An Analysis of Municipal Tariff Determination

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ABSTRACT
- Municipal Distribution is in a Challenging Environment. This paper will throw some light on the challenges faced by some municipalities on some of the realities, challenges and solutions to this challenge with specific reference to tariffs and pricing. This will cover the following issues:
- Complying with NERSA guideline increases or public expectations.
- The process followed to arrive at their own tariff increases and tariff structures.
- Dealing with Eskom’s tariff increases to them and their average increases.
- The small amounts being spent on repairs and maintenance and refurbishment;
- Managing municipal DSM and energy efficiency programmes.
- Reducing energy consumption to assist in the energy crisis;
- Addressing the challenges of the possible reintroduction of load shedding (NRS 048-9);
- and other issues such as skills shortages.

1 INTRODUCTION

The following events introduce the background in respect of electricity pricing in distribution industry:
- The lack of Eskom price increase announcement in time for the 2008/2009 increase.
- The National Treasury guideline stipulating that municipalities should use an increase of 34%.
- The lack of guidelines from NERSA to municipalities in terms of price increases.
- The high Eskom price increase of 25% that was only announced by the end of June 2009.
- The application of average price increases of 34% and more by the majority of municipalities.
- The high increase of 25% announced by Eskom for 1010/11 for municipalities by end of April 2010.
- The guideline increase from NERSA of 18% for those who applied 34% the previous year, etc.
- The NERSA dictated inclining block rate tariff without consultation and against many current policies.

This caused too high price increases to be applied in 2009/10 and lower increases being applied in 2010/11, lower increases for poor customers and the introduction of inclining block rate tariffs by some. All this have serious financial implications, which will be highlighted later.

These steps will be analysed with a view of understanding the underlying challenges and then to propose solutions to these. Proof of these changes are given below:

From Eskom Tariff book.
**Price increase**
On 25 June 2009 the NERSA approved an average tariff increase of 31.3% for Eskom effective 1 July 2009. To protect the poor the NERSA determination includes a lower increase to the Eskom Homelight customers that results in the following price increases:

- The average price increase for tariffs to customers directly supplied by Eskom, excluding local-authorities (municipalities) and the Homelight I & 2 tariffs is 33.6%.
- The average price increase to the local-authorities' tariffs is 31.3%.
- Homelight I & 2 tariffs will experience a price increase of only 15%.

From NERSA Media statement.
3. In order to provide for cross-subsidies for low income domestic customers, as required by the Electricity Pricing Policy (EPP), implement residential inclining block rate tariffs concurrently with this price increase. The structure of the inclining block tariffs, together with the average kWh and percentage price increases, are as follows:-
From NERSA media statement 24 Feb 2010.

7. For those municipal distributors who implemented the 34% increase in the 2009/10 financial year, a municipal guideline increase of 15.33% is approved for implementation with effect from 1 July 2010 followed by 16.00% from 1 July 2011 and another 16.16% from 1 July 2012. For those municipal distributors who implemented a different increase, the Energy Regulator will consider applications on a case by case basis.

NERSA media statement 14 April 2010.

7. For those municipal distributors who implemented the 31% increase in the 2009/10 financial year, a municipal guideline increase of 13.53% is approved for implementation with effect from 1 July 2010 followed by 15.00% from 1 July 2011 and another 16.16% from 1 July 2012. For those municipal distributors who implemented a different increase, the Energy Regulator will consider applications on a case by case basis.

2 ANALYSIS OF INCREASES

The first statement is one of great disappointment for the players in the industry who have put municipalities in a difficult financial situation:

- Eskom for breaking the law and not announcing its price increase in time.
- NERSA for not doing anything such as getting into discussions with municipalities or issuing temporary guidelines.
- For NERSA applying bullying tactics to get the inclining block rate tariffs approved and to be applied.
- National Treasury for not liaising with NERSA and SALGA and then issuing unclear guidelines.
- Also for municipalities / AMEU who did not seek clarification on what to do.
- Many municipalities applying the inclining block rate tariffs without realising the true impact.

