYING

## WHEN RULES CHANGE FROM THE WEST TO NORTHERN ONTARIO

I am not a bush pilot. Not by any stretch of the imagination. But, I have flown professionally in the Canadian bush. Well, northwestern Ontario (about 200 km north of Thunder Bay) and the coastal mountains of B.C. Is that “bush” flying?

Disclaimer time. I am a professional seaplane pilot, employed to utilize my training and decision-making skills to fly paying passengers. My work week has me flying seaplanes (either turboprop or piston) to destinations inaccessible by road. When I was employed by a company in Ontario, I flew to communities and outposts from February to mid-October. So, that year, I got to fly a piston Beaver on wheel skis then floats in the summer.

When I learnt to fly, I was taught dead-reckoning navigation. Time on track. The aircraft had no navigation avionics. We had a watch, a magnetic compass, an ASI and a map. And this was in the early 80s. When I did my CPL test, the nav portion had to be done without the use of NavAids. The diversion my examiner gave me was 150 nm, at 500' AGL. I passed, but I think I was 80 lbs lighter due to fluid loss. Little did I (or the sadistic examiner) know, that years later, those skills would be relied upon. I mean, it was the later part of the 20th century, we have Loran, INS, and soon GNSS, who needs this archaic knowledge? Umm, right.

When I arrived in NW Ontario, it was -41c. The first thing I learnt about was dealing with an aircraft that is stored outside in that sort of temperature. At those temps, we do not fly the Beaver. It was only authorized for -35c and warmer. So, the day it warmed up to -31c, I did my area intro and ski ops intro. Then it was off to a small Indigenous camp, beside a lake about 40 minutes north. The GPS was flaky, there was no VOR or NDB. The gyro drifted like 60s hippy, and the maps



▲ The capabilities of young pilots today allow them to make a turnaround decision before they reach the plane.

were useful only as a sun visor. The settlement we were looking for was beside a big lake and had a small wooden dock. I looked out the window at nothing but white. What Lake??

At about the right time and place, someone had placed an orange tarp on the frozen lake, so I landed and it was the correct spot. Supplies delivered, returned to base, and kept my job. And so it was for the next eight and a bit months. When the thaw occurred, we converted the machines to floats and carried on. Two piston Beavers, a Norseman V and a Super Cub were the machines we used. The skills we used were basic airmanship and cowardice. Why cowardice? Fools rush in where angels fear to tread. My boss told me on the first day, “if you feel the conditions are wrong, you’re right. Turn around and come home”. To this day, I still live by that mindset.

But here’s the thing. It was 1997, not 1927. We were still doing things the same way as Punch, Wop and Doc. We might have had a GPS receiver in the cockpit, but because there were so few satellites, and we were so far north, more often than not we would lose lock and have to revert to old-school. My map was covered in lines of magnetic track from our base to whatever destination, with timings determined by the cruise speed of the machine I was flying. We all carried

an overnight kit and learned how to get dinner should we need to.

The next season, I was back on the West Coast flying into small mountain lakes with high density altitudes or a sea-level inlet with one direction in and out (and winds always in the wrong direction). It was a whole new set of rules. Then there are the boats, big and small. Once, trying to get from Port McNeill to Vancouver, I was following Johnstone Strait when I noticed a line on the water. I am in ground effect, with “ahem!!” minimal visibility. I decide to keep the line to my left. Not five minutes later, the lower portholes of a cruise ship went past my left wing tip. Missed it by a wing length. It might have been the early 2000s, but we were still relying on intuition and local knowledge.

While many decry the World Wide Web for dumbing us down, for those of us who make a living at or below 500' AGL, it has opened up a whole world of decision-making tools. Satellite imagery that is updated every 15 minutes with resolutions to one km. Live streaming Web cams that seem to be on every cabin and lighthouse. NAV Canada and Coast Guard Canada have stationed cameras all along the coast (and in NAV-Can’s case, all across the country). Data streaming services allow us to get updates in real time, while we fly. GNSS is now so reliable.

