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EDITORIAL—SOME HIGHLIGHTS

I General Economic Scene

State:

Weather and Prices: July saw good south west monsoons in the state. By July 27, the water level in the Mettur reservoir crossed 100 feet with an inflow of 53,000 cusecs and a discharge of 25,000 cusecs. On July 27, 1977 the water level was 49.05 feet with an inflow of 8,547 cusecs. As a result, water from the reservoir was released from July·4 (as forecast in the last issue p 373), for the season for irrigation in the delta starting with 7,500 cusecs, with a view to helping farmers, particularly in tail end areas. The Public Works Department has increased the drawal to 25,000 cusecs by the end of the month. Heavy rainfall continued during the month at various centres fed by the Grand Anicut Canal and the areas served by the Cauvery and Vennar. Prices during the month remained stable with marginal increases in the prices of vegetables and fruits. Cereals, pulses, edible oils and sugar recorded steady or declining prices.

State Plan for 1978-83: The State Planning Commission announces that it is in the final stages of completing work on the five year plan (1978-83), with a total outlay of Rs. 2,100 crores. The primary objectives of the Plan coincides with those of the National Plan—which is to ensure employment to the unemployed and full employment to the under-employed in rural and urban areas, and to bring down the percentage of people living below the poverty line.

Third Pay Commission: The Third Pay Commission submitted its report to the government on July 27. Its recommendations relate to the pay structure, allowances, leave and retirement schemes, fringe benefits and promotional prospects of 7.44 lakh employees of the state government, local bodies and teaching and non-teaching staff of the aided educational institutions. The government is now examining the report and its recommendations and will be giving effect to its decisions as of April 1, 1978.

Power: The power supply position in July in the state was normal. As noted earlier, the good rains covered also the catchment areas of the hydel reservoirs, with the reserves improving to 400 million units in early July and to 561 million units by mid July. The release of water for irrigation from Mettur enabled the generation of 100 MW. By mid July the daily power demand amounted to 30 million units and this was met through 14 million units from thermal stations and 4 million units from Kerala (which had been supplying 7.5 million units daily in March–May but which was reduced at Kerala's request due to its inadequate rains). Ennore did well, as against the July target of 91 million units, by mid July it had generated 104 million units. Neyveli supplied 275 MW to the Tamil Nadu grid. The Board has presented to the government a project for a 420 WM thermal station at Mettur with two sets of 210 MW each, which would feed the Salem Steel and the Mettur aluminium plants. In July also the Union Planning Commission gave its formal clearance for the setting up of the second thermal power station at Neyveli of 630 MW (comprising three 210 MW sets) at an estimated cost of Rs. 213.98 crores. Tata Consultants have been chosen to provide consultancy services to the thermal station, the supply of plant and equipment is to be from indigenous sources. The station will draw its lignite from the second mine cut where 40 deep bore-well pumps with a capacity of 270 cubic metres per hour will be continuously working. This artesian water will be stored in the existing lake *"Pudu Eri"* and the pumps will meet the treated water requirements for the boilers. The second mine cut will have an annual production capacity of 4.7 million tonnes and will cost Rs. 144.7 crores. The Rs. 25 crores Suruliyar Hydro-electric project will be commissioned in mid August. With an installed capacity of 35 MW, it will generate 117 million units a year and will help to tide over the low voltage problem of Madurai district.

For the country as a whole, with the south west monsoon setting in, there was some improvement in the power and water. The Union ministry reports that the generation of power in June was up by 13.5 percent compared to June 1977. The total generation in June was 8,067 million units (up from 7,101 million units in June 1977). The thermal generation was 4,431 million units, hydel 3,452 million units and nuclear was 184 million units. The national average daily power availability was 255.48 million units. Four new power projects with an aggregate installed capacity of 350 MW went on stream—Sileru hydel (100MW), Harduganj thermal (110 MW), Patrahe thermal (110 MW) and Giri Bata hydel (30 MW). With good rain fall in the Mercara region and Krishnarajasagar and Kabini in the upper region of the Cauvery almost full and the good flow into the Linganamakki reservoir of the Sharavathi project, Karnataka government reduced the cut on high tension consumers from 45 per cent to 30 per cent and on low tension industries from 25 per cent to 20 per cent. The union ministry announced that 3,850 MW of additional capacity is being commissioned this year, which is a 14 per cent increase over last year's. In nine states there were no power cuts in July, while in eleven states there were cuts of various sizes. In uttar Pradesh the 26 mini steel plants with a capacity of 4 lakh tonnes a year, were functioning at 1.5 lakh tonnes because of interrupted power supply at a time when there was a greater demand for steel ingots and billets. One other reason for the poor power situation is the acute shortage of qualified staff, which is estimated to cover some 60 to 70 per cent of unqualified staff. This is worsened by the high turnover of engineers and technicians in sensitive areas like instrumentation. The Central Electricity Authority runs four training schools, at Neyveli, Durgapur, Badarpur and Nagpur where 700 engineers and 50 technicians are trained and which should be expanded and run as an educational facility. If to this accelerated manpower programme, the causes for the tardy execution of projects were removed, the power situation in the country would improve sensibly. The average additional time taken for setting up power projects is seven years and the result is that while the load growth is 15 per cent per annum, the generating rate is 10 per cent. In addition the state boards run into heavy losses. Against a total investment of Rs. 2,000 crores in 1977-78, the loss is about Rs. 1,000 crores per annum. Further the Planning Commission reports that there are funds but no projects. These groups of retarding factors need honestly to be faced and solved as they can be with determination and professional expertise in the country. The Planning Commission announced in early July that it has cleared the 1,100 MW Ramagundam thermal project estimated at Rs. 540 crores as a Central project to be executed by the National Thermal Power Corporation to be linked to the southern regional grid by 400 KV transmission lines. The Corporation and ministry are required to enter into firm arrangements for the supply of coal on an assured basis and to finalise modes of transport. The government also announced that it is giving high priority to use solar energy particularly for rural areas and referred to the one tonne a day prototype paddy dryer developed by Annamalai University, the ten tonne a day paddy dryer of the Central State Farm at Ludhiana and the 10 KW experimental solar power plant at Indian Institute of Technology, Madras. The Bhavnagar project is developing a solar energised desalination pilot plant of 1,000 litre capacity along with a series of a time bound research programmes on bio-gas technology. These are important initiatives for the long term. The short term need to gear the electric power programme to meet the growing power demand of the country is a priority which the Draft Plan fully recognises and should be met.

