



Ref: DOIA 2122-2282

5 July 2022

Nicky McLean  
[fyi-request-19586-b956f780@requests.fyi.org.nz](mailto:fyi-request-19586-b956f780@requests.fyi.org.nz)

Dear Nicky McLean

I refer to your email of 3 June 2022 to the Ministry of Business, Innovation and Employment, requesting the following under the Official Information Act 1982 (the Act):

*Via your organisation's web site a copy of file renewables.xlsx can be obtained, and my attention for the moment is directed at the entries under the heading Energy Transformation, specifically those for Wind. You offer calendar year totals in PetaJoules, and starting with the year 2000 (before which there was just the Brooklyn hill turbine and Hau Nui and Tararua had just started), the table below show your figures followed by mine, from a national database of electricity data. Apologies for the layout, but fixed-spacing typefaces are not available here.*

*Year: MBIE other*

*2000: 0.43 0.50*

*2001: 0.50 0.48*

*2002: 0.56 0.55*

*2003: 0.53 0.52*

*2004: 1.30 1.29*

*2005: 2.21 2.20*

*2006: 2.24 2.22*

*2007: 3.35 3.31*

*2008: 3.81 3.76*

*2009: 5.31 5.26*

*2010: 5.89 5.84*

*2011: 7.05 6.66*

*2012: 7.48 6.87*

*2013: 7.28 6.71*

*2014: 7.96 7.01*

*2015: 8.51 7.22*

*2016: 8.43 7.74*

*2017: 7.53 6.88*

*2018: 7.44 6.79*

*2019: 8.12 7.49*

*2020: 8.30 7.70*

*2021: ?.?? 8.56*

*As you can see, apart from the year 2000, your figures are consistently higher and often by more than ten percent. My values are based on the summations of half-hourly generation data, as metered, easily obtained via a system called Gnash. (Gnash.exe for windows, Gnash for*

GNU/Linux) So my question is 1) where have your values come from, and 2) what is included and what not. For instance, have any values been based upon the nominal installed capacity (with some estimate of an annual load factor, say), and have you included some sort of data/estimate for miscellaneous wind turbines scattered about, perhaps supplying a factory? For instance, there are some wind turbines in the Seaview industrial area that might supply internal load and thus not the public supply even though offsetting the draw on the public supply.

By contrast, the half-hourly data available to Gnash are clearly deficient: wind turbine generation at Mahinerangi and Horseshoe Bend is lumped in with hydro generation (if it is counted at all) and so not identified as "wind", and whole wind farms are omitted entirely, as at Flat Hill (near Bluff), Weld Cone, and Lulworth, as well as for various individual locations such as atop Brooklyn. And the absence of data for the new wind farm at Turitea will shortly be the subject of an OIA request to the Electricity authority.

Thus, I expect Gnash's data to be "low", but, not by so much as appears to be the case. So, what makes up your data?

I am writing to notify you that I am extending the timeframe for responding to your request under section 15A(1)(b) of the Act, as consultations necessary to make a decision on the request are such that a proper response cannot reasonably be made within the original time limit.

We will now respond to your request on or before 12 July 2022, which is an extension of five working days.

You have the right to seek investigation and review of my decision by the Ombudsman, in accordance with section 28(3) of the Act. The relevant details can be found at: [www.ombudsman.parliament.nz](http://www.ombudsman.parliament.nz).

Yours sincerely

A handwritten signature in black ink, appearing to read 'MSK', with a large, sweeping flourish extending to the right.

Madeline Sherwood King  
**Team Leader, Ministerial Services**  
Building, Resources and Markets