IT: Building Bridge between Bangladeshis at Home and Abroad

by Mridul Chowdhury

IN the IT sector of Bangladesh, there is an air of silent optimism that is impatiently waiting to burst out in the form of a revolution. Most informed citizens, whether related to IT or not, feel that a positive change is imminent. Thousands of students and unemployed youth rushing to computer training centers, tens of meetings and seminars being held to discuss prospects of computerization and software export, scores of private companies getting involved in computer-related businesses, and the government taking laudable steps to nurture the IT-industry — are all indications that the nation, that had almost forgotten to dream, has found a reason to hope.

Unfortunately, a large section of the Bangladeshis living abroad are unable to share the euphoria. Although most IT-related expatriate Bangladeshi professionals keep themselves informed through Internet News about the major turn of events in Bangladesh such as the withdrawal of taxes on computers, they are not getting a clear picture of the overall scenario of the software industry in Bangladesh. They are not fully aware of the level of skill of programmers, the experience of software companies, the efforts of academicians to improve skill, the government decisions in process of implementation, the progress towards faster telecommunication etc. As a result, they are hardly equipped to envision where the industry will stand in the next year or two, what kind of opportunities will open up, or what problems will remain to be overcome.

Similarly, many resident Bangladeshis interested in IT-related businesses or studies often find themselves pondering over what language or operating system they should develop their expertise in to be able to meet the demands of the ever-changing global IT market. Bangladeshi professionals working abroad are in a unique position to keep themselves at par with latest technological developments and inform their fellow countrymen back home about the scope and nature of the demand. However, this is only one of the many ways that information from expatriate Bangladeshis can prove to be extremely valuable.

Taking a peek across the border, we will see how big a role the non-resident Indians (or the NRIs, as they term themselves) have played in the development of the Indian software industry. In fact, it was these NRIs who initially managed to attract businesses related to Data Entry and Software and made internationally known Indians' ability to do quality work efficiently and inexpensively. The Indian Government was quick to realize the potential and formulated the Indian Software Policy in 1986 to provide active support to the new-born industry. By 1988, India was exporting software but a major part of these were being created by Indians working abroad. Some of these NRIs came back and set up Software Export Houses in India. Many of the others who stayed abroad maintained close liaison with local companies.

The educational and training institutions efficiently fuelled the revolution with the most important element — IT-skilled manpower. The revolution initiated by the NRIs became one of the most phenomenal success stories in the world with the Indian software industry growing at more than 52 per cent for the last seven years.

In Bangladesh, although there are still major problems to be overcome, it is quite apparent that the IT-revolution has begun. But the non-resident Bangladeshis (or the NRBs, as the JRC report terms them) have still no noteworthy part to play in it. **Due to lack of effective communication between the resident and the expatriate Bangladeshis, scope of mutual benefits through exchange of opinions and information still remain unexplored.** Many NRBs remain skeptical about coming back or investing. The absence of a strong network among the Bangladeshis across the world have probably hurt all of us concerned more than we know.

With this vision in mind, a group of young IT-related students, professionals and reporters in the US and in Bangladesh are in the process of bringing out a half-yearly magazine on the potential of the IT-industry in Bangladesh. It will be circulated both in Bangladesh and in the US. The first issue is targeted to come out in January 1999. The aim will be to create a common ground for sharing of constructive ideas, reality of today and vision for the future.

The magazine might be divided into three main sections, which may deal with: 1) creating (i) a database of software companies situated in Bangladesh and (ii) a database of companies abroad, specially in the US, where Bangladeshis hold executive positions; 2) giving an overall scenario of the software industry in Bangladesh with respect to business opportunities; 3) exchange of opinions and analysis of the international market.

The first section will contain information provided by representatives of the relevant companies about their level of skill and experience to help establish overseas business links. The second section will include investigative reports and personal interviews about different sectors related to the industry such as human resource development, telecommunication status, government policies etc. The third section will deal with analysis of the trends of the international IT-market and a vision for Bangladesh's place in that.

