



# UVic Forest Biology Update

Fall 2022/  
Spring 2023

## Meet our Associate Member:

### Dr. Joey Tanney



Since 2018, I have been at the Pacific Forestry Centre (PFC; Canadian Forest Service, Natural Resources Canada) where I am employed as a research scientist (mycologist) working on phytosanitary & other forest health issues. I am also the curator of the Forest Pathology Herbarium (DAVFP) at the PFC, which houses more than 35,000 specimens representing 3,000+ fungal species.

I am currently working on several research projects focusing on forest tree pathogens, including: (1) assessing the effect of the foliar microbiome on Swiss needle cast (*Nothophaeocryptopus gaeumannii*), an important disease of coastal Douglas-fir that is projected to increase in severity due to climate change; (2) exploring the phytosanitary risks of fungal symbionts present in internationally traded plants for planting; (3) identifying & differentiating conifer seed mycobiomes in healthy versus unhealthy conifer seed lots to improve regeneration efforts, & (4) assessing the impact of sooty bark disease (*Cryptostroma corticale*) in BC, where it was first reported in summer 2022 in Victoria & Vancouver causing mortality in ornamental trees, likely exacerbated by the 2021 heat dome event. As a mycologist, my interests are quite broad & I enjoy exploring the taxonomy & ecology of forest fungi (especially ascomycetes) as much as possible.

I am currently collaborating with Juergen Ehling & Paul de la Bastide on work involving Swiss needle cast & I have especially enjoyed my interactions with students & associated field work. With the COVID situation stabilizing one of my goals this year is to become a more familiar face within the Centre for Forest Biology & engage students more with mycology.

## UVIC Mycology Club Foray & Session




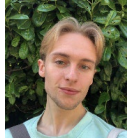
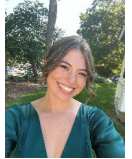

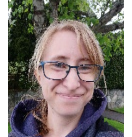
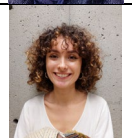

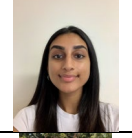


On the afternoon of October 31st, Paul de la Bastide hosted a get together in the Biology Department with members of the newly founded UVic Mycology Club. This club was created by and for undergraduate students with an interest in Mycology and all things fungal. Despite the relatively dry conditions, students were able to collect a diverse array of fungi from various sites on campus and in the surrounding neighbourhoods.

We had the welcome assistance of two experienced Mycologists, Dr. Shannon Berch and Juliet Pendray, both enthusiastic mycophiles from the local South Vancouver Island Mycological Society. They provided valuable guidance in fungal identification by describing what features to look for, as well as how to smell and taste (!) fungi, when examining an unknown sample.

The club is planning to develop a virtual myco-herbarium to document the fungi that may be found on campus and around Victoria. Included below are pictures of the group and examples of the fungal biodiversity collected by club members. If you are interested in the club, contact David Furlonger ([dafurl@hotmail.com](mailto:dafurl@hotmail.com)).



## New FORB Members

Daisuke Yamakawa	Dr. Hawkins	MSc	
Yudel Huberman	Dr. Hawkins	PhD	
Meara McIntosh	Dr. Hintz/Dr. de la Bastide	Research Assistant	
Alistair Knox	Dr. von Aderkas	Honours Student	
Robyn Swartman	Dr. Hintz/Dr. de la Bastide	Directed Study Student	
Elliott van der Wee	Dr. Constabel	Research Assistant	
Bethany Robson	Dr. Hawkins	Honours Student	
Lola Dumortier	Dr. Constabel	Visiting MSc from Lyon, France	
Freya Innes	Dr. Constabel	Research Assistant	
Simar Bennypaul	Dr. von Aderkas	Research Assistant	
Ida Lamani	Dr. von Aderkas	Research Assistant	
Madeleine Guimond	Dr. von Aderkas	Directed Study Student	
Joshua Little	Dr. Ehltling	Research Assistant	

### Successful PhD defense!

Congratulations Harley Gordon on his successful PhD defense! His topic was 'Unexpected Connections: Salicinoid Biosynthesis in Poplar'.