My young pilots now head to their aircraft with knowledge and capabilities that awe me. The turnaround decision is often made before they even get to the aircraft. Pilots can see from the data how fast the weather is moving. They can get accurate weather details from Met, Flight Service or online that gives them the strength to say “Sorry. Not today. But tomorrow “Yes. But we’re going to wait 45 minutes”. The also still head out with the Coward’s Rule in mind. 🙏

# WHY WOULD I FLY AN 80-YEAR-OLD AIRCRAFT?

BY MIKE DAVENPORT, BC

## This question was asked just the other day: why fly an 80-year-old aircraft?

The easiest answer is because I can; yet that doesn't tell the whole story.

There is a whole subculture of pilots and aircraft owners who love their antique or classic planes and fly them wherever and whenever they can — and the older the better.

The truth be told, my 1947 Stinson 108-2 is only 78 and I've flown it for 30-plus years, but, unlike me, it is still going strong. However, the eldest two that I have been privileged to fly were built in 1938, a Piper J3 and a Beech D17 Staggerwing. Then there was the Finch 16D built in 1939 and then led a hard life in the military as a trainer during WWII. There was a 1946 Piper J5 and a 1948 Champ 7DC followed by an 83-year-old 1941 Porterfield that, after the Stinson, is my personal favourite. I'm sure that you can tell from the list of airplanes above that I do have a bias toward older tail-draggers and enjoy the bragging rights.

Let's look at some of the ages of some other airplanes whose names you will recognize.

DH Beavers built in 1948 are still out



▲ The 1938 Beech SD17S after a 12-year restoration by Jim Britton.



▲ The 1933 Piper J3 Cub is owned by the Leslie family of Kelowna, B.C.

there hard at work every day. Another item of note is that the RCAF currently flies the CF18 fighter jet built back in 1982, some 42 years ago. At least one is a museum piece. The Douglas DC3's first flight was in 1935 (84 years ago) and a number of them are still working worldwide. Flight schools in Canada regularly use Cessna's that are older than many of their students. The first C150 was built in 1957 and is now 67 and the C152 that came out twenty years later in 1977 is a mere 47. The American military fly a bomber that is a senior citizen; its B52 is 66 years old and still going strong. I do admit that older but pampered antiques are flown only on nice days while some

are taken on long cross-country flights from all over the continent to EAA's AirVenture in Oshkosh every year where hundreds of similar aircraft meet.

Safety is an issue that must concern us all; however, I personally feel more secure in a well cared for antique or classic because I'm confident that the owner of that airplane probably spends more time maintaining and pampering it than flying; therefore, it is more likely to be in a good, safe condition.

For a little contrast, think about driving a classic car. How do you feel about going down the freeway at 110 KPH in a car with no seatbelts and a speedometer that reads in MPH, no airbags or God forbid, one with no screen to tell where you might be going, that you are driving too fast or too close to the car in front and no GPS to hint at how to get there. That 1967 Mustang in my neighbour's driveway is 57 years old and yet it's driven regularly by an 80-year-old who doesn't seem concerned.

In conclusion, while there is a common opinion that flying is too expensive and no doubt one could make a case for that, you can often buy a certified, airworthy antique or classic for significantly less than the price of a good used car. ✈️

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# ALTERNATIVES FOR FLIGHT: ULTRALIGHTS AND HOMEBUILTS

**What can a pilot do when they still yearn to fly but want to dial it back? The prospect of not passing your medical test is never easy, and the decision to slow down is tough, but fear not — many alternatives can keep you in the game.**

Deciding which discipline works for you takes research, and goal setting. Do you want the project of a lifetime to fly short flights at low speeds? And don't forget the associated costs and licensing regulations vary. As with every regulated activity, restrictions and challenges exist. However, associations representing the various disciplines are just as passionate about aviation as you. The key to understanding all the ins-and-outs is to join your local chapter and learn from certified instructors.