Two separate editorial teams — one in Bangladesh, the other in the US — will work on making this magazine a reality. The team in the US has not been formally formed yet. The team in Bangladesh includes some eminent computer specialists.

The writer, a 3rd year student at the University of Texas at Austin, will be one of those working from the US to collect articles and interviews.

Windfarmers Bring Power to People

A computer-controlled windfarm has come on stream in China. Its output is dwarfed by the vastness of the country's demand for electricity, reports *Gemini News Service*, but its supporters believe it is setting an important trend, ***Fons Tuinstra*** writes from Beijing

CHINA'S latest windfarm is being run partly from Holland.

Computer systems and modern communication techniques in each of the 40 wind generators make it possible for Dutch technicians to adjust their operation from a base thousands of miles away.

There are only six people on the site on Nan'ao island, near the southern port city of Shantou: three operators and three for security.

"The operators have very little to do and don't need any specific knowledge," says engineer Cai Tao, who runs the park on behalf of the $30 million joint venture, which began producing power in July. "They have only middle-school education and some additional training so that they can understand some English words used in the software."

Compared with the enormous demand for power in China, Nan'ao is a small-scale project. But it represents a potentially important breakthrough in China's energy policy.

Most of the country's windparks are backed by hefty governmental support: Nan'ao is the first commercial venture.

"We are the first to set up a commercial park with a foreign partner without financial support from the Chinese or foreign governments," says X S Guang, who works for the Shantou Electricity Board, a partner in the venture.

The Shantou Dan Nan Wind Power Company is also the first in which a foreign partner holds a majority (55 per cent) of the shares.

Until recently, China was unwilling to give foreign investors a say in industries considered strategic. But policies are changing as China prepares to join the World Trade Organisation.

The desire for more foreign capital and for environmentally-sound technology is also helping to open doors that were previously kept firmly shut.

The foreign partner, Nuon, is also unusual. It is a regional electricity company which operates in the Dutch city of Arnhem.

Executive director Leo Blomen says that the liberalisation of markets in Europe has forced such companies to rethink their operations and to compete on a global market.

"We are a project developer," he says. Nuon will run the windfarm for 22 years, after which it will be transferred to the Chinese partner.

Dan Kofoed Hansen of Negmicon, the Danish manufacturer of the windmills, each of which generates 24 mw, is also happy.

"Other windparks only run thanks to soft loans from different governments. Here we can prove that producing wind energy is possible without governmental funding," he says.

Guang is happy, too. He points proudly to the rows of streamlined wind-powered generators and says, "Remember this windfarm when you switch on a light in Hong Kong. That light will burn, thanks to the windmills here at Nan'ao."

He says that the central government is giving every encouragement for wind energy experiments, partly because about 80 per cent of electricity production is currently generated by coal, a major contributor to two of China's most serious environmental and health problems — acid rain and lung diseases.

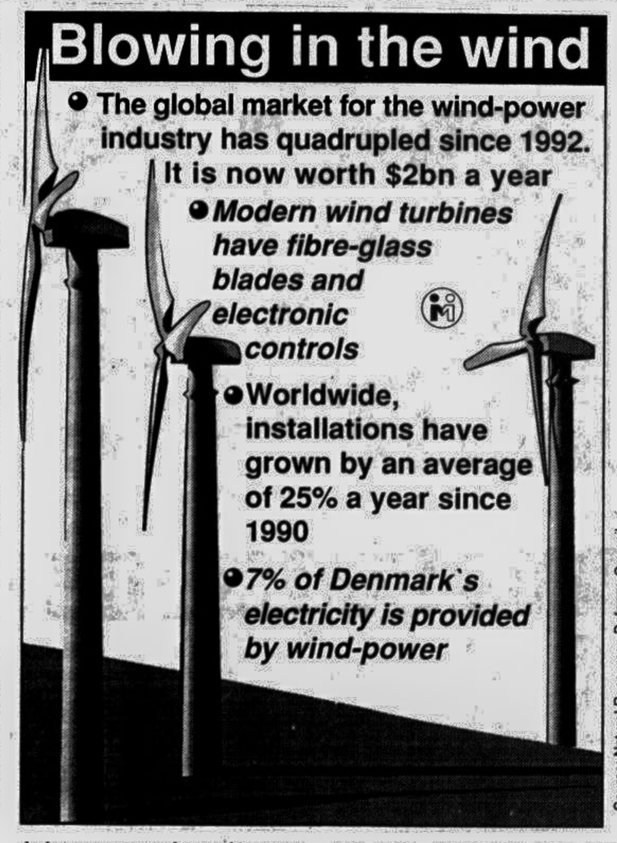
China is looking for alternatives, but both their nuclear power stations and the huge proposed Three Gorges Dam raise other environmental concerns. If wind energy proved that it could pay its way, it would offer an alternative with few side-effects.