Despite all these negatives, the industry has shown a responsibility to make a plan in reaching meaningful solutions. The impact of the current legal dispute between municipalities and NERSA about the right to set tariffs has probably worsened this situation.

3 RESPONSE TO THE INCREASES

In view of the guidelines from National Treasury for a 34% price increase the majority of municipalities applied an average increase of 34%. A few municipalities did however do the logic interpretation and applied an increase which catered for an increase in Eskom purchase cost of 34% which meant and average increase of about 25%.

When the Eskom increase of 31.3% for municipalities was announced by the end of June, not a single municipality that I know of, realised the true impact and adjusted the tariffs down. The average impact on municipalities of the above actions is shown in the table below.

The first impact according to the guideline issued 24 Feb and the second based on guidelines issued 14 April 2010.
Action required: The important message from this analysis is that municipalities have to apply cost reflective increases to the various customer categories and that subsidies should remain within the national guidelines rather than arbitrarily set limits. This includes stipulations made by NERSA.

5 PROBLEMATIC PRACTICES

The question recently being asked, is why municipalities cannot survive with the increases granted by NERSA. The section above suggest that they should be able to. This section will highlight some other aspects which illustrate the problem for electricity departments specifically.

- The first problem relate to municipalities that compile budgets for the electricity departments which are used as a basis for the application of electricity price increases to NERSA, but then a large portion of this money is not spent because of the following:
  - Municipal management do not approve the appointment of electricity staff.
  - Expenditure on electricity capital projects are simply stopped.
  - Very restrictive measures are applied to electricity departments in running their daily businesses.

- The second big problem is that municipalities are embarking on massive non-electricity capital projects of which the revenue requirements by far exceed that of the municipality. What is happening now is that the capital projects of the electricity department is being cut and the money is used for non-electricity capital. Examples of this are the purification of sewerage water for drinking purposes, the building of high speed bus services, etc.

- The next big problem relate to practices to hide non-electricity expenditure in the electricity budget. An example was identified in one municipality where the cost of public lighting, which up to recently was part of the municipal budget and electricity, was compensated to provide this service. A strategy has now been approved to move all these costs to electricity without any compensation. This increases the net cost to electricity with no adjustment in electricity revenue.

The extract from the EPP clearly show that the above practice is a contravention of the EPP.

- Another problem that has been identified, relate to the provision of and write off of bad debt. A few cases have been found where the outstanding debt of the total municipality, of which typically more than 80% relate to non-electricity services, are being written off to all services on a ratio of total revenue rather than actual outstanding debt. In this way the electricity ends up with a very large cost which have no relationship to unpaid electricity.

The big problem with these practices is that the municipalities are increasing its dependence on electricity profits beyond the levels allowed in LG legislation in a hidden way. Furthermore, the problem of arrear electricity infrastructure maintenance and refurbishment is being exaggerated. When major network faults occur, which cause long outages because of non-maintained networks, the damage and losses to the town and thus the municipality, would be very serious and claims for damages due to negligence could become a serious problem.

Proposed actions:

- National treasury for once and for all need to set the rules for ringfencing of electricity from the rest of the municipality.
- National Treasury then also need to set the limits / proposed levels for the municipal surplus on electricity.
- Municipalities then need to stay within these levels and NERSA must regulate the electricity tariffs to remain within these levels.
- Electricity managers can then take responsibility within normal budget constraints to run their businesses to a high level of quality.

