

# FluTracking

a citizen science tool for  
gathering public health data

Frank Mackenzie



The screenshot shows a web-based survey form for FluTracking. At the top, it specifies the week: 'Monday, 24 May 2021 to Sunday, 30 May 2021'. The form is divided into four main sections: 'Symptoms', 'Swab Test', 'COVID-19 Vaccination', and 'Flu Vaccination'. Each section contains a list of questions with radio button options for 'Yes', 'No', and 'Don't Know'. The 'Symptoms' section lists: Fever?, Cough?, Sore throat?, Runny nose?, Shortness of breath?, Any change in sense of taste or smell?, and None of the above. The 'Swab Test' section asks: 'Did you have a nose or throat swab during the week ending Sunday 30 May?'. The 'COVID-19 Vaccination' section asks: 'Have you received dose 1 of a COVID-19 vaccine?'. The 'Flu Vaccination' section asks: 'Have you received the Annual Flu vaccine in 2021?'. A 'Submit' button is located at the bottom right of the form.

For the week of: **Monday, 24 May 2021**  
to  
**Sunday, 30 May 2021**

**Symptoms**

Did **you** have:

Fever? ☐ Yes ☐ No ☐ Don't Know

Cough? ☐ Yes ☐ No ☐ Don't Know

Sore throat? ☐ Yes ☐ No ☐ Don't Know

Runny nose? ☐ Yes ☐ No ☐ Don't Know

Shortness of breath? ☐ Yes ☐ No ☐ Don't Know

Any change in sense of taste or smell? ☐ Yes ☐ No ☐ Don't Know

☐ None of the above

**Swab Test**

Did you have a nose or throat swab during the week ending Sunday 30 May? ☐ Yes ☐ No ☐ Don't Know

**COVID-19 Vaccination**

Have you received **dose 1** of a COVID-19 vaccine? ☐ Yes ☐ No ☐ Don't Know

**Flu Vaccination**

Have you received the **Annual Flu** vaccine in **2021**? ☐ Yes ☐ No ☐ Don't Know

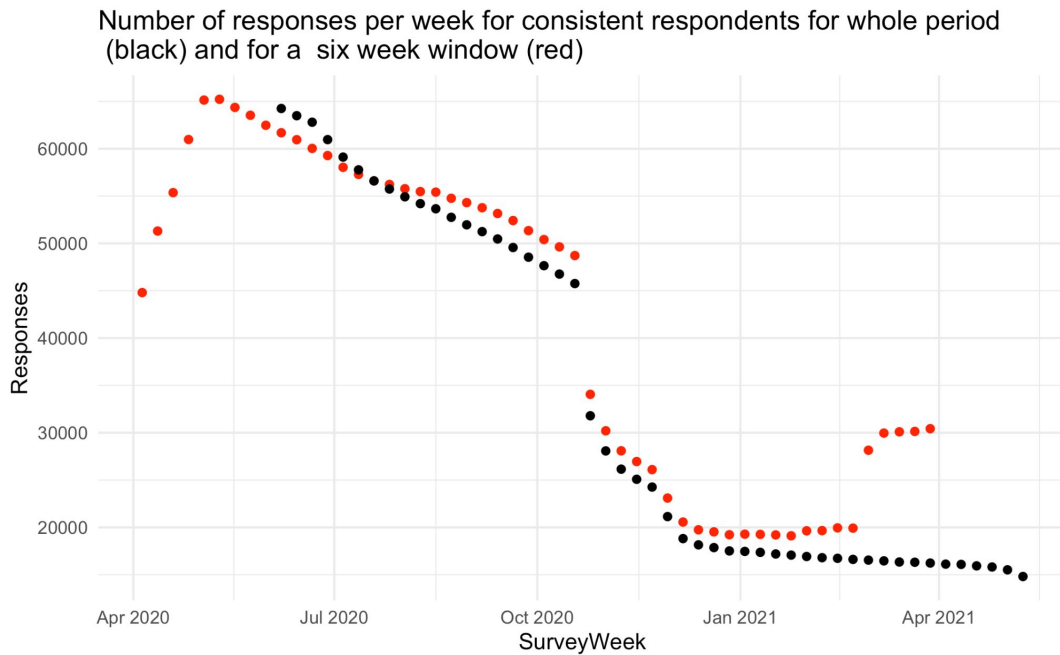
**Submit**

## Key Points

- Participatory surveillance of COVID and flu-like symptoms
- Near real-time symptom reporting
  - info on outbreaks as they happen
- COVID testing rates critical to estimating size of outbreak at detection