Southern Chief Ministers' Conference: A meeting of Chief Ministers of the four southern states and Pondicherry in July reviewed a number of problems and *inter alia* recommended that: (a) the government of India should raise the Central subsidy for rice to the level of wheat (from 4 paise to Rs. 23.19 per quintal), so that the procurement price of rice can be raised without raising its selling price, and (b) the sugarcane price should be raised to Rs. 125 per tonne related to a recovery of 8.5 per cent to meet the increased cost of cane cultivation and the prices of other inputs and the levy price be fixed on the basis of cane prices and the cost of sugar recovery as a means of avoiding regional imbalances. These will now have to be taken up with the Union government for implementation—a procedure which can be avoided if the Zonal Councils are reactivated.

Water: The July interministerial review on the Krishna water project noted that Andhra Pradesh had appointed a superintending engineer to undertake investigation of the Andhra Pradesh part of the project. Tamil Nadu is planning to set up a cell for the same purpose. It was also decided to take up with the

Union government the Godavari—Cauvery link project as a first stage of the Ganga–Cauvery link programme. The State Planning Commission reviewed the project for use of surplus of waters of west flowing rivers in Kerala. It was established that out of 2,500 tmc feet of water now going into the sea from 40 west flowing rivers, Tamil Nadu required 80 tmc feet for irrigating 10 lakh acres of land in Coimbatore, Madurai, Ramanathapuram and Tirunelveli districts. The project will also help Kerala as channelling out of 500 tmc feet of water would be enough to arrest sea erosion in that State. The Committee on the Kodaganar Dam burst in Madurai districts (see Vol VIII p 1), submitted its report in July. Its finding is that the design of the dam was in accordance with state government specifications (but not according to Central Public Works Department specification), there was no improper designing, nor was the site wrong and that there was no major defect in the dam. It points out, however, that there was insufficient care by the authorities about the possibilities of heavy floods due to inflow of forest streams. The Tamil Nadu Water Supply and Drainage Board is completing protected water supply schemes to 6,000 villages this year at a cost of Rs. 24 crores. It has started work in 7 of Ramanathapuram villages which have only saline water. Over 1 lakh villages will be benefitted by the current potable water schemes. Also to improve the maintenance of bore–well/hand pumps, one mobile team is being provided to look after 500 pumps instead of 1,000 pumps as at present. In regard to urban areas of the states 41.2 million people, 15.5 million live in 740 local bodies (urban), of these 11.1 million who live in 254 towns have the basic amenity of safe drinking water, so that Board's plan is to cover the remaining 486 towns in the next six years. The rest of the population of 25.7 million are under 12,596 village panchayats.

Housing and City Development: The Tamil Nadu Housing Board has evolved a low cost housing design suitable, for rural areas. On this basis it is constructing 200 units at Guduvancheri. Designed as a twin type structure, each unit has a plinth area of 22.64 square metres with a raised platform, one large room and kitchen. using lint concrete and broken stone, palmyrah rafters and Mangalore tiles. Each unit will cost Rs. 4,000. This will be the first rural housing project of the Board. On the city improvements, a recommendation to shift to other places about a third of the 788 hawkers doing business in 65 trades on the pavements in George Town has been made by the committee set up by the government to recommend means of faster movement of city traffic. It has also recommended a ban on pavement vendors at bus stops. On the basis of experience of this measure, the scheme to relocate hawkers will be extended to other parts of the city. In July also the Indian Oil Corporation registered over 20,000 applicants for LPG connections to be met by 1981–82. There are over a lakh of persons still waiting for gas connections and their needs will not be met during the current Plan period. The Madras Metropolitan Water Supply and Sewerage Board, an autonomous body to be in exclusive charge of the water supply and sewerage systems of the metropolitan area came into existence from July 22 with a membership of 6 non–officials and 7 officials, the Secretary, Rural Development and Local Administration being the Chairman. All properties, assets and liabilities of the Madras Corporation and the ground water branch of Public Works Department relating to water supply and sewerage services for the Madras Metropolitan area including all works in progress are transferred to the Board from August 1, 1978.

