

# **POWER TARIFF MUDDLE**

By

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## **1. Introduction**

WAPDA was established under WAPDA Act. 1958, for an unified and coordinated development of water and power resources in Pakistan. The power wing has since been responsible for the construction, maintenance and operation of Power System throughout the country excluding KESC area and has been supplying power to its consumers, meeting increased load demand at various voltage levels and at a tariff determined by Bodies for power rates constituted by GOP. The guiding principles for determination of power tariff are as follows:

- i) The tariff must provide the correct economic signal of the underlying advantages and disadvantages of using electricity and to encourage its use when and where justified and to discourage it when and where it is not.
- ii) The electricity tariff should be capable of providing revenue for energy sector to cover its cost and to help provide savings for its growth and development.
- iii) The tariffs should contribute to equity.

WAPDA successfully developed operation and maintained power system inspite of several distortions in tariff such as subsidies to lifeline consumers, subsidized supplies to FATA and Agriculture tube wells etc. which badly disturbed the tariff structure. Tariff for low income domestic consumers and agriculture tubewells were subsidized thus shifting burden of higher tariff to commercial and industrial consumers. There has been increase in tariff from time to time due to devaluation of Pak currency, overall inflation and unviable rural electrification as per policy of GOP. GOP never shared burden with WAPDA due its dominance and political pressures, thus containing profits of WAPDA resulting in increased debt servicing liabilities.

Inspite of non cooperative attitude of GOP, the situation remained under control till WAPDA economy was plagued by induction of IPP's, HUB and privatization of Kot Addu Power Plant. It may not be out of place to mention that WAPDA has been a profit earning organization inspite of all lapses since its creation and had played a vital role in the development of the country.

Induction of IPP's, privatization of Kot Addu Power Station took place under direction of the World Bank being the covenants of loans signed by our top brass. Loan giving agencies to cover up their engineered plans, later labeled it as mismanagement of financial discipline and inefficiency of the WAPDA organization to control line losses, theft, and higher overheads. Now let us see how we can resolve this power tariff muddle and what effects it will mar on our economy.

## **2. Importance of Power Tariff**

It is observed from the statistics of developed and developing countries that increase in energy consumption per capita is directly proportional to GDP growth. Since energy permeates the economy of a country, it is understood that social and economic structure of an economy could substantially and regressively alter by large energy use, the major component of which is electricity.

The power tariff has a great bearing on increased use of electricity. Higher power tariffs, beyond the capacity of the consumers to pay, restricts electricity demand and results in higher cost of agriculture and industrial products. In fact power tariff has a key role to play in economic development of a country, so it is essential to keep tariff at reasonable levels for development of industrial and agriculture sectors to attain economic goals.

### **3. Causes of Power Tariff Increase in WAPDA**

Is WAPDA responsible for tariff increase? My answer this question is simply 'No'. GOP is responsible for abnormal increase and distorting the tariff. In this context I would like to draw attention to my paper read at IEP forum in December 1995, where in I worked out loss to WAPDA in the coming years due to privatization of Kot Addu, HUBCO and induction of IPP's and warned of the consequence.

Quote:

**"It may be observed that WAPDA will suffer loss of Rs.33.05 billion during the year 1997-98 which will shoot up to Rs.46.65 billions during the following years at specified plant factors. In case of devaluation of rupee, the loss will proportionately increase. Imagine how WAPDA will survive against such a colossal loss. WAPDA economy may collapse along with hundreds of other institutions viz consultants, manufacturers, contractors and indentors etc, until power tariff is increased by 46%, to neutralize effects of Privatization. Such an increase in tariff will prove disastrous to GOP economy. Cost of production will increase resulting in reduction of exports and higher rate of inflation and a forced cycle of currency devaluation. It may be clarified that WAPDA earned a net profit of more than 10 billions during 1995-96. To attribute this loss to WAPDA mismanagement is totally unjustified."**