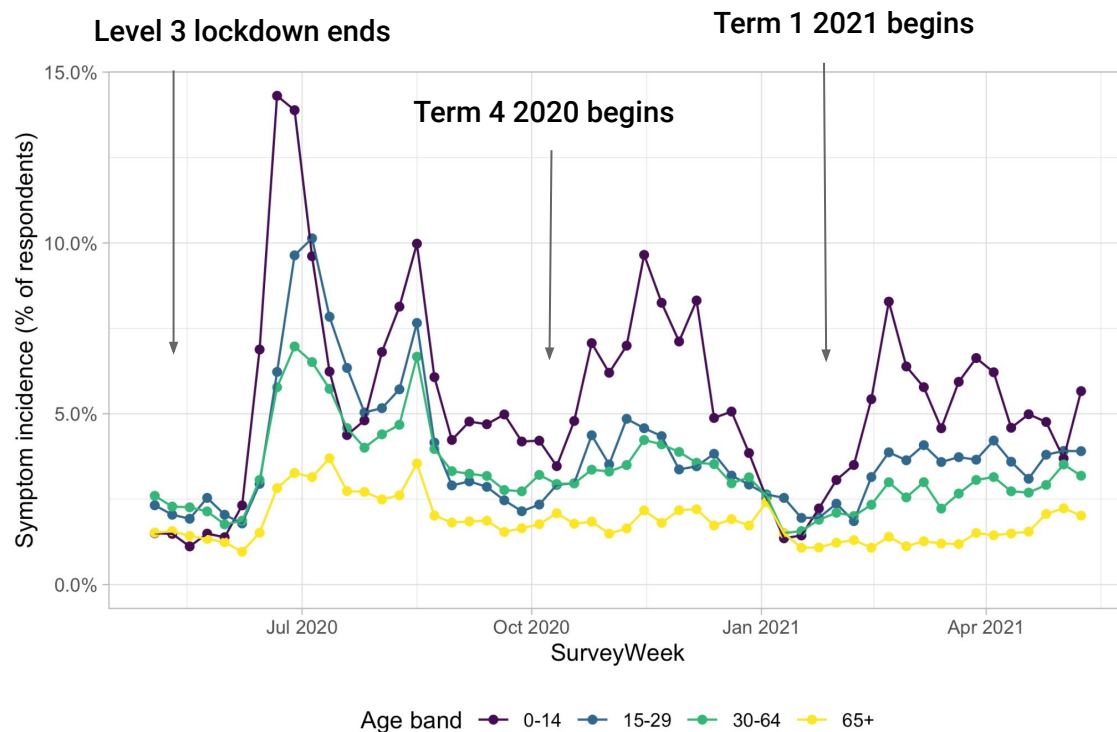
# Bias

- More likely to report when symptomatic
- Overestimation of incidence
- Don't want to exclude too much data



# What can this data show us?

- 0-14 year olds have highest incidence
- Bring illness home to older family members?
- Peaks after school holidays



# Sign up to FluTracking: flutracking.net

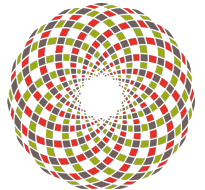
## Contact

Frank Mackenzie  
frankie.a.mack@gmail.com

Emily Harvey  
emily@me.co.nz

Steven Turnbull  
s.turnbull@auckland.ac.nz

We wish to thank New Zealand FluTracking, which is a collaborative initiative between the Ministry of Health and Hunter New England Health (NSW, Australia) for the provision of FluTracking data.



**Te Pūnaha Matatini**  
Data ■ Knowledge ■ Insight