As a frontrunner on the Getting Electricity indicator, Malaysia showcases efficient electricity connection processes.

Tenaga Nasional Berhad (TNB), a utility in Kuala Lumpur, has an efficient process of obtaining new commercial electrical connections under Tenaga Express program. The process involves three steps that are comparatively easy to comply with (see figure). As a first step, customers with a subscribed capacity of 100-140kVA submit an application, a preliminary metering scheme, a layout plan and electrical drawings specifying the exact location point of the connection. The consolidated document package allows the utility to prepare a cost estimate of the external works without conducting a site visit, thereby minimizing the number of interactions between customers and the utility.

Figure: Electricity connection process in Malaysia

After receiving a payment of an estimate from a customer, TNB commences external connection works, which are completed within 14 days. Concurrently, TNB obtains all the necessary internal approvals and permits from local authorities, without any customer involvement. Shifting the burden of obtaining such authorizations from a customer to the utility not only decreases the number of interactions between customers and public authorities (and hence opportunities for rent seeking), but also reduces the time to obtain a new electricity connection. As a final step, the utility installs a meter and turns on electricity supply. As a result, the entire process of obtaining a new electrical connection in Kuala Lumpur takes on average 24 days.

The cost of getting a new electricity connection of 140 kVA in Kuala Lumpur is also relatively low, amounting to 25.6% of income per capita compared to the East Asia and Pacific regional average of 594.6%. As part of connection costs, TNB charges a security deposit as a guarantee against nonpayment of future electricity bills. In accordance with the international good practices, TNB returns the amount of a security deposit to a customer with an interest rate of 2.5%. This significantly lessens the financial burden of providing a security deposit.

Furthermore, the electricity connection costs are fully transparent. That is, for 140kVA connections, the costs are fixed and based on an official fee schedule available online to all customers. Similar to connection costs, Malaysia ensures transparency of connection processes. For example, the utility publishes online information about procedure requirements and time objectives for new connections.
**Malaysia demonstrates the highest performance on the Reliability of Supply and Transparency of Tariffs Index, scoring a maximum of 8/8 points.**

Indicative of a reliable power supply, the SAIDI and SAIFI indices in Kuala Lumpur are consistently below one. The utility in Kuala Lumpur records all planned and unplanned power outages lasting 1 minute or more, including load shedding. Further, the Energy Commission of Malaysia, an independent regulatory body monitoring the performance of the utility, makes the SAIDI and SAIFI indices publicly available. This practice guarantees the utility’s accountability and efficiency and ensures that the published indices accurately reflect customers’ experiences. In addition, TNB notifies customers in advance of any planned outages through its ‘Power alert’ tool available on the utility’s website. The notification system, wherein customers receive alerts prior to preventive maintenance checks, makes the electricity supply more predictable and allows customers to minimize potential losses from the electricity outages.

TNB uses modern automatic systems to monitor and restore power outages. For monitoring purposes, the utility employs TNB Outage Management System, which consists of a call center, a trouble call system and an outage reporting system. Likewise, for the purpose of restoring power outages, both SCADA and non-SCADA systems are installed at TNB. The utility also promotes the enhanced management and monitoring of the electricity consumption through the use of smart meters.

Following recommended best practices, the existing electricity tariffs are available online for all customers and any changes in electricity pricing are communicated to customers by TNB at least one month in advance. This approach allows businesses to plan expenditures beforehand and reallocate financial resources as needed.