

The key problem is yet to be tackled in the Indian economy

by Ramtanu Maitra and Susan Maitra from New Delhi

Since April 1985, the Rajiv Gandhi administration has introduced a plethora of measures with the goal of streamlining the slow-growing Indian economy and giving it an impetus for faster growth. Commonly referred to as the “new economic policy,” this package has been the focus of great excitement both here and abroad.

Inside India, a coalition of Neanderthal businessmen and socialist ideologues erupted to protest the government’s “capitalist turn.” On Wall Street, an equally myopic group celebrated Rajiv Gandhi’s alleged conversion to “free market” magic. Both miss the point.

The policy package has two principal aims: to loosen the tight regulatory grip that has strangled industry, on the one hand, and on the other, to streamline the fiscal-budgetary process to enhance revenue collection and stabilize the business climate. Liberalization of import licensing was just one of the more controversial features of the package.

These measures were long overdue. But from the standpoint of the prerequisites actually needed to move the Indian economy, it is like the elephant producing a mouse. The urgent problems which have put a brake on the growth of the physical economy over the last two decades, and formed the basis for ethnic and religious clashes now threatening to tear the nation apart, have so far remained untouched.

Besides infrastructure, which is in impossibly short supply, and modernization in certain basic industries such as steel, machine-tools, and basic engineering, the central problem in the Indian economy is *productivity*, in particular *agricultural productivity*. What is required is a focused, priority program to generate surpluses in agriculture to vastly increase investment resources for industry and bring forth the agro-industries that will provide the transition for the workforce from agriculture to industry.

Political obstacles

The problem is only of *political* economy, in the sense that Friedrich List and Henry Carey stressed by that, the development and mobilization of the productive powers of a nation. In the 1984 December elections, less than two months after Prime Minister Indira Gandhi was brutally murdered, the present administration won a massive majority. Rajiv Gandhi campaigned on a commitment to take India into the 21st century, and he bid the population join him in the enter-

prise. They did so, overwhelmingly.

But nearly two years later, the vision of India of the 21st century remains hazy. As the Indian population awaits a briefing on the order of battle, a question is taking shape in their midst: Is it politics-as-usual again, after all?

Only the most cynical doubt the Rajiv Gandhi administration’s intentions. At issue is whether he and his associates possess the combination of wisdom and courage to take political control of economic policymaking, and take the kind of action necessary to make good on the promises.

The five-year plans exemplify the problem—instead of being a powerful lever for transformation of the economy, the plan has become a bureaucratic mechanism for placating all constituencies, for creating the aura of “a socialistic pattern of society.” While the Gandhi administration might deservedly expect kudos for implementing the plan efficiently and in full, it will be a Pyrrhic victory. While critical infrastructural sectors, a prerequisite to productive investment, gasp for breath, ineffective “anti-poverty” cash distribution multiplies. The anti-poverty funds are controlled by the same political powerbrokers who systematically sabotage public-sector projects in their states by using them as “employment factories” for political patronage. The present administration no less than others has found itself dependent on these politicians to stay in power. Only a campaign for national development can break the stalemate, creating at one and the same time a new mass constituency for progress and a political apparatus across the country capable of translating the Gandhi government’s intentions into reality.

It is characteristic of large, slow-moving creatures that it is only with great difficulty that they can be induced to either slow down or speed up in the short term. Thus one would not expect to see much impact one way or the other—either of the policy measures or sins of omission on this account—in a review of the economy’s 1985-86 fiscal year performance.

The economy appeared stable. The rate of inflation in the wholesale price index showed a 3.7% rise over the year, down considerably from the 7.6% jump it registered in the previous year. Industrial output grew by 6.1%, and foodgrain production was 148.5 million tons—an increase of 2.3 million tons over the 1984-85 harvest, but about 11.5 million tons below target, due to a continuing erratic monsoon pattern. Meanwhile, the country’s buffer stock of foodgrains

has grown to 29 million tons. The government's effort to manage the buffer stock with exports met with some success: \$250 million worth of foodgrains were exported during the year—an increase of \$87 million over 1984-85.