Shantou Electricity Board is paying 50 per cent more for Nan'ao electricity than for electricity from other sources, but Nuon spokesperson Fransce Verdeuzeldonk points out that electricity prices in China do not reflect many of the environmental costs of production, many of which stem from the use of outdated power stations. If those costs were included, says Verdeuzeldonk, wind energy would be cheaper.

In any case, the spokesperson added, windpower was rapidly becoming more competitive: "Wind energy is sometimes more expensive, but that will change very soon."

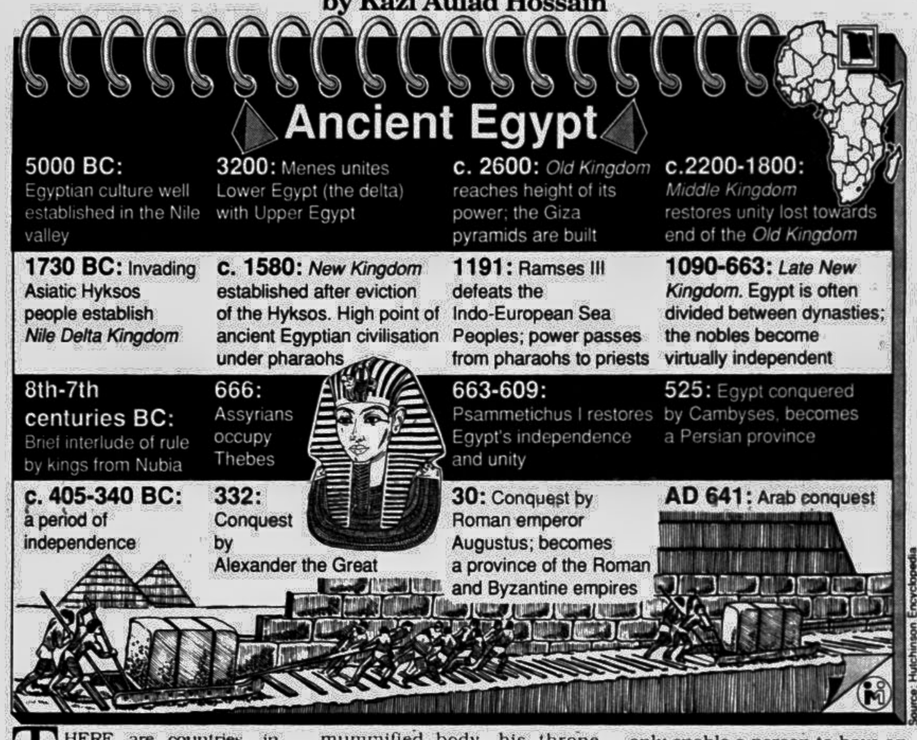
Leo Blomen says experience is also bringing down costs. "From our experience, I know each new park will be 15 per cent cheaper, because every time you learn from the mistakes you make the time before."

The writer is a Dutch journalist living and working in Shanghai.



