



NES-FES - Breakfast meeting on “Increase Energy Prices and its Impact on the Namibian Economy” – 16 July 2008

“Government Response to Increasing Energy Prices”.

Presenter: Mr. Kavepurua Kaveṭuna – Acting Deputy Director of Electricity Division – Mines and Energy.



Presentation Outlines

- Impact of Electricity Prices on Industry
- Impact of electricity prices on Consumer Price Index (CPI) and on households
- Summary of sequence of events in case of higher electricity prices in Namibia
- Increasing Energy (fuel) prices
- Government response to electricity tariff increases
- Government response to increasing Energy (fuel) prices



Impact of Electricity Prices on Industry

- In estimating the impact of increased electricity prices on various industry sectors, an analysis of the cost structure of the Namibian economy was done using a social accounting matrix provided by NEPRU.
- This allowed to single out industries with high electricity cost share in their total annual costs as illustrated in the following table.



Impact of Electricity Prices on Industry

INDUSTRY	EXPORT SHARE	ELECTRICITY COST SHARE
Crops	0%	0,4%
Animal products	22%	1,7%
Traditional Agriculture	0%	0,03
Fishing	3,9%	~0%
Mining	66%	1,3%
Meat Processing	9,7%	0,4%
Fish Processing	57%	0,2%
Beverages and Food	5,3%	0,5%
Light Manufacturing	3,3%	0,7%
Heavy manufacturing	11,6%	3,5%
Construction	1,9%	0,3%
Water Supply	0%	2,2%
Hotels & Restaurants	0%	2,1%
Government	0%	1%



Impact of Electricity Prices on Industry

- As from that table, the total electricity cost shares range between 0% and 3,5% with a sample average of approximately 1%.
- In industries facing zero or limited international competition, increased electricity prices will be passed on to customers.
- For manufacturing firms, which face international competition in both the domestic and export markets, the possibility of passing on increased electricity costs to sales prices is limited.
- The latter applies for fish processing industry which exports mainly to European markets; and beverage and food industry which is exposed to international competition from South African companies in the local Namibian market.



Impact of Electricity Prices on Industry

- Much of the initial effect of higher electricity tariffs might be lower profitability and less investment in capacity expansion.
- In some industries, such as mining and textiles, there might be an initial drop in profitability for the first year or two, but there might also be a recovery already in the second or third year.
- It is important to note, however, that increased electricity tariffs may not necessarily lead to a fall in production, but may simply lead to a lower growth rate.



Impact of electricity prices on Consumer Price Index (CPI) and on households

THE IMPACT ON CPI

- The impact of increased electricity prices on CPI can be separated into two effects, namely the direct and indirect effects.
- The direct effect is the weight of electricity in the consumer price index. Since the weighing of electricity in CPI is 1.8%, then the direct effect of 10% increase in electricity tariffs on CPI is 0.18%.
- The indirect effect is the price increase on other consumption goods as a result of companies passing increases in their electricity bills on to end customers.
- In general, the effect of electricity tariff increases on CPI ranges between 2 – 4% depending on the pass-through of cost increases to end-user prices.



Impact of electricity prices on Consumer Price Index (CPI) and on households

THE IMPACT ON HOUSEHOLDS

- Domestic consumption of electricity (especially for lighting, cooking and heating) strongly correlates with household income.
- Poorer households rely to a much lesser extent on electricity for household tasks.
- For cooking, for example, the source of energy for rural households is wood and charcoal; while poor urban households use paraffin and gas in addition to wood and charcoal.
- The share of electricity cost in household budget depends a lot on household income class.



Impact of electricity prices on Consumer Price Index (CPI) and on households

THE IMPACT ON HOUSEHOLDS

- In low-spending households, electricity makes up about 0.6% of total consumption expenditure. This low income group doesn't have many electric appliances and depend on wood as source of energy.
- The share of electricity in total consumption then increases with increase in total consumption (increase in income) for middle income households. This middle income group can afford buying many electric appliances.
- For households with highest total consumption (high income households), the share of the cost of electricity consumption is relatively lower.



