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# The Road Towards Retail Competition and Open Access

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## Background

The electric power industry in the Philippines is divided into three major sectors: generation, transmission, and distribution. The generation of electricity is being done by NPC and private investors[2] called Independent Power Producers (IPPs), where NPC also buys its power supply. The transmission of electricity as well as the construction of transmission grid networks inter-connecting the main islands nationwide is being franchised by the National Grid Corporation of the Philippines (NGCP) from the National Transmission Corp (TRANSCO). Meanwhile, the distribution of electricity to end-users is done by private investor-owned electric utilities, local government-owned utilities, and electric cooperatives located within their franchise areas.

At present, the electricity end-users buy power only from their local distribution utility (DU)[3]. At the same time, generating companies can sell power only to DUs, which in turn re-sell the electricity to household and corporate end-users.

On 24 September 2012, the Department of Energy (DOE) and the Energy Regulatory Commission (ERC) issued a joint statement setting the initial implementation of the Retail Competition and Open Access (RCOA) on 26 December 2012. The RCOA scheme is among the reforms enacted to restructure the power industry, promote greater competition and private sector participation under Republic Act No. 9136, or the Electric Power Industry Reform Act (EPIRA) of 2001. With RCOA, power industry will have a fourth major sector, the supply sector composed of retail electricity suppliers (RESs) and the local electricity suppliers (local RESs).

## Retail Competition and Open Access Defined

Retail competition allows power suppliers to directly transact business with any electricity end-user designated by the ERC as a Contestable Customer (CC), i.e. an end-user given the choice of suppliers of electricity. Meanwhile, open access allows electricity end-users to freely choose their suppliers of electricity whom they deem offer the power supply arrangement with the most competitive price.

## The Players in the RCOA Regime

- ***Contestable Customers (CCs).*** A CC is an electricity end-user (may be a household or a firm) who has the power to choose the supplier of electricity, as may be determined by the ERC. The various CCs together comprise the Contestable Market (CM).

- ***Retail Electricity Suppliers (RESs) and the local RESs.*** A RES may be a person or an entity authorized by the ERC to sell, broker, market or aggregate electricity to end-users in

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[2] Executive Order No. 215, series of 1987.

[3] A distribution utility is an electric cooperative, private corporation, government-owned utility or existing local government unit which has an exclusive franchise to operate a distribution system in accordance with EPIRA.

the CM. The RES should also be a registered member of the Wholesale Electricity Spot Market (WESM). Meanwhile, the local RES is a non-regulated business segment of the distribution utility catering to the CM in its franchise area.

- ***The Single Market.*** Under the RCOA, there will be a single electricity market composed of wholesale and retail components. The retail component will cover only the transactions of the RESs and their CCs in the WESM.

**The RCOA Regime**

- During the first year of RCOA, CCs with power consumption of least a monthly average of 1 megawatt (MW), may choose to continue sourcing their power supply from their DU for six (6) months from 26 June 2013 to 25 December 2013, provided that said DU operates as a RES.

- In case the RES fails to provide electricity to a CC or a CC is unable to have a retail supply contract with a RES, the CC may enter into a contract with a Supplier of Last Resort (SOLR) designated by the ERC. The last-resort supply of electricity serves as a temporary/short-term contract (lasting to a minimum of one billing cycle) until the CC is able to transfer to a RES.

- Starting on 26 December 2013, a CC will be allowed to switch to another supplier at the end of each billing period. After the first year of RCOA implementation, the CC can negotiate with a RES for a more flexible supply contract, wherein a CC can switch suppliers every month after the billing cycle.

- Two (2) years thereafter (i.e. by end-2015), the threshold usage/consumption level for the CM shall be reduced to 750kW. A RES acting on behalf of a group or groups of CCs such as homeowners associations, affinity groups (religious, cultural, regional, fraternal, etc.) shall be allowed to supply electricity to end-users whose aggregate demand within a contiguous area is at least 750kW.

- Subsequently and every year thereafter, the ERC shall evaluate the retail performance of the market in terms of the readiness of consumers (volume of consumption) and the Central Registration Board's (CRB) infrastructure/facilities. On the basis of such evaluation, ERC shall gradually reduce the threshold level until it reaches the household demand level.

**Benefits of RCOA**

- ***Increased customer choice.*** Electricity customers can freely choose from whom they purchase electricity. This will increase economic efficiency and overtime should result in power costs reflective prices.