The core sectors of industry also registered moderate growth rates. Capacity utilization in the public-sector steel plants rose from 73%-79% in 1985-86, and the Steel Authority of India, Ltd. (SAIL), which manages the plants, showed a profit of \$600 million for the year. SAIL has entered into a collaboration agreement with NKK of Japan for upgrading and modernization of technology at its three main plants—the Rourkela plant, the Durgapur complex, and the Indian Iron and Steel Co. at Burnpur. Saleable steel production rose by 11.1% during the year and cement production, now over 32 million tons, showed a rise of 8.4%.

Coal, a key ingredient for the power and railroad sectors, registered an annual output of 160 million tons. In order to meet the Seventh Plan target of 226 million tons by 1989-90, several measures have been mandated: improvement of infrastructural facilities, opening of new mines, improvement of labor and machinery productivity, expediting of land acquisition for coal mining, and controlling worker absenteeism.

Petroleum, used chiefly in the transportation sector and fertilizer industry, went through a price hike to reduce consumption and furnish a margin of funds to the treasury. The oil consumption growth rate did moderate by 0.9% against the previous year's growth rate. Electricity generation rose by 8.6% overall; hydroelectric generation, one-third of the total, dropped by 5.3%. Thermal power plant output, helped by new installations of more than 2,000 megawatts, increased by 15.8%.

The foreign trade figures, however, were disappointing. The current account deficit based on trade imbalances rose to about \$6.9 billion—an increase of about \$2.6 billion. What caused the deficit is not only the rise of imports—which jumped by \$1.6 billion—but also a drop in overall exports. A key factor was the reduction in crude-oil exports, which had ballooned while India's refining capacity was being expanded to artificially boost the export profile. Generally, however, volume exports of the traditional commodities—sugar, tea, tobacco, spices, raw cotton, cotton yarn, silk fabrics, jute products, etc.—stagnated at the same time that terms of trade declined.

On the other hand, with the significant drop in spot-market oil prices and concerted import substitution plans for several large bulk imports such as sugar and edible oil, it is generally anticipated here that the trade deficit will moderate in the next few years.

India's debt abroad has reached the \$20 billion mark, mostly long-term foreign assistance, and debt-service payments are estimated at 13.6% of current account receipts for 1984-85. It is expected to rise to an average of 17.6% between 1985-90 at 1984-85 prices.

Overall, in the past 15 months, the economy has lum-bered along, but with virtually no increase in productivity.

TABLE 1

Incremental capital to output ratio (ICOR)

Plan	Years	ICOR
First Plan	1951-56	3.2
Second Plan	1956-61	4.1
Third Plan	1961-66	5.4
3 Annual Plan	1966-69	4.9
Fourth Plan	1969-74	5.7
Fifth Plan	1974-79	3.9
Sixth Plan	1980-85	5.0
Seventh Plan	1985-60	5.5 est.

Although some industrial facilities, both in the private and public sectors, have improved capacity utilization, output from capital investment continues to show a downward trend (see **Table 1**).

After 35 years of planning by the experts, the country still depends heavily on the monsoon rains for its foodgrain production; power shortages not only haunt industrialists and households, but also farmers. Transportation of raw materials, intermediate products, and finished goods is still a nightmare for entrepreneurs and a financial blessing to the railway mafia who routinely chisel valuable assets by stealing from loaded wagons. Indian ports have earned the distinction of being the most costly in the world.

This defines the most immediate context for the government's bid to move the economy into a faster growth mode. A glance at some Indian economic history explains the specific task they have taken on. For decades, Indian businessmen, many of whom started as mere traders during the British Raj, have complained of the all-pervasive presence of government bureaucracy in economic activity. They protested high taxation, delays in obtaining industrial licenses, denial of expanded market shares through the Monopolies and Restrictive Trade Policy (MRTP) law, tight controls over foreign exchange, and the public-sector domination of the economy.

