Submission to Victorian Renewable Energy Auction Scheme
Response to Consultation Paper
Department of Environment, Land, Water and Planning

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Executive summary

At Aurecon, we work with clients who are active across the full spectrum of the energy supply chain, from development, generation, transmission and distribution to retail. Our work sees us engage a wide range of stakeholders from technology providers and contractors through to communities and regulators. As such, we’re in a unique position that touches each of the elements that impact the transition to a renewable energy economy. The transition itself will be challenging. Those businesses that foster a culture of innovation will be able to adapt and to succeed. Governments that create the space for innovation and facilitate efficient allocation of capital will attract and grow new industries.

For Victoria to develop a successful pathway to up to 40% renewable energy generation our submission highlights several important factors in designing the Auction scheme:

- **Focus on energy supply options that help meet demand**
  - As a means to more efficient use of capital and reduced costs to consumers, we encourage the structure of the auction to ensure by and large the deployment of technology that can match supply and demand, by auctioning time-based tranches of energy (day time ‘blocks’ for example) and to facilitate deployment of storage technologies in the longer term.

- **Transparent processes and predictable timelines**
  - Investors value knowing the rules of the game. It gives them confidence to put capital at risk and compete. A well designed scheme that offers reasonable notice to participates, makes the rules clear as early as possible, has the greatest chance of encouraging international developers to enter the market and compete. Mobilising resources takes time and effort. Ensuring transparent processes and predictability (with flexibility) will yield the best result for Victorians.

- **Learn from global experience**
  - The Chilean Government reverse auction processes of the last few years is perhaps the best example internationally of a scheme that has facilitated significant investment in renewables. It’s use of ‘time based’ energy tranche auctions to bring forward solar, including solar thermal, to get the industry itself solving typical supply-demand imbalance between renewable generation and customer demand is industry leading.

- **Be mindful of stranding assets**
  - The 40% renewable target should take into account the momentous potential for change in global energy markets with the advent of low cost solar, ever cheaper large scale batteries and, in the transport sector, electric vehicles…consider the economy wide challenge of distributed generation and the great work other Victorian departments are doing to facilitate this.

- **Beware of bubbles**
  - Inefficient duplication of resources and effort between parallel and competing projects has become somewhat of a hallmark in Australia’s recent history of developing and delivering major energy projects. Where these major projects have failed is in a coordinated and unified approach focussing on optimum long term market outcomes over short term milestones. Ensuring the auction scheme sees labour and resources allocated efficiently will reduce any upward pressure on the cost of delivering projects.

- **Build an industry, not some projects**
  - With the energy industry in transition, we encourage the Government to seek to establish a focus on technology as the enabler to a renewable energy economy, along with digitisation of infrastructure, data collection and predictive analytics. Driving jobs growth and investment to make the transition smooth for existing participants and stakeholders is a worthy aim, and this should be targeted over the long term, not just during the construction phase.
1 Scheme structure

1.1 How can the Department ensure that a pipeline of projects will be ready to meet the Government’s targets for 2020 and 2025 while maintaining appropriate flexibility for Government to adjust the scheme where required?

At Aurecon, we are deeply engaged with many and varied renewable energy developer-clients who make the investment decisions to bring projects to markets. The overwhelming feedback from our clients is that we:

- Set firm targets with defined timelines
- Lead a transparent process
- Set clear expectations on the tender requirements

We provide sufficient certainty for our clients to risk development capital expenditure to prepare their projects.

We believe that a substantial pipeline of Victorian renewable energy projects exist that will contribute to meeting the interim 25% by 2020 target. These are mainly wind projects, of which many are in the process of seeking re-approval for amended project configurations to take into account the latest technology and higher turbine hub heights.

1.2 How much notice should be provided to industry of upcoming auctions?

As per our response above, we do not expect the target to come under ‘supply’ pressure in the medium to longer term. We expect the key factor impacting the time required to prepare for auctions to be the compliance expectations set by the Government for already identified project opportunities. These could include elements such as a requirement to have the project approved or if not already approved, all approvals submitted.

With a transparent auction schedule, and clear incremental ‘build target’, 6-9 months’ notice is expected to be sufficient for the initial tranche and provide the impetus for developers to ensure they are prepared for later auctions.

Consideration needs to be given for when the supply is required to be online – noting that typical construction schedules vary depending on the technology and in particular, the nature of its grid connection.