My calculation have proved true. Today WAPDA is bearing a loss of about Rs. 40 billions a year, and this loss is beyond control of WAPDA. The sale price of IPP's, HUBCO & KAPCO are fixed under the contract agreement. Other components of expenses are fuel for WAPDA plants, debt servicing and net hydel profits to NWFP, where degree of control with WAPDA is again negligible. Only sector left is operation and maintenance of Power System, where WAPDA have some control and can improve system efficiency and line losses but same are difficult to improve due to socio-economic problems. WAPDA losses remained between 25 to 26% over the past six years, which cannot be brought down further. According to my estimate, theft is about 6% while technical losses amount to 20%. Technical losses are high due to lengthy transmission and distribution lines, overloaded system and poor workmanship etc, which will require huge investment to improve and bring down losses to a reasonable level and perhaps, is not viable at this stage. GOP

requirement to reduce loss by 1% every year shows ignorance of our top management. WAPDA O&M cost is only 8% of total sale and is one of lowest among the power utilities, although World Bank and IMF is blaming WAPDA for high overheads and overstaffing which is not true.

#### **4. Impact of IPPs and Private Thermal Generation over WAPDA Tariff**

Analysis of IPP generation for the year 2001 – 2002 is as under:

Amount paid to IPP (Million Rs.)	109,193
Units Purchased MKWh	23,242
Units Sold MKWh (less losses) MKWH	17,250
Cost per Unit Rs/KWh	6.33
Average Selling Price Rs/KWh	3.73
Net Loss Rs/KWh	2.60
Total loss due to IPPs (Rs. Billion)	44.8

The average cost of WAPDA Thermal plus Hydel generation is Rs.1.86 per unit which to some extent compensate loss due to IPP's. The cost of Thermal generation by WAPDA is almost the same as average sale price while cost of Hydel generation is very low as debit services have already been paid and its only the operational cost of power houses which in fact is saving WAPDA from total disaster.

#### **5. GOP View Point**

GOP repeatedly assures masses that it remains alive to their plight and would ensure reduction in electricity prices soon. Thus, they say, would be achieved through the subsidy being given to WAPDA to partially compensate for the loss, improvement in the thermal hydel mix, conversion of furnace oil fired thermal plants to gas and the reduction of IPP rates as soon as the front loaded PPA's level off.

Regarding conversion of existing furnace oil power stations to gas, it will take another six to seven years for implementation of the projects due to constraints of gas availability in certain areas and absence of infrastructure for supply of additional gas. Reduction in IPP's rates by the year 2005 will be nominal and will have no substantial impact on its tariff. By the year 2009 appreciable slide in favour of WAPDA may take place.

On ground realities, all the above measures will take long time to have its real impact on tariff. According to my assessment if all goes well and in accordance with plans, actual slide in favour of WAPDA would start not before 2010.

#### **6. IMF – World Bank View Point**

According to IMF & the World Bank, all power utilities should be self sustainable, without any financial assistance from GOP. In addition IMF wants that no subsidies be allowed to any power consumers. The point is valid and understandable. WAPDA can still manage its affairs well if GOP cooperates and allows WAPDA to withdraw all subsidies from lifeline consumers, FATA/PATA areas, tubewells etc. The question arises which agencies are responsible for creating crises like situation in Power Wing

of WAPDA today. IPP's in WAPDA were inducted under instructions of the IMF and the World Bank although 6.5 cent/KWh policy was introduced by Mrs. Benazir Bhutto. High cost of IPP's along with ballooning prices of furnace oil are the major reasons for the prevailing high power tariff. Earlier the IMF and the World Bank endorsed GOP steps to levy taxes and GST on POL and Electricity Sales, so as to boost the revenues and reduce the GOP budget deficit, which ultimately resulted in power tariff increase.

To day another follow up of the IMF with GOP is total privatization of the power sector. This again will have similar impact on the power tariff as in case of IPP's. In this context I would like to reproduce some abstracts from my papers issued in 1996 – 1997.

**Quote:**

- i. WAPDA is likely to bear a loss of revenue from 2500 to 3500 million rupees a year due to privatization of FAEB. IFC has used economic techniques using models where apparent loss to WAPDA is not visible and has balanced WAPDA payments by increase in sale and cost of units.
- ii. It is interesting to note that as a sale proceed of 26% share of FAEB, an amount of 2.5 million will be received by GOP only once while WAPDA will continue to pay more or less the same amount every year. In fact privatization amounts to GOP borrowing a loan at more than 100% rate of interest. Ponder for a while over the consequences if all power wing, WAPDA assets amounting to more than Rs.200 billions are privatized under IFC Proposed terms and conditions, which may lead to total bankruptcy within a short period instead of supporting sagging economy of GOP.