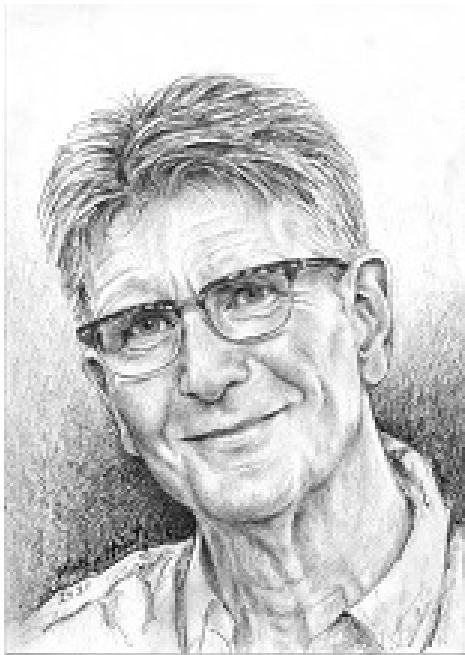
We wish him the best at his new job with Aurora Cannabis!

### Successful MSc defense!

Congratulations to Claire McPolin who successfully defended her MSc thesis, 'Ectomycorrhizal fungal endemism and rainforest nutrition in Pacific Northeast'.







Professor Will Hintz passed away November 27th, 2022 after a brief illness. We are shocked at this sad and sudden news. Will was in the midst of planning his teaching for next spring and had just submitted a proposal for an NSERC Discovery grant. He was very much looking forward to many more years of activity.

Will came to UVic as an Assistant Professor in 1993 after a PhD and postdoc at the University of Toronto, and a research position with Allelix Biopharmaceuticals. Will joined the Department of Biology and a few years later became part of the Graduate Centre for Forest Biology. He served as Department Chair for six years, from 2004 to 2010.

Will was a productive and inventive researcher. His special expertise was Dutch elm disease but he was interested in the molecular genetics of all fungal diseases. He worked on tree seed pathogens, fish pathogens, and the planet's great frog die-off, which resulted in a paper in *Science*. Will published widely with collaborators from many countries. More locally, he developed and patented a fungal biocontrol treatment for weedy deciduous trees. Will loved teaching students how to do scientific experiments, and trained many undergraduate and graduate students over the years.

Will was a quiet man who was dedicated to his family. He was an artistic and sophisticated photographer. Sadly, Will suffered a freak accident in 2016 that left him almost fully paralysed, but he was heroic in his determination to continue as a loving husband and father, and as a creative scientist and teacher. For Will, COVID was an extraordinary opportunity that provided him the opportunity to teach online – and he loved it! He also stayed involved with his lab and continued to plan new research projects.

Will was a remarkable man who met the most challenging circumstances with grace, courage and fortitude. We extend our heartfelt condolences to his family.

Compiled by Andrea Roszmann, Administrative Assistant,  
Centre for Forest Biology

## Alumni News!

Congratulations to Dr. Matthew Adeleye on his new Assistant Professor position at the University of Cambridge! Matthew completed his MSc at UVic in 2018 with FORB Faculty member, Dr. Terri Lacourse, then a PhD & post-doc at the Australian National University. <https://www.geog.cam.ac.uk/people/adeleye/>

## Recent Publications

Cowan, M.M., C.M. Pearce, T. Finston, G.R. Meyer, R. Marshall, W. Evans, T.F. Sutherland, P.Y. de la Bastide. 2022. Role of the *Vibrio* community, reproductive effort, and environmental parameters in intertidal Pacific oyster summer mortality in British Columbia, Canada.

Aquaculture

<https://doi.org/10.1016/j.aquaculture.2022.739094>

Aura L.C. Parra, Cleverson D.T. Freitas, Pedro F.N. Souza, Patrick von Aderkas, Christoph H. Borchers, Gwyn A. Beattie, Fredy D.A. Silva, Robert W. Thornburg. 2022. Ornamental tobacco floral nectar is a rich source of antimicrobial peptides. *Plant Science*, 324:

<https://doi.org/10.1016/j.plantsci.2022.111427>

Hawkins Barbara J., and Robbins Samantha. 2022. Comparison of ammonium, nitrate, and proton fluxes in mycorrhizal and nonmycorrhizal roots of lodgepole pine in contrasting nitrogen treatments. *Canadian Journal of Forest Research*, e-First. <https://doi.org/10.1139/cjfr-2022-0066>

Giuliano, C., and Lacourse, T. 2023. Holocene fire regimes, fire-related plant functional types, and climate in south-coastal British Columbia forests. *Ecosphere* 14(2): e4416. <https://esajournals.onlinelibrary.wiley.com/doi/10.1002/ecs2.4416>

## Honours Fest 2023!

Forest Biology had a number of undergraduate students participating in Honours Fest 2023. Honours students in the Faculty of Science explained their thesis projects to interested viewers and judges. In this photo, Alistair Knox is explaining his fern breeding system to Professor Barbara Hawkins.