“Whether it's an age thing, a cost thing, or a time thing, many of us are thinking of transitioning into lighter, simpler airplanes,” said Kathy Lubitz, President of UPAC, the Ultralight Pilots Association of Canada. “Something we focus on at UPAC is the transition from regular flying to ultralight flying because there are differences. With ultralights, you're generally flying at lower speeds and not in instrument conditions.”

Ultralights encompass a broad range of aeroplanes, including the still uncatagorized light sport, but Canadian Aviation Regulations, CARs, define two specific types: Basic (BULA) and Advanced (AULA). Trikes and PPGs, or powered paragliders, are popular in this flying community. A trike is powered and has a wing similar to a hang glider attached to a three-wheeled buggy. A PPG has a wing, and the pilot wears a backpack



▲ Stephanie Rankine is an ultralight enthusiast. Here she is next to a Savage Cub Ultralight.

with an engine and a pusher propeller. To fly in Canada, you must have a Class 4 declared medical, take a Transport Canada approved ground school course, pass the Ultralight exam, have not less than five hours of dual instruction and two hours of solo flying, plus 20 takeoffs, circuits and landings, 10 of which must be solo.

“Some people might say it's stepping down,” explained Ted Rankine, an avid pilot and communications director for UPAC. “I prefer to think of it as stepping up because there are so many options to fit as simple or complex an aircraft as you'd like. The cockpits of some advanced ultralights could surprise you.”


The RAA, or Recreational Aircraft Association Canada, represents builders and flyers of amateur-built aircraft to Transport Canada. Gary Wolf, the organization's president, is a private pilot and amateur-built airplane enthusiast. “The Amateur-Built category is a different world in which the owner is in control of the maintenance of his aircraft, and he has the choice to perform all maintenance if he is capable, or he has the

alternative of having part of the annual performed by an AME,” he observed.

Paragliding is also an attractive hobby as it boasts one of the lowest costs for flying. Tyler G., President of the Hang Gliding and Paragliding Association of Canada, HPAC/ACVL observed, “Everyone is different, but you could potentially become a paraglider-rated pilot over a long weekend. The great thing about the sport is that you can travel the world with your paraglider equipment.”

This sport is self-regulated, which doesn't mean not regulated. While paragliding has fewer restrictions, pilots do adhere to Transport Canada's CARs. The association administers pilot ratings, certifies instructors and provides third-party liability insurance to its members. Those without their private pilot's license must pass the HAGAR, Hang Glider Air Regulations exam.

Another exciting way to keep your hand in aviation is with RPAS, remotely piloted aircraft systems. These aircraft are governed by Part 9 of the CARs.

Carl Layden, president the Model Aeronautics Association of Canada, is a former private pilot and long-time model airplane enthusiast. “Some radio-controlled aircraft disciplines, such as precision or scale aerobatics, need higher than the 400-foot Transport Canada limit. For this purpose, we made our case by applying for and receiving an SFOC, Special Flight Operations Certificate. This allows us, in unrestricted airspace to fly above 400 feet, to a maximum of 1,700 feet. And we must maintain a minimum 500-foot separation from the lower controlled airspace.” 

# RCAF CENTENNIAL ANNIVERSARY

FEATURING THE SNOWBIRDS

BY PHIL LIGHTSTONE

April 1, 2024, marked the 100th anniversary of the Royal Canadian Air Force (RCAF). The Centennial milestone allows RCAF to honour its distinct heritage and recognize its people. Canada's Air Force when formed in 1924 had 62 permanent members.