1.3 Should capacity be auctioned in consistent capacity tranches (eg 200 MW etc)?

In order to more accurately reflect the principle that the Victorian target is an ‘energy’ target, we recommend the Government consider basing the target on ‘energy tranches’ (MWh or GWh) rather than capacity (MW or GW).

In this way, an energy target it set for 2020 and 2025, with an annual (say) volume of energy to be auctioned. Ideally, this incremental volume would start smaller and increase over time. In this way, the Government will be able to capitalise on technology improvements and anticipated cost reductions.
1.4 **At what frequency should auctions be held?**

We recommend initially structuring the scheme to hold auctions on an annual basis, with flexibility to move these at the discretion of the Government by up to six months. This creates both a level of certainty for developers, constructors and other stakeholders, and allows for a relatively continuous engagement on the part of the administration. It also allows the government to frequently review demand patterns and customer behaviour in response to the rapidly changing technology landscape.

An established timeline will also assist industry with procurement planning – for both equipment and people – and an increase in the annual target over time would also support capability building and discourage market distortions via competition for labour, equipment and services that puts upward pressure on costs.

Examples abound, globally, of ambitious renewable targets leading to a ‘boom-bust’ situation by asking too much too soon from an emerging industry – in many cases forcing costs up via competition for scarce resources. The Government should seek to avoid this situation in order to ensure cost competitive tender results.

1.5 **What proportion of scheme generation should be dedicated to solar projects?**

We understand that the principle behind dedicating a portion of the target to solar is to increase the diversity of supply. However, we believe that an additional principle for consideration could be better matching supply and demand.

We see several options for how the Government can achieve the goal of delivering a certain percentage of the energy target from solar.

Current renewable energy pricing at the Australian Federal Government level values renewable energy only on the quantum of energy delivered, not on whether it is delivered at the time that it is needed in the market. Wind, for example, is a ‘semi-scheduled’ generator under the current market construct. A tranche of annual energy auctioned does not recognise the fact that demand for energy varies on a daily basis.

Therefore rather than set a split of solar, we believe that the Government could consider introducing a ‘time-of-day’ requirement, ensuring supply is matched to demand.

For example, the Government might chose to auction a 24 hour block of energy for up to XGWh of energy per year, which, like the current ACT Government reverse auctions, would likely see wind projects meet this requirement in the near term as the lowest cost form of energy (on an annual basis). The Government could also allocate a % of energy to be auctioned each year to be supplied over an 8 or 10 hour day time period, say YGWh.

In this example, X+Y equals an annual energy volume, which is set for a particular year prior to the commencement of the first auction, however the split between X and Y is determined say a year in advance for each bid (assuming annual bids) to best reflect the forecast demand profiles. This leads to diversity of supply, as well as gives the Government flexibility to adjust the X and Y components in response to both demand changes and technology developments over time.

This is shown diagrammatically in Figure 1.

The above structure has been used by the Chile Ministry of Energy to significant effect in the last three years, including a time based tranche structure. We recommend the Government review the experience in Chile, in particular this aspect of matching supply and demand, to appropriately determine the tranche size and timing.
Before selecting the portion of solar, we recommend that the Government study the ability of the existing network and generation mix to cope with the ‘afternoon ramp’ and ‘evening peak’ and, rather than allocating a fixed percentage, utilise a time-of-day generation profile to auction discrete time-based tranches as per our response in Section 1.3. This is also relevant to whom the Government chooses as the scheme administrator – the distribution network service provider has the relevant data to make this analysis possible and understand the time and network value of renewable energy (Section 4.1).

What the Govt announces in 2017
Schedule of annual energy to be auctioned (year shown = year delivered)

What the Govt determines each year
Indicative annual energy ‘split’, assuming solar/wind/storage

Indicative daily ‘blocks’ tendered
Daily energy requirement based on time-tranches and ‘split’

Figure 1  Example: initial scheme definition (annual target, back-end loaded), annual energy ‘split’, daytime demand profile showing an example of time based tranche structure

1.6  Should the proportion of solar be different pre and post 2020 to allow a solar pipeline to develop and technology costs to come down?

Noting the Government has already indicated a possible 20% of the target being met from solar, performing analysis of demand profiles referred to in our response 1.5 above could help form the basis for finalising this split. This is shown diagrammatically in Figure 1 as the dashed line over the course of a day.

We believe that by introducing an element of timing to the tranches, the Government could achieve both its desire to deploy solar and as a consequence, enhance the role of renewables through various energy storage mechanisms.