World's Finest Living Museum

by Kazi Aulad Hossain



THERE are countries in this world including Britain where one can find numerous shops of antiques visited by curious purchasers. What is the underlying idea behind such sale and purchase of antiques or rare articles? The idea is people are by nature eager to have a glimpse of the dead past and they find pleasure in doing so. Similarly, at the national level, a country feels very happy if she has in her possession antiques or relics that existed, says, even 100 years ago for they enable people to have a journey into the past. But, think for a moment that if a country unlike most other countries has the unique honour and privilege to have in her possession relics or antiques dating back to 5,000 years, she must obviously feel elated and her exultation certainly would know no bounds. And that country is wonderous Egypt, the land of Nile and Aswan Dam, the land of great Pyramids, and the land which is regarded as the very cradle of civilisation.

In Egypt one may soak in sun, sea, sand and 5000 years of its glorious history while wandering through this wonder land. And while wandering one may, however, have a feeling that he is being watched, watched not by spies or thieves, but by the very dead themselves. The dead who left this mundane world many centuries ago look on helplessly.

Now, an attempt may be made to discover the wonders of Egypt. But before doing so it is adviseable that one should visit the famous Egyptian Museum for a crash course on "Egyptology". The visitor will be simply bewildered to see its wonderful exhibits. Among its 100,000 artifacts the most spectacular series of exhibits are those related to King Tutankhamen's funerary items. And they include king's mummified body, his throne and model boats, his ornaments and a solid gold bed! It may be mentioned here that most of the items are made from gold and encrusted with precious stones giving the visitor a clear idea of colossal amount of wealth the Pharaohs had in their possession. There is a Royal Mummy Room in this Museum which houses eleven of the finest mummified bodies of the kings and queens.

Of the wonders of Egypt, the first and foremost name which obviously comes to our mind immediately is the name of the great Pyramids which are truly one of the Seven Wonders of the world. Since it is not possible to throw light on various aspects of all the great pyramids of Egypt, I would like to refer here only three of them. They are; pyramids of Cheops, Chephren and Mycerinus. These three great pyramids, it may be stated here, are the mortuaries of three generations of rulers and they add an inspiring element to the horizon. Of these three pyramids or mausoleums, it may specially be mentioned here, the 146 metre high pyramid of Cheops was built in 2600 BC using approximately two and a half million limestone blocks, weighing a total of six million tonnes. The present day engineers and architects find themselves completely bewildered while seeing the ingenuity of construction techniques of these great pyramids built over the graves of Egypt's ancient kings.

The metropolitan city of Cairo has many places of interest which one should invariably visit. In this city there is a 185-metre high Cairo Tower, and if any one wants to get a bird's eye view of the city then it is better (before touring the city) to take the elevator to the top of this Tower for this purpose. The Tower will not only enable a person to have an idea of Cairo's multi-cultural character, it will also enable him to get a spectacular view of the whole city and the great pyramids from up here. For a novel experience the Tower gives him an opportunity to get a view of the sun setting behind the lofty exquisite pyramids.

While visiting the city of Cairo one must not miss its sprawling suburb of Heliopolis well-known for its tree-lined avenues, swank apartment complexes and mansions with grand Moorish (Arab Jewish) facades.

They say Egypt is the gift of the Nile. But I would like to add that the Nile is the gift of Allah bestowed on Egypt for its power, progress and prosperity. The river which is Egypt's life-blood irrigates and invigorates everything it passes through. One may find on the Nile the most impressive and historically significant town of Luxor built on a 4000 years old site of the bustling city of Thebes. The town (Luxor) is also close to the Valley of Kings — the largest Pharaonic burial ground in all of Egypt. Egypt boasts of one of the two longest dams (2441-metre) in the world, the Aswan Dam. Though a bigger cousin has superseded it, it still is aweinspiring in all its majesty.

So, the great Pyramids, and the enigmatic Sphinx, king Tutan Khamen's funerary items including a bed of solid gold, the gently flowing Nile and the famous town of Luxor on it, the Valley of Kings (the largest Phranaic burial ground), the awe-inspering world famous Aswan Dam, Cairo's 185 metre high Tower and its exquisite suburb of Heliopolis, and last but not the least, the world renowned Al-Azhar University — all together make Egypt itself the world's finest living museum.