The tip of the sword from the public's perspective is Canada's Snowbirds, formed in 1971. The Snowbirds are part of 431 Air Demonstration Squadron and have become a Canadian icon. The entire squadron — comprised of 100 personnel including pilots, technicians (aviation, avionics, aircraft structure and supply), mobile support operators, resource management support clerks, an engineering officer, a logistics officer and a public affairs officer representing all three elements (Army, Navy and Air Force) — work as a team to bring thrilling performances to the Canadian public. Serving as ambassadors of the Canadian Armed Forces (CAF), The Snowbirds demonstrate a high level of skill, professionalism, teamwork, discipline and dedication inherent in



▲ The CT-114 Tutor is a single-engine turbojet-powered trainer aircraft.

the men and women of the CAF. The Snowbirds form 431 Squadron, which has flown a variety of aircraft over the past 100 years including: Vickers Wellington; Handley-Page Halifax; Avro Lancaster; Canadair (North American) F-86 Sabre; CF-18; and the CT-114 Tutor. You might be wondering how the team got its name. A *Name the Team* contest was held at the local base elementary school in June of 1971. Doug Farmer, a Grade 6 student, was the winner.

The Snowbirds' Canadair CT-114 Tutor jet dates back to 1961, but according to Snowbird 8, lead solo pilot, Cap-



▲ Preparing for flight at 15 Wing Moosejaw, home to 431 Squadron.

tain Marc-Andre Plante, "I transitioned into The Snowbirds in 2021 where we fly 300 knots, 300 AGL and with four feet of separation in our diamond formations and a one-foot error rate. The Tutor provides a stable platform for flights demanding the highest level of precision flight." In 2023, the RCAF began upgrading the Tutor jets from their 1950s steam gauges to a state-of-the-art Garmin glass cockpit. To date, two Tutor jets have received this transformation. Captain Plante reports: "As a Snowbird pilot the transition in the jet to glass takes a few flights to get comfortable, focusing on IFR skills. But with an Attitude Indicator which does not tumble during our aerobatic maneuvers, the glass cockpit brings some definite advantages." The Tutor



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jets do not have the systems to support G-pants, which are common in modern military aircraft. The Snowbirds are routinely pulling +5 to -2.5 Gs in their manoeuvres, requiring the pilots to be at an exceptional physical fitness level.

The Tutor is capable of a wide performance range, with a top speed at altitude of 429 kt, 478 kt in a dive and a stall speed of 71 kt. The Tutor is furnished with manual flight controls, which incorporate spring tabs. The jet is aerodynamically stable in flight making it an excellent training aircraft and well suited to the demands of the Snowbirds. In 1967, 10 Tutor jets were modified to support the needs of the aerobatic team, adding a second control system (allowing the pilot to fly from either the left or right seat), a smoke system and two diesel fuel pods. The Snowbirds have 11 Tutor jets in their squadron. With the bulk of Canada's Tutor jets mothballed, the RCAF should have enough spare parts to keep the Snowbirds in the air for the long term. With budget constraints, an investment into modern glass cockpits, lots of spare parts, and an aircraft platform suited to the task, one could see the Tutor in service with the Snowbirds for the indefinite future.

Colonel Maggie Jacula, RCAF 2024 Campaign Manager, was dedicated to managing the RCAF's Centennial activities for the past three years with a team consisting of nine staff. Jacula reports: "Our team, while small is mighty, planning, supporting and delivering a variety of activities mission critical to the build-up to April 1, 2024, and the celebrations taking place during the rest of the year. We really want people to know about the proud history of the RCAF, and all the different ways that they can get involved in air and space in Canada. A lot of times when you think of the Air Force, you think of airplanes and pilots. Without a doubt, airplanes and pilots are very important to the Air Force, but in order to achieve our missions, there are so many other trades that are involved."

Currently the RCAF has: 11,668 men

and women serving in the Regular Force; 2,004 Reserve Force members; 15 wings; 38 flying squadrons; and 23 nonflying squadrons. Major Bruno Paulhus, as a navigator, has flown 9,625 hours on the CC-130, anecdotally there are aircrews with 10,000 hours. It is important to note that fighter and rotary aircraft hours will be lower than

medium-heavy transport and maritime patrol aircraft.

