

REF

RENEWABLE ENERGY FOUNDATION

DE MORGAN HOUSE, 58 RUSSELL SQUARE, LONDON, WC1B 4HS
TELEPHONE: 020 637 4847; WEB: www.ref.org.uk

Mr Fergus Ewing, MSP,
Minister for Energy, Enterprise and Tourism
By email: scottish.ministers@scotland.gsi.gov.uk &
fergus.ewing.msp@scottish.parliament.uk

26 April 2013

Dear Mr Ewing:

Scottish Government Answer to a Parliamentary Question from Mr Murdo Fraser MSP¹

I have just seen your most recent response to a question (S4W-13869) tabled by Mr Fraser relating to the study by Professor Hughes on the degradation of the load factors of wind turbines over time (published by Renewable Energy Foundation in December 2012).

You will not be surprised to hear that we take a close interest in what is said about work that we have released, and we are always happy to receive comments and constructive criticism. I was aware that, in responding to an earlier inquiry from Mr Fraser (S4W-13239), the Scottish Government had previously referred to Professor Hughes' study as "flawed", so I was hoping that the Answer to Mr Fraser's follow-up question might clarify this assertion.

However, the response drafted by your civil servants does not appear to advance our understanding of the issue. It misrepresents what Professor Hughes said and relies upon global averages that are neither consistent nor relevant to the experience of wind power in the UK. To be specific:

¹ S4W-13869. See http://www.scottish.parliament.uk/S4_ChamberDesk/WA20130419.pdf

(a) Professor Hughes studied the performance of all wind farms operating from 2002 to 2012, not just fifteen year old turbines. The bulk of his sample consisted of wind turbines installed after 2004. A significant degradation in performance can be observed even for turbines installed within the last five years.

(b) The study by Bloomberg NEF which you cite does not take account of any of the factors – location, wind availability, average age, operating regimes, etc – that must be considered in any careful analysis of the performance of wind turbines. We are simply perplexed that your staff should consider the Bloomberg study relevant to the issues raised by Professor Hughes.

In summary, your answer does not, in fact, produce any specific contrary evidence. Consequently, we conclude that, at present, it is reasonable to evaluate policy on the basis that Professor Hughes' findings provide the best description of what has happened in the past and is still happening.

Current subsidies to wind power are in effect a very large gamble funded by electricity customers. Professor Hughes' work provides strong empirically grounded analysis suggesting that the bet will not pay off. It appears from your answer that the Scottish Government is relying on the unsupported and implicit assumption that historical evidence, as produced by Professor Hughes, can be ignored because things will certainly be radically different in the future.

That is clearly a dangerous assumption, and we suggest that the Scottish Government would do better to engage with the data, employing the same analytical rigour that Professor Hughes has brought to the subject.

We would be very pleased to discuss matters with you or your officials. I have no doubt that Professor Hughes would be happy to be involved as well. This is, after all, a matter of public interest.

Yours sincerely,

A handwritten signature in black ink, appearing to read "John Constable". The signature is written in a cursive, flowing style with a long horizontal stroke at the end.

John Constable
Director