

"Energy crises in Pakistan"

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Expensive hydrocarbons

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"Energy Crises in Pakistan"

Energy sectors play a vital and pivotal role in the development of a country. This sector is responsible for man's prosperity everywhere in the world. But unfortunately our country is facing major issues in energy since its independence. That has been agreed in shape of industrial treaty at very early times of the country's birth. ~~These~~ These crises in Pakistan adopt a fatal role in the development. The energy sectors of Pakistan facing two main problems which are:

Load shedding, Expensive electricity.

The demand of electricity is increasing day by day and the availability of the resources are decreasing. ~~time with it~~ In last two decades, the shortfall of electricity has been increased upto a major extent.

If we look into the statistic of shortfall in Pakistan, it was about 5000 to 8000 MW in the year 2006/07. Then almost

after one and half decade the
shortfall gone to 10000MW in the
Summer season of year 2022.

Here, the answer of the time is to
know how this shortfall arise and why
we compromise on loadshedding?

As every body knows that Pakistan
has a limited resources of Hydrocarbons.
We generate about 6500MW electricity
from coal in which just 2500MW generated
from locally produced coal. Similarly,
588,000 barrel of oil is using in Pakistan
where we only produce = 83,000 barrels.

The low production of oil is because of
no proper refineries. We are just capable
to refine just 36% of our crude oil
while the rest 74% declared as waste.

Similarly, our gas producing capacity is
only 36% of our daily usage that is
about 1 billion cubic feet per day. So,
the reason is obvious that we are unable
to fulfill our requirements from Hydrocarbons
i.e. Coal, Gas, oil. We do not focus on long

term policies and ~~try~~ try to overcome our problems easily - We has compromised on the import ~~the~~ of ~~the~~ expensive hydrocarbons that leads to the immense loadshedding in the country.

The second main reason that our energy sectors are facing since long is the expensive electricity generation - Pakistan's electricity generation is expensive one. Among the countries of Asia - The tariff rate in our country varies with the usage / consumption of electricity / energy - Here tariff is 28 PKR for the consumption of 1-100 units and 44 PKR ~~from~~ for use of 100-300 units of power followed by 56 PKR ~~from~~ for 300-600 consuming units - If the consumption goes above ~~the~~ 600, the per unit cost jumps from 56 to 72 PKR - That statistic is just for local community. Now have... a short look of Commercial Unit ~~is~~ which ~~is~~ is 98 PKR for the consumption of each unit - ~~the~~ ~~rate~~ ~~in~~ ~~the~~ ~~energy~~ ~~cost~~ ~~has~~ ~~gone~~ ~~because~~ ~~of~~ ~~many~~ ~~reason~~ ~~tariff~~ has been increased almost 300% i-e in year 2021 the cost was 18 PKR for a slab of 300-600 units now is 56 PKR.

There are several reasons for the price exaggeration in Pakistan. The major one is the effects of COVID-19 on global community. The prices of the hydrocarbons were low in international market during the COVID-19 Pandemic period. Our power generators are working 60% on hydrocarbons i.e. we generate 12000 MW diesel generators, 6500 MW from coal and 7000 MW from LNG. As the prices were low, the demand was less because of industrial shut down during that period. As the industrial zones got functional, the demand of hydrocarbons increased globally. So, the prices also been exaggerated and Pakistan is hydrocarbon importing country.

The other main reason is the the sanctions of European countries over the Russia. The biggest importers of hydrocarbon are European countries and Russia is the world biggest supplier of hydrocarbon. After Russian-Ukraine war, E.U imposed sactions over Russia and stopped the import of hydrocarbons due to which the prices of Diesel, LNG and coal increased world wide. This is

because of shortage oil which arised after the sanction imposed by European countries. The world started to buy it on a very high price from other exporting countries.

The other main and foremost reason is concern with our currency. Our currency has been devalued uph an unexpected level that badly effected the economy and stock exchange. A time came that Pakistan stock exchange was almost crashed. This is because of the deficiency of dollar and other foreign reserves in the banks. Pakistan has to pay up United State dollar (USD) for all its import from any country. Due to the devaluation of PKR against US Dollars, we used to pay more for our imports. The biggest and major import of Pakistan is Hydrocarbons that has been imported for the mean of energy production. As the devaluation of PKR and payment of more, it leads up us to increase the prices of electricity.