Show your support and attend one of the many RCAF Centennial events or tour one of the 11 RCAF museums, which remind us of the lessons learned, the sacrifices made and hint at the challenging paths that will lead the RCAF into the future. 🇨🇦



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# SUSTAINABLE AVIATION RISING

HOW SEALAND INTEGRATED AN ELECTRIC AIRPLANE

BY MIKE ANDREWS, VANCOUVER ISLAND, BC

It is no industry secret: aviation innovators are striving toward environmentally friendly technology. Sustainable Aviation Fuel (SAF), hydrogen, and electric are becoming the future of flying. Aeronautical titans like Airbus, Boeing, Embraer, Honda, Textron, the U.S. Air Force and others continue to invest billions into research and development.

These advancements not only reduce emissions, but also have the objective of becoming more cost-effective. However, the elephant in the room is the current financial and environmental cost of producing these new energy sources. The cleaner alternatives aren't perfect yet, and there's much to improve in capacity, production and implementation. Like every revolution though, it must begin to allow for growth.

Numerous Canadian institutions are working to integrate sustainable aviation technologies where they're most practical. The Canadian Advanced Air Mobility (CAAM) brings many of us together, building a network and bridging gaps between politics, funding, regulators, and industry. This remarkable organization serves as a vital catalyst for the nationwide adoption of Advanced Air Mobility (AAM).

With the intent of writing within my personal knowledge base and experience, the remainder of the article will focus exclusively on electric, piloted aircraft.

First, a brief outlook on how Canadian industry is tangibly underway to meeting ICAO's goal of net-zero carbon emissions by 2050:

- June 14, 2024 — Sealand Flight con-



ducts Canada's very-first paid commercial flight in an electric airplane and begins electric flight training.

- 2026 — Harbour Air receives eBeaver STC certification and begins electric passenger routes.
- 2026 — Helijet receives ALIA eVTOL aircraft by Beta Technologies and begins electric passenger routes.
- 2028 — Air Canada receives ES-30 electric-hybrid aircraft by Heart Aerospace and begins hybrid passenger routes.

Other renowned disrupters include the Waterloo Institute for Sustainable Aeronautics (WISA), Waterloo Wellington Flight Centre (WWFC), Brantford Flight Centre, Elibird Aero, and Diamond Aircraft. This list could go on, showcasing the widespread dedication of individuals and organizations in this field.

These flight operations each have a particular mission profile which can reasonably adopt the next generation of aircraft. In most cases, the zero-emissions capability already exists, such as flight

▲ With an endurance of 50 minutes and 30% battery reserve, the Velis Electro is an ideal flight trainer.

training and short regional commuting. Many countries around the globe are leading in early adoption, and now Canada is no longer far behind. Like other electric vehicles, embracing these sustainable aircraft wherever feasible enables and assures future progression.

So what is involved in adopting these technologies? Without too much detail, here is how our team at Sealand Flight Ltd., of Campbell River, B.C., has successfully integrated Canada's first-ever commercial operation of an electric airplane.

In 2019, Sealand's visionary, Nancy Marshall, discovered the European electric airplane movement and inquired with Transport Canada (TC) of their potential in Canada.

Three years later, TC formally called for interested and qualified flight schools to participate in a trial program of Pipitrel Velis Electro airplanes. While these



aircraft have a European Type Certificate, they are not yet certified in Canada, which is a requirement under CAR 604.32 (a). Hence the need for a distinct trial program.

The first to be approved was WWFC, in partnership with WISA. Together, they began flying a Velis Electro in early 2023, with 150 hours flown to date. WISA's overall leadership continues to be instrumental in creating industry progress.

Sealand's approval came quickly afterward in 2022. Our airplane, C-FPIP, arrived in February of 2024, began flying in April, and as of June 14, is the first to conduct public commercial flight operations.