For the post 2020 period, as future demand profiles become clearer due to the impacts of battery technology at a residential scale, other time based tranches may be desirable, for example, 6 - 10 pm (the current residential peak demand period). These tranches would be expected to clear at a higher price, but this could facilitate new entrants and new technologies (such as solar thermal).

Alternatively, the Government could consider a split not as ‘wind and solar’, but ‘energy’ or ‘energy plus storage’. In all cases, valuing the ability to dispatch should be the intention of splitting the target on a technology basis either pre or post 2020.
1.7 Are there any other matters the State should consider when setting the scheme’s technology split?

We recommend a thorough analysis of daily demand profile to deeply understand when consumers (at each level, ie industrial, commercial and residential) need energy, to maximise opportunities for renewable supply to meet demand and possibly form the basis for a time-of-day tranche structure in the energy auction.

Assuming wind is the lowest cost renewable energy source for Victoria in the immediate term, it may be less of an issue in the early years of the scheme, but over time and based on recent experience in South Australia, a confluence of factors such as export capability of transmission interconnectors, along with impacts on operational parameters for existing brown coal generators, is likely to favour ‘dispatchable’ forms of energy. We therefore also recommend understanding at what penetration of semi-scheduled renewables like wind does the time value of renewable energy becomes more relevant in Victoria.

Given the work currently being completed by the Essential Services Commission of Victoria on the energy and network value of distributed generation, and the Departments conclusion that the Distribution Network Service Provider (DNSP) is the preferred scheme administrator (from a charging perspective) we recommend establishing a clear link between different technology scales.

1.8 What is the best way to treat LGCs under the scheme to enable successful proponents to secure project finance, ensure scheme costs are minimised and ensure adequate market interest from industry to participate in the auctions is attracted?

We recommend the same treatment as under the ACT Government’s auction process, as described in the Electricity Feed-In (Large Scale Renewable Generation) Act 2011 – the value of the LGCs should be transferred to the Victorian Government.

1.9 What are stakeholders’ thoughts about complementarity/additionality if the Federal RET were extended/expanded?

As above, we recommend the same treatment as under the ACT Government’s process.

We should add that given the intention to drive new investment, the scheme should be clear that projects already in operation – yet which are not selling power under a commercial off-take contract - should be excluded from bidding in the auction. Given their sunk capital and incumbent position, these projects are likely to have an unfair cost advantage over new projects on a cost of energy basis.

2 Payment structure

2.1 Do stakeholders agree with the proposed CfD payment structure approach?

The Government’s proposed CfD payment structure approach appropriately recognises the risks that developers and the Government are taking in committing to develop, build and operate large scale renewables.
2.2 If a CfD payment structure is used, on what basis should a NEM reference price be set? (eg monthly average, half hourly NEM price)?

The price should be set in accordance with the settlement period. At this stage, this is half hourly, however by establishing a direct link between the market and the CfD structure, this allows for the potential of the market settlement period to change and maintains a settlement structure that all existing generators are familiar with. The recent AEMC announcement has extended the deadline for its draft rule determination to 30 March 2017, with the final determination on 6 July 2017. We recommend that consideration be given to this potential rule change in agreeing the settlement structure.

2.3 What would be the impact of adding a floor price to cap the total payment applicable in any one period?

If the intention is to minimise the downside risk to the Government, we believe that other mechanisms exist such as assessing locational benefits. Negative pricing events have been a feature of the wholesale market in South Australia during periods of high wind generation and low demand (typically overnight), exacerbated by a market that has a low level of interconnection and high gas generation. We believe that by auctioning energy tranches on a time basis, the negative price events that are, in effect signals to cease generation, can be effectively managed.

2.4 Do stakeholders agree that payments should be made under the scheme based on energy delivered as defined above? Are there other ways that stakeholders consider are possible to provide locational signals to projects to ensure they are appropriately sighted on the network?

We applaud the efforts to ensure that locational signals are included to ‘fully value’ the energy delivered. Developers will then take the location specific risks around actual and marginal losses. This may however, in the short term, decrease the viability of many solar projects planned for the north west of the state. However, if an appropriate time value of energy is considered (that is, time based energy blocks are subject to specific auction tranches) this is likely to less of an issue.

Aurecon considers two elements that are locational specific for renewable energy – firstly the ability of a renewable generator to be ‘coincident’ with the peak demand at a particular point in the network, and secondly the ‘confidence’ in the energy resource that the generation will be able to meet that peak demand. These two form what can be termed a ‘Coincidence-Confidence Factor’, CCF. By working with network owners and operators, this factor can be determined by technology at specific feeders. This is also an important consideration when considering who should administer the scheme and bill customers, given demand profiles are likely to be most specific at the distribution feeder level.