6 LARGE CUSTOMER TARIFFS

The high Eskom price increases have a significant impact on the tariff structures to be applied by municipalities. The main changes are as follows:

Policy Positions: 48

Public lighting, including street lights, high mast lights, parking area lights and traffic lights are considered as consumers of electricity and are not part of electricity supply. The associated charges must cover capital and operating costs associated with energy, electricity network, dedicated lighting networks and lighting services. Such services may be provided by electricity utilities, but such costs must be charged to the appropriate owner, in most cases the municipality. The municipality can in turn fund such service from the MSOE.
The energy cost component of the municipal tariff becomes a larger portion of the total tariff.
This means that the costs for customers at higher voltages, would increase closer to the Eskom increases rather than the municipal tariff increases.

These dynamics were studied in some municipalities. The table below shows the % mark-up in energy prices for the large customers in the 2009/10 tariffs.

<table>
<thead>
<tr>
<th>Munic A</th>
<th>Munic B</th>
<th>Munic C</th>
<th>Munic D</th>
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The large majority of municipalities are selling the energy at prices lower than the Eskom purchase costs. This is by no means saying that these customers are being cross-subsidised, as the demand charges by far exceed the municipalities’ other costs. The table below shows the total mark-up on the average Eskom purchase costs at a load factor of 60%.

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<th>Munic A</th>
<th>Munic B</th>
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</table>

At least one municipality is selling its electricity at below cost to the majority of its large customers. The majority of municipalities are however making significant profits from large customers.

**Action required:** Municipalities need to undertake some form of cost of supply analysis with a view of at least determining the relationship between energy and other costs and to restructure the tariffs accordingly. While the very high Eskom price increases are taking place, this should be done every year.

### 7 TIME OF USE (TOU) TARIFFS

Eskom introduced its TOU tariffs more than 15 years ago. The majority of municipalities are purchasing their electricity from Eskom on either Megaflex or Miniflex. Despite this the state of TOU tariffs in municipalities is appalling. The reasons for this are as follows:

- Many municipalities have not yet introduced TOU tariffs for their customers.
- In many cases the TOU tariffs are more expensive than the non-TOU tariffs.
- In many cases the process to convert to TOU involves a long process of analysis, very high conversion fee, revenue neutral surcharges and in some cases very little support from municipal staff.
- The tariff structures are set contrary to the cost of supply and without an understanding of the underlying principles and consequences.
- Customers are not provided with the required meter and data support.
- In many cases the meters are not available.

The bottom line of all of this is that a very small portion of municipal customers, specifically large customers, are on a proper TOU tariff. One of the underlying problems relate to the belief by many municipal staff, that only those customers who can benefit from load shifting should be on TOU. This is proof of the lack of understanding and appreciation of the reasons for TOU tariffs:

- The first and main reason for the application of TOU tariffs is to be more cost reflective. Customers have very differing load profiles and thus different usage percentages in the different TOU periods. When only 1 energy rate is applied the tariff is not reflective of the big cost difference.
- The second reason is to enable load shifting. There is a perception that customers must first prove that load shifting can be done, before being converted. Experience in South Africa and worldwide prove that customers start reacting when they receive the time differentiated price signals.

The table below shows the c/kWh mark-up on the Eskom energy prices for some of the municipal TOU tariffs at MV.
The following observations can be made from this:

- Of the 14 municipalities analysed only 7 offered TOU tariffs to its large customers.
- The number of TOU customers in the majority of these municipalities are less than 10% of the large customers.
- Some of the energy prices are less than that of Eskom in 3 municipalities.
- The c/kWh mark-up in the different TOU periods is very different.
- The TOU periods differ with that of Eskom in the case of one municipality.

These facts clearly show that the design and roll out of TOU tariffs is problematic. This is despite the fact the electronic meters with TOU features and in many cases the presence of remote features exist for a very large percentage of the larger customers in these municipalities.