Getting to this stage required a multitude of steps. Once the airplane arrived, we needed to charge it. Pipistrel's proprietary 20kW charger, designed for European use, requires a 3-phase, 400V input. Unfortunately, neither of these are commonly available at Canadian airports. Thus, when the plane is charging, an ac-

companied electric whir of a phase converter and a transformer are noticeable.

Sealand then hosted a week-long factory maintenance course for the aircraft, taught by Pipistrel engineers from Slovenia. Participants included representatives from Transport Canada, Apex Aircraft (the Canadian Pipistrel brokers), and maintenance engineers from across Canada, including two of our own.

This course provided TC direct information and confidence in issuing FPIP's Special Certificate of Airworthiness (SCoA). Flight operations quickly ensued with company pilots and staff.


For the ability to take paying customers on training or sightseeing flights, a regulatory exemption is required to use the non-certified aircraft in commercial operations. After much anticipation, and some political lobbying, this was received at the beginning of June.

Since then, we have embarked on the beginning of electric flight training.

Working closely with TC, the Velis Electro is integrated into our PPL syllabus, being used for lessons up to and including the first several solo flights. Then, students transition to Internal Combustion Engine (ICE) airplanes for the remainder of their training. However, we aim to eventually offer the full PPL course on FPIP. Electric aircraft differences training is also available for licensed pilots.

From this extensive experience, looking forward, our industry's biggest hurdles to advance sustainability will be technological capability, safety, ground infrastructure, and regulatory adaptation.

Collectively, Canadians are tackling these challenges, creating the foundation for increasingly sustainable aviation. Vehicles that were once science fiction are ready to become our reality.

For more information on Sealand Flight, please visit our website [www.sealandflight.com](http://www.sealandflight.com) 



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**A**re you dreaming about a long-range, multi-day flight? Flying across Canada to Palm Springs or Florida? Making these dream adventures a reality is an exciting prospect. Apart from planning the route, figuring out where you'll stay, budgeting, and all the other thousand things you'll need to do to help you make your trip a success, COPA asked some pilots who've made long-range trips about their experiences and asked for their top tips. Here's what they advise.

"Plan, plan, plan," says Alex Markov, an aerospace engineer and longtime pilot with private and commercial licences. Buying his Cessna P210 was a dream come true. "You really need to get organized, be flexible, and did I mention plan carefully?" he continued.

In the fall of 2023, Markov flew from Victoria, B.C., to Camp Casey (CSQ4 – Camp de base Casey private airfield) in the Haute Mauricie region of Quebec to participate in AeroVenture 2023. "It was a last-minute decision to go, but planned. I had been thinking about it for a few weeks, the weather looked good in September, and I wanted to fly this trip," he explained.

Markov, President and Director of Engineering at Amtech Aeronautical Limited, has been flying since the early 1970s. "The flight out was three days, and I was able to participate in the largest GA gathering in Canada. Plus, I won a prize from COPA for flying the furthest distance to the event. It's a great Canadian event that presents Canadian



▲ Alex-Markov-with-his-P-21.

aviation in the best light. It was so well run, from a tent already available to me to the food and the small trade show; the whole experience was superb, and I recommend it highly."

Instrument rated, but not required on this trip, Markov's outbound routing was Victoria (CYYJ) to Medicine Hat (CYXH) with an overnight. Gimli (CYGM) to Timmins (CYTS) and a second overnight, then on to Camp Casey. "One thing that surprised me is that sometimes you may just need to carry cash, like at Camp Casey. It was an unforeseen challenge, but not hard to overcome. Then, on my return route, while the weather was good, there was lots of smoke because of the forest fires blanketing the country, and I had to overnight in Dryden (CYHD)."