Transport: The Southern Railway is undertaking preferential loading of coal at transhipment points at Tiruchirapalli and Bayanapalli to meet the urgent fuel needs of cement factories in the state and south. 76 wagons are being moved per day for each unit and close liaison is maintained with South and Central Railway authorities to monitor coal wagon movements to the south. Also the Southern Railway is watching the movement of coal from production centres in Bengal, Bihar and other areas to the southern consuming points. The Southern Railway is doing its share in the crisis situation caused by the coal shortage (due to the May strike in Singareni, work to rule agitation in Eastern Railway, strike by labour contractors in Calcutta and heavy decline in Asansol coal offerings). The coal situation will be reviewed later under the National section. In July, the 3 month old congestion in Madras port was cleared and ships which had to wait for a fortnight for a berth in April, May and June will now be able to secure one in 3 days. The congestion was due to the worse situation in Bombay which made ships come first to Madras to discharge their cargo, an increase in the arrival of passenger ships from the Andamans during the summer months, and the need for reserving berths for bulk carriers of fertilisers, wheat etc. The average quantum of cargo carried and landed in the Madras port increased from 500 tonnes to 1,500 tonnes per ship during this period. From April 1 to the third week of July, 1.16 lakh tonnes of fertilisers were landed, while in all of 1977-78, 2.5 lakh tonnes were landed.

Tenancy Legislation, Tribals and Farmers' Agitation: In mid July, the 1976 Tamil Nadu Cultivating Tenants (Protection from Eviction) Act was extended by an ordinance for 3 months which protects cultivating tenants from being evicted because of arrears of rent. The government also appointed a commission to review and recommend the wages of farm workers in East Thanjavur, which were originally fixed in 1969 on the basis of the Ganapathia Pillai Commission report and revised in 1974. For tribal development, the state government has approved a master list for road development in tribal pockets of Salem-Dharmapuri, North Arcot—South Arcot and Tiruchirapalli districts. Under the integrated tribal development programme, 8 major schemes covering a total length of 171.1 km costing Rs. 2.09 crores will be executed over 5 years. For the current year Rs. 45 lakhs have been allocated for the road from Matrapalli to Pudurnadu, from Odaikadupudur to Pachamalai and from Karumanthurai to Karikoilvalavu. The results of studies on tribals conducted by the Institute of Techno-Economic Studies (ITES) confirm the finding of the Madras Institute of Development Studies (MIDS) study published in publication No. 13 (see Vol VII pp 742-744). The ITES study of 200 tribal villages in nine areas in the state shows that 86 per cent of tribal families are in debt to an average of Rs. 2,307 per family. While more than half were aware of the recent debt legislation, only 23 per cent were willing to benefit from it. With this logic, "what is legal is not necessarily moral," the tribal is tied by a sacred relationship to the moneylender-cum-trader. Large size agricultural multipurpose societies which can develop cooperatives among them, *diversify their economy* and meet their consumption credit needs are recommended. The farmers' agitation led by Tamizhaga Vivasayigal Sangam (Tamil Nadu Farmers Association) was revived in July. Their demands include reducing power rates by Rs. 2, writing off all loans due from farmers owning 5 acres of land and less, cancelling 50 per cent of loan and *interest for those who owned* 5 to 10 acres, and waive 50 per cent of interest for those who own 10-15 acres, and introducing crop insurance. The attempt to stop the production and transport of milk and vegetables to the *cities and towns* was abandoned.

National :