The EPP makes the following stipulations in this respect:

Policy Position: 31

<table>
<thead>
<tr>
<th>Tariffs must include TOU energy rates as follows:</th>
</tr>
</thead>
<tbody>
<tr>
<td>• all customers supplied at MV or above within two years;</td>
</tr>
<tr>
<td>• all customers above 100 kVA within five years;</td>
</tr>
<tr>
<td>• all cases where the metering provides such features within five years; and</td>
</tr>
<tr>
<td>• all other customers where it is warranted.</td>
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</tbody>
</table>

Proposed action: The following actions are proposed in this respect:

- TOU tariffs should be rolled out as follows in all municipalities:
  • To all customers at MV by 1 July 2011.
  • To all customers > 250 kVA by 1 July 2012.
  • To all customers > 100 kVA by 1 July 2015.

  This roll out should be:
  - Compulsory for all customers in the category.
  - The tariff should be set to be revenue neutral with the demand and single energy rate tariff for all customers in each category being converted.
  - In this way, no further analysis is required and no revenue neutral surcharge is required.
  - and the municipality will not lose any money when customers convert to TOU.

- The tariff must be structured as follows:
  • the same structure as that of the Eskom Megaflex applicable to that municipality
  • or the average in the case of various supply points with different tariffs.
  • The c/kWh mark-up must be the same in all periods to ensure that the municipality does not lose any contribution (revenue minus cost) when customers shift load from one to another period.
  • Ideally the mark-up on energy, the demand charges and fixed charges, should reflect the cost of supply as determined through COS studies.
  • The rates need to be analysed and be set based on these principles every year and not by the application of an average increase on all the rates.

If TOU tariffs are structured and rolled out in this way, the large customers, who all have a different potential to shift load will be charged fairly and will have the opportunity to start managing their businesses, to shift load and apply strategic conservation in the more expensive time periods. All of this can be done without putting the municipality under a massive administrative or financial burden or causing it to lose any contribution.

8 DOMESTIC TARIFFS & SUBSIDIES

The majority of players in the industry know the impact of subsidies and cross-subsidies being applied to the poor electricity domestic customers in South Africa.

The main strategy being applied by Eskom and municipalities, is the application of a single energy rate tariff without any fixed or capacity charges. This provides significant subsidies to the low usage customers.

The table below from the EPP shows the proposed breakeven between a cost reflective tariff and a single energy rate life line tariff.
The table below shows a comparison of standard domestic tariffs with life line tariffs in a few municipalities.

<table>
<thead>
<tr>
<th>DOMESTIC TARIFFS BREAKEVEN</th>
<th>Standard Domestic</th>
<th>Life line Break even</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Basic 20 Amps</td>
<td>Energy kWh/m</td>
</tr>
<tr>
<td>Munic A. 103.417</td>
<td>64.440</td>
<td>53.900</td>
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<tr>
<td>Munic B. 87.360</td>
<td>64.290</td>
<td>55.070</td>
</tr>
<tr>
<td>Munic C. 13.500</td>
<td>64.600</td>
<td>70.000</td>
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<tr>
<td>Munic D. -</td>
<td>68.940</td>
<td>NA</td>
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<tr>
<td>Munic E. -</td>
<td>61.344</td>
<td>49.233</td>
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<tr>
<td>Munic F. 20.396</td>
<td>70.741</td>
<td>54.428</td>
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<tr>
<td>Munic G. 180.760</td>
<td>80.520</td>
<td>&gt; 5000</td>
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<tr>
<td>Munic H. 28.570</td>
<td>73.180</td>
<td>124</td>
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<tr>
<td>Munic I. -</td>
<td>64.290</td>
<td>58.900</td>
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<tr>
<td>Munic J. 79.680</td>
<td>63.780</td>
<td>273</td>
</tr>
<tr>
<td>Munic K. -</td>
<td>74.200</td>
<td>71.760</td>
</tr>
<tr>
<td>Munic L. 70.500</td>
<td>65.250</td>
<td>Never</td>
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<tr>
<td>AVERAGE 39.661</td>
<td>63.612</td>
<td>61.433</td>
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</table>

What this is showing are as follows:

- The breakeven points between the standard domestic tariff and the life line tariffs are either much higher than prescribed in policy documents or no breakeven is ever achieved.
- It must also be remembered that many of these customers also receive free basic electricity (FBE) which increases the break even points even further.
- This means that the extent of cross subsidisation of poor domestic customers, far exceed national government intentions.