- **Increased competition.** Switching among retailers by customers in response to prices will put competitive pressure on retailers' margins and prices. Prices charged by both the generation company and the suppliers to the contestable market shall be competitive and will not be subject to ERC regulations. However, charges in transmission and distribution of electricity will remain fully regulated by the ERC.

**Table 1. DOE's RCOA Timeline**

| | |
|---|---|
| 6 Jun 2011 | ERC announced the Open Access Date of 26 December 2011 (ERC Resolution No. 10, series of 2011). |
| 9 May 2011 | DOE issued the General Policies for the Implementation of the RCOA (DOE Department Circular No. DC 2012-05-005). |
| 24 Sep 2011 | The DOE and ERC resolved that the initial implementation of RCOA will be set on 26 December 2012. |
| 24 Feb 2012 | The Philippine Electricity Market Corporation (PEMC) will be the market operator and the CRB, designated to register all eligible CCs within three (3) months prior to open access date (DOE Department Circular No. DC 2012-02-002). All DUs shall provide the list of CCs to the DOE, ERC, and PEMC. |
| 17 Dec 2012 | ERC issued a Resolution Adopting the Transitory Rules for the Implementation of RCOA (ERC Resolution No. 16, series of 2012). In the initial phase of the RCOA, the said rules shall particularly cover (a) ERC's issuance of Certificates of Contestability (CoC) to all eligible customers, i.e. all electricity end-users with a monthly average peak demand of at least 1MW) for the preceding 12 months to be part of the CM; (b) RESs duly licensed by the ERC shall register with the PEMC as WESM direct member Trading Participant—transacts on behalf of the CCs, and shall provide the PEMC with their offering terms and conditions for publication on the PEMC website; (c) DUs' responsibility towards their CCs and captive customers; and (d) the Supplier-of-Last-Resort Service. |
| 26 Dec 2012 | Open Access Date and start of six-month transition period before full RCOA implementation. During this period, all CCs shall enter into retail supply contracts with their chosen RESs. The RESs and the CCs shall furnish the DU and the CRB with the said contracts on or before 26 May 2013. Meanwhile, the DUs shall continue to supply electricity to their captive customers and CCs who are not able to contract with a RES. ERC figures as of end-December 2012 showed 908 CCs, 19 RESs, and 27 SOLRs. |
| 6 May 2013 | From the RESs' submission of supply contracts to the DOE, power rates offered by the RESs range from ₱5.00 to ₱6.00 per kWh. Meanwhile, the CCs reported to the DOE that they are having difficulty obtaining or entering into retail supply contracts (RSCs) with the RESs. In response, the DOE issued Department Circular No. DC 2013-05-0006 enjoining all DUs, RES, and local RES to disclose to the DOE their power supply contracts with the generating companies and the list of their customers. Also, the ERC shall issue a resolution that will allow the CCs to stay with their existing DUs until such time that they have the supply contracts with the RESs. |
| 26 Jun 2013 | Commercial Implementation of RCOA |

## Is the Philippines ready to shift to the RCOA scheme?

The country's readiness to shift to RCOA scheme was assessed during one of the discussions of the BSP with power industry experts.[4] According to one of the discussants, Ms. Sarah Fairhurst of the Lantau Group, RCOA is likely to benefit customers and other market players although certain issues still need to be addressed, such as customers' ability to switch suppliers with minimal difficulty and the incumbent electricity suppliers losing some of their customers (as much as 40-60 percent in the case of other countries) since customers with large loads are more likely to switch suppliers to save on industry cost. Cross subsidies need to be removed in order to encourage switching of suppliers. Table 2 summarizes the assessment made by the Lantau Group.

**Table 2. Philippines' Readiness to Shift to RCOA**

| Pre-requisites for retail competition | PH's readiness |
|---|---|
| **Ability of retailers to source generation**<br>- Open, fair, well -functioning and competitive wholesale electricity market | Yes, WESM is operational in Luzon and Visayas. However, there is only a limited number of participants[5] at present. |
| - Non-discriminatory contracts market for those retailers wishing to supply to retail customers | Limited forms of contracts; no derivatives (e.g. forward contracts). According to the ERC, derivatives will be considered in the future, when the market is fully developed. |
| **Ability of retailers to compete fairly**<br>- No cross subsidies[6] of retail prices | Done, cross-subsidies have been removed except for the lifeline subsidy |
| - Unbundling[7] of transmission, distribution, generation and retail, including unbundling the systems and prices of each | Done |
| **Ability of customers to switch efficiently with minimal hassle**<br>- Efficient metering, billing and settlement systems<br>- Efficient transfer system with no built-in advantages to the incumbent retailer | Issues regarding ability of customers to switch |

Source: The Lantau Group

[4] 19th BSP Environmental Scanning Exercise held on 12 December 2012 attended by resource speakers from the DOE, ERC, NGCP, and Meralco and experts/discussants from The Lantau Group (a private firm specializing in providing expert economic and commercial consulting services to businesses and governments in the Asia-Pacific region), Retail Electricity Suppliers Association of the Philippines (RESA), Semiconductor and Electronics Industries in the Philippines, Inc. (SEIPI), and the Asian Development Bank (ADB).

