Dear Kim,

With Reference to the Request for Action

I am very concerned with the delays for action. Every day delayed allows more damage to the water environment and the potential for harm as described in Chapter 4.4.2. of the Request for Action (RfA). Water is a basic human right and a requirement for life and lack of action is denying this right to many of our citizens.

Access to justice provisions of the Directive on Environmental Liabilities are only a limited implementation of the broader rights to challenge acts and omissions of public authorities related to the national law on the environment -Article 9(3) of the Aarhus Convention\(^1\) and 9(4). Clearly, the maintaining of the proper quality of groundwater and surface water for drinking, is a provision of (not least) the Water Framework Directive, and is related to the national law on the environment. So therefore, it is submitted that the broader provisions of Article 9(3) and 9(4) apply. (fair and timely - to say the least).

The UK system has been held repeatedly to be in breach of Article 9 of the Aarhus Convention, which says that members of the public should be able to challenge environmental decisions, and the procedures for doing so shall be adequate and effective and not prohibitively expensive.

**Article 9 of the Aarhus Convention**
- Art. 9(1) – access to review procedure for any person whose request for environmental information has been ignored, refused or inadequately answered
- Art. 9(2) – access to review procedure for members of the public concerned to challenge substantive or procedural legality of decisions, acts or omissions subject to public participation provisions of art. 6
- Art. 9(3) – access to administrative or judicial procedures for members of the public to challenge other acts or omissions which contravene provisions of national law relating to the environment.
- Art. 9(4) – review procedure shall provide adequate and effective remedies and be fair, equitable, timely and not prohibitively expensive
- Art. 9(5) – information to be provided to the public on access to review procedures and establishment of assistance mechanisms to remove or reduce financial and other barriers to access to justice to be considered

The delays have coincided with Scottish Government decisions re: Whitelee and Sneddons Law Windfarm Developments and may also be in trying to find ways to dispute the evidence. Other developments referred to in Chapter 4.5.4 – 4.5.11 are being ignored and allowed to proceed without the necessary checks and balances. I will expect to be provided with all the ongoing monitoring results for these developments showing that all mitigation procedures have been successful, that there have been no pollution incidents or downgrading of water catchments and that all planning conditions and recommendations have been met by the windfarm developers. (I am following PMO reports to which I will refer at a later time).

1. We now have more evidence of the potential for Windfarms to seriously affect our water supplies, with the recently published Sneddon Law WF Private Water Supply Risk Assessment (PWSRA): https://app.box.com/s/61683trl1bryog9sjlyp1wvffufpk945

\(^1\) http://ec.europa.eu/environment/aarhus/pdf/marc_pallemaerts.pdf
Sneddon Law Windfarm was originally permitted by East Ayrshire Council in 2012. It has taken Community Windpower Ltd (CWL) nearly five years to commission this PWSRA. This has only happened because EAC refused, in January 2016, to discharge the planning condition that was supposed to protect people’s water supplies. This is directly as a result of Dr. Rachel Connor’s irrefutable evidence of water contamination and completely vindicates her evidence in the Whitelee3 windfarm Extension PLI report. It also questions the Scottish Government’s and SEPA’s competence as the authority with the expertise to make judgement on windfarm and water contamination issues.

As a result of the refusal to discharge the PWS planning condition, CWL have submitted an Appeal to the Scottish Government (DPEA) and this PWS planning condition is now due to be considered at a public Hearing, starting on 9 January 2017.

The PWS RA report is from the developer’s own expert consultants and witnesses (Geohydrologists MacArthur Green) which lists 8 PWS as now being at major risk for loss of, or pollution to their PWS and 12 PWS as being at moderate risk. Twenty private water supplies in total are considered to be at significant risk, applying the appropriate Environmental Impact Regulations.

All of these PWS now considered to be at significant risk are outside SEPA’s designated (LUPG 31) 250m ‘one size fits all’ buffer zone. This is SEPA’s guidance for the minimum distance for a water source to lie from a windfarm related excavation of more than 1 metre in depth (ie borrow pits or turbine foundations.) This rule of thumb is “designed” to provide absolute protection for private water supplies. But it does not do that. Again I would like to draw your attention to the same situation at Glenapp windfarm, currently under construction, where only 2 PWS are considered at risk, with any mitigation requirements, out of 28 within the water catchment zone.