This problem has been exaggerated by the NERSA rulings that the poor customers should receive maximum price increases of 15%.

9 INCLINING BLOCK RATES (ICBR)

Despite the massive cross subsidies already provided to poor domestic customers, NERSA ruled that poor domestic customers should be provided with subsidies (apparently totally unaware of the current cross subsidies) by way of an inclining block rate tariff. It goes on by not saying that the inclining block rate tariff be applicable to poor domestic customers only, but that that it should be the only domestic tariffs to be applied by Eskom and municipalities.

- Eskom reaction.
  - Eskom did not seem to make any objection in this respect, but only applied it to the billed customers and not to pre-payment customers, due to vending problems.
  - This impact plus that of low increase for rural, on non-domestic, non local Government customers was an additional increase of 4.6% in 2010/11. See abstract below.

- SALGA reaction.
  - Compliments to SALGA who did object to this ruling by NERSA.
  - The problem is that NERSA has been applying ongoing pressure on municipalities to apply these tariffs, despite an agreement with SALGA that it would not.
  - Various municipalities did however apply inclining block rate tariffs to their domestic customers, in line with NERSA ruling.

The figure below shows the comparative revenue from the current Eskom domestic tariffs VS the recommended NERSA inclining block rate tariff.

It clearly shows the following:

- Further increasing cross subsidies to the poor.
- Introduction of cross subsidies for very large / wealthy domestic customers.
- Additional increases for some high usage domestic customers.

The impact of the proposed NERSA inclining block rate tariffs are as follows:

- Increased cross subsidies for poor domestic customers beyond national government targeted levels. The
impact has been quantified, but not very accurately, due to massive data requirements for Eskom, but not for municipalities.

- Introduction of very large cross subsidies for non-poor customers specifically those with irregular usage.

The impact on those municipalities that have a significant number of customers with irregular usage such as holiday homes or lodges and empty stands will lose a lot of revenue and this burden will be placed on the permanent residents unfairly.

- Introduction of unfair problematic practices in pre-payment customers.

- A change in the need for the application of smart meters and application of time of use tariffs and demand side management measures for domestic customers.

- Massive negative financial impact on municipalities associated with reduced consumption due to high price increases and roll out of energy efficiency measures.

The table below shows the situation for typical municipal customers at 60 Amps.

Where a customer installs a solar water heater, some efficient lights and is generally more aware and saves 300 kWh/m, when normally using 1000 kWh/m, the savings will be as follows:

- On the cost reflective tariff - 26%.
- On the ICBR tariff - 33%.
- On cost as % of revenue - 16%.

As energy efficiency strategies are rolled out, municipalities will increasingly come under pressure, because the loss in revenue will exceed the savings in purchase and other costs significantly. This is because the tariff is now not cost reflective and there is no fixed charges to cover the fixed costs.

The NERSA proposed application of ICBR tariffs for all domestic customers does not comply with various national policies such as the ones below:

A. The Electricity Pricing Policy (EPP) of South Africa as approved by cabinet 19 December 2008 states the following:

- Policy Position 2: Electricity tariffs must reflect the efficient cost of rendering electricity services as accurately as practical.
  - The average level of all the tariffs must be set to recover the approved revenue requirement.
  - The tariff structures must be set to recover costs as follows:
    - The energy costs for a particular customer category.
    - The network usage cost for a particular customer category and
    - Service costs associated herewith.

- Policy Position 36: Domestic tariffs to become more cost-effective, offering a suite of supply options with progressive capacity-differentiated tariffs and connection fees:
  - At the one and a single energy rate tariff with no basic charge, limited to 20 Amps and nominal connection charge (details under section on cross-subsidies);
  - At the next level a tariff which could contain tariff charges to reflect a basic charge, customer service charge, capacity charge and energy charge with cost-reflective connection charges; and
  - At the final level TOU tariffs must be instituted on the same basis as above, but with TOU energy rates.