Marketers Vie for the Big Rural Pie

by Durga Ray

Although much of rural India still comprises petty farmers, even a small fraction of the 700 million living in rural areas translates into a huge market.

GUESS who is one of the most sought after customers in the great Indian bazaar, the one whom several home-grown companies as well as multinationals are targetting? None other than the rural Indian symbolised in the rustic villager largely staying under tiled or thatched roofs and mud huts in the vast Indian countryside.

The rural market has as large a share as 70 per cent of the country's annual private consumption expenditure of Rs. 25,000 billion ($57 billion) and it has been growing at a much faster rate than the urban one, market sources say.

Although much of rural India still comprises petty farmers, even a small fraction of the 700 million living in rural areas translates into a huge market.

Several companies, from one which has been here for half a century, to the relatively younger ones, are talking of generating 50 per cent of their sales in India from the rural market.

The biggest example in the first category is the Hindustan Lever Limited (HLL), the consumer products major which is one of the oldest and largest multinational companies (MNCs) in India. About 50 per cent of HLL's sales volumes in the category of soaps and detergents come from rural areas and close to 25 per cent in the personal products' category.

"India's rural market is very amorphous. It is difficult to arrive at a firm figure (of its size and break-up)," HLL's General Manager (Sales) V.S. Sitaram told IANS. "A rough indication is that in a category like soaps and detergents, rural accounts for about half the total market of 30 lakh tonnes."

"In personal products, like hair care, skin care and dental care, rural regions account for about 25 per cent of the Rs. 540 billion ($12.8 billion) market," he added.

Even foreign companies are zooming in on this target. Defal India Private Limited, a French MNC dealing in cooking appliances which came to India just two years ago, is looking towards the rural market for future growth. Like in urban areas, the marketing here can be either direct or indirect.

Says Saurabh Adhikari, Managing Director, Defal India: "Direct marketing would involve actually going down dusty roads and giving demonstrations. The indirect way is to make sure you are visible in smaller towns or semi-rural areas where the rural wholesalers comes to buy products."

Adhikari points out that channels for distribution of durables have never existed. "They have to be created and that takes time. We recognise the potential of rural markets."

"Future growth lies in rural India. We have to look at the rural market for expansion." "Our target is to generate 50 per cent of our sales from this segment," Rajeev Karwal, Vice-President, marketing, LG Electronics, the South Korean white goods giant, was quoted as saying in The Times of India.

"The growth of the rural markets has been explosive," Rajeev Shrivastava, Vice President, marketing, DCW Home Products, which sells packaged wheat flour and salt, said.

It's no wonder then that according to the National Council for Applied Economic Research's *'Very Rich Whitebook: A Study of Super-affluent Indian Consumers'*, 15 per cent of the mega rich in the country are in rural India.

And they don't just buy land or gold; they are buying consumer durables, the NCAER report said, because the rural customer is no longer the subsistence farmer he once was.

"There are areas in the cities with the aspirations, lifestyle and income levels equivalent to the rural areas. We have moved away from the geographical definition of rural," Nabankur Gupta, Director (sales and marketing) at Videocon which manufactures white goods was quoted as saying by the paper.

Advertising and marketing strategies are being evolved for targetting the rural customer as rising agricultural incomes and increased exposure to goods and services have led to a proportionate increase in demand for consumer durables as well as what in trade parlance are known as fast-moving consumer goods (FMCGs).

Television sets and washing machines have become very much a part of the lifestyle of the rural rich but the ordinary villager still needs to be targetted with smaller or cheaper versions of urban products designed to suit his needs.

To ensure that the village buyer can afford their products, HLL brought out low-priced, small packs of their premium brands of tea, detergent and shampoo. Also, low-priced detergents and tea were designed specifically for the rural customer.