The PWSRA in paragraph 3.2.3 suggests that because searches are based on property location (as is the case at Glenapp), rather than source location, that the search area is based on a 500m radius from the boundary as it provides ‘a more conservative and precautionary assessment and aims to capture any source locations that are at a distance from the registered property’. It also highlighted the need to consider the fractured nature of the bedrock as potential hydrological pathways and that each PWS needed to be individually assessed. It also highlighted that assessment should be driven by localised hydrological and hydrological conditions and not restricted to the LUPS-GU31 SEPA guidance of 100m and 250m.

Despite repeated requests from East Ayrshire Council over the past four years to review information for Sneddon Law windfarm, SEPA have repeatedly discharged any concerns related to their interests- which includes the protection of surface and groundwater in the environment. Once again, as they did for the WL3 Extension Public Inquiry, SEPA have declined the invitation by the Reporter to attend and contribute to the PWS Hearing for Sneddon Law WF. This is unacceptable for a Scottish Government Authority with responsibility for upholding the law on factors of the water environment

2. Please allow me to remind you of these facts?
Sneddon Law WF is adjacent to and surrounded by Whitelee WF on three sides and it shares much of the same solid geology and surface structure as Whitelee WF.

In the decision notice for the Whitelee WF 3 Extension, issued only in October 2016, 20 months after the Inquiry, Dr. Rachel Connor was criticised by Scottish Power and the Reporters as being unqualified to draw any conclusions as to how so many water supplies during that windfarm construction were either lost completely (four in total) or suffered serious contamination with sediment and bacteria. The Whitelee Extension 3 Public Inquiry in June 2015 lasted almost a week and dealt largely with the alleged impact, caused by constructing Whitelee WF original and its two Extensions (2006 -2013) on public and private water supplies as well as on surface and groundwater. Permission was ultimately refused for “landscape” reasons. (see Report) http://www.windsofjustice.org.uk/wp-content/uploads/2016/11/Whitelee-Extension-Phase-3-PLI-report.pdf

The difference this time is a that a professional water risk assessment, commissioned by the developer, has used the same background geohydrological risks to draw many of the same conclusions as were drawn by Dr. Rachel Connor and her team, at the Whitelee 3 Inquiry. On this occasion, therefore, CWL cannot cast doubt on the evidence, the conclusions and the credibility of their own experts.

Rural dwellers rely on their private water supplies and usually have no alternative supplies. They are more vulnerable to contamination and pollution than public water supplies. It should not be the case in 21st Century Scotland that our citizens have to fight for the right to protect and maintain their water supplies in a clean and wholesome condition. SEPA has been presented other Request for Actions in relation to water contamination and windfarm development, Blackcraig windfarm in Dumfries and Galloway being one which identifies all these concerns to their PWS. Unless a full independent Geohydrology report is made standard practice with all the correct monitoring, then citizens will continue to become ill as the water environment continues to become contaminated. Water is a basic human right and a requirement for life. There have been several successful human rights cases based on pollution of PWS in Europe, not just because of pollution by commercial developers but also by local authorities. This is a live issue wherever industrialisation takes place.

PWSRA Chapter 3.2.5 identifies the same potential effects which were identified in the RfA; which actually occurred during the construction of Whitelee windfarms: the contamination of surface and ground water caused by leakage and spills of chemical from vehicle use and groundwater contamination from concrete pouring for turbine foundations within excavated areas, in close proximity to groundwater linked to potential pathways linking the source of the pollution with the receptor.

Again the potential for erosion and sedimentation pollution into surrounding watercourses, during construction, occurs during rainfall events from exposed ground or borrow pit excavation and ground disturbance in the proximity of emergent springs can also cause a deterioration of subsurface water quality.