- Policy Position 48: Qualifying customers shall be subsidized through the application of a life line tariff:
  - a single energy rate tariff;
  - with no fixed charge;
  - Limited in capacity to 20 Amps; and
  - nominal connection fee.

- Policy Position 49: The level of the life line tariff should be set to break-even with the cost reflective tariff of the licence for a 20 Amp supply at a recommended consumption level of 300 kWh per month.

- Policy Position 40: The shortfall in revenue between the life line tariff and the cost of supply after deducting the electrification capital grant shall be addressed within the distributor. The impact of such cross subsidy must be passed over all customers in the licensee, not only on domestic customers and should be shown transparently as a kWh levy on consumption.


The inclining-block tariff was decided against by the NDTS working group for two principle reasons: Firstly it is structurally non-cost-reflective. The average cost of supplying a customer decreases as consumption increases and hence an inclining-block tariff where the tariff rate decreases as consumption increases is contrary to the cost of supply and hence contrary to the key elements of the electricity pricing philosophy as described earlier i.e. that tariffs must be structurally cost-reflective. Secondly, the implementation of an inclining-block tariff on prepayment electricity meters - which are widely used - is at best, impractical.

C. The Distribution tariff code makes the following key statements:

General tariff principles

(3) The structure of tariffs (the balance of fixed and variable components) should reflect the costs drivers.

(8) Cross-subsidisation between and within electricity tariffs shall be applied to all electricity users in accordance with government’s policy and the NERSA’s cross-subsidy framework. This process will be informed by Distributors calculating current levels of cross-subsidisation (total cost reflective tariffs versus current tariffs).
Cost reflective tariff structures

(2) The tariff charges (rates) shall be calculated based on the approved revenue requirement, volume forecast for demand and energy and customer numbers.
(4) A cost-reflective tariff structure will:
(a) Align with the purchase structure and cost of energy.
(d) Include differentiation to take into account:
Retail charges that reflect the size of the supply and the services being provided to the customer.

Proposed action: In view of the serious implications of the proposed NERSA ICBR tariffs the following action is proposed:
- SALGA to undertake a detailed study on the proposed ICBR tariffs in respect of:
  - Compliance with national government policy.
  - Extent to which it achieves national objectives.
  - The short terms and long term financial implications.
  - The practical implemental problems.
- SALGA can then call for a national workshop with DOE, DPLG, National Treasury and NERSA to debate these issues and come up with a new policy that complies with ESI requirements.
- That NERSA be forced to reverse the unilateral decision in respect of Eskom and municipal application of inclining block rate tariffs.

10 RESELLERS

In South Africa there are an estimated 2 million domestic customers being supplied with electricity through electricity resellers. Although some municipalities see them as a threat, the majority of them are supplying a good service and the customers are generally happy.

These resellers are viable because of the mark-up made on electricity sales, as does municipalities. The electricity Act used to contain a section, stipulating that resellers could not charge more than the end use customer would have been charged, had it been a customer of the licensed distributor. This stipulation has been removed from the Act, but many municipalities now have stipulations to the same effect.

The NERSA strategy of domestic increases to the poor limit to 15% and the introduction of inclining block rate tariffs is a serious threat for resellers. This is because the resellers purchase costs are going up by the very high Eskom or municipal increases and the selling prices are remaining at the low levels or are reducing significantly.

In Eskom and municipalities, the revenue lost due to the lower increases to the poor and the introduction of ICBR tariffs, are recovered from other customers. Resellers do not have that option.

Some municipalities have passed by-laws to allow resellers to sell at a price equal to their average purchase costs from the municipality. Although this will help, the lack of a basic / customer service charges in domestic tariffs to cover the network and customers service costs, will make it impossible for resellers to be viable.