Draft Plan — 1978-83: In July the Dantwala Committee report on decentralization of planning was submitted to the *Planning Commission. It recommends* that the block should be the unit of planning and for this purpose recommends the merging of all development programmes at the block level and placing the pooled funds at the disposal of the block level planning authority. Against the governments' proposal to introduce block level planning in 3,500 blocks, the *report, taking into consideration* the lack of planning machinery even at the state level, leave alone at the district and block level, and the fact that while in 2,945 out of 5,000 blocks there is one or more special programmes like SFDA, DPDA, CAD *etc., and there is* none in 1,500 blocks, recommends that a beginning be made with planning in 100 blocks, to be increased to 500 at the end of the Plan period. It recommends that the district planning team comprise of a chief planner, economist statistician, cartographer, agronomist, engineer, industry officer and a credit planning officer, to whom specialists may be added as needed and with which *research institutions may be associated.* It also recommends reforming the agricultural structure and institutional set up before entrusting the panchayat raj institution with planning responsibilities and that for approval of the block plan, and to give high priority for preparation of land records where they do not exist or are in arrears. Also existing credit, *marketing and inputs supply institutions* should be reoriented to make them responsible to the needs of the rural poor, and one new institution recommended is graingola for public distribution of essential goods at the village level. Districts and blocks where poverty *and unemployment are intense should be* chosen to start block level planning. The responsibility for the block level planning must be borne by the government, with special steps being taken for the participation of the public, particularly the weaker sections in the *planning at* the block level. The state planning agency should issue the guidelines for the State plan and its priorities on the basis of which the district and block plans can be developed and integrated with the overall state plan. The block level planners must be told what *are* their *financial* parameters, what are the continuing schemes which must be provided for out of these finances, and what is available for the new programme. It recommends that the resource inventory compilation be deferred till the planning team knows what it wants from the inventory and why and for this purpose the resource inventory should be in the form of statistical papers dealing with an analysis of past performance, identification of constraints and development potential. The plan should rather provide for a detailed soil conservation survey of the block to identify works and their costs, an employment guarantee programme to use surplus manpower, and full use of local soil and water resources. Emphasis is laid on organisation and institutional reforms as in the case of languishing cottage industries needing organisation, and supplying them with raw materials, marketing and innovative designs services. The reform calls for the use of the sophisticated aids available in the country—such as the Photo Interpretation Institute, the National Remote Sensing Agency, ISRO, for inventorying resources and providing maps. The Planning Commission has also informed the ministries and the states that investment for large and medium industry will be limited because of the greater investment going into agriculture, power and irrigation and small scale industry, so that completion of ongoing projects should be given priority and capital intensive projects given low priority. The generation of 18,500 MW of power in the five years to be attained involves each scheme having a techno-economic feasibility study and optimal choice from the regional angle as between hydel and thermal stations and the reinforcement of the transmission system. The states have been asked to prepare long term irrigation plans with due emphasis on ground water use. Similarly guidelines have been issued with regard to fisheries particularly in the east coast and the culture of prawns in the back waters of some states and with regard to link roads as part of a 15 year district master road plan. For the first year 1978-79, the Commission has authorised the agreed Rs. 146.48 crores on central health schemes and Rs. 111.8 crores on family planning—in the hope that last year's disastrous lag can be made up. The guidelines also call on all the states industrial development corporations and finance corporations to reappraise the industrial licenses and letters of credit that have been granted in order to take up only those projects linked to agriculture, rural development, wage goods production and employment orientation, and to drop all projects which are more costly at home than abroad so that the latter can be imported. On the financial side, the guidelines call for an additional mobilisation of resources of Rs. 3,700 crores by the states in the five year plan period. This will leave Rs. 12,150 crores to be met by central assistance and devolution from central revenues in the total states plan size of Rs. 29,815 crores. To raise these additional resources the states have been asked to levy a progressive land holding tax *a la* Raj Committee (see Vol. III, p. 14 and 15), or additional cesses on land revenue, commercial crops and market arrivals, together with irrigation rates increases and betterment levies, increase in electricity tariff, inventories and tax on capital gains in land values. The Planning Commission has set up a standing committee for directing and improving the data base for planning and policy making.

Prices and anti-inflation: The index number of wholesale prices recorded a high 1.8 per cent rise in the month June, standing at 186.0 on July 1. This means for the first 3 months, April to June, of the current financial year, the price rise has been 1.8 per cent and for the past

12 months a decline of –1.4 per cent. The price rise was mainly due to 11.6 per cent in iron and steel prices, followed by a 2.8 per cent rise in primary articles—pulses 2.8 per cent and suprisingly 1.8 per cent in cereals—surprising because of the plentiful supply and market arrivals of cereals in June. Sugar prices rose by 2.4 per cent and basic chemicals by 1.8 per cent during June. Jute goods price declined by 2.5 per cent and there was also a fall in edible oil prices (–0.5 per cent). The rise in the prices of pulses, rice, condiments, spices and other common items is traced to hoarding and profiteering. Cereal prices have been kept down because of the bumper crop and in fact traders who usually invest and store wheat have now left the wheat trade to the government and turned to other commodities. Similarly vegetable oils prices have not risen because of the massive government imports. But traders have moved in to the other edible oils, pulses and condiments and basmathi rice. Speculation in turmeric has driven its price up to Rs. 300 per quintal, illegal forward dealing in groundnut oil has sent up its price. It is estimated that as at June, Rs. 350 crores have been invested in these hoarding and speculative profiteering activities. Government has under consideration bringing 25 per cent of vanaspathi production under its control which would involve taking over 5 sick units, expanding the functioning of Ganesh Flour Mills, and establishing a vanaspathi unit in the co-operative sector in eastern India. There has been a sharp rise in money supply in the first 3 months, April–July, by 7.7 per cent against the 2.2 per cent rise in the same period in 1977. Net Reserve Bank of India credit to government is the major component which amounted to Rs. 711 crores till June 24 and which is the economic measure of deficit financing. The increase in foreign exchange assets of the banking sector added another Rs. 692 crores to money supply. It is also true that this has not led to a sharp rise in prices and the usual lean period price rise has been lower this year than last year—which is a reflection of the serious demand stagnation situation and the presence of a dangerous degree of liquidity in private hands. This is seen in the fact that demand deposits have increased by Rs. 591 crores while time deposits have only risen by Rs. 525 crores till June 24, reversing the usual trend (last year demand deposits rose by Rs. 124 crores, while time deposits spurted to Rs. 880 crores). Notes in circulation declined by Rs. 156.92 crores in the week ending June 23. While the good monsoon has prevented speculative price rise in cereals, speculation as noted earlier is rise in cement, steel, coal and soda ash where prices are rising. In the case of rayon and nylon, prices are rising despite liberal imports showing the strength of liquidity and speculative trade forces. Another element in the money supply situation was the sharp decline in the Union government's deposits with the Reserve Bank of India during the last week of June from Rs 1,922.31 crores to Rs. 377 crores. The Reserve Bank of India reserves have increased by Rs. 245 crores while state government overdrafts which had been Rs. 599.30 crores declined to Rs. 14.59 crores. In fact no state was in over draft on July 29, having cleared all their dues after release of Union assistance in advance of the due date of payment, besides instalments of central assistance to state plans plus their share of central taxes. Grants-in-aid payable under article 275 (1) of the Constitution were