Conrad Hatcher, an experienced pilot and longtime instructor, agrees with Markov that detailed planning for a long-range flight is the most important

thing you can do to make it successful. Safety must be your ultimate consideration. "We can be blissfully unaware and underestimate the challenge," Hatcher reflected. The founder of Hangaaar.com, an online ground school for pilots, Hatcher notes, "Planning is key, and also getting the training you need to fly in the terrain you are not familiar with is crucial. The longer the trip, the higher the risk because you may be flying out of your comfort zone. If you've never flown in the Rockies, it is worth your while to go with an experienced pilot through the logistics and fly with them. The same applies to crossing the border. Fly with someone who has done it before."

He also advises his students to fly in favourable weather, keep flight legs short and set daily goals. Another essential point is recognizing when you



can't achieve the day's objective and not being afraid of calling it a day early, especially if the weather changes. "Don't be too ambitious, stay hydrated and remember that fatigue creeps up on you," Hatcher cautioned. Markov concurs, "Sometimes you don't realize how tired you are until you get off the plane."

Janine and David Black, whose stories have appeared in COPA's *Flight* magazine, flew across Canada and back in June 2023 in a Cessna 172. Documenting their plans and flights through daily vlog entries, their website, flysea2sea.ca is a testament to their amazing ability to pivot plans as conditions and (sometimes) equipment requires. They avoided monster hail on the Prairies, crossed the Canadian / American border twice, battled low visibility from forest fires, and saw the country from coast to coast.

Planning accordingly for who is travelling with you will give you and your passengers peace of mind. For example, children and pets will add new complexity. "Little people, small bladders." Consider these three key pre-flight activities to help make your furry friend's flight successful. 1. Reach out to your vet to confirm that flying wouldn't negatively affect your dog and it is safe for them. 2. Don't feed your dog before flying, you don't need messy accidents, and 3. Acclimatize your dog to your aircraft and the sounds your aircraft makes before bringing them on board. Keeping flight legs short, having a dog bed or a blanket, toys, food, and a clean-up kit are all helpful. Indeed, any furry friend can become air-sick. It may also be advantageous to bring an additional person with you to "attend to the extra paws in the cockpit."

For a lot of Canadians, a short flight can quickly put a pilot over a terrain that requires survival equipment, and this is essential for long distance cross country. This is why Hatcher recommends always carrying an up-to-date survival kit for any flight, but especially if you don't already fly with one. "It's imperative for long distances; you should know how all the kit's components work." Addi-



▲ Conrad Hatcher at North County Airport.

tionally, he reminds pilots not to underestimate the challenge. "Be prepared that it will take longer and cost more than you plan for," he affirmed.

You'll also want to think about your flight planning tools. COPA members have access to Flight Bridge, where COPA can book car rentals and hotels and notify FBOs. Electronic Checklists available on Foreflight, Garmin Pilot and Fltplan.com's GO app. Hatcher also recommends using digital maps and ensuring you've done the necessary advance work, such as knowing the cost of gas at the destinations you plan to visit. Some more fun things to consider: what sights you'd like to see? Can you afford to go to that museum or show if gas prices are high? What happens after you land? Do you want to camp after a long day or need a hotel?

Long-distance trips are aspirational for many private pilots. Be aware, be prepared. Pilots in Western Canada may consider a flight to Palm Springs, California, to be the ultimate destination. Calgarians may want to fly over the Rockies. Eastern Canadian pilots may wish to fly to Florida. All these trips are challenging. Hatcher advises, "If you're a flatlander, you'll want to go out with someone who flies the Rockies before you do it alone. And if you're flying to remote northern Ontario or Saskatchewan, that's a challenge, too. Flying over water is yet another consideration altogether."

In terms of budget, it will cost more than you expect. "It's like a long-distance road trip," Hatcher observed. "When was the last time a long road trip went off without a hitch? You may want to rent a car in advance. Many American airports have courtesy cars, but there aren't as many at Canadian airports."