Summary of sequence of events in case of higher electricity prices in Namibia

- Initially, energy intensive exports industries and import competing business reduce investments; and possibly production too.
- Households will cut down on no-electricity consumption to finance their electricity bills.
- This will lead to lower production and investment in sectors which produce for domestic market.
- Lower production and investments in the economy in general will lead to increased unemployment and a fall in prices on real estates.



Increasing Energy (fuel) prices

- The rapid increases in fuel prices reflect market forces in global supply and demand and perceptions of supply and demand.
- The oil market remains tight, evidenced by soaring prices, low surplus production capacity, and the concern that global supply growth may not keep pace with demand growth over short term.



Increasing Energy (fuel) prices

- World oil consumption is projected to rise by almost 1.2 million bbl/d during the second half of the year 2008, reflecting the impact of higher expected prices, lower economic growth, and growing pressure in some countries (such as India, Malaysia, Indonesia, and China) to ease price subsidies, which could dampen consumption growth.
- Rapidly increasing delivered fuel costs for power generation, particularly for coal & diesel, are pushing up electricity prices.



Government response to electricity tariff increases.

- GRN will consider implementing subsidies
- Pro-poor electricity tariff is under consideration
- Promotion of the use of renewable energy; GRN approved the Off-Grid Electrification Master Plan and issued a directive that hot water requirements of all government and state-owned institutions must be met with the use of Solar Water Heaters.
- Increase of access to renewable energy technologies through the Solar Revolving Fund. Public awareness campaigns and promotion of efficient use of energy.



Government response to electricity tariff increases.

- GRN supports construction of interconnection transmission lines to diversify the sources and routes of electricity imports. This will allow the national power utility NamPower to import electricity from cheaper renewable sources such as hydro power in our northern neighbouring countries, instead of importing from only South Africa whose main sources of electricity is expensive fossil fuels, mainly coal.
- Demand Site Management Alternatives. Distribution of Compact Fluorescent Lights (CFLs); extension of ripple control of electric geysers by REDs, municipalities and local authorities.



Government response to increasing Energy (fuel) prices

- The government took note with grave concern that by not bringing the cost of fuel in this country under control we risk a knock on effect with energy costs to industry and food manufactures who use energy in high volumes.
- The rising fuel cost worldwide has spiraled out of control and it is increasing inflation to the detriment of us all, especially non-petroleum producing companies.



Government response to increasing Energy (fuel) prices

Government measures:

- The key focus of the government of Namibia, particularly MME, has been to ensure that Namibia's energy infrastructure is sufficient to support economic growth.
- The Government through its rigorous policy approach focuses first on the need to ensure that there is security of supply, which can be provided through policy certainty and the roll-out of additional energy infrastructure. This not only includes electricity generation and distribution but also areas in liquid fuels such as the provision of port infrastructure, refinery, storage and distribution capacity.



Government response to increasing Energy (fuel) prices

Government measures:

- In addition, the Government is also exploring ways to better cushion the country against supply insecurities as well as exploring the possibility of developing a sustainable Biofuels industry to lessen dependence on the importation of liquid fuels. The strategy takes into account the potentially negative impact that Biofuels could have on food production.
- It has also become clearer that alternative energy sources need to be developed. While key to this will be the roll-out of nuclear energy and the development of a local nuclear industry as an affordable and environmentally sound alternative, the Government is encouraging the development of other alternative and renewable sources, such as bio-fuels and nuclear energy.



Government response to increasing Energy (fuel) prices

- Whilst looking for longer term solutions to Namibia's energy needs, it is necessary to find ways of reducing our current levels of energy demand without adversely affecting our economy.
- As part of a broader strategy to deal with the issue of energy supply the Government promotes the efficient use of energy. Energy efficiency does not only mean efficiency in the final consumption of energy, but efficiency in its production and transportation as well.
- A Programme to implement energy security is therefore a vital component of the government's Programme of Action.



Government response to increasing Energy (fuel) prices

- Taking cognizance that the economy can only take on a certain limit for fuel increases, before the equilibrium of the economy is disturbed, government has heavily subsidized the transportation of fuel prices to the far remote areas as well as subsidizing pump prices by enforcing reduced margin of increases across the board during the three quarters (Q3 of 2007 and Q1 & Q2 of 2008).



I Thank You!