released to enable the state clear their dues. The Planning Commission is in the mean while working on the question of the cumulative burden of deficits in State's resources, while the need for strict and prudent financial management by states is emphasised. One measure to tighten the hold of the Reserve Bank of India over the gilt edged market was its July decision to discontinue the practice of charging differential rates for Union government securities for purchase from and sales to commercial banks. The difference between the buying and selling prices of central government loans and the differential rates followed by Reserve Bank of India so far represented its commission as paid by the banks. Now with the abolition of the difference, the banks will go directly to the Reserve Bank of India and not through brokers. In April brokers had been eliminated in the inter bank call money market. The Reserve Bank of India has also informed foreign banks that they will not be allowed switch deal in government securities. The effect of these decisions will have to be watched during the coming year. With regard to the flow of resources to rural areas, two developments in July need to be noted. One is the government decision that at least 60 per cent of the funds of the rural banks must be invested in rural areas. The other was the Dantwalla Committee report on Regional Rural Banks with its recommendations that the banks be made an integral part of the rural credit structure which is based on the committee's assessment that within a short space of time the regional rural banks have demonstrated their superiority over the rural branches of commercial banks in their low cost operations, simplicity and low profits, local participation in management, the procedural familiarity of local staff and the close association of the district agricultural and rural development agencies and personnel. The committee on this basis recommends the acceleration of the Regional Rural banks and their replacement over a period of time of the rural branches of the commercial banks. Each Regional Rural bank will have a population of 20,000 which is the area of 5 reorganised primary agricultural credit societies, with the authorised and paid up capital of each bank being Rs. 1 crore and Rs. 25 lakhs respectively.

Gold Sales: On July 1, the Reserve Bank of India announced the awards in its fifth gold auction—1.62 tonnes of the aggregate value of Rs. 10.47 crores on the basis of 1,193 accepted bids which were the largest so far. In 5 auctions, the Reserve Bank of India has sold 6.3 tonnes yielding to the government Rs. 40.80 crores. As in the fourth auction, the reserve price in the fifth auction was Rs. 641 per 10 grammes. In the sixth auction on July 12, 1.52 tonnes were sold at a price range of Rs. 641 to Rs. 655. Gold prices in the Bombay bullion market, however, recorded a rise on the day the sixth auction results were announced at Rs. 683 per 10 grammes due to the seizure of gold in the city and the hampering of the inflow of smuggled gold. On July 26 at the seventh auction 1.45 tonnes of gold were sold at a price range of Rs. 645–654 per 10 grammes. The government announced on July 21, that a scheme to sell gold at a fixed price to goldsmiths at selected centres will begin to be operated soon and the number of centres are now being settled and 5 to 10 gramme bars being brought out to meet the needs of goldsmiths. Has the scheme achieved its aim not to bringdown prices but to reduce the domestic price of gold to supplement the preventive measures against gold smuggling? The government think so, but the evidence quoted earlier is against it. The government also announced at the sametime in the Lok Sabha that a scheme for import of gold for the purposes of jewellery exports will be made soon. The scheme which is aimed at preserving the country's gold reserves and at the same time earn foreign exchange through the export of value added jewellery will allow gold imports without restriction to the extent needed for the export of jewellery.