All agree that their long-distance trips were wondrous experiences. "Meeting different people at Camp Casey, talking about airplanes and life. Seeing how well-run the event is has me considering flying the trip again this fall," Markov mused.

Ultimately, this trip of a lifetime will be an experience, something to remember and savour. The planning phase is the biggest challenge, but there are many resources on the Internet and the COPA community to bounce your ideas off of and get support. One last piece of advice? Get out there and enjoy it! 🛩️

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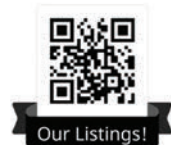
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# WHY COPA MATTERS

**What is the value of a COPA membership? While there is no one-size-fits-all reason to be a COPA member, the underlying goal is to protect every Canadian pilot's Freedom to Fly.**

Our advocacy efforts involve lobbying Transport Canada, negotiating with NAV CANADA, engaging elected officials at all levels of Government, and maintaining a network of pilots to help monitor thousands of airports across Canada. We leverage the collective support of thousands of pilots to back our greater cause to preserve General Aviation in Canada.

Of the hundreds of issues we face every day, some of our most important focus areas include ensuring GA pilots receive air traffic services, enabling the longevity of GA in Canada, and removing lead from aviation fuels in a way that works for the entire General Aviation fleet.

## Did you know?

General Aviation has an excellent safety record, with an estimated **30,000 pilots** flying approximately **37,478 aircraft**

*(Transport Canada, 2023).*

**Why do we exist? The Canadian Owners and Pilots Association was founded in 1952 to speak as a unified voice for General Aviation in Canada. Since then, we've grown to meet the ever-changing needs of the Canadian aviation community and remain the only national organization that represents Canadian GA.**

*How can you support? Consider contributing to the COPA Flight Safety Foundation which supports our scholarship program and safety initiatives and renewing your membership today!*

## Education

Since 1954, one of our main functions has been the dissemination of aviation information. We provide timely GA news, updates, articles, aviation courses and guides through our e-newsletter, magazine and COPA Aviation Academy. At the same time, we offer opportunities for members and prospective members to learn about the many facets of aviation through our Discover Aviation program.

## Advocacy

COPA plays a vital role in advocating for the rights and interests of GA enthusiasts across Canada. Prominent trends and changes that COPA is focused on includes increasing the number of pilots by helping to make flying more accessible. Our Freedom to Fly Fund was created to guarantee that COPA would have the resources required to take on emergency actions, legal or otherwise, in defence of the Canadian Freedom to Fly.

## Community & Events

Our network of 200 local chapters called COPA Flights was started in 1964. Today, our army of 12,000 pilots combined with these regional groups create opportunities for connection between pilots from coast-to-coast-to-coast via events, meetings, and other local activities.

## Savings

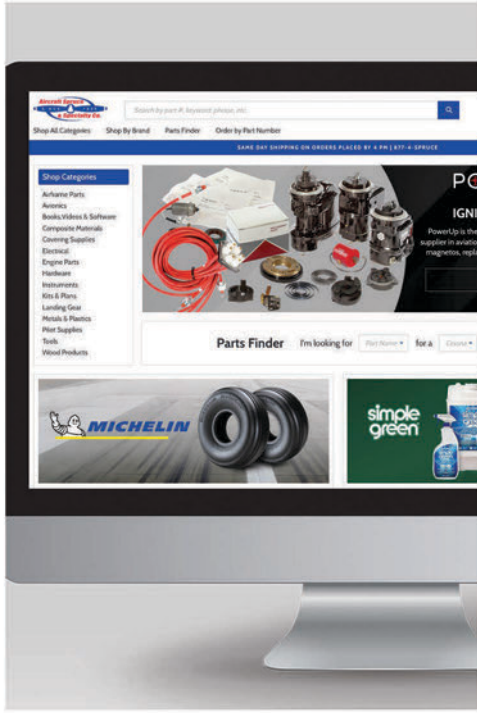
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