The last paragraph of 3.2.5 states: The introduction of impermeable infrastructure and any associated drainage during the construction phase of the Development, may lead to the diversion of flow from upper catchment areas. Whilst turbine foundations will be impermeable, access tracks and
material used for the temporary and permanent substation will be of crushed stone and will maintain a level of permeability. Diversion of flow could lead to deterioration in the quantity of water along its original pathway, causing a potential reduction in yield at any abstraction point; and could remain for the life of the impermeable barrier. In addition, excavation from borrow pit construction or dewatering can result in the lowering of the water table. The assessment of ‘drainage’ in this WRA refers to the potential for the Development to alter the direction of natural drainage paths to the source. This could result in a reduced volume of water along the natural drainage path. The potential for an activity to cause a reduction in flow is again based on a combination of the type of flow path, the nature, direction and extent of the activity and local topography. The assessment of this potential risk is based on implementation of good practice throughout all phases of the Development, professional judgement and experience from other relevant projects.

3. Evidence in the Request for Action clearly demonstrates that ‘good practice’, ‘professional judgement and experience from other relevant projects’ does NOT work or are ignored by developers.

In the case of Sneddon Law WF, how can the developer be allowed to submit an Environmental Statement (ES) which is so deficient that it fails to list almost all the PWS that are now deemed to be at major risk of either pollution (loss of quality) or loss of quantity, or loss altogether? It is extraordinary that the original ES from 2011 listed only six PWS as being at risk. All were then deemed to be at negligible risk apart from one (Craigends) now owned by CWL and intended to be mothballed, with the property rendered uninhabitable. The information now available that 20 PWS were at significant risk from the development was not before the Council when it awarded consent in 2012. To their credit, EAC now recognise this. They have a policy that any planning application likely to affect water supplies would be regarded as a deemed refusal, in line with the EU’s Water Framework Directive. Other councils have this same policy but if developers submit Environmental Statements (like all those listed in the RfA) which do not identify ALL PWS at risk, and do not identify ALL watercourses at risk, then how can they be protected?

Why then is this critical environmental information omitted from the Environmental Statement? The Scottish Government MUST take responsibility for its negligent action in not having done proper SEA. This failure to provide such important environmental information before a decision to award Planning Permission consent must be questioned? How can Permission be regarded as being competent if there is missing information which would be contrary to existing law?

I would just like to draw your attention to the Maastricht Recommendations transposed into Scottish Law:

Article 31, GENERAL RULE OF INTERPRETATION
1. A treaty shall be interpreted in good faith in accordance with the ordinary meaning to be given to the terms of the treaty in their context and in the light of its object and purpose.
2. The context for the purpose of the interpretation of a treaty shall comprise, in addition to the text, including its preamble and annexes:
   (a) Any agreement relating to the treaty which was made between all the parties in connexion with the conclusion of the treaty:
(b) Any instrument which was made by one or more parties in connexion with the conclusion of the treaty and accepted by the other parties as an instrument related to the treaty.

3. There shall be taken into account, together with the context:
(a) Any subsequent agreement between the parties regarding the interpretation of the treaty or the application of its provisions;
(b) Any subsequent practice in the application of the treaty which establishes the agreement of the parties regarding its interpretation;
(c) Any relevant rules of international law applicable in the relations between the parties.

4. A special meaning shall be given to a term if it is established that the parties so intended.

4. Forestry and peat are the two main sources of carbon capture and much of our forestry and peat lands are integrated needing real protection. The Scottish Government’s blind commitment to industrialising our forests and peatlands is releasing vast quantities of CO2 into the atmosphere See Ramsar protection:

https://www.youtube.com/watch?feature=player_embedded&v=ZcxZ9gvNfSU

Draining peat is the equivalent of burning fossil fuels. Draining an area of peat the size of a football field (the base for each individual windturbine) releases the same amount of CO2 as driving a family car 3 time round the world. This CO2 loss is never calculated as part of windfarm CO2 savings. FCS has 690 turbines operational (471), under construction (31), pre-construction (66) and in planning (122) industrialising a

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21 Over half of Scotland’s territorial land area is public land by virtue of the Crown’s ownership of Scotland’s territorial seabed, while around half the length of Scotland’s foreshore is also still public land owned by the Crown.

22 In considering the terrestrial half of Scotland, the totals in Fig. 7 indicate that approximately 886,000 ha, or 11% of Scotland’s land area of 8 million ha, is owned by the Scottish Government and local authorities.

