

Four questions for politicians considering Australia's energy future



Greg Hunt's 'certainty for the renewables sector' lasted all of two years. Photo: AAP

Judith Sloan, The Australian 12:00AM June 20, 2017

Allow me to let you in on a secret: the notion that governments can create certainty for investors, particularly when it relates to electricity and climate change policy, is a myth. It ain't going to happen, even if the Coalition government is able to achieve a compromise position on the Finkel report.

Go back just two years when the Coalition government, with Tony Abbott at the helm, adjusted the renewable energy target — from 41,000 gigawatt hours to 33,000GWh by 2020. Greg Hunt, then environment minister, told us “what I think we have achieved today is certainty for the renewable energy sector”.

That lasted all of two years and we are back in a similar bind where we are being told the status quo is not an option. But hang on, two years ago we were led to believe that everything had been sorted.

In 2015 the climate modellers had told the minister that wholesale electricity prices were bound to fall because there would be additional supply of electricity generation coming on to the market — new wind farms and some large-scale solar — and the other generators simply would chug along. They might not make any money, they could even lose it, but they would remain in the market.

It took only the withdrawal of the Northern power station in South Australia and Hazelwood in Victoria to jack up wholesale prices by more than double in two years. The modellers thought \$40 a megawatt hour would be the likely figure; it is now about \$120.

In combination with the statewide blackout in South Australia last year and the power shedding that occurred earlier this year — with NSW lucky to miss out — the issue of reliability of supply has also become a hot political issue. So much for investor certainty.

The Finkel review panel understands the issue of investor certainty as it affects the prospects for investment in electricity generation. When it comes to new coal generation, the estimate is made that the weighted average cost of capital is close to 15 per cent, which is almost on a par with the cost of capital for investments in many developing economies. What the panel is saying is that a 5 per cent risk premium would need to be attached to the assessment of any potential investment in new coal-fired electricity plants, meaning there will be no new coal-fired electricity generation in the country in the next 40 years at least. There may be variations in how long existing plants are kept going, but there will be no new investment in coal-fired electricity.

This is notwithstanding the surge in investment happening worldwide in next-generation high-efficiency, low-emissions coal-fired electricity plants. Forty-five are being built in Japan, more than 100 in Africa, hundreds in China and other parts of Southeast Asia and some in Europe, including in Germany. Germany also has extended the date when the use of brown coal will be phased out.

This all surely raises the question: how is it possible that governments overseas see the sense in building or facilitating the construction of these new HELE coal plants but it is not possible in Australia? Given that Australia is the source of vast quantities of high-quality thermal coal, it is more than passing strange that there is no prospect of any new coal-fired plants being built here. The answer must revolve around the failure of the market to establish the conditions for investment that would be beneficial for the community — in this case, reliable, relatively low-cost power. Now in such instances, the conclusion drawn from the existence of market failure is that the government should become involved in the provision or financing of the worthwhile activity that is prevented by the market failure. Think: federal government financing of the National Broadband Network, or state government commissioning of desalination plants.

Of course, there are some serious questions about the NBN and the desalination plants in relation to their cost, in particular. But there is nary a remark made about the need for government to be involved in the projects.

In the case of the NBN, there almost certainly would be serious under-provision in rural and regional areas. And in the case of desalination plants, private investors are prepared to take the risk of constructing these expensive capital-intensive plants in the context of uncertain future demand only if governments effectively underwrite the risk — through take-or-pay contracts, for instance.

So let's think about the electricity market and the predictions of Finkel. It doesn't take too many brains to realise that a renewable mix of 42 per cent by 2030 is unworkable, even if we deduct the 9 per cent from small-scale rooftop photovoltaics. In the context of ageing coal-fired electricity plants that will be prone to break down and with what we know about the scope and cost of storage, particularly batteries, there is no way the government can agree to implement the clean energy target that is predicted to lead to this mix.

And let's be clear about something: the CET is not technology-agnostic. It penalises coal-fired generation by denying it a certificate or allowing only a small proportion of a certificate. (Intermittent renewable energy would be eligible for a full certificate.)

The combination of the emissions reduction targets used by Finkel and the exclusion or near-exclusion of coal from the CET means new coal is knocked out. Tweaking the emissions intensity benchmark won't alter this fact.

So for all those parliamentarians thinking about this issue, there are several questions to be answered:

- Is affordability and reliability of electricity more important than emissions targets?
- Do you want to see the exit of every smelter, cement plant, fertiliser plant and most other parts of manufacturing from Australia?
- Can you see a role for government in fostering the development of new best-practice coal-fired power plants?
- What are the options of meeting our Paris commitments through the purchase of (cheap) international carbon credits, linking the RET with the direct action scheme and other means?

By answering these questions, the parts of the ultimate solution become clearer.