Furthermore, the government agreements with independent Power producers (IPP) is another major threat to the energy sectors of Pakistan. When ever Pakistan faced any kind

& the problem of shortfall, they signed
 agreements with IPPs for the installation
 of Power Plants. In Pakistan IPPs installed
 in 1994, 2005, 2011 and 2014 and never
 been negotiated the agreements. The agreement
 used to be for whole year but that is a
 bit unfair because the demand in winter
 season is less while more in summer season.
 But we have to pay them same/ equal for
 the whole period. We also face other problem with
 IPPs - the problem with IPPs ~~are~~ ^{is} the Capacity
 Payment. That payment ~~is~~ is about 5 Trillion
 PKR that government has to pay in dollars.
 The independent providers are being payed
 in dollars. We also pay local IPPs in dollars
 rather than for paying them in our own
 currency PKR.

Our Country Pakistan is not only facing
 energy problems, they are also facing other
 problems like economic, financial, agriculture.
 To meet all these problem we do not have
 any source. So, by ~~ed~~ for this the only solution
 is to get loan from other people/countries.
 The major loan provider of Pakistan is IMF.
 Pakistan granted loan by IMF for 24 times. Each
 time they issue loan on very strict conditions.

The negotiations of 2022-23, IMF demanded to increase the prices of electricity in form of removing subsidies. That was the major reason for hike prices of electricity.

There are several problems with our transmission and distribution sectors as well. The transmission and distribution losses are about 33% that are major in whole Asia. Our losses are above our neighbour countries that are 3%, 9%, 12% of China, Bangladesh and Afghanistan. Among 33%, 17% of problems are with transmission while the rest 16% is concern with distribution side. In this the major part is electricity theft that is 9%. Beside this, the other factors are other transmission and distribution lines and the usage of electricity by government departments on subsidies based. That is a major blow to the energy sector.

The energy problems badly impacted the economic wheel of the country. The energy crises in Pakistan lead the countrymen to the verge of leather from the system. According to a survey, in Pakistan middle class families pay 40% of their income just to pay their electricity bills. Due to this

high pay of their income, in they compromised on other means of life that left the impressions on Commercial markets. This issue also hit the industrial sectors of the state. The other major sector that is considered the spine of our economy is agriculture, that is also been blown by the crises in energy. Because the farmers are usually unable to buy expensive fertilisers for the production of crops. So, the production in Pakistan is decreasing annually. All these factors are responsible for the hit of Public life.

~~The need~~

To overcome all these problems and put off the country on the right track of development, we need to make some harsh decisions. These might not be in favour of people for a time being but will bring happiness and prosperity to the country with the passage of time. We should work on long term projects rather than short term (Work of Dams, Cheaper Electricity projects, local IPPs). This will also lead us to negotiate our agreements with the foreign IPPs and could get rid of capacity payment. We should revamp / renew our

Transmission lines. By upgrading it, the losses in our lines will get reduce upto certain Percents. Furthermore, we need to take some Strick actions against Electricity theft - As many government departments are still using Electricity on subsidised based, so by bring reforms like Privatisation can solve this Problem of energy sector in an efficient way.

The role of Energy in the development of a Country is not hidden from anyone. All Countries of the world, specially developed Countries are at their peak because of energy. The economies of some big nations are running over the imports of energy means. Russia a Country having biggest one by Area, ~~are~~ is the biggest supplier of hydrocarbons to the ~~Europ~~ European zone. Same ⁱⁿ as the example of China example of China, being the largest Populus Country ~~to~~ did not face any sort of problems in their state. The world's Powerful Country, United States of America selling the world just because of their industrial sectors that operates on Hydrocarbons. These Countries do not face

the Problems of Loadshedding nor of expensive electricity generation. Even in one of our neighbouring Country Provides 300 Units of Electricity free of Cost to the Customers. So, we also needs to bring Pakistan in the queue of these Country. If we keep an eye on the hydrocarbons usage, it will easily get happen. According to the shortfall in Pakistan, we can easily achieve it locally - the biggest headache to Pakistan's economy is the expensive hydrocarbons - that we export from other Countries, could be brought up to zero if we fulfill our needs of electricity from Solar (3000 MW), Wind (4500 MW), Local Coal (1320 MW), Hydal (15000 MW) and Nuclear (13000 MW) - By doing so, the import of hydrocarbons for our power sector will get 0% and Pakistan will be back on the track.