Fig. 7 Public Land Ownership in Scotland

23 The two largest components of the Scottish Government’s land and therefore the great majority of public land in rural Scotland, both result very largely from acquisitions during the first half of the 20th century. The crofting estates date from the Government land settlement programmes from the end of the 19th century until the 1930s. The build up from 1931 of the land managed by the Forestry Commission that now makes up Scotland’s National Forest Estate had largely ended by 1970s. The growth of public land ownership during the first half of the 20th century, remains one of the few major changes to have significantly affected the pattern of land ownership in rural Scotland during the last 100 years.

24 During the last 40 years, the overall proportion of public land ownership compared to private land ownership seems to have remained broadly similar. The pattern of private land ownership in the remaining nearly 90% of rural Scotland is considered later in Section 4 of this Report.

total of 21295.05 hectares of forestry land.
Please can you inform me as to how many turbines are on the other areas owned below?

Accelerated forest clearance in preparation for windfarms cannot be separated from windfarm development as it would simply **NOT** be felled in this way other than to facilitate clearance for the industrial windfarm. Therefore the water contamination associated with forestry clearance has to be considered as part of the windfarm development.

RFA Chapter 4.5.1 refers to an FOI answered by SEPA.

1. **Arecleoch** - Could you please therefore supply me with details of all water testing sites, dates and results from base line to present day and list all properties tested for including suspended solids and particulate matter/colour (mg/l/pt/Co)/turbidity (NTU), iron/manganese/E coli/coliforms/toluene and any other pollutants. states:

**Q1. We advise SEPA has no routine groundwater quality, level monitoring or microbiology water quality monitoring in the Arecleoch area.**

It is therefore reasonable to conclude that the methods employed may not be effective.

Although not ‘routine’, I would have expected SEPA to have been aware of the following research and I would like to submit it as further evidence: “Understanding aquatic carbon loss from upland catchments in south west Scotland during land use change from commercial forest to wind farm” by Melanie van Niekerk 2012 Submitted to the School of Natural Sciences Biological and Environmental Science University of Stirling Scotland.


*This research provides one of only three studies to investigate concentrations and fluxes of DOC in water courses draining land subject to disturbance relating to wind farm construction. It is the only study that incorporates a period of time prior to work beginning and takes in the whole of the development phase. In this respect it provides a valuable addition to our understanding of the way in which peatlands respond to land use change and may provide useful tools to assist developers in minimising the impact of their activities on these valuable carbon stores.”*

“This research has:

1. Added three new catchments to the detailed knowledge base of DOC concentrations and fluxes from UK peatlands. It has also presented some of the highest known values for such areas. It also provides one of only four studies to investigate concentrations and fluxes of DOC in water courses draining land subject to disturbance relating to wind farm construction (Grieve & Gilvear 2008; Murray 2012; Waldron et al. 2009);

2. Confirmed the persistence and dominance of the seasonal pattern of DOC through a period of land use change and shown how the pattern was modified by two harsh winters;

3. Highlighted at the catchment scale an impact from wind farm development on DOC concentrations and fluxes;

4. Elucidated some activities that led to elevated DOC concentrations and fluxes, for example turbine base installation and forest harvesting;
5. Introduced activity scores as a novel means of attributing changes in DOC to the type and intensity of development activity; and

6. Used E4/E6 ratios as a way of detecting changes to DOC composition resulting from land use change.

This piece of research is highly relevant to this RfA both by providing valuable information on the construction effects on the area of Arecleoch and confirming the impacts of forestry and windfarm construction on the water environment.

Scottish Power Renewable and SEPA were instrumental in facilitating this research as they are mentioned in the acknowledgements. This research should be added to the evidence already sited below.

5. I would like to remind you that the deterioration of water supplies, (documented deterioration during the Whitelee construction period of both surface and groundwater, with extensive monitoring conducted by SPR, Scottish Water, SEPA and Glasgow and Edinburgh Universities) is contrary to the Water Framework Directive (WFD). The EU Water Framework Directive (2000/60/EC) came into force on 22nd December 2000. It was required to be adopted into municipal law, i.e. UK statute, by all Member States.

