CAB newsletter 20th July 2022

You are receiving this as a member of the Centre for Applied Bioinformatics (CAB)

Not yet joined CAB? Well if you are receiving this you already have joined, but if you know anyone who would like to join, then please forward this message and they can now sign up using a simple web form from the members page at https://www.appliedbioinformatics.com.au/Members.php

News:

Want to work with the University of Arizona? UWA is keen to promote collaboration with the University of Arizona. To support this, CAB is organising a virtual symposium of short presentations with University of Arizona researchers to try to identify potential collaborations (date to be confirmed). Initial speakers from Arizona are below. If you would like to attend or present at the virtual meeting, please let me know.

- Prof. Janko Nikolich-Žugich is an immunologist and gerontologist. He is the director of the Aegis Consortium for Pandemic-Free Future (https://aegis.uahs.arizona.edu/) and Co-Director, Arizona Center on Aging (https://aging.arizona.edu/).
- Prof. Nikolich-Žugich is leading effects to build a strong undergraduate program in Bioinformatics as well as building the Cyber-infrastructure to support NIH-funded programs for data management, data sharing, and data integration of large-scale longitudinal multi-OMICS studies in humans.
- Ted Maston is the Chief Operating Officer of the Aegis Consortium.
- April Yingst is the Program Manager of the Aegis Consortium and the Personalized Defense Initiative, of which a major component is Bioinformatics.

ABACBS are now seeking expressions of interest from the wider professional bioinformatics community to join us! If you are a professional bioinformatician and would like to play a more active role in the shaping of professional bioinformaticians in Australia, please email professional@abacbs.org

Twitter addicts, get your fix of the latest bioinformatics tweets at @UWABioinfo

Promote your publications through CAB tweets! Please email any of your recent publications and we can promote through the CAB newsletter and twitter account ouwABioinfo

Missed a previous newsletter? Fear not, they are now all available online at: https://www.appliedbioinformatics.com.au/Newsletters.php

Publication highlights:

This is a section where members can suggest papers from their own group or elsewhere that they want to promote to centre members. They take the simple format of a title, download and short summary. Please forward any papers you would like to highlight to me for inclusion in future newsletters.

Title: Multiple genome viewer (MGV): a new tool for visualization and comparison of multiple annotated genomes

Download: https://www.ncbi.nlm.nih.gov/pmc/articles/PMC8913476/

Summary: Cool mouse pangenome viewer

http://www.informatics.jax.org/mgv UI: https://github.com/mgijax/mgv

Backend: https://github.com/mgijax/mgv_data

Talks:

First joint CAB - Institute of Data joint meeting

Wednesday 14th September at Forrest Hall and online, followed by drinks and nibbles. In person attendance is limited so reserve your place early by email: dave.edwards@uwa.edu.au

Presenters:

Philipp Bayer (Mindaroo): Title TBC Eric Alves (UWA): Applied bioinformatics for immune cell profiling Nicola Armstrong (Curtin):

If you are interested in hearing about talks from the Cancer Research Cluster, please contact Zhaoyu Li at <u>zhaoyu.li@uwa.edu.au</u> to join the mail group.

Infrastructure:

Do you run small-scale Linux-based analyses? ARDC have launched this:

https://desktop.rc.nectar.org.au/about/

It is essentially a small Nectar instance, but you directly connect to a Linux Desktop. There's no need to learn Linux system administration or the Nectar interface.

Training:

NCI training:

- The GPU Hackathon will take place from the 24th of October to the 4th of November. The aim is to help you port and optimise codes on GPUs in a focused and highly collaborative environment. Please ensure you submit an Expression of Interest before the **29th of July**.
- The two GPU Bootcamps are being run in partnership with the National Supercomputing Centre of Singapore (NSCC), the Pawsey Supercomputing

Research Centre and the New Zealand eScience Infrastructure (NeSI). The NCI and NSCC OpenACC GPU Bootcamp will be on the 17th and 18th of August and the NCI, Pawsey, and NeSI CUDA GPU Bootcamp from the 7th to the 9th of September.

 We are extremely pleased to be collaborating with Intersect once again to help deliver the second <u>High Performance Computing and Data in Drug Design</u> and Delivery course from the **6th of September to the 1st of December**.

Australian BioCommons Workshop: Single cell RNAseq analysis in R

22 & 23 August 2022

In this hands-on workshop we will show you how to perform single cell analysis using Seurat - an R package for QC, analysis, and exploration of single-cell RNAseq data. We will also explore ways of visualising single cell expression data.

Applications close 10 August. https://www.biocommons.org.au/events/scrnaseq

Applications for the Quarter 4 round of **NCI's Adapter Allocation Scheme** are now open. If you want more information about the scheme, please click <u>here</u> and to register for an online information session on the **2nd of August**, please click <u>here</u>.

Funding:

The Threatened Species Initiative (TSI) is now seeking project proposals as part of its 2022 Request for Partnership round. For details, please visit: https://bioplatforms.com/projects/threatened-species/

Conference:

The UWA Data Science Forum I

Date: Friday 29 July 2022

Time: 1pm to 4pm

Venue: UWA Blakers Lecture Theatre

The presenters at the first forum are the UWA academics who are leaders in their field.

- Professor Jo McDonald, School of Social Sciences
- Professor Wendy Erber, UWA Medical School & School of Biomedical Sciences
- Professor Melinda Hodkiewicz, School of Engineering
- Associate Professor Paul Roberts, School of Psychological Science

In addition

• Professor EJ Holden, School of Earth Sciences & Director, UWA Data Institute

Will give a short overview of the new institute.

For more information contact Inge Koch: inge.koch@uwa.edu.au

Jobs:

The Minderoo Ocean Genomes lab at UWA is hiring a level B postdoc to assemble and analyse VGP-level marine vertebrate genomes. Level B, 3 years https://external.jobs.uwa.edu.au/en/job/509270/research-fellow-ocean-omics-laboratory