



## Implementation of Budget Initiatives for the Power and Renewable Energy Sector

Finance Ministry has recently discussed about a detail roadmap for effective implementation of the provisions related to the Power and Renewable Energy Sector in the Union Budget 2021-22. The key points are as follows:

- 1. A framework will be planned to promote competition among DISCOMs and give consumers options to choose from more than one Distribution Company.
- 2. A reform-based result-linked power distribution sector scheme will be launched that will assist to improve the financial stability of DISCOMs.
- 3. The government has announced the PLI scheme for 13 key sectors to possess core competence and cutting-edge technology. For this initiative, the government has committed more than 1.9 Lakh Crore over five years.
- 4. It is proposed to promote the comprehensive National Hydrogen Energy Mission in 2021-22 for generating hydrogen from green power sources.
- 5. An additional capital infusion will be provided to SECI (₹ 1000 Cr.) and IREDA (₹ 1500 Cr.) to upsurge the non-conventional energy sector.
- 6. Customs duty on solar appliances will be raised to encourage domestic production.

## **CER Opinion** –

- **CER** The most important concern at hand is the financial viability primarily on account of operational inefficiency and higher cost as compared to the tariffs. The budgetary provisions should aim to address that through reform linked multi-year schemes so that the benefits are transferred to the consumers in the sector. This would also enable the distribution utilities to be prepared for the impending retail supply competition by offering choice to consumers. A focussed discussion involving key stakeholders particularly the State Electricity Regulatory Commissions (SERCs), distribution utilities academic institutions, civil society as well as consumer bodies would help identify the critical reform needs that may be differentiated across states.
- **CER** The budgetary provisions for the power sector envisage provision of substantial amount of financial resources over the next five years. This is an opportunity to bring the sector out of the current state that continues to drain the financial resources of the states and continue to demand significant resources from the central government as well. The key question is to design schemes that are differentiated across states and are able to provide necessary incentive for the government owned utilities. This should account for, among others, the level of operational inefficiency, cost structure as well as consumer mix. This should help improvement in the governance structure in the power sector across the states.
- **CER** The existing experience with UDAY as well as previous schemes like APDRP has shown that all state sector utilities do not respond to incentive in the similar fashion. This is





largely on account of difference in governance structure within the power sector (particularly the distribution utilities) across the states and important role played by the State Electricity Regulatory Commissions (SERCs). A 'single-design-fit-all' scheme may not be an effective way of implementing reform linked scheme across the states.

- **CER** Investment linked schemes should address the key aspects of the distribution sector that can help improve transparency of operations, cost-effective procurement and encourage RE integration. Previous schemes particularly APDRP and R-APDRP have facilitated investment in feeder/DT metering. However, in spite of significant investment, there is limited visibility of the energy accounting to the consumers.
  - a. **Grid Transparency**: Enable Distribution System by ensuring visibility of the grid through online and real-time data of energy accounting and its disclosure through the discoms' portal. This can be supported through targeted investment and incentive for reduction in losses.

An incentive may be provided to ensure that this energy accounting-based data is available in public domain to the licensee website, this will not only enhance the transparency but also encourage distribution utilities to take suitable measures for reduction in network losses. This will significantly reduce the overall risk for the new retail supply companies/investors.

- b. **Rooftop SPV:** Distribution companies face financial stress due to increase in rooftop solar adoption by consumers. This is expected to impact growth of rooftop SPV across the country. A special program aimed at tapered support to discoms for facilitating higher penetration of rooftop SPV would help to partially bridge the financial impact due to SPV adoption.
- c. **Solar Pumps for Agriculture:** Enhance support for Agricultural SPV programs, based on competitive, transparent and cost-effective process. This would help reduce the financial losses for the distribution companies as well.
- d. State Level GeM: Enable transparency in all procurement by the generation, transmission, trading (holding) as well as distribution companies. Power procurement planning based procurement of power through competitive bidding/market. All asset purchase above a limit (say Rs. 1 lakh) to be compulsorily done through fully transparent process that can be facilitated through an online platform like GeM (say UP-GeM, RAJ-GeM etc). This can be state-specific platform but with standardised design feature ensuring seamless portability/accessibility of information across the nation. Budgetary support through by GoI can help setup such a platform across all states (this may be extended to all procurement in the respective state government). This would influence investment decision but would ensure that procurement happens in a standardised fashion reducing cost of procurement and ensuring that data on all procurement is accessible for all stakeholders.





- e. **Improvement in Grid Flexibility**: Higher RE integration in the power system across the states is limited by its flexibility on account of the inability of the generating stations to operate at lower technical minimum generation level and achieve higher level of ramping rates. Further, incentivising investment in cost-effective storage particularly pumped hydro generating stations (including those in the neighbouring countries) can help address some of the potent challenges for higher RE integration.
- **CER** <u>Multiple Distribution Licensee Vs Retail Supply Competition:</u> Ministry is supporting creation of multiple distribution company, the electricity distribution network being a natural monopoly would ideally require a single distribution utility. In the absence of significant economies of scale available to a new entrant distribution licensee, there would be cost inefficiency for the sector as a whole, this would particularly of concern in distribution areas with low load density. Further, it would also lead to duplication of distribution network that will have to overcome the right way of urban areas across the distribution companies.</u>

Given that the budget has recognized the need to provide consumers an alternative to existing electricity supplier, it would be desirable that appropriate policy and regulatory changes can be adopted towards the same. Due to the differences in terms of consumer mix, Power purchase obligation, existing financial state and financial obligation, distribution segment across all the states may not be amenable to immediate adoption of supplier choice. However, an enabling framework under the Electricity Act be allowed to adopt a graduated path towards enhancing competition in retail supply. For example, a state may like to segregate a portion of distribution license area to be experimented with retail competition, learn from this experience before opening up other areas.

**CER Distribution Sector Reform:** The next distribution level reform needs to be identified and debated with the relevant stakeholders including the Regulators while taking into account the consumers' perspective. One such area of distribution reform would be network and energy tariff to unbundle across the Distribution Utilities. It is pertinent to note that a selected SERCs have determined separate tariff for network and energy. Given the larger choice (same network) particularly unbundling of retail tariff measure would be identified and that can be supported with necessary incentive for the distribution sector. Improvement in the governance framework within the distribution utilities is important to ensure that the public sector entities also embrace incentives linked to various schemes as a private sector entity would do.

Furthermore, to ensure that the sector is able to embrace retail supply competition, it is important to ensure the 'visibility' of the distribution grid particularly the energy accounting across the electricity supply chain over the distribution network starting from the interface meter, feeder, distribution transformer, consumers.

**EXAMPLE 7 Event and Some of the states have already ensured near 24-hour of electricity supply for the agriculture sector. The techno-economic viability of feeder separation needs to be** 





reevaluated, as such investment may have limited number of years (due to near surplus situation in the power sector) available to derive benefits from such investment. Further, implementation of Agriculture SPV pumps would also reduce the overall efficacy of feeder separation.

**CER** <u>**Capital Investment/ Infrastructure Creation:**</u> The central sector scheme had played an important role towards encouragement of various advance technologies particularly in the distribution sector. It would be desirable that significant amount of money should not be earmarked for such investments which should now fins its economic value with the distribution companies. If this is not happening, it is likely that either such investments are not effective in bringing about the desired change or that the governance structure with the power sector does not enable the distribution utilities to identify economic value in such investments.

Support for any investment link be it smart metering, feeder separation etc. should be evaluated on the basis of expected benefit while also considering loss of the economic life of an asset that was procurement in the recent past (for example the electronic meters).