Economy and Industry: The NCAER review of the last quarter of last year January-April 1978 shows that for the year the economy may register a growth of 6 per cent because of the good performance of agriculture at 125 million tonnes, eventhough industry is likely to show a 4 per cent growth rate against the previous year's 11 per cent. It finds a revival in the investment climate, with capital issues for the year being Rs. 135 4 crores (an increase of Rs. 47.3 crores over 1976-77), in part due to the FERA guidelines which made for dilution of equity holding of foreign companies but also due to 19 new ventures. Also import licenses in the first 9 months amounted to Rs. 5,960 crores compared to Rs. 4,007 crores in 1976-77 and the increased disbursement of term lending institutions are noted. Prices rose during the year by 5.1 per cent but even on this during the second half of the year prices fell by 2.1 per cent. The power situation was poor and acted as a bottleneck to industry and agriculture. Against the target of 2,466 MW to be commissioned, the actual performance was 1,956 MW. The export import trends show that there will be a trade deficit in the year, by itself not a matter for concern in view of our large foreign exchange reserves, provided there is no decline in our value added exports and the composition of imports serves the plan objectives of increasing employment and raising living standards of the poor. The review is optimistic about the state of the economy. And so is the government's view as set forth by Finance Minister in his July statement at Gujarat which refers to the drawing down of inventories in many industries because of the pick up of demand especially in steel, coal and cotton textiles, and places the overall rate of growth for 1977-78 at 6 per cent. The 11-12 per cent increase in agricultural production is attributed not to the weather but to increase in the area under irrigation, promotion of research, agricultural extension, use of high yielding varieties seeds and balanced fertilisers. Referring to the same indices as NCAER, reference is made to increased private investment plans, to programme for meeting the power demands and cement shortage and steel needs through expansion of plants and imports, and the food and foreign exchange reserves as the basis for a continued growth of economy during the current year. There are doubts about this analysis: price stability seems to be an indication of stagnant demand, in turn due to the structure of the economy: agricultural production is still mainly dependent on the monsoons: the composition of the import trade shows the weakness of the economy and the food and foreign exchange reserves are not investment resources. In fact the index number of industrial production shows that industrial growth rate for 1977-78 was a low 3.5 per cent against the modest 5-6 per cent target. The official explanation for this poor performance is power scarcity, inadequate coal supply due to wagon shortage, industrial unrest, capacity constraints in some cases, and the slow growth of key sectors of steel, cement, coal and power to which should be added the stagnant demand factor which is a structural factor of the economy. A further depressing point revealed by a government study is that Rs. 773 crores of bank finance are locked up in 270 sick industrial units at the end of September 1977, to which should be added the 103 sick textile units under NTC. Sickness is spread over the whole industrial spectrum, starting with engineering with 72 sick units and Rs. 211.26 crores, textile (excluding NTC) 68 units and Rs. 230.30 crores, chemicals 15 units and Rs. 78.93 crores, sugar 23 units and Rs. 33.49 crores etc. with continuing additions since September, and as a result of which the Reserve Bank of India has introduced a system of monitoring of the sick units by the scheduled commercial banks. To this sickness problem, should be added the public subsidy system which inspite of the budget declaration to reduce subsidies is continuously on the increase, the latest being the July decision to restore cash subsidy to jute exports. The budgetted subsidy which stood at Rs. 117 crores in 1971-72 is Rs. 1,150 crores for the current year, with Rs. 202 crores for indigenous and Rs. 263 crores for imported fertilisers, Rs. 456 crores for food, Rs. 232 crores for export subsidies, Rs. 90 crores for coal etc. The Industrial structure of the country is a high cost structure and is really non-competitive in international terms. The Annual Survey of Industries for 1975-76 which was published in May shows the important role of the small scale sector in generating employment: for every 1 lakh of its investment it generated employment for 22.2 persons against 5.8 persons employed by plants with Rs. 10 to 25 lakhs capital and 3 person by those exceeding Rs. 25 lakhs. The report also shows that a consumer based strategy will accelerate job of creation and that the small scale sector creates more employment at a lower per unit cost of output. For the current year, the government announced in July various measures to increase industrial production—with increased targets that had to be achieved —3,800 MW in power, 21 million tonnes for cement, 10.3 lakh tonnes for paper in place of 9.8 lakh tonnes, 60,000 commercial vehicles (an increase of 26 per cent) and 13,000 of railway wagons (in place of the earlier 8,500). It is undertaking advance planning of imports and buffer stocks of crucial inputs and constant monitoring by a fire fighting unit in the industry ministry, including transfer of some units from the Department of Heavy Industry to the Department of Industrial Development and vice versa—e.g., the watch unit of HMT as an instance in the first case and cement in the second. On this basis, the government forecasts an 8 per cent rate of industrial growth for the current year. The ministry also announced that the organisation for 212 District Industrial Centres have been completed, 1,500 persons to man them are under training and the centres would start functioning by the end of the year.

Public Sector Performance: The Department of Heavy Industry reports that in May its 15 units produced Rs. 74.15 crores (85 per cent more than in May 1977 and 62.5 per cent over April 1978). Bharat Heavy Electricals Limited produced Rs. 42.10 crores (84 per cent increase), HEC Rs. 5.03 crores (four times increase), Bharat Pumps Rs. 1.07 crores (five times increase), HMT Rs. 12.95 crores (206 per cent increase) etc. The government also announced that it is planning to abolish its existing Department of Heavy Industry and replace it with a Department of Industrial Production—which will function as the fire fighting unit mentioned earlier, while the Department of Industrial Development will implement policy and planning matters. A report by Polish Consultants on the coal industry shows that the industry is in poor shape, with under utilisation of capacity (60 per against the 95 per cent claimed by CIL). Also against production in similar mines in other countries of 500 tonnes a day, the average production of an incline in this country is a low 100 tonnes per day. Apart from implementing immediately their recommendations to improve production and pumps in the mines, a serious question is raised as to the misleading reports issued by the industry in which over Rs. 2,000 crores have been invested since nationalisation.

National Production Front :

Steel: Steel production in 1977–78 aggregated 9.59 million tonnes (integrated plants 8.42 million tonnes and mini steel plants 1.17 million tonnes), with imports at 0.35 million tonnes and exports at 1.1 million tonnes. For the current year, the production target is about 2 million tonnes higher, at 9.97 million tonnes by the 6 integrated plants and 1.5 million tonnes by mini steel plants, with 5.9 lakh tonnes imports and 8.3 lakh tonnes exports. It is proposed to build a buffer stock of 6 lakh tonnes this year to meet future emergencies. (At July the integrated plants had a stock of 7 lakh tonnes). Production in the plants during the first quarter declined to 1.5 million tonnes against last year's first quarter of 1.6 million tonnes (capacity use 83.86 per cent) due to non-availability of power. This loss of 90,000 tonnes suffered by Durgapur, Bokaro, TISCO, IISCO, and Bhilai also traces to the poor coal stock position, with Bhilai having a week's coal supply and Rourkela 5 days stock. The situation improved by the end of the month of July. There has also been some delay in railway availability for steel despatches as a result of which Rourkela could despatch 77,581 tonnes to saleable steel against a production of 97,474 tonnes in June. The government announced in July a price concession to state small industries corporations which will be supplied steel at Rs. 150 per tonne from the stockyards, involving a loss of Rs. 6 crores for the plants. This will also reduce the dependance of small units on railway movements and enable them to buy a better mix. The government has also under consideration increasing Bokaro's capacity to 4.75 million tonnes at an estimated cost of Rs. 115 crores, going on at the next stage to a further expansion to 5.5 million tonnes. This is an expansion from the first stage of 1.7 million tonnes of ingots and 1.355 million tonnes of saleable steel. Also plans are under consideration for the establishment of the Vishakpatnam steel plant in phases with Soviet assistance. This is part of a long term plan to set up two other port based export oriented plants at Mangalore and Paradeep, whose schedule will depend on their product mix capacity growth of internal and external demand, and availability of financial resources.

