

Q What are main causes of energy crisis in Pakistan? What measures do you recommend to address it?

Answer

Introduction

"Crisis of energy leads to economic crisis."

(- Robert Hoover)

Pakistan has been facing an issue of energy crisis since 2007. In fact, several reasons are behind energy crisis. Resultantly, excessive loadshedding and expensive agreement put burden on economy. Therefore, suggestive measures be taken to address crisis of energy.

2- Energy Crisis - an Overview

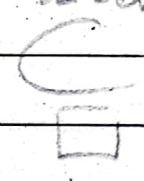
Energy crisis results excessive loadshedding.

(- Tazveer Hussain)

Since 2007, Pakistan

1- Intro.

2- Energy crisis



3- Causes of energy crisis

a) Supply

b) Demand

c) Government

d) Tariffs

e) Energy loss

f) No bill for PAF

g- Imp

h) subsidies

i) expensive

j) maintenance

5-

has been facing energy crisis.

The cost of energy is reached at peak.

"Cost of energy per unit is 16 PKR, while cost of commercial unit is reached at 64 PKR."

(- Energy Crisis, 2022)

Moreover, excessive loadshedding is also an evidence of energy crisis.

"In 2022, rural areas had loadshedding of 16 to 18 hours, while in urban, 8 to 10 hours."

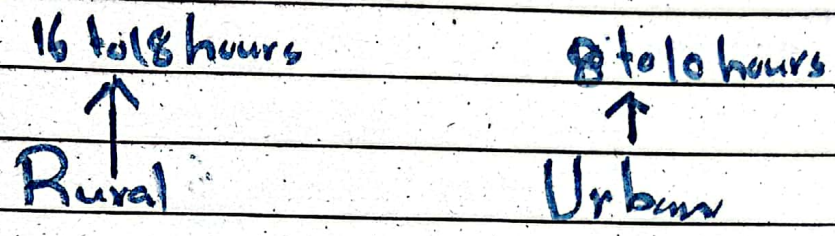
(- Energy Crisis, 2022)

Thus, Pakistan has been facing an issue of energy crisis.

### Cost of Energy

energy per unit	16 to 34 PKR
commercial unit	36 to 64 PKR

## Load shedding, 2022



### 3- Contemporary causes of energy crisis

Following are main causes:

- a) Import dependency of hydrocarbon  
 Import of hydrocarbon leads to energy crisis. In fact, Pakistan imports hydrocarbon for energy production.

### Fiscal Year, 2022

oil	6000 MW
gas	12000 MW
coal	5,800 MW

(Economic Survey, 2022)

Thus, import of hydrocarbon leads to energy crisis.

- b) Import dependency of LNG  
 Moreover import of

LNG also causes energy crisis.  
Dependency on import of energy  
causes energy crisis in  
Pakistan:

"In 2022, generation  
of energy was 65,800 MW  
and consumed 88,000 MW."  
(- Energy crisis, 2022)

Hence, dependency on LNG import  
increases that leads to  
energy crisis.

c)

Unexpected transmission loss  
Pakistan has a huge  
transmission loss. In fact, trans-  
mission system is rusted now.  
"Pakistan loses almost  
17% of energy  
in transmission."

(- Economy Survey, 2022)  
Therefore, a huge transmission  
loss results energy crisis.

d)

Usual energy theft.  
Energy theft is more  
common in Pakistan. In fact,

energy theft becomes a cause of energy crisis.

"Theft of energy as 'Kuchdi' system is prevailing in Sindh and Balochistan."

(- Energy Theft, 2018)

Therefore, energy theft results energy crisis.

e) Tamper meter reading  
 Tamper meter reading is also a major cause of energy crisis. Tampering meter reading is more common leads to energy crisis. According to economic survey, "almost 30% of energy crisis is due to tamper meter reading." Thus, tamper meter reading also leads to energy crisis.

4- Implications of energy crisis  
 Following are possible implications:

a) Capacity payment of loan

Capacity payment of loan increases due to energy crisis. Import based energy leads to debt.

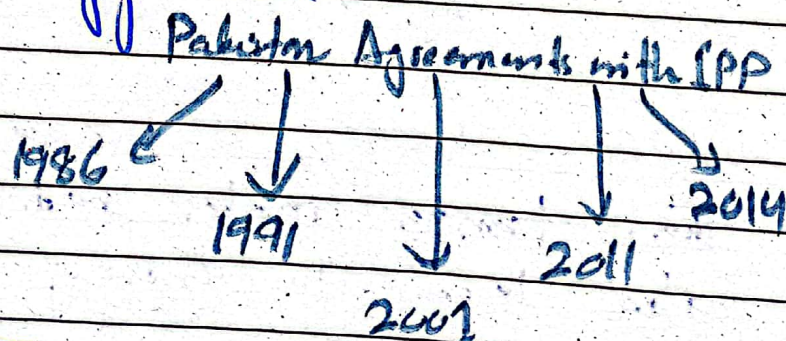
'In 2022, Pakistan had capacity payment of 2.3 billion PKR.'

(- Toqueul Husain, economic crisis, 2022)

Hence, capacity payment increased.

b) Expensive agreements

Moreover, energy crisis forces to do expensive agreements. Pakistan also did agreements with IPP to meet energy need.



Therefore, Pakistan compulsion for expensive agreements increased!

c) Increase loadshedding

Further, loadshedding is become a problem. Energy crisis led to excessive loadshedding.

"The year 2022 was recorded worst in loadshedding."

(A. Hameed, December 2022)

Therefore, loadshedding is also an outcome of energy crisis.

5- Recommended measures to address energy crisis

Following are recommendations:

a) Renegotiate Agreements with IPP

Pakistan needs to renegotiate agreements with IPP. Long period is passed in renegotiation of agreements.

"The agreements of 2000 were renegotiated in 2020, after a long period of 20 years."

(Energy generation, 2021)

Thus, Pakistan needs to

renegotiate agreements.

b)

Renewable sources of energy generation

Pakistan should attempt to generate energy from its local renewable sources.

Consequently, Pakistan's more than half of deficit will be covered.

"Almost 60% of deficit is due to import of energy."

(Economic Survey, 2018)

However, Pakistan can produce more than 60% of energy from its local resources by 2030. (Economic Survey, 2018)

Renewable Energy Sources:

Wind	3000 MW
Solar	900 MW
Hydal	< 10,000 MW

Therefore, Pakistan depends on



its local sources.

### c) Civil Nuclear Projects

Further, Pakistan can also meet its energy needs by civil nuclear projects. Pakistan will generate its own energy by 2030 from its own sources and dependency will be reduced.

"Pakistan dependency on energy generation will be reduced by 50% by end of 2030."

(- Economic Survey, 2022)

Therefore, Pakistan generates energy from civil projects.

### d) Improve transmission loss

Furthermore, government needs to replace old transmission system. Doing so energy loss will be reduced.

"Scheme to Modern transmission system is improved by 3% of energy."

(Pakistan Bureau of Statistics)

Therefore, shift new transmission system.

### e) Digital Meter Reading

Government needs to arrange new digital meter reading system. Resultantly, energy bills will be reduced by digital reading.

"Job government is set to regulate and privatize."

(Ishrat Hussain)

Hence, shift digital meter reading system.

### 6- Conclusion

"Pakistan is in energy crisis."

(The World Bank, 2023)

Energy crisis in Pakistan is prevailing. Several causes are behind it. Consequently, implication of energy crisis are bad. Hence, suggestive measures be adopted to meet energy crisis.