

# Otago Genomics & Bioinformatics Facility

## OGBF Bioinformatics Workshop RNA-Seq: what is state of the art?

This hands-on workshop provides an introduction to designing and analysing RNA-Seq experiments. The workshop will cover key aspects of RNA-Seq experimental design, differential gene expression analysis, analysis of RNA-Seq time-series data, and leveraging RNA-seq for genome annotation. You will learn a variety of possible workflows for analysing RNA-Seq data, plus solutions to some frequently encountered problems when using RNA-Seq technology:

- How many biological replicates, and what level of sequencing depth, do I need for meaningful (i.e. statistically powerful) results?
- What is the difference between available analysis tools, and what will my results look like in each case?
- What graphics are available to best illustrate my results?
- What to do when it all just doesn't work?

*And, ultimately:*

- I have my differentially expressed genes  
- WHAT'S NEXT?

⇒ **Registration essential:**  
**genomics@otago.ac.nz**

⇒ **Laptops are required**

**Hercus D'Ath  
Lecture Theatre**

**Wednesday**

**15<sup>th</sup> November 2017**

**10.00am - 5.00pm**