Crude: July saw interruption in the supply of petroleum products—HSD and kerosene—in the north, with low stocks and the closure of Hindustan Petroleum Corporation's refinery at Bombay due to a leak in the refinery tower and reduced throughputs in Koyali, Barauni and Cochin refineries. Hence spot purchases were made in the Gulf countries of 100,000 tonnes of HSD and 70,000 tonnes of kerosene. This is essentially due to faulty planning as supplies should be assured to meet a 7–10 per cent growth for the year. From the long term point of view, some important conclusions have been reached on saving and conservation of petroleum products by an expert group set up by the ministry. This Petroleum Conservation Action Group after study of 650 industrial units which consume 2.2 million kilolitres of furnace oil has identified a saving of 318,000 kilolitres through adopting better fuel efficiency practices which would involve a saving of Rs. 55 crores a year. As a result of past recommendations (see Vol VII p 10 and Vol VI p 262) 76,000 kilolitres have been saved (equal to Rs. 7.6 crores) through conservation measures. In the transport sector, in 24 states transport units 6 per cent saving in diesel oil consumption is to be achieved through better fuelling practices, calibration of fuel pumps, better maintanance, improved driving habits, and proper management control resulting in saving 48,000 kilolitres valued at Rs. 6 crores. In the unorganised transport sector which consumes 4.2 million kilolitres, a 2 per cent saving through proper education in diesel economy practices will result in Rs. 11 crores economy. There is a new wick stove designed by the Indian Institute of Petroleum which saves a lot of fuel. The Union ministry estimates that an annual 2 million tonnes of crude oil will be available in 1981-82 as well as 4 million cubic metres per day of associated gas from the Bombay High and Bassein oil fields. By 1983 the south Bassein gas fields will produce 10 million cubic metres of gas per day. The gas which will be available from 1979 will first be used in gas turbines of 4x60 MW for the Maharashtra State Electricity Board at Uran and FCI's Trombay facilities, and by 1981-82 the gas will be used mainly in Trombay fertiliser plants. On July 15, Bombay offshore oil and gas reached on shore consumers through the pipelines—through the Bharat Petroleum Refinery at Trombay and the Tata power station. Currently the oil supply is being maintained at 4 million tonnes a year and will go up to 5 million tonnes in October.

Coal: The poor functioning of coal mines has been referred to earlier. The coal crisis arises from the fact that the demand for coal from Coal India is estimated at 101.5 million tonnes this year, while the actual production last year was 88.6 million tonnes. The industry has to increase production by at least 13 million tonnes this year. The actual production by Coal India during the first quarter of 1978–79 is 3 million tonnes behind the target—20.7 million tonnes against 23.7 million tonnes. Singareni produced 1.9 million tonnes against the target of 2.5 million tonnes. Within Coal India, BCCL and Eastern India are doing badly producing 11 million tonnes against the target of 12.4 million tonnes. BCCL is the main producer of coke and its poor performance is serious. The shortfall in production is due to: (a) shortage of explosives which are being imported and expanded in production internally, (b) large scale absenteeism of mill workers (reaching 58 per cent this year), (c) scarcity of electricity and (d) poor management. In the first six months *of the calendar year, industrial units* all over the country, heavy industry, power plants, cement units and sugar mills etc. have suffered an output loss estimated at Rs. 4,000 crores. The *government is examining the manage*ment side to see if there should be some reorganisation. Coal India and its subsidiaries have been asked to make up the production shortfall of the first quarter and to achieve the target for the year of 113 million tonnes, while the problem of explosives, power and wagons are being coordinated and attended to. To help attain increased production, the function of the department of mines have been turned over to the Geological Survey of India. BCCL reports a 4 point plan to lower the ash content of washed coal to 19-20 per cent. It is installing two big washeries at Sudamadih and Moonidih *with a raw coal feed capacity* of 2 million tonnes. At the end of July Coal India reports that the loading into ships at Haldia for movement to the southern consumption centres had begun and *that by the end of the month* 24,000 tonnes of coal was expected to be despatched in 3 coastal vessels. Another cause for the shortage faced by small consumers which has come to light is *the existence of a large number of ghost* buyers. In Meerut, for example, of 165 units which brought coal, 106 were bogus units which bought the coal and sold it at twice the price. In Calcutta there were 50 bogus customers, in Bombay 1/3 of the stock is cornered by non-existent industries, and this has to be dealt with under the black marketing laws.

