

22 February 2019

Dear Sarah and Briony,

The Independent Electricity Generators Association Incorporated (IEGA) appreciates this opportunity to make suggestions about improvements that could be made to the regulatory regime for renewable generation to enable timely investment consistent with achieving the government's renewable electricity and climate change targets.¹

The IEGA's membership is either directly or indirectly associated with predominately small scale power schemes throughout New Zealand for the purpose of commercial² electricity production.

Our members have made significant economic investments in generation plant and equipment throughout New Zealand that is embedded within local distribution networks with 95% of the plant using renewable fuel. IEGA members' generation plant range from 0.1MW to around 10MW (with one plant at 25MW and another at 32MW). Combining the capacity of members' plant makes the IEGA the sixth largest generator in New Zealand. At this stage we do not have any investors in solar pv as members.

IEGA members are small, entrepreneurial businesses, essentially the SMEs of the electricity generation sector. We are price takers in the electricity market and provide significant benefits to the regions in which we operate. Distributed generation also provides incremental renewable generating capacity that much more closely matches local or regional growth in electricity demand as New Zealand's transition to a low emissions economy progresses.

As discussed in our meeting on Friday 14 February, the regulatory regime intersects with the operation of, and investment, in renewable electricity capacity when an investor wants to:

- amend the conditions of an existing consent for an operating plant – most likely to make the investment more productive. This is referred to as re-powering overseas
- re-consent an existing consent that is due to expire
- amend the conditions of an existing consent prior to construction. The project may have been consented several years ago and new technology or information becomes available that means a variation would result in a more productive site
- gain a consent for a new project

¹ The Steering Committee has signed off this submission on behalf of members

² As such we do not represent household solar pv investors

As asked we have focussed on the impact of the regulatory regime on generation connected to the local distribution network.

Simplified process for smaller generating plant

The regulatory regime imposes disproportionate costs on smaller scale plant. That is, the consenting process is a 'one size fits all' approach whether the generation plant is 330MW or 0.5MW. This disadvantages the development of small scale renewables due to the complexity, risk, cost and time involved. We provided a case study of re-consenting the 100 year old Raetihi hydro power station. This process took 19 years and cost \$0.5 million (excluding the cost of the owner's time) for a 0.5MW plant. Converting this cost to re-consenting the neighbouring Tongariro Power Scheme of 330MW would cost \$330 million.

The IEGA **suggests a simplified (less complicated) process up to a de-minimus of 10MW for the 'SME' sector of the generation market** (ie generation that is not connected behind a consumer's meter). This approach is taken by the government in other sectors of the economy.

We recognise the importance of the environmental and engagement focus of the Resource Management Act (RMA). However, the RMA requires numerous studies to be undertaken prior to an application being lodged that can be proven to be completely irrelevant during the consenting process for generating plant less than 10MW. For example, archaeological, birds, noise studies etc. Further, each consenting authority has discretion to consider an application with its own approach / process / focus. For example, consenting authorities can impose different methodologies for testing particular effects.

We **suggest an Expert Panel** be created that can assess a generating plant proposal at an earlier stage before any studies are undertaken. The Expert Panel would have the authority to determine that the application does not require some particular studies. For example, a 1MW hydro plant in a remote area of a farmer's land does not require a noise study.

The Panel would have expertise in hydro, wind, solar and other generating technologies and apply a consistent approach or criteria across projects across New Zealand. It would shape the consent application by identifying the issues associated with the project that have to be further investigated or addressed in the consent application.

Further, this Expert Panel could impose conditions which, if met, would not be re-litigated during the consent process by the consenting authority. Or it could impose conditions that form a minimum threshold – this threshold could be exceeded if the investor does a study to satisfy that the aspect of the project is not an issue. For example, a hydro plant that diverts less than 25% of the river's flow is allowed; or the project can take more than 25% if a study proves this will not have a detrimental effect.

This Expert Panel process would provide a higher level of certainty for an investor at the start of the consenting process. At the moment an investor undertakes a large amount of work at considerable cost to put their best foot forward in a consent application but there is absolutely no certainty about whether the information prepared will be sufficient to satisfy the consenting authority. Our members

are dispersed across New Zealand and are often dealing with small local authorities that do not deal with consenting generation plant very often³.

This process also works for all of the times an investor has to deal with consenting (list on page 1).

The benefits of having an Expert Panel as an initial gateway for projects of 10MW or less are:

- a reduction in the cost of undertaking studies to support a consent application – as the Expert Panel will determine the studies that are directly relevant to the application
- a consistent approach to reviewing applications across New Zealand
- more certainty for investors considering a proposal prior to making a significant investment in the regulatory process
- it is consistent with other rules faced by distributed generation in the electricity market – the Electricity Industry Participation Code has a de-minimus of 10MW in relation to the obligations to the System Operator.

National Environmental Standards

On the same vein, the IEGA suggests National Environmental Standards could usefully ensure a consistent approach to particular issues across all consenting authorities. The example we discussed in the meeting was fish passage past a hydro dam. At the moment there are different tests and different conditions imposed for the passage of the same fish in different catchments.

An NES for small-scale wind or hydro would be positive in all circumstances listed on page 1.

Repowering

Repowering of wind farms is a focus in a number of jurisdictions. This is discussed in the context of the UK in a [report](#) by the Energy and Climate Intelligence Unit, which includes how the government could support the repowering investment (March 2018).