The solution to this problem is contained in all the energy policy which have been set to date, except for the latest NERSA rulings on lower increases and ICBR tariffs. It is contained in the following:

- Electricity tariffs must be based on cost of supply.
- Any subsidies should be measured and be transparent.
- Subsidies should be targeted at the poor.

If this was applied, resellers would have a mark-up in the standard domestic tariff because of the cost differences and would be viable. Where there are specific transparent cross-subsidies, it should be applied consistently within a municipal boundary as is required by law. This would mean that the municipality, being considered the body to distribute electricity cross-subsidies, should collect revenues and distribute cross-subsidies and subsidies to all the residents in its area of jurisdiction. This is for example the case in respect of FBE, where municipalities distribute the funds also to poor customers supplied by Eskom.

If the trend of less than average increases are continued for the poor and ICBR tariffs are introduced, resellers will be under severe financial pressure. Their possible actions to survive could include:

- Applying tariffs that are higher than that applied by the municipality / Eskom. This could cause a retaliation by the customers of the resellers, which could cause a demand to become direct customers to the municipality. Although some municipalities would like this, it will increase their subsidy burden and will increase their total resource requirement which is already under severely constraint.
- An alternative is for them to apply to become licensed distributors of electricity in which they can apply their own set of tariffs. This is unlikely due to the massive admin burden and some municipality withholding consent. If NERSA continue with the forcing down of an INBR tariff only for domestic customers, this will not provide any relief.
- Another alternative is to take municipalities to court to subsidise the difference between the cost of the resellers and the ICBR tariff of the municipality.

None of these actions will be good for our industry. The most viable solution is to apply the good policies that have been developed over the past years:

- Eskom and municipalities apply cost reflective tariffs.
Specific provisions be made for the poor within the EPP and other policies.

Where there are poor people qualifying for the specific provisions for the poor that are supplied by resellers, such funds need to be channelled to those poor by the municipality.

11 RESULT OF FINANCIAL CRISIS

When the financial crisis becomes more apparent, one begins to wonder what happens in respect of some of the very important deliverables of municipal electricity departments such as: DSM and energy efficiency, reducing energy consumption to reach the savings targets, addressing the maintenance backlogs, preparing to be more ready for possible future load shedding, etc.

I want to start off by saying that I applaud many municipal electricity staff for their efforts and will, to do what is required, despite the serious constraints under which they work. The current structures and rules in municipalities make it very difficult to do their jobs effectively and efficiently. A few examples is proof of what I mean:

- One of the municipalities have installed various electronic meters with remote reading features. When I asked whether I could obtain the load profiles for the last year, I was told that they did not have the money to download the data. This was because the 2 cell phone sim cards being used was held by finance and these were limited to R500 per month each.
- I have seen many detailed capital and refurbishment budgets, catering for the absolute essentials and for the normal requirements, being prepared by electricity staff annually and simply not being approved.
- The tender requirements in municipalities are so stringent that it makes it very difficult to undertake the basic functions. In one municipality a tender had to be prepared to purchase a few 11 kV fuses. The particular feeders are currently running without protection, because the tender process will take 6 months.
- The introduction of the so called infrastructure managers, in many cases has been disastrous for electricity departments. Firstly this has effectively pushed the whole electricity department down one level further from the Municipal Manager. This has made it almost impossible for many municipalities to employ quality engineers / technicians. One infrastructure manager asked my opinion about advertising the post, head of electricity, holding a government certificate of competency, with a salary of R150 000 per year. In a few municipalities, especially the smaller ones, the infrastructure managers is a major stumbling block in delivering quality electricity service.

12 CONCLUSIONS

The subject covered in this paper is a highly complex one and the situation and solutions for each municipality is not the same. The objective of this paper is to highlight some of the key issues which municipalities should give attention to.

The conclusion with respect to electricity pricing, policy formulation and delivering a quality service is that very serious changes are required.

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