SUBMISSION FROM PROFESSOR TONY MEEHAN

I submit the following in response to the call for written evidence by the Economy, Energy and Tourism Committee’s inquiry into the Scottish Government’s Renewable Energy Targets.

I am responding on subjects where I have knowledge. I note the scope of the inquiry is limited to Renewable Energy and does not take cognisance of the broader energy and environmental issues and challenges facing Scotland. However it does recognise the importance of the reduction in carbon emissions which is reliant upon the success of renewable energy. This is the subject I address.

I accept the Committee is unable to comment on any current / live planning applications, however in order to illustrate my points I make particular reference to the multiple planning applications and existing permissions granted to the deep water port at Hunterston North Ayrshire.

TARGETS

As I understand the primary objectives of the Government’s Renewable Energy policy, and therefore targets, are to establish renewable, sustainable energy sources, reducing carbon emissions and to lead the world in providing carbon free energy and a low carbon society.

I invite the Inquiry to consider and accept that the inclusion in NPF 2 of the proposed new 1825mw coal fire power station endangers the Government’s ability to meet Scotland’s C02 emissions targets under the Climate Change (Scotland) Act 2009. Assuming the successful application of Carbon Capture and Storage (CCS) to the minimum levels of 300mw is achieved, the levels of uncontrolled CO2 emissions will still exceed 8 million tonnes annually.

This does not include the carcinogenic emissions which, although not in the remit of the inquiry, will endanger Public Health.

Therefore the contribution of Renewable Energy to achieve the Government’s reduction in C02 emission targets will be invalidated.

TECHNOLOGY

Continuing on the reduction of C02 emissions. The following is important for the Inquiry to recognise because it has a direct impact on Scotland’s ability to meet the required and often stated carbon reductions in order to achieve its reduced emission targets under the Climate Change (Scotland) Act 2009.

It is claimed CCS technology will reduce carbon emissions to an acceptable level. This is unproven and cannot be proved until the Coal Fire Power station is in operation. The technology, and therefore ability, to build and operate a CCS system to service 300mw does not exist.

Capturing carbon is not the challenge but the transportation and storage is. In short we are talking about “Trial and Error”
In order to be transported and stored, carbon has to be compressed into a highly volatile and unstable substance. To compare the storage process to something similar used in the Scottish off-shore oil industry is not the same. The extraction of potentially lost oil reserves by pumping water into an existing field is based on the established fact oil floats on water. Compressed Carbon does not behave in the same way. There is no historic information or practice to safely compress and transport the volumes and quantities involved. One mistake and the results will be catastrophic.

I invite you to recall the recent BP Gulf of Mexico disaster. Whilst being aware of the dangers in the transportation and storage of C02. Who carries the risk? Is it the operator of the power station? Is it the electricity company buying the output? Is it the Scottish Government? Is there an insurance company who is prepared to accept the risk?

I suggest the important questions regarding CCS at this time are;
Who actually knows how CCS will function at commercial volumes of 2, 8 or 10 million tonnes of C02 annually over a forty year lifetime?
What are the capacities and capabilities and how much can CCS deliver?
What are the dangers?

As an observer there appear to be three groups of “specialists”
Those who have a financial / professional interest and will do / say what is necessary to receive Government support for research and development or commercial gain.
Those who should know the answers, but do not, thereby avoiding political and commercial responsibility.
Those who caution against immediate and blind commitment to an unproven science that has the potential to create, serious, dangerous and lasting consequences.

Might I propose the Inquiry favour the third group as caution being the optimum and safest course to follow at this time?

**PLANNING AND CONSENTS**
Is the planning system adequately resourced and fit for purpose?

When asked every Government department will probably answer this question saying it is under resourced. However the second part of the question is the key to answering the first part. If it is not fit for purpose, is this due to lack of resources or incompetence?

Due to the ever changing technological and political agendas connected to subjects of energy and planning, the skills of the planner and the associated government departments which support them, require constant reviews of their professional abilities and continuous education. These should be encouraged and resourced.

Sepa as the Scottish Environmental Protection Agency should do just that. If it does not have the knowledge or expertise, which it admits insofar as the transportation
and storage of CCS, it should not give support and approval to a planning application which is dependent on the successful use of CCS.

SEPA currently has the freedom to change its position to a Consultee as it chooses or consider it to be appropriate, thereby abdicating its responsibilities. This should not be allowed.

National Planning Framework 2 designated a number of projects which were not included in the initial Consultation and in doing so avoided, or failed, to consult those communities who would be affected. This should not be allowed.

Why under Section 36 of the Electricity Act, is there automatically a “Deemed Planning Permission” (DPP) for any and every application? And why is the only way in which such an application can be halted is if the Local Planning Authority files an objection?

To illustrate this point; North Ayrshire Council, the local planning authority, objected to the application to build the coal fire power station at Hunterston. This DPP is now subject to a £multi-million Public Inquiry which may or may not resolve anything. Those who wish to present an effective challenge to the Application at the Public Inquiry will incur substantial legal costs to do so, while the taxpayer pays for the Government’s costs. This should not be allowed.

The Inquiry may wish to consider the judgement by Lord Brailsford against Mr McGinty. In which he ruled that one insert into the Edinburgh Gazette is an acceptable level of public information and consultation. This should not be allowed. The above comments would suggest the current planning and consents system is not fit for purpose.

National priorities reconciled with local interests
In addressing this matter, how does one differentiate between National priorities and local interests and political priorities?

In national priority terms, is it in the Scotland’s best interest to have an imbalanced Energy Policy which removes a low cost, clean and safe energy system because of an immovable political ideology?

Because of this there is a conflict of position and information regarding the ability of renewable energy to fulfil Scotland’s short term and future energy requirements and the need to reduce Carbon emissions. Who does one rely on for accurate information?

If it is in the remit of the inquiry to address this question and present an answer which resolves the above conundrum, then I suggest the Inquiry has fulfilled its purpose.

With regards to local interests; it would seem as though employment, or perhaps it should be unemployment, has become a planning gain – and as such attracts support at a local level – but should this be allowed to mitigate the planning
decision? I ask this because there can never be any guarantee of local employment for skilled jobs.

If required I am available to meet members of the Inquiry to expand further on the above points.

Professor Tony Meehan
1 March 2012