[5] There are 231 registered member of the WESM: 77 - large companies (bulk users of electricity); 70 – electric cooperatives; 65 – power generating companies; 12 – DUs; and 7 RES. According to ERC, there are 140 DUs all over the country (120 elec. cooperatives and 20 privately-owned DUs); in the website, there are 3,793 self-generating companies and 58 IPPs.

[6] In 2002 and 2005, the NPC removed the inter-grid (between Luzon and Visayas) and intra-grid (within Luzon) subsidies. Also in 2005, the distribution utilities removed the inter-class subsidies (between industrial and residential). Meanwhile, the lifeline subsidy remains to subsidize the low-income electricity end-users.

[7] Unbundling is the itemization or breaking down of the specific components of electricity bill to make the pricing of electricity more transparent and understandable to electricity consumers. With the unbundled rate, the consumer will be able to know and understand the components of the electricity bill – how much goes to generation, transmission, distribution, metering, supply and other charges.

Relative to the above discussion, there are still some transitional issues that still need to be addressed:

1. ***Cost of connecting could be expensive for some companies.*** The cost of the Time of Use (TOU) meter (needed to comply with WESM standards) may be expensive for some commercial end-users. Even the construction of new electricity supply system is costly. According to the DOE, the TOU meter will be installed by the DU and the cost of said meter will be charged to the CC on a staggered basis. The DOE also proposed that each CC should have a personnel dedicated to handle RCOA requirements and participation in the WESM.

   In countries where retail competition was introduced, metering was also a challenge and a barrier to competition for small electricity end-users. To address this, the UK and the State of California introduced measures for ensuring metering capacity prior to liberalization of the market (International Energy Agency [IEA], 2001).

   The start-up costs for metering raise the issue of whether the benefits of retail competition outweigh the costs. A study conducted in the UK showed large welfare gains involved in the introduction of competition, with benefits from lower prices exceeding the start-up costs. Meanwhile in California, small consumers (with consumption below 20kW) may use load profiling[8] to avoid new metering requirements since the cost of improved meters is too high compared to the potential reduction in their electricity bill (IEA, 2001).

2. ***CCs under the SOLR service will be charged a higher rate.*** The SOLR rate will be based on WESM prices plus a 10-percent premium, together with the other regulated charges. The premium computation will be dependent on the length of contract of a CC with the SOLR.

3. ***High cost of electricity to some customers at the initial implementation due to stranded costs and the lifeline subsidy.*** Upon implementation of the RCOA scheme, DUs will have two types of customers: the Contestable and the Captive. Since some of the DUs' customers will be CCs, the DUs' contracted energy could exceed actual retail sales to captive customers resulting in stranded costs. These stranded costs could be recovered by the DUs from their captive customers.

   According to the ERC, any excess amounts in contracted energy supply may be renegotiate by the RES with the generating company for the reduction of its excess contracted energy volume or may resell it to the WESM (wherein price of electricity is volatile and could be higher).

   Based on the case studies on selected APEC economies,[9] stranded costs are of great importance to economies in transition to competition because the financial burden can be very large, no matter who bears it: citizens could bear it as taxes or investors could suffer financial losses leading to bankruptcy. In the case of Japan and Korea which depend heavily on nuclear power generation, stranded costs may pose a problem in the future

[8] A load profile is a chart illustrating the variation in demand/ electrical load over a specific time. Load profiling enables an electricity supplier to calculate the consumption of its customers who do not have a time interval meter installed, which will be the basis of the supplier in its settlement of electricity purchased at the wholesale market. Customers thus need not replace their existing meters with the market-prescribed time-interval meters.

[9] Australia, Chile, Japan, The Republic of Korea, Malaysia, New Zealand, Russia, United States of America.

if existing nuclear power plants would become uneconomic in a competitive environment. Private investors would tend to invest in less capital-intensive, smaller scale generation plants in order to keep down generation costs. (Asia Pacific Energy Research Center [APERC], 2000).

