

It's time SA learnt from others and overhauled its power sector

By Anton Eberhard 26 Aug 2016

South Africa has not had load shedding for nearly a <u>year</u>. This is a welcome development after years of power cuts that constrained economic growth. Electricity consumption has more or less flattened out, giving the national utility, Eskom, more space to catch up on maintenance and meet demand.



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But all is not well in the country's electricity sector.

There are challenges around rising costs and <u>electricity tariffs</u>. Further improvements are needed in technical and commercial performance. And Eskom has to raise sufficient finance to complete its investment programme. This comes at a time when National Treasury has no fiscal space for further equity injections.

On top of this, municipal electricity distributors are not investing adequately in maintenance and service delivery. This could have catastrophic consequences for security and reliability of supply in the future.

The current period provides an opportune time to consider the electricity sector's medium and long-term future. Is the sector's current structure fit-for-purpose? Does it provide a sustainable platform to achieve national goals and objectives?

What the economy and people want from the sector is instinctively and practically clear: access to electricity that is adequate, reliable and affordable as well as competitive prices in the case of business. And this should be accomplished within the bounds of environmental sustainability and transparent governance frameworks to attract enough investment to meet current and future needs.

At the moment it is not clear that the current structure can achieve these goals. This suggests that alternatives should be considered.

The case for restructuring

The past three decades have seen fundamental reform and restructuring of electricity sectors in countries <u>all over the world</u>. The old model, of a vertically integrated, state-owned monopoly, has been challenged. <u>New models have been explored</u> and adopted that involve different levels of integration or unbundling, competition and public or private ownership.

It is striking that South Africa's electricity sector has been largely immune to these global developments. In recent years there's been private investment in a number of renewable energy independent power projects. But Eskom is now <u>arguing</u> that it doesn't need them.

The question of private or public should be unshackled from ideological predispositions. Debates around private participation in the electricity sector are often contentious. This includes whether privately owned entities are more efficient than public utilities. The country needs to consider restructuring proposals only in terms of whether they will support national economic and social development goals.

Choices range from a fully state-owned electricity sector to one which is fully privatised, or somewhere in between.

In fact, South Africa already has a hybrid system. State-owned Eskom and local government distributors are complemented by private independent power projects. Eskom has been unable to fund all the country's electricity needs. Over the past four years independent power projects have mobilised close to R200bn in private investment.

It would seem sensible to retain a mixed electricity market – especially in power generation so that the country can secure adequate, timely and cost-effective capital investment.

But if the state were to countenance privatisation, it would be a mistake to allow private investment in an unstructured, vertically-integrated dominant Eskom. This would repeat the mistakes made in the privatisation of <u>Telkom</u>. There the strategic private partner used Telkom's monopoly to frustrate the entry and growth of new private players in the sector. It also maintained high prices.

Building competition into power generation

Globally many years of experience show that effective competition is possible in power generation (and energy sales), while electricity transmission and distribution mostly remain natural monopolies.

Independent power projects in South Africa already compete for the right to build, own and operate power stations based on long-term contracts and competitive prices. It makes sense to extend this kind of competition.

It is possible for power stations also to compete in a power exchange. This typically happens in a day-ahead market where independent power projects (and perhaps also Eskom) compete to sell their power for each period in the day. Such wholesale power markets have potential price benefits. But they are not always effective in attracting new investment. A much more effective way of attracting investment is through competitive tenders for long-term contracts.

Competition can also be encouraged by giving customers the right to choose their supplier. But international experience shows that while the benefits are potentially significant for large customers, they're relatively modest for small users.

A modest amendment to the Electricity Regulation Act could make explicit the possibility of direct agreements between independent power projects and qualifying customers. This would spur innovation and investment, and reduce costs.

Traditionally, power systems have been vertically integrated: power generation, transmission and distribution functions have been combined in one company. But with generation potentially open to competition, many countries have decided to separate generation from the natural monopoly wire components.

The challenge of the current system is that it can discourage investment in independent power projects. It can also make inter-connection with the grid difficult or expensive and can constrain dispatch. This is because Eskom controls power purchases from independent power projects, as well as access to transmission, but also builds and operates its own power stations.

An alternative would be to spin off state-owned generation into a separate Genco. This would leave Eskom to control only transmission (and the system operator and buying functions). Eskom could then – on a neutral, transparent and fair basis – contract either State Gencos or independent power projects, creating a platform for private investment.

Overcoming state paralysis

Despite ample evidence of best practice South Africa seems to be in a state of paralysis.

The difficulty in restructuring state-owned utilities when they are in crisis is that governments are careful not to propose interventions that might further destabilise them. But when the crisis recedes so does the political imperative for restructuring. When Eskom was load shedding the focus was on immediate measures to keep the lights on and on improving its financial viability. It was more difficult to agree on far-reaching reforms that might prevent similar crises in the future.

It requires vision, leadership and commitment to restructure state owned enterprises. Any such process must remove impediments to investment and achieve efficiency improvements that facilitate economic growth and development.

There is an alternative to Eskom's leadership defending an old, vertically-integrated, monopolistic electricity industry model – which international experience shows is moribund. Would the company not want its legacy to be distinguished by a reforming zeal that sets South Africa on a different path? This would embrace a model for attracting new investment and securing power supply while containing costs and prices, and promoting environmental sustainability.

Perhaps South Africa's fiscal position will have to deteriorate further before the country accepts that it can no longer fully fund its public utilities and that a greater openness to private investment is inevitable. It has already <u>pumped R83bn into</u> Eskom since 2008.

It would be better to start that restructuring and reform process now before there is another crisis.

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