The new measures, beginning with the 1985-86 budget released in March 1985, are an attempt to put to rest those complaints and put the ball in the industrialists' court. The labyrinthine controls over import and export, and other business activity, were not the brainchild of any Indian leader, but were introduced by the British Raj to serve its own interests, principally keeping India deindustrialized. Following independence, the welter of trade controls were lifted to facilitate the heavy industry-based industrialization program of the first two five-year plans. A "single window" clearing system, which guaranteed investors all necessary infrastructural backup once the license was issued, was adopted.

But then, in 1958, as a result of a very large burst of

imports of industrial plant and capital equipment, India was plunged into a serious foreign-exchange crunch. What emerged from the crisis was a system in which all industrial licensing was subjected to clearance from the standpoint of foreign-exchange requirements, and a myriad of controls were imposed which pushed delays in the licensing process up to 6-10 years. Over the years, the issuing of licenses and permits has become a thriving new business in its own right. As Indians put it: The British Raj was replaced by the License and Permit Raj.

In March 1985, the government accelerated the liberalization process that had begun five years before. Twenty-five broad categories of industries were de-licensed entirely, and in June the de-licensing was extended to 82 bulk drug and related drug-formulation companies. In December 1985, de-licensing was again extended, now to companies in 22 industries that were subject to the MRTP and Foreign Exchange Regulation Act (FERA), provided that such undertakings were located in a centrally declared "backward area." For many of the industries remaining within the ambit of industrial licensing, the facility of "broad-banding" was adopted to allow them to make changes in their product-mix without losing time seeking fresh licenses. The government also announced a scheme of capacity re-endorsement for all licensed units, except those in small-scale sectors or in certain industries suffering from acute shortage of raw materials or infrastructure, or characterized by high pollution.

Government also took a series of steps to rationalize the MRTP Act itself. The asset threshold bringing a unit under the purview of the act, set at the equivalent of U.S. \$20 million in 1969, was raised to \$100 million. Later, a new list was published specifying 30 broad industry groups in which MRTP or FERA companies are permitted to set up new capacity, provided the items of manufacture are not specifically reserved for the small-scale or public sectors.

The 1985-86 budget also introduced major tax reforms to foster an environment for growth and savings while at the same time encouraging compliance and providing relief to lower income groups. As a result, tax collections increased by more than 20% in 1985-86.

As a followup to the budget, in December 1985, a Long Term Fiscal Policy (LTFP) was announced, the first in India's history. According to the government's annual economic survey, the LTFP has four objectives. It is expected to impart a definite direction and coherence to the sequence of annual budgets, thus contributing to greater predictability and stability in the economic environment. Second, it will place more reliance on rule-based fiscal and financial policies as opposed to discretionary, case-by-case administration of physical controls. Third, the LTFP will facilitate coordination of different aspects of economic policy. Finally, it is expected to strengthen the operational linkages between the fiscal and financial targets of the Seventh Plan and the annual budgets.

Besides these measures, a new three-year import-export

policy, featuring a fairly extensive liberalization of import controls, was set forth. The policy is aimed at modernization and exports, at facilitating technology and other imports needed to augment production. Imports under the so-called "Open General License" have been significantly increased, with major benefit to the automobile, oil field services, leather, electronics, jute manufacturers, ready-made garment, canning, and other industries.

Sectoral policies, such as the textiles policy, were also announced. Fertilizer subsidies were reduced and petroleum prices hiked to reduce the foreign-exchange drain. Meanwhile, a vigorous effort has begun to bring in the huge pool of unaccounted money from industrial houses, businessmen, government employees, and others.

A hesitant response

The response of the business and industrial communities to these reform measures has been mixed. Investors were happy to see part of the complex regulatory structure streamlined. If the stock market, one of the main sources of capital for the corporate sector, is any indicator, enthusiasm is running high. Following the announcement of the new measures, the stock market showed a steady, almost heady upturn. About \$1.5 billion was raised from the capital market during the fiscal year, almost a 30% improvement over last year (see Table 2). However, real investment by the private corporate sector has not shown such optimism: 1985-86 investment of \$2.6 billion is only 10% more than last year.