Moreover, removal of the lifeline subsidy rate for lower-income household customers being paid by other electricity end-users need to be considered.

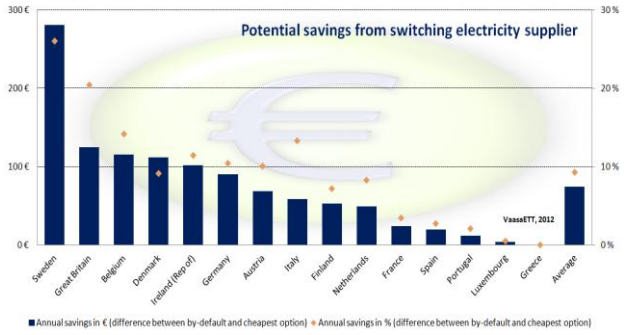
4. ***Prices and potential savings from switching suppliers.*** The industrial sector in some economies had electricity price reductions brought by deregulation. Large industrial consumers can negotiate favorable tariff rates in a competitive market since electricity suppliers are willing to charge lower tariffs to those with large load profiles (APERC, 2000). In the case of Japan, electricity rates dropped by 1.8 percent annually on average from 1994 to 2004, and an approximate 17-percent decline between 1994 and 2004. Under the liberalized segment, commercial customers benefited from a 26 percent drop in electricity rates between the years 2000 and 2004 (Hammons, 2011).

   In the Philippines, information on the electricity rates offered by the RESs will only be available as soon as Retail Supply Contracts have already been submitted to the WESM and the DOE. Likewise, the potential savings from switching of suppliers can only be determined after the official switching of suppliers in December 2013.

   Meanwhile, residential customers in Europe could gain potential savings in switching from their by-default contract to their chosen supplier depending on the following factors: (a) if they are large energy users; (b) if they are located in areas where energy prices are high; and (c) if the proportion of the "switchable" cost is sufficiently high. (Dromacque, 2012).

   Table 3 shows estimated potential savings from switching electricity supplier (2011) in the European energy markets based on the difference between by-default rates and cheapest option.

**Table 3. Potential Savings from Switching Supplier**




**Source: Savings Tracker, analysis VaasaETT, 2012**

5. ***Industry concerns.*** SEIPI's request for the continuation of the Ecozone Rate Program (ERP), a subsidy for the semiconductor and electronics industry as major power users, will probably not materialize in the near term since PSALM which subsidizes the ERP has already been privatized. According to SEIPI, the expiration of the ERP on 25 December 2012 will increase their power costs resulting to higher manufacturing costs that may trigger movement of foreign investors loading out of the Philippine factories, shorter work weeks, lower power consumption that would result in reduced revenues to sustain their operations.

## Concluding Remarks

The key to the effectiveness of reforms in the electric power industry consists of providing freedom of choice for all electricity end-users. Closely related to this is the option for users to switch to another electricity supplier, which in turn will encourage market players enhance the efficiency of service they extend to their customers

However, there is a need to address some transitional issues in the implementation of the RCOA scheme, particularly the effect of potential stranded costs which could be passed on to consumers. The cumulative effect of stranded costs could result in inflationary pressures. The ERC, as regulatory body, should ensure that firms do not inflate their stranded costs by either declaring more of their assets stranded or by claiming that the prices in the spot market were lower than the original contracted price.

Full disclosure is vital for the smooth implementation of RCOA. An education plan aimed to inform the customers on the electricity rates, strategies on how to avail of the best offer from the RESs, the reliability of power supply, consumer protection and assistance would help determine the potential problems and market failures of RCOA and thereby build the credibility of the ERC.[10]

In the short run, with the power of choice limited to only to the Contestable Market, lower prices for large end-users could come at the expense of higher prices for others (particularly small consumers) through higher stranded costs.

Over the medium term, with existing supply constrained by aging power plants in the Luzon and the Visayas (which have been operating since the 1960s and often produce lower outputs and undergo shutdowns), and with the increasing demand for electricity, the cost of power could rise and further hinder the efficient implementation of retail competition.

Nevertheless, the reforms in the electric power industry are expected to bear fruit in the long term wherein the cost of electricity will be lower or will remain stable. According to the DOE and the ERC, a reduction in generation charges can be achieved once power supply is sufficient, and RCOA is fully implemented. The EPIRA also provides for the commissioning of new generation plants by 2016 aimed to generate more power supply reserves and achieve more competitive prices.

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