Another way is to assess locational factors into the assessment criteria, whereby the value of delivered energy is assessed as part of the process to compare and evaluate bids. A specific assessment criteria might be to question the value (or cost) of the generation at the transmission feeder level and downstream at the distribution feeder level ie does energy injected at a particular point in the grid defer or avoid downstream augmentation, therefore deferring or avoiding costs that are ultimately passed on to consumers? Or does it require augmentation and therefore adds cost to consumers?

Finally, the Government could consider the value of certain network locations explicitly when determining the criteria around specific auctions, by working closely with Network Service Providers. Again, this could complement the work being done by the Essential Services Commission.
2.5 Do stakeholders consider that any alternative payment structures could be employed for the scheme, such as a fixed payment approach? If so, what are the relative advantages and disadvantages of these options?

While this may have the advantage of simplifying the scheme compliance and the billing regime on behalf of the developer, a distinct disadvantage is that the developer has a greater amount of revenue at risk. This is likely to increase the cost of funding and diminish the size of the funding pool.

2.6 Do stakeholders agree that a fixed payment approach would be less likely to address the barriers faced by project proponents in relation to attaining project finance, resulting in lower value for money bids?

We agree with the example included. Certainty is what investors require, both in tenure, as well as price per volume. As above, a distinct disadvantage of the example given is that the developer has a greater amount of revenue at risk.

3 Contracting elements

3.1 Are the above contract elements broadly appropriate?
Yes, we agree that the elements described are broadly appropriate.

3.2 Within the contract range of 10 to 20 years, is there an ideal duration, particularly with the aim of minimising project financing costs?

Recent experience in Australia (the ACT Government) and also internationally in Chile suggests that 20 years will achieve the lowest power price result. For financiers, the longer the term of the PPA the greater the certainty of the cash flows. Combined with the confidence in the renewable resource, greater certainty over cash flows correspond to more competitive financing. For renewable projects, where capital costs are high compared to ongoing operations and maintenance, the more competitive the cost of capital, the lower the levelised cost of energy.

3.3 What would be an appropriate project delay threshold for contract termination clauses?

A unilateral right for the Government to terminate the power purchase contract have an adverse impact in the eyes of developers and specifically lenders – ultimately increasing their view of risk, increasing funding costs and impacting the ability of the government to get the best price.

We believe that an appropriate mechanism lies in an agreed project schedule. Projects should be selected and then awarded a FIT with an agreed schedule of milestones, one of which includes financial close and final investment decision. Delays outside the control of the developer might include transmission connection agreement or environmental approvals being delayed. Care must be taken by those tasked with assessing the projects at the evaluation phase to understand these risks and reflect them in the price paid for energy.

Appropriate clauses in the contract to remedy delays should be included with no unilateral ability to terminate the agreement without first having conducted a cure period and given the developer time to remedy.
The Government might also consider mechanisms to ensure compliance with a project schedule that rely on a tenderer lodging a bid bond or winners lodging a bond or security on success. These might be non-refundable in the case of default, for example, or the Government might draw down on a bond for every x months/years delay.

3.4 Would quarterly payments have a significant impact on financing costs compared to monthly payments?
Provided that the tenure of the PPA and other structural elements (such as risk sharing around the CfD, see our Response 3.5) appropriately allocate upside and downside risks, it is difficult to see quarterly payments having a significant impact. However, given the typical financial capacity of developers, we suggest that monthly payments would be more favourable.

3.5 What are the implications of a two-way CfD?
The two way CfD appears the most appropriate way of apportioning risk. The residents and businesses of Victoria are being asked to support the deployment of technology over long periods of time – given that downside risks are being taken by this customer base, they should also be exposed to any upside opportunities.

Minimising the downside risks to customers can also be best managed by ‘back end loading’ the requirements for energy and a time based tranche structure as we have outlined earlier in our submission.

3.6 What do stakeholders think about the generation requirements being considered? Where maximum and minimum generation volumes are contained in scheme contracts how should these be set?
Predicting generation on an annual basis from renewable energy sources is considered low risk.

Selecting a maximum generation volume from a given project below the range of output expected (P50) – and requiring the developer to take some market exposure for some of their output – will enable the government to support multiple projects in different locations.