The financial community's reaction to the government's policy moves must also be looked at in light of the Seventh Plan, launched in 1985, and their own appreciation of the need for "political will." The total plan outlay stands close to \$270 billion (see Table 3). Although modest growth targets have been projected overall, there is a great deal of skepticism as to whether even that can be attained. The allotted monies will be spent, but if previous plans are any guide, time and cost overruns will paralyze a large chunk of the capital.

Investors' cautiousness has been accompanied by cautionary notes from a number of senior Indian economists. Dr. K. N. Raj, for instance, has drawn attention to the danger of

TABLE 2
Funds raised from capital market

Year	Amount (million U.S. \$)	Percentage to net domestic savings
1980-81	\$110	0.6
1981-82	440	2.3
1982-83	640	2.9
1983-84	720	2.8
1984-85	1,100	3.9
1985-86	1,580	N.A.

complacency with regard to investment resources implied by the new policy so far. Raj finds fault with the government's apparent assumption that the private sector has virtually unlimited resources, such that it can take up whatever the public sector cannot or should not handle, that the public sector itself does not have a serious resource problem, and that exports can be raised fast enough to meet the bulk of foreign-exchange requirements of the Seventh Plan.

Raj's concern points to the underlying issue—a low rate of productivity growth in the economy, the fact that the rate of growth of real surplus is static at best.

What didn't change

India's export performance over the decades has been less than satisfactory (see **Table 4**). The problem was both in increasing the volume of exports, and at the same time, moving out of traditional goods to make a dent in the capital-goods markets internationally. Untangling the red tape and allowing increased technology imports are themselves of little help. In the first place, no superior (imported) technology can have an effective impact unless the basic infrastructure in the form of electricity, water, speedy and reliable communications, cheap and abundant transport, and a pool of skilled and constantly upgraded manpower exists in surplus. In its absence, new technology cannot pay for itself, in terms of producing an improved quality of product, raising productivity, or in the product's export competitiveness, and the economy would as a result suffer doubly.

The second factor is international and even more important. Development lending is drying up, as the bankrupt Bretton Woods monetary system presides over the descent into trade war and depression. While Ibero-American, African, and some Asian nations are being strangled by International Monetary Fund "conditionalities," India is lobbying fiercely for a greater percentage of concessional loans from

the World Bank/IMF. For the record, India has duly registered its distress at the situation, but has so far shown scant interest in backing up those developing-nation leaders locked in battle with the international financial institutions for the future of their nations. India's decision to observe from the sidelines ensures that any hope for increased exports is mere rhetoric.

The public sector continues to be a net drain on the national economy (see **Table 5**). In 1984-85, public-sector facilities recorded a 2.5% return on capital employed. Out of the 207 major operating units, only half showed any profit (and that, before taxes). Ninety units incurred losses, and another two managed to break even. Total profit earned was about \$760 million on invested capital of more than \$32 billion. Without the petroleum sector's \$930 million contribution, the picture is one of net losses across the boards.

There has been no dearth of criticism of the public sector's miserable performance over the years, including from prime ministers and those accountable for the failures. Recently two reports have been issued by high-level, government-appointed committees detailing the problems and suggesting remedies. The Jha Committee report contains solid recommendations on management, autonomy, and accountability, government clearances and approvals, and the profitability of public enterprises, but has so far not met with any response from the administration or the politicians.

The profit motive was, however, never associated with the public-sector operation. When these facilities were set up, the purpose was to create productive activity in the backward areas, and to a certain extent this objective has been fulfilled, though not without a cost. The private sector can claim no such excuse. But the private sector has squandered away valuable capital by opting for obsolete technology, employing cheap and unskilled labor, and producing shoddy products. Depending entirely either on government-devel-

TABLE 3
Seventh Plan
Sectoral investments in billion U.S. dollars
(1 U.S. \$ = 12 Indian rupees)

Sector	Gross investment target		
	Public	Private	Total
Agriculture & allied products	\$23.0	\$28.3	\$51.3
Mining & Manufacturing	35.4	51.8	87.2
Electricity	26.8	0.3	27.1
Railways	10.3	—	10.3
Other transport	7.4	15.0	22.4
Communications	5.3	—	5.3
Other services	20.4	44.9	65.3
Total	\$128.6	\$140.3	\$268.9