Both Amlaird WTW and the two public reservoirs are now being taken out of commission with the building of a new 1m wide pipeline, due to be completed March 2017, which will bring ‘clean’ water from North of Glasgow (Loch Katrine) more than 20 miles, to East Ayrshire at a cost to the Scottish public purse of over £120 million.

http://www.scottishwater.co.uk/about-us/media-centre/latest-news/braden-water-supply-investment
http://www.scottishwater.co.uk/Investment-and-Communities/Your-Community/New-Ayrshire

The same is happening at Loch Braden which is also being prepared to be taken out of commission due to the treatment works being unable to cope with the high carbon content in the water.

Chapter 4.3.3 in RfA highlights this issue and its connection with high levels of THM’s studied by Professor Simon Parsons (4.3.3 (95-97) and the connection with various cancers.

The Scottish Government (written questions submitted to Fergus Ewing December 2015) has declined to answer whether Scottish Power Renewables, as the Whitelee windfarm developer could be liable for costs of reparation under EU law: The Water Framework Directive (WFD) transcribed into Scots Law with The Water Environment (Drinking Water Protected Areas)(Scotland) Order 2013, This Order describes criteria that would necessarily constitute a breach of the WFD which dictates that the ‘polluter pays’.

1. Drinking Water Protected Areas have to be protected with the aim of avoiding any deterioration in their quality that would compromise a relevant abstraction of water intended for human consumption. A supply intended for human consumption would be compromised if as a result of deterioration in the quality of the water body:

2. an abstraction (or planned abstraction) of water intended for human consumption
has to be abandoned and an alternative used to provide the supply;

3. water abstracted (or planned to be abstracted) has to be blended with water abstracted from another source;

4. additional purification treatment has to be applied; or

5. the operating demand on the existing purification treatment system has to be increased significantly.

All of the above ‘breaches’ occurred in relation to the construction period of Whitelee windfarm and is already occurring elsewhere. Action needs to be taken immediately.

6. I conclude with the summary from the Request for Action:

2. Summary of Request:


The evidence of pollution stems from the monitoring recorded as a requirement for Whitelee windfarm construction 2006-2009. The results of monitoring were not considered by the Scottish Government prior to consenting the WL WF Extensions 1 and 2 in 2010, despite evidence indicating ground water contamination had occurred from the original windfarm on a designated Drinking Water Protected Area.

Potential for such damage to the surface and groundwater will be cited at application or appeal stage for all windfarm developments on River Basin sites, specifically the proposed windfarms at Afton, Sneddons Law, Kilgallioch, Assel Valley, Tralorg, Hadyard Hill Ext., Ballantrae (Glenapp) windfarms and the 5 windfarms around Straiton with special reference to Dersalloch. None of these projects are built. Lack of legally required monitoring will be cited at Arecleoch and Mark Hill windfarms.

A wind farm development involves wind turbine installations and activities which involve the use and storage of dangerous substances.

The ELD 2004/35/CE states:

Whereas:

The prevention and remedying of environmental damage should be implemented through the furtherance of the "polluter pays" principle, as indicated in the Treaty and in line with the principle of sustainable development. The fundamental principle of this Directive should therefore be that an operator whose activity has caused the environmental damage or the imminent threat of such damage is to be held financially liable, in order to induce operators to adopt measures and develop practices to minimise the risks of environmental damage so that their exposure to financial liabilities is reduced.

Definitions

1. ‘environmental damage’ means

(b) water damage which is any damage that significantly adversely affects the ecological, chemical and or quantitative status and or ecological potential, as defined in Directive 2000/60/EC [1] of the waters concerned

2. ‘damage means a measurable adverse change in a natural resource or measurable impairment of a natural resource service which may occur directly or indirectly.

Yours sincerely,

Susan Crosthwaite

Copied to:
First Minister Nicola Sturgeon
Ruth Davidson MSP
Andrea Leadsom MP
Dr. Therese Coffey MP
Paul Wheelhouse MSP
Alexander Burnett MSP
Murdo Fraser MSP
Shona Robinson MSP
Roseanna Cunningham MSP
Maurice Golden
Angela Constance MSP
Michael Matheson MSP
Fergus Ewing MSP
David Mundell MP
Lady Marr MP
David Henderson DPEA