HLL had been tracking consumer behaviour and purchase patterns in rural areas for close to 50 years now. "The findings broadly show that in rural India, price and functionality of products determine choice. Rural India is willing to accept any product category as long as manufacturers meet these two parameters," Sitaram said.

Ruling out that rural marketing was more of an event activity than a consistent brand-building exercise, Sitaram said it was "equally an exercise in building brands, as it is in urban areas. Fairs and festivals are only tools to build brands because they offer the most appropriate media in rural areas."

Companies have to use unconventional media like paintings, video vans and demonstrations at fairs and festivals to spread their message in rural areas as television covers only 35 per cent of the total rural Indian population of 700 million. "That reach is minuscule considering that India has about 600,000 villages," said Sitaram.

However, advertising in popular programmes on television gets the brand noticed, says Adhikari. "Next time a villager goes to the town for his purchases he asks for the product by name or sometimes wholesalers recommend a product," he told IANS. Although by the end of this century, HLL hopes to have dedicated rural stockiest, at present, goods are distributed in rural areas through stockists in small towns.

— *IANS*

Polluting the Environment on a Galactic Scale

Radhakrishna Rao writes from Bangalore

Having polluted and destroyed much of the earth's environment, mankind now runs the risk of doing the same thing in space. Already the final frontier is rapidly becoming littered with garbage and overcrowded with satellites — with unknown consequences for the planet.

FROM somewhere in the vastness of the universe, a tiny speck of paint travelling at ten kilometres per second came into contact with the American space shuttle, piercing its windscreen. It must have been a frightening moment for the crew, and it highlighted the risks of a growing tide of cosmic pollution.

The North American Air Defence Command estimates that there are now thousands of objects to various sizes in orbit, ranging from parts of broken satellites and discarded bits of launch vehicles to nuts, bolts, and other rubbish.

The problem is not a new one. A decade ago, a National Aeronautics and Space Administration team discovered a cloud of debris 400 miles above the Earth — millions of sodium and potassium droplets that had apparently leaked from a reactor in a Soviet satellite. But as human activity in space gathers momentum with each new discovery and technological advance, the phenomenon of galactic pollution is increasing.

The total weight of this celestial garbage has been estimated to exceed six tonnes and researchers fear that such orbiting junk could destroy multi-billion dollar satellite launches and other space probes. Accidents have already happened. In July 1996, for example, a French defence satellite was hit by a fragment of an Ariane launch vehicle from the European Space Agency.

But the pollution of space has implications for the earthly environment, too. The Russian Proton rocket is believed to have created a significant problem by dropping its first and second stages, along with the remains of their toxic propellants, on isolated areas of Kazakhstan. In the United Sates, meanwhile, environmentalists have been protesting against the pollution caused by the regular launch of the space shuttle.

Recent concern about the depletion of the ozone layer has stimulated renewed interest in the role played by exhaust fumes from launch vehicles. Free chlorine atoms released when hydrogen chloride from the exhaust reacts with naturally occurring hydroxyl radicals constitute the main danger to the ozone layer from rocket launches.

The National Academy of Sciences in the United Sates has called for more launch vehicles to be based on 100 per cent liquid fuel, because atmospheric pollution by chemicals released by solid propellant is likely to become an increasingly serious issue.

Researchers are busy devising strategies to minimize space pollution and reduce the potential danger posed by debris future missions. Computer modelling to assess robiting debris and predict its effect on space activities is being developed by several space organizations round the world.

But debris is not the only environmental problem along the final frontier. Congestion caused by communications spacecraft is increasing rapidly, particularly in the geostationary orbit — about 36,000 miles above the equator — where a satellite appears stationary in relation to the earth. With the number of communications spacecraft growing by 10 per cent annually, this threat can only increase.

The eminent science fiction writer, Arthur C Clarke, predicted this and warned of the dangers of overcrowding in space. As we take the benefits of using space for granted in our daily lives, we also need his vision if we are avoid doing the sort of damage in this new environment that we have wrought in our more familiar one on earth.

— *WWF Features*

The writer is a freelance journalist based in Bangalore.