TABLE 4

Total exports and imports

(Average per change)

Country	Export			Import		
	1970-75	1975-80	1980-85	1970-75	1975-80	1980-85
India	4.9	5.2	4.2	6.5	0.6	5.5
Indonesia	7.7	4.2	-3.3	21.2	6.4	3.8
South Korea	30.5	16.4	2.9	11.4	11.1	7.7
Brazil	10.5	6.7	3.1	14.1	0.3	1.7
Mexico	4.8	18.6	8.1	9.3	13.3	-8.5

oped technologies or on government permission to import foreign technologies, entrepreneurs have spent most of their time pleading for further government favors. Today, with the hint of a productivity drive, modernization, and competition, their first impulse is to look for the nearest socialist ideology!

The physical drag

In the most basic sectors of the physical economy, the surplus generation essential for any serious, long-term investment push is negative. The infrastructural weaknesses which have become more and more visible will become decisive to the extent that the impetus for faster economic growth takes hold. Moreover, this particular weakness has a geometric effect.

Shortage of electricity, for example, does not simply mean a stopping of productive activity in a particular industry; it will necessarily affect other industries linked in the production chain. The lack of electrical power forces millions to depend on burning wood, which not only gives rise to a high rate of air pollution, but also to large-scale deforestation. It was precisely by meeting electricity demand that such fast-growing nations as South Korea have kept 37% of its total

land under forest cover. By contrast, less than 12% of India's land has adequate forest cover, and that is dwindling fast.

Large-scale deforestation has set into motion a myriad of ecological problems, including massive annual flooding in the Gangetic Valley, the wholesale drainage of rich topsoil into the Bay of Bengal, siltation of reservoirs, and consequent reduction of the lifespan of some hydroelectric units, widening of rivers, and losing of precious rich land, and increasing the dredging cost of those river-mouth ports.

The disastrous impact of the power shortage requires placing the task of electrification on a war footing.

But the current energy plan, which calls for generation of 100,000 MW of electrical power by the year 2000, will still leave the country hostage to power shortages. Plans to produce electricity through coal-based thermal power stations have severe limitations, in particular, the potential to cause a breakdown of the already weak transportation system and the guarantee of multiplying dangerously high levels of environmental pollution.

Nuclear power is the only solution to India's large power requirement. But to date, inaction on the part of government to mobilize industry to build up a strong and efficient component supply capability has kept nuclear power insignificant

TABLE 5

Performance of public sector enterprises

(in millions of U.S. dollars)

	1974-75	1979-80	1980-81	1981-82	1982-83	1983-84	1984-85
Number of enterprises	120	169	168	188	193	201	207
Capital employed	\$5,500	\$13,480	\$15,170	\$18,280	\$22,100	\$24,910	\$31,800
Pre-tax profit	\$260	\$18.8	\$15.0	\$853.0	\$1,285.0	\$1,240.0	\$775.0
Return to capital employed (%)	4.7	1.4	0.1	4.6	5.8	5.0	2.5

so far as electricity generation is concerned. The plan to generate 10,000 MW, or 10% of total electricity supplies, through nuclear by the year 2000 is inadequate, and ignores the potentials of the atomic-energy sector, which has enjoyed a vast amount of money and skilled manpower.

India's basic steel sector, key to heavy industry, is similarly eating into the national economy. The steel industry, which produces 10 million tons of saleable steel annually, has recorded a statistically insignificant growth rate in the last two decades. Not surprisingly, the cost of Indian steel is about twice the cost of Japanese steel. India produces 16 kg of steel per capita as against 500-600 kg per capita in the advanced sector, and even this 16 kg is illusory, because in the rural areas where more than 80% of the population lives, per capita availability comes down to about 3 kg. That is a significant barrier to the industrialization process in rural India.

Here, too, the potential exists: India has one of the largest deposits of iron ore in the world, along with other raw materials required for steelmaking, such as limestone and coking coal. In the 1950s, Japan was producing less saleable steel than India; today, with no domestic raw materials whatsoever, Japan produces 12 times as much steel as India.

