Current financial markets and impact on financing of energy infrastructure globally

Building of energy infrastructure includes investments in ports, railways, coalmines, oil and gas fields and pipelines, power generation, transmission, distribution, and equipment for the power sector. Energy sector investments are also required for affecting alternative energy choices. Financing of energy infrastructure globally needs special attention because of two recent developments: the extraordinary volatility of crude oil prices, and the global meltdown in financial markets and institutions that have made funds for investment (equity or debt) and for short – term purpose, difficult and expensive. The recent rise in crude oil prices to $140 in less than a few months, and its collapse within a few months to $35 was accompanied by an almost concurrent rise in the prices of gas and coal. While gas prices have fallen with the prices of crude oil, coal has not fallen to the same extent.

The rise in prices resulted in a lot of activity in exploiting hitherto expensive energy sources. For example, tar sands in Alberta in Canada had become viable when crude oil prices were at $100. Many other oil fields that would produce expensive oil became viable and so did many gas fields. Many transnational pipeline projects also became viable and so did the possibilities of using LNG (liquefied natural gas), and demand for shipping capacity to transport it. Many of these new projects were suspended when crude oil prices collapsed. Drilling rigs, shipping capacity for oil and gas, have become much more easily available. Many renewable energy forms especially, wind, solar, and geothermal that witnessed investment interest have seen a setback. Attention to nuclear generation increased as nations decided to reduce their vulnerability to price – volatile imported have coal as fuel for electricity generations, the need for more options brought about fundamental changes in foreign policy as India looked to assure uranium supplies to increase its nuclear power generation in the long term.

India also faces the volatility of the foreign exchange value of the rupee caused by sharp falls in foreign investment into India, migration of foreign bank funds to bolster liquidity at their head offices, and rising deficits in the balance of payments as overseas demand fell.

Financing of energy infrastructure in thus affected by crude oil prices. Sudden price falls take the minds of consumers and governments away from finding alternatives to limited supply sources and to alternative energy. This restricts finance since the viability of such projects might seem weak. In addition, risk aversion in the time of global recession makes it difficult to raise fresh equity or long – and short – terms debt. If new energy projects had not raised their funds or achieved financial closure when crude prices were high, it is difficult for them today achieve financial closure when crude prices are falling.

In the last one year, the global meltdown of banks and financial institutions has made equity funds is almost impossible. The sources of finance are domestic equity, domestic debt, insurance and pension funds, external commercial borrowings as debt and as optional convertible bonds, external commercial borrowings, and foreign equity funding from private sources, governments and from multilateral institutions. In recent months all these sources have become much more difficult to access. Liquidity is tight globally, and investors are reluctant to invest in other countries (even in their won countries) and borrowing is scarce as also more expensive. In countries like India, there is the additional problem caused by the declining foreign exchange value of the Rupee. This, within one year, reached a high of Rs. 40 to the dollar and a low of Rs. 50, hovering now at about Rs. 48. India is not the only country so affected. The decline of the rupee and many other currencies of developing economies makes borrowings expensive both in interest payments when converted to domestic currencies for accounting purposes, and when the loans are marked to market in the balance sheets as required by accounting

standards. This can also downgrade their credit rating, making it even more difficult to raise funds overseas.

Financing infrastructure for power projects requires many enabling conditions such as rising demand, lack of domestic fuel alternatives, payment security, remunerative prices, fuel availability, and transportation / transmission capacity. Clearly, any energy infrastructure projects that are taken up must be consistent with the economy's energy security and sustainable development objectives. For example, India is rich only in high ash coal and must depend on it for its soaring electricity needs till nuclear energy generation rises to more reasonable levels (20% or more of its needs), which is expected to be in the next 20 years. While India can expect rising quantities of domestic gas in the years to come, higher relative prices than coal and private sector control that maximizes profits will limit its use. However, electricity demand is rising there are sever shortages, trades possible. Open access, and captive and merchant generation, will optimize availability. Payment security by buyers is more certain because central and state governments have ensured mechanisms for the purpose. All these developments enhance the financial viability of energy projects.

India and other economies wanting such investment, according to a document of the APEC (Asia – Pacific Economic Cooperation), 'should establish stable, transparent, independently administered, predictable and non – discriminatory legal, fiscal, regulatory, and trade regimes that support the enforceability of project contracts and consider the interests of all participants, including for projects of a cross – border nature'. A decade after the exit of Enron from India under inauspicious circumstances there are better drafted contracts, fiscal measures are in place to reduce tax incidence and offer incentives for capacity additions, the electricity regulatory regime with over 10 years of experience is much better developed despite some shortcomings, and trading has greatly expanded, though not to its potential.

However; fuel availability from domestic sources is not ensured in India because of nationalized coalmines, skewed government policies not encouraging use of gas for power generation, and a misguided attempt to relate gas prices to international prices than to adequate returns and user affordability. However, the ability of consumers to pay the cost of energy is low in India and in many other developing countries because of the poverty of many and populist policies to benefit powerful vested voting groups. India, like others, has a complex system of subsidies and cross – subsidies as well as considerable theft of electricity. Despite this, an almost parallel market of viable customers has come about and payment security to investors especially in electricity is not as much of an issue today. The mega and ultra mega power projects also have built in safeguards to ensure payments. Other countries in similar situations may learn from this experience.

Notably, infrastructure projects are notorious for misuse of funds and padding of costs. Good governance and transparency in operating enterprises are essential if such projects are to raise funds and at reasonable costs. This is particularly important when tariffs are regulated. India has still to make progress in good corporate governance though there are some companies that are exemplary. Good governance also ensures that all risks are evaluated and monitored. Similarly, participation of overseas multilateral and international financial institutions, and private overseas investors, in energy infrastructure projects, gives credibility to projects. Currently, funds from them have become source. India, in addition, has many government – owned or controlled financing institutions that fund infrastructure – IDFC, PFC, IDBI, India Infrastructure Finance Company Ltd, and other banks and financial institutions. They have been encouraged by government, which in some cases has added to their capital to finance infrastructure and energy projects.

India has vast funds locked up in provident and pension funds, and in life insurance. The first two are not permitted to invest in energy projects. Insurance has low caps on how much can be invested. Clearly, in this time of financial shortage, the government must relax such restrictions. Investment in energy utilities gives guaranteed and good returns when they start production, and in developed countries is the natural outlet for investment of such funds.

It is important in a time of economic and oil prices downturn that we prepare for future prosperity. Oil is a non – renewable resource and prices will resume tier rise. It is imperative hat government act to ensure that investment continues in developing alternative to oil and gas. As in the revival package for the USA a President Obama, our economic revival packages must provide funds for this purpose.

Infrastructure projects require considerable funding; returns and slower because of long gestation of projects. Further, limitations of fuel availability, lower than cost sales to select customer groups and rising costs, affect project availability of financing and raises its cost. However, well – designed projects by promoters with good track records have less difficulty in achieving financial closure.

The project developer must implement speedily so that the project begins to ear its way even before the expected dates. Government processes must not delay project execution; for example, on land acquisition, clearances when environment and forestlands and affected, inadequate planning of compensation to those who need relief and rehabilitation, and so on. These issues can delay project execution, thus raising costs. A project developer, who has planned for this and knows how to proceed without delays, will have little difficulty in raising the finances.

What this means in India (and other countries) is that a big project developer with track record may make progress. The smaller projects will come across many hurdles in raising finance. Government restrictions on investors like provident funds might ease their situation.

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