Setting maximum volumes of energy to be purchased should be a function of the Government’s development targets – how many projects does it wish to support over time? Purchasing the entire volume of energy from a given project may not desirable, either from a risk perspective, or from the perspective of driving development of a broader industry. Purchasing only a small amount of energy from many projects may help facilitate development but might also lead to intense competition for skills and equipment in the delivery phase that put upward pressure on price.

We recommend the Government assess the impact that varying levels of development and construction activity might have on skills and equipment supply so as to ensure that over time the most sustainable industry development path is created and not a ‘boom-bust’ cycle characteristic of many of Australia’s recent large energy projects.

3.7 Are there any other contract elements that should be considered?
We have briefly mentioned consideration being given to bid bonds or winners lodging a bond or other security as a mechanisms to ensure compliance with project timelines. These may be employed to ensure only financially capable developers participate in the processes, minimising the administrative and process burden on the Government.
3.8 Are any of the elements likely to lead to perverse outcomes?
Seeking to set either a floor price or adjust the price settlement mechanism may deliver unintended consequences. A contracting structure in keeping with the precedent set by the ACT Government reverse auction process is likely to minimise perverse outcomes.

4 Scheme administration and cost recovery

4.1 What are the relative advantages and disadvantages of the different scheme administration and cost recovery options listed above?
We agree with the assessment provided in so far as forcing energy retailers to administer the scheme and recover costs is likely to be complex and not cost effective.
The case for either Transmission or Distribution NSP’s performing the function is appropriate. While the TNSP is best placed to understand the high voltage network constraints and the most cost effective way of connecting large scale renewables to the grid, it may be that the DNSP is better placed to value downstream benefits from a network perspective given the linkage to customer demand.
In making a final recommendation, the Government should seek to deeply understand the implications of various build scenarios on the networks themselves. The concept of a demand study to better understand when consumers (including industrial and commercial, not just residential) use and value energy, and what form the renewable target outcome would best deliver against the customers’ needs and wants, is recommended.

4.2 Is there another mechanism for recovering scheme costs the Government should consider that would result in better outcomes?
The Government could consider a simple levy on electricity bills, if it intended to grant to the TNSP the administration and cost recovery of the scheme.
A situation that the Government should seek to avoid is one where particular geographic regions served by a single distribution network provider, that gain a disproportionate share of renewable energy capacity, may see their distribution charge component of their bills rise out of step with neighbouring regions covered by a different DNSP. This would constitute a transfer of market benefits/costs over the long term.

4.3 The Department’s proposed position is currently to exempt emission intensive trade exposed companies (as defined under the Federal Government’s RET scheme) from paying scheme costs. Do stakeholders agree with this approach? Are there any other parties Government should consider exempting from scheme costs? If so, how should this occur?
From a wholesale market perspective, the impacts of greater renewable generation are forecast to be favourable to large consumers.
As the energy market evolves in the next decade, with the customer at the centre of an energy services model versus the end of a supply chain, more efficient outcomes are expected to lead to lower energy prices in the longer term.
While the Government should consider an exemption in the near term, over time there may be a case for large industrial consumers to ‘opt in’ and take advantage of the longer term ‘buying power’ of the Government to give them access to lower pricing (without making an equivalent 20 year commitment, of course, in which case the Government takes some demand risk). Ensuring an ongoing dialogue with industry is essential to maximise any opportunities in this respect.

5 Auction evaluation principles

5.1 What do stakeholders think of the proposed evaluation criteria set out above?

The proposed evaluation criteria are appropriate and consistent with other auction processes that Aurecon has been involved in both designing, and participating in as an assessment consultant. Locational benefits have been rightly understood as critical to bringing forward the most cost effective and efficient investment. We would not limit network considerations to the transmission system but also suggest incorporating downstream distribution considerations.

Timely construction and operation is essential to industry confidence and overall economic development success, and as discussed in this submission, careful consideration should be given to whether lodgement of bonds or security could be employed to give greater confidence in schedule and execution risks, and to attract the right level of investor, are appropriate.

It is not clear to us that in and of itself, that ‘contribution towards Victoria’s targets’ is a success criteria. There may be situations where projects that have particular locational or other benefits do not have a particularly high capacity factor, but have a low price per unit energy. We wouldn’t expect these types of projects to be penalised. On the contrary, we believe price should be the principal criteria.

The coincidence of the generation type to demand could be considered (ie what % of the generation is considered ‘firm’ on an annual or daily basis), if the concept of time based energy tranches is not developed as an alternative to capacity tranches.