There is a related crucial problem in basic industry, against which even the limited fiscal-regulatory measures will run aground. And that is the lack of an appropriate industrial relations policy in India. Steel plants, shipyards, mines—in fact, any industry one cares to look at—is stocked with anywhere from 2 to 10 times, and sometimes more, workers than is necessary. While four shipyard workers handle containers in the Sri Lankan ports, Bombay port allocates 20 people to do the same job. As a direct result, Indian ports have earned the distinction of being the costliest in the world.

Former Reserve Bank Gov. R. K. Hazari has recently drawn attention to this matter. "It is futile and unnecessary to maintain high levels of high-wage employment at the expense of competitive productivity," Hazari wrote recently in the New Delhi daily *Economic Times*. "If we are serious about productivity and desire some elbow-room for innovation and the healthy working of competitive forces, there must take place a large measure of deregulation of industrial relations to encourage collective bargaining. . . . Labor must be explicitly recognized as a self-respecting adult human resource, not a protected infantile species."

The central challenge: agriculture

The major issues in Indian economic policymaking center on raising productivity and alleviating poverty in that process, and, in particular, in a multifold development of infrastructural facilities and some core sector industries, such as steel, fertilizer, machine tools, electrical machinery, and engineering. Top priority must be given to agriculture.

Statistics show that the Indian agricultural sector—where subsistence farming is still pervasive—continues to be a net drain on the economy. Agriculture is the country's largest

sector, employing fully 70% of the workforce. The majority of India's rural poor—about 80% of India's population still lives in rural areas—who earn less than \$400 annually belong to the agricultural sector. A good percentage of the urban poor also properly belong to the agricultural sector; they are driven into the cities to try to make ends meet.

No fiscal or monetary policy will make any dent on the national economy unless the agricultural sector is made highly productive, and the necessary ingredients to do so are made plentiful. The first change will have to be abandonment of the self-serving prejudice that subsistence agriculture constitutes some kind of "productive" economic activity, a lie which has served as a ready rationale for the propriety of the status quo among planner and politician alike.

The fact that some excellent work has been done in Punjab, Haryana, parts of Uttar Pradesh, and Tamil Nadu in raising agricultural productivity underscores the political nature of the problem. As the data for agriculture shows, overall productivity remains dismally low (see **Table 6**). In 25 years, average per hectare rice production rose by a mere 0.42 tons. During the same period, performance in wheat was much better, and both contrast with a low performance in the crucial oilseeds sector—which is today costing India \$1 billion per year in foreign exchange.

The same set of figures show some of the reasons. For instance, only 42% of the irrigable land under rice cultivation is actually irrigated. Again, in the case of wheat, the situation is slightly better, while for oilseeds it is disastrous. Fertilizer consumption, use of pesticides, and high-yield varieties (in the case of rice and wheat) point in the same direction.

Agriculture is not simply production of foodgrains, pulses, and oilseeds; it also properly encompasses agro-industries such as food processing, growing and processing fodder for expanded herds of cattle and poultry, and maintenance and other industrial activities on the input side. Agriculture also properly encompasses education and development of the rural population.

A vision to move the nation

In this, India can take a leaf from South Korea's *Saemul Undong*, or "New Community" movement, launched by the late President Park Chung Hee in the early 1970s when South Korea was plagued by food shortages. The movement launched by the government involved a \$2 billion investment in improving the living quarters of the peasants, and proceeded to develop leaders from within the rural communities to oversee the use by the peasants themselves of raw materials supplied by the government to build roads, bridges, irrigation canals, and make improvements on the land. *Saemul Undong* was an intense political campaign that reaped a rich harvest: It raised South Korea's rice productivity by 250% in less than a decade!