Chairman WAPDA interacted with the Ministry of Water & Power and was in position to defer privatization of FESCO, until terms and conditions are made favourable to the local bidders and WAPDA is safe guarded against any loss due to privatization. IMF believes that WAPDA is a drain on national exchequer and it is necessary to privatize it, to improve efficiency and to reduce tariff which may prove otherwise.

## **7. Analysis of Prevailing Situation**

There is no doubt that present power tariff is high, which must be reduced to promote economic growth in industrial and agriculture sectors. The hurdles to reduce tariff are not within WAPDA control. The first and the foremost is the generation tariff which is the base for arriving at distribution tariff. IPP contracts already signed by GOP has to be honoured and WAPDA has no control over them. Another major factor is the furnace oil cost which was Rs.5500 in the year 1999, rose to Rs.14500 in the year 2002 showing an increase of 170% and gas prices were also increased by more than 100% during this period while WAPDA was allowed an increase of 17% only. WAPDA operation and maintenance cost is 8% of the total sales and is at its lowest ebb. The only sector for which WAPDA is being blamed, are losses which hangs between 25% to 26% over the last few years. Careful analysis indicate that 50% losses are of generation and transmission, the reduction of which will require huge investment which can not be attended due to financial constraints. Remaining 12 – 13% losses belong to distribution out of which 5 to 6% may be theft. If induction

of 30,000 army men in WAPDA could not control it, no other solution will be workable due to socio-economic problems in the country and we have no alternative but to digest this loss.

The mission believes that privatization of power sector will reduce cost, which in my opinion will prove otherwise, the cost will increase as private investor will use all its resources to recover profits over their investments and return on the principle amount within shortest possible time.

So in the present circumstances I don't see any possibility of immediate relief until GOP supports WAPDA to bring down tariff which is discussed hereunder:

## **8. Recommendations**

By the year 2010 WAPDA has estimated a peak demand of 21,000 MW compared to 10500 MW today based on low growth load forecast and has proposed to add 8000 MW additional generation out of which 3000 MW is from Hydel and the remaining 5000 MW from conventional fuels i.e. gas or furnace oil. So in the near future I don't see any development, which will bring down cost of electricity.

### **8.1 Short Terms Measures**

- i. GOP should withdraw GST and other taxes on import of furnace oil.
- ii. GOP should withdraw GST on sale of electricity.
- iii. Govt. intends to collect Advance tax from all categories of consumers through electricity bills which will further deteriorate the situation and under no circumstances be implemented. GST and advance tax together would amount to 30 to 40% of the electricity bills.
- iv. Subsidies given by WAPDA to FATA/PATA, AJK and life line domestic consumers under direction of GOP amounts to 42% of total collection and should be compensated and paid promptly to WAPDA.
- v. Formula for profit sharing to provinces of Hydel power generation should be reviewed. WAPDA at present is paying Rs.6 billion per annum to NWFP which amount is exorbitant while WAPDA is making no profit.
- vi. GOP should help WAPDA to extend gas facility for power generation and should ensure that gas prices shall not be increased abnormally.
- vii. WAPDA should adopt measures for higher sale of energy to reduce share of costly IPP's. Higher the production the lesser will be the cost of generation.
- viii. For sustainable development and economic growth of the country it is essential to supply power to Industry and Agriculture at reasonable rates. Under the present circumstance, WAPDA may consider to provide power to Industry and Agriculture from midnight to 8 AM

charging only operational and maintenance cost excluding capacity payments. This will not cause any additional burden to WAPDA, thus improving load factor and cheaper energy to Industry & Agriculture.

## **8.2 Long Term Measures**

- i. Under long term plan, Thar and South Coals should be harnessed on top priority. The potential of Thar Coal is sufficient to generate 100,000 MW of electricity for 60 years. I suggest that atleast 3000 MW of power generation should be produced from coal by the year 2010, which will greatly help WAPDA in balancing and resolving its high tariff problem.
- ii. Kalabagh dam should be constructed and other proposed dams at Bunji and Tha Kot should be advanced as far as possible.
- iii. Timely execution of proposed projects on Gas Hydel, and Coal as envisaged under vision 2025 programme must be ensured.