5.2 Do stakeholders have views on how evaluation criteria might be weighted?

Energy price and project readiness are key criteria for assessment. Under the umbrella of project readiness sits transmission, construction and schedule constraints.

Having an extensive community engagement program, and successfully carrying it out, will directly impact the success of the project during execution. This should be given high importance.

5.3 Are there other evaluation criteria/principles that the Government should consider to ensure the scheme meets its objectives?

The principles that we think make for a successful Auction are expressed in questions below:

Price: is this project the most competitive energy project that can be purchased on behalf of the people of Victoria

Does it drive sufficient investment and economic activity?

- How many jobs are created during development, construction, operation?
- How will it assist the broader community in the transition to a renewable economy?
- How will the project contribute to technology development and consider broader macro trends like the digitisation of infrastructure, data collection and predictive analytics?

Has the developer sufficiently de-risked the project to ensure it will be delivered on time?
- Is the community engagement done to date sufficient? Do locals want the investment?
- Is the contracting and procurement strategy achievable?

Does the developer have the financial capability to execute?
- What is the credit worthiness of the counterparty?
- Have they identified sufficient sources of funding to achieve a realistic return for their investors?

The Government could also consider whether the project could facilitate the industrial use of renewable energy:
- In South Australia, near the site of the recently closed coal fired generator at Northern Power Station, a $175 million solar powered greenhouse facility is nearing completion. This project attracted a CEFC commitment for cornerstone debt financing, which in turn has enabled the project proponent to secure private equity funding and a 10-year supply contract with a major supermarket for its products. Victoria could explore these types of direct investments to facilitate industrial and commercial activity in specific regions.

5.4 Are the costs associated with developing a proposal to bid into the scheme based on addressing the above criteria effectively likely to be prohibitive?
Increasingly, renewable energy options will become more cost competitive. Facilitating development is about bringing forward development investment. Provided that administrative timing and processes are clear, we do not believe that costs would be prohibitive. On the contrary, transparent processes with clear requirements (compliance conditions) are likely to lead to lower cost outcomes as developers remain intensely focussed on delivering the best solutions into the auction scheme and spend the right amount of money where it’s required (for example, on community developments, capability building).

5.5 What would be appropriate minimum project sizes (both in general and for large-scale solar)?
The Government should carefully consider how many projects it is seeking to facilitate and what portion of an individual project’s output it intends to buy, balanced against the need to build sustainable competitive forces in the equipment and services industries such that no upward pressure on costs results from the scheme.

Understanding the current ‘capacity’ of the market to respond to multiple work fronts in multiple locations, considering issues like the availability of workforce and even, in simple terms for wind projects, the availability of suitable cranes to undertake heavy lifts, is critical before deciding on issues such as size of projects, size of tranches, technology split. This should be understood prior to setting firm targets for technology type or project size.
Creating a ‘back end’ loaded target with a visible and transparent ramp rate, starting with a meaning tranche that increases in size over time (predictably) with annual auction processes is likely to best facilitate capability building and bring about the best outcome for consumers, developers and project owners.

For solar projects, one consideration should be whether developers can aggregate multiple commercial and industrial projects (individual cut-off size, say, 1 MW) into a single ‘Distributed Project’ that has a minimum capacity (for example, 20 MW) and receives the same ‘flat’ price despite varying connection points.

5.6 Would there be benefit in asking proponents to submit expressions of interest to participate in the auctions to ensure only more advanced projects proceed to the full evaluation round and that costs are minimised for project proponents where possible?

Again, the experience of Chile is useful. Developers have not had to participate in an expression of interest phase because of the requirements of the bids themselves. If the Government is seeking to ensure only the more advanced projects proceed to full evaluation, developers might be asked to demonstrate the following at a pre-qualification stage:

- Only projects that have secured a land access right or an option to access a renewable resource are eligible – this would exclude developers who are in the concept phase only.
- Only projects that have completed and submitted a development approval to the relevant authority are eligible – this would address in large part the approvals risks and potentially, enable the Government to understand community and social risks (based on the type and number of feedback received through that process).
- Only those projects that have submitted a transmission connection inquiry and progressed to the negotiation phase are eligible – this would address development timing risks as time to connection agreement is typically critical path for developers.

The Government could consider a financial capability requirement – lodgement of a bid bond for example – as one means of limiting the number of bidders. The size of this bond would need to be reflective of the size of the auction, technology and other criteria.

A limited upfront EOI period could be considered for the Government to better understand the project pipeline on a periodic basis, to quantify the impact of the program versus the status quo.
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