The urgency of a similarly appropriate political-economic approach to transforming Indian agriculture can be seen from the standpoint of land. One hundred years from now,

TABLE 6

Performance of agricultural sector

	Years			
	1960-61	1970-71	1980-81	1984-85
Area under rice production (million hectares)	34.1	37.1	40.2	41.2
Total rice production (million tons)	34.6	42.2	53.6	58.6
Percentage of area irrigated	44.7%	37.5%	40.5%	41.9%*
Percentage of rice cultivation under HYV	N.A.	14.9%	39.7%	60.4%
Under wheat production (million hectares)	12.9	18.2	22.3	23.6
Total wheat production (million tons)	11.0	23.8	37.5	44.2
Percentage of area irrigated	15.1%	54.5%	69.7%	72.4%*
Wheat cultivation under HYV	N.A.	35.8%	72.2%	83.1
Under oilseed production (million hectares)	13.8	15.4	15.6	19.9
Total oilseed production (million tons)	7.0	9.6	9.4	13.1
Percentage of area irrigated	1.5%	2.9%	7.2%	14.9%*
Fertilizer consumption (average kg/hectare of arable land)	N.A.	11.4	33.8	62.8

*figures available only for 1982-83.

India's geographic parameters will have remained the same, while everything else will have increased: population, cattle numbers, foodgrain production, organized industrial activity, housing, clothing demand, etc. Surely the food and agricultural raw materials demand will not be met by fostering agriculture "anywhere and everywhere." Productivity is the solution.

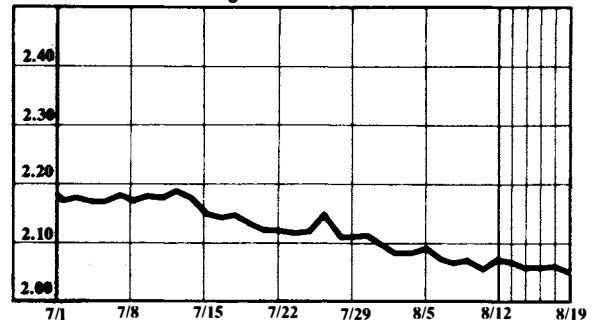
Agriculture is suitable only in limited areas where the highest productivity can be achieved. That means concentrated use of energy per hectare in the form of mechanization, improved seed varieties, chemical fertilizers, pesticides, and so on, to reduce the total energy consumption per ton of agricultural produce. It means tilling the most fertile land using pumped groundwater.

One such area is the Gangetic Valley, stretching from Uttar Pradesh to the Bay of Bengal. This area holds the key to India's economic awakening. Three hundred million people live in this basin and the area can provide all the agricultural produce that the entire country would possibly need in the year 2000. It can provide more: It can provide the country with exportable surpluses, with new agro-industrial complexes, new cities, and can be a huge workshop for the production of skilled manpower.

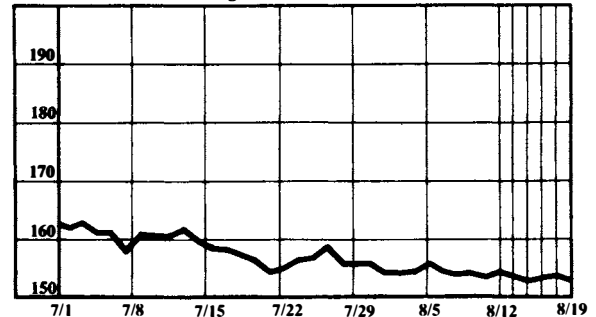
Most important, it is a vision that can move the nation.

Currency Rates**The dollar in deutschemarks**

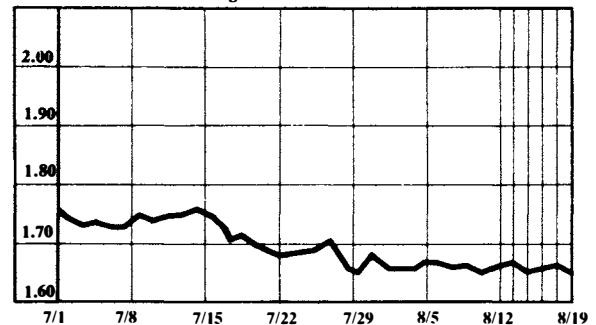
New York late afternoon fixing

**The dollar in yen**

New York late afternoon fixing

**The dollar in Swiss francs**

New York late afternoon fixing

**The British pound in dollars**

New York late afternoon fixing