The European Union “Proposal for a DIRECTIVE OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL on the promotion of the use of energy from renewable sources”⁴ included the following process for repowering:

³ This differs from say Meridian and Genesis that deal with one consenting authority for the entire Waitaki power scheme or Mercury for the Waikato power scheme

⁴ See https://eur-lex.europa.eu/resource.html?uri=cellar:3eb9ae57-faa6-11e6-8a35-01aa75ed71a1.0007.02/DOC_1&format=PDF

d) Administrative simplification: (1) reinforced provisions with "one-stop-shop", time ranges and facilitated procedures for repowering; (2) permitting procedures time limited, through automatic approval and simple notification for small projects.

A combination of Options 1 and 2 is preferred for this Proposal, in order to establish a permit granting process for renewable energy projects with one designated authority ("one-stop-shop"), a maximum time limit for the permit granting process, a simple notification to Distribution System Operators for small scale projects and a specific provision on accelerating permit granting process for repowering existing renewable plants. This option allows achieving clearer, more transparent, predictable and less time-consuming permitting processes for applicants.

This option is proportionate as it is to a large extent the implementation of best-practice procedures that already exist in some Member States. It does not entail high costs. It respects subsidiarity as it leaves Member States the choice of how to organise the one-stop-shops. It also does not interfere with the content of the permitting procedures.

Directive statements in regulatory instruments

The IEGA supports changes to the NPS-REG to make this instrument more directive. We do not have the legal resource to provide suggested rewording but have made the following comments in previous submissions:

- the NPSREG has equal weighting with numerous other criteria in the RMA so has no 'teeth'
- there is little consistency between regions / districts as to the provisions that apply to the operation, maintenance and development of renewable electricity generation activities
- the provisions in the NPSREG are not as directive or 'forceful' as those within the New Zealand Coastal Policy Statement ('NZCPS') or the National Policy Statement on Electricity Transmission ('NPSET') which impacts on its implementation within lower-order statutory planning documents
- the NPSREG has not provided any certainty for the re-consenting of existing renewable electricity generation schemes.

We note the following sections of the 'DIRECTIVE 2009/28/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 23 April 2009 on the promotion of the use of energy from renewable sources and amending and subsequently repealing Directives 2001/77/EC and 2003/30/EC' updated in 2015⁵.

- (3) The opportunities for establishing economic growth through innovation and a sustainable competitive energy policy have been recognised. Production of energy from renewable sources often depends on local or regional small and medium-sized enterprises (SMEs). The opportunities for growth and employment that

⁵ <https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:02009L0028-20151005&from=EN> page 2-3

investment in regional and local production of energy from renewable sources bring about in the Member States and their regions are important. The Commission and the Member States should therefore support national and regional development measures in those areas, encourage the exchange of best practices in production of energy from renewable sources between local and regional development initiatives and promote the use of structural funding in this area.

- (4) When favouring the development of the market for renewable energy sources, it is necessary to take into account the positive impact on regional and local development opportunities, export prospects, social cohesion and employment opportunities, in particular as concerns SMEs and independent energy producers.

- (6) It is appropriate to support the demonstration and commercialisation phase of decentralised renewable energy technologies. The move towards decentralised energy production has many benefits, including the utilisation of local energy sources, increased local security of energy supply, shorter transport distances and reduced energy transmission losses. Such decentralisation also fosters community development and cohesion by providing income sources and creating jobs locally.

The above are clear statements by the European Union about the value of distributed renewable energy and how member government policies should approach these investments.

These statements also acknowledge the benefit of “shorter transport distances and reduced energy transmission losses”. This benefit probably has more relevance in NZ than most European countries given our long stringy transmission grid and distance between utility scale renewable resource and major load centres – transmission losses are about ~3.5 – 4%% of total generation injected into the transmission grid by grid connected generation plant, and losses on distribution networks about ~5%.

Department of Conservation

The conservation estate is about 30% of New Zealand’s land mass. However, it forms a higher proportion of the land / resource suitable for hydro generation plant. That is, hilly / mountainous land where water collects and flows from a height – the height from source into a power station, called the head, determines the amount of electricity that can be generated from the same quantity of water – the higher the head the more electricity.

IEGA members’ experience is that the Department of Conservation (DoC) is a significant opponent to even small scale hydro development. Their involvement has resulted in significant delays, increased uncertainty and risk for consent applications and minor consent variations. Further, if a hydro development is consented DoC appears to have complete discretion about the concession rates applies to different schemes as well as the discretion to amend the rate for an existing generating plant.

Given the size of the conservation estate and the quantity of new generation capacity required to achieve NZ’s electricity and climate change targets, the IEGA suggests the conservation estate be reviewed and ‘zoned’ for renewable generation developments. Associated with this a standard

concession fee could be determined and published for any renewable investment. This could be a decision that renewable generation can be built on land classified as stewardship land. A zoning approach as well as a standard concession rate will provide investors with certainty when investigating renewable resources.

Investor certainty

The IEGA suggested in our submission on the Zero Carbon Bill that any target in primary legislation should apply to the activities, purpose or statutory objectives of any government agency that could make decisions with climate change implications. For example, the Department of Conservation as it is involved in 'approving' renewable generation projects.

The IEGA would welcome the opportunity to discuss this letter with you in more detail.

Yours sincerely

A handwritten signature in black ink, appearing to read 'Warren McNabb', is positioned above the typed name.

Warren McNabb
Chair