Copper and Alumina: Copper production at Khetri complex is also a sad story, functioning at 30 per cent of its rated capacity. Besides low production at the smelter, the quality of the ore, *being extracted at high cost*, is poor. With an annual capacity of 31,000 tonnes, it is producing only 1,113 tonnes per annum, the low production being due to faulty planning, slow execution and lack of proper management. As a result, the cost of mining has been steadily rising from Rs. 115 per tonne in 1975-76, to Rs. 125 crores in 1976-77 and to Rs. 131 per tonne in 1977-78. The mine development has been slow at 340 metres per month compared to 483 metres at Kolihan. By 1983-84 ore production is expected to increase to 27 lakh tonnes but in the meanwhile there will have to be the import of copper *concentrates to feed the smelter.* With regard to alumina, the discovery of the large deposits of bauxite in the coastal districts of Andhra Pradesh and Orissa has sent up the estimate of bauxite from 250 million tonnes in 1973-74 to 2,000 million tonnes in 1978-79. Two feasibility studies have been commissioned in the 2 coastal areas to see if the alumina produced there could *be refined* into aluminium first for internal consumption and later for export. The existing aluminium industry is functioning under a serious handicap due to shortage of power, and so to meet the internal demand aluminium is being imported. The government *is reviewing* the aluminium pricing policy on which a decision will be announced soon, *and along with* it there is need for a new marketing strategy and a new orientation in the use of aluminium for both industrial and household uses.

Sugar and Soda Ash : To meet the problem of the large sugar production of 65 lakh tonnes for the 1977-78 season referred to in the last issue (pp 385-386) the government has decided to build a buffer stock of 12 lakh tonnes, to increase sugar consumption by increasing levy sugar releases from 38 lakh tonnes to 44.3 lakh tonnes and to export 6 5 lakh tonnes. Also credit facilities have been liberalised to cover the additional credit needs of the mills to pay cane growers, and excise rebate are being given to factories which continue crushing beyond April 30. There is also the problem of arrears to cane growers which is posing a serious problem and on which mills have to act. The government has set up a 7 member cabinet sub-committee to go into the various aspects of sugar policy and formulate a solution to the problems faced by the growers, mills and consumers. One of the questions under debate is the dual pricing policy and the question of control vs decontrol. With regard to soda ash used by industrial units in glass, glassware, paper, pulp, textile, sodium silicate and bichromates which is in short supply, the government is planning to import adequate quantities and reduce its import duty so that the price of imported chemical matches the price of the domestic products. The estimated production of soda ash in 1977-78 was 5.5 lakh tonnes against the installed capacity of 7.4 lakh tonnes. There is no reason for the rise in price of soda ash, except speculation and hoarding and hence the import will regulate this anti social element. By 1982-83 its production will go upto 8 lakh tonnes.

Cement and Textiles : The ministry of Industry is seriously examining the suitability of using the public distribution net work for the retail sale of cement as private distributors have not succeeded in getting supplies to users and have allowed cornering to takeplace. In the mean while a meeting of representatives of the Cement Manufacturers Association, Union and state governments and cement distributors meeting on July 10 agreed to give the CMA voluntary distribution scheme a 3 month trial before it is taken over by the public distribution system. Leading industrial houses are entering the cement production field to meet the government's decision to expand cement capacity in both the public and private sector. The Industry ministry has cleared 22 proposals for private sector cement production, of which 15 are by large houses. Also the government has approved additional 7.5 million tonnes capacity in the public sector. With regard to textiles, the Union cabinet sub-committee on textiles has formulated a policy under which controlled cloth production is divided between the private sector mills, NTC mills and handlooms. 37.5 per cent (1,000 million metres) of the total cloth production in the country is to be controlled cloth, with 400 million metres each to be produced by the private sector and NTC mills and 200 million metres by handlooms. This means that the NTC and non-NTC mills will be producing 15 per cent each of the total obligation, and for the first time the handloom sector will be producing 7.5 per cent of its total output as controlled cloth. The new policy is to take effect retrospectively from June 1, 1978, with at least 80 per cent in other than grey cloth. The maximum ex-mill price is to be Rs. 3.60 per metre and the maximum price inclusive of excise is to be Rs 4.50 per metre—representing an increase of Re. 1 per metre of what the consumer will have to pay. This means that in addition to the current subsidy of

Rs. 25 crores to the National Consumer Cooperative Federation (NCCF) for controlled cloth sales, the Union budget will have to provide an additional subsidy of Rs. 30 crores to the NTC. While the private sector mills will for the present be allowed to distribute the cloth through their distribution outlets, the government has reserved the right to require them to distribute the cloth through the 24,000 outlets of the Khadi and Village Industries Commission and NCCF. The government has also reserved the right to make changes in the intersectoral distribution of controlled cloth, after the necessary review of the functioning of the present distribution system.

Newsprint, Tyres and Tubes and Electronics: The newsprint policy announced for the current year liberalises the quota for small and medium newspapers. For all papers, the allotment is increased by 5 per cent over the consumption of 1977–78 and can be further increased for a paper depending on its actual consumption. Small and medium papers can obtain 400 tonnes (up from last year's 300 tonnes) from NEPA or imported varieties. The compulsory quota of NEPA newsprint has been reduced from 25 to 15 per cent for newspapers with an entitlement of over 400 tonnes. Higher wastage compensation is provided for imported newsprint ranging from 8 per cent for the port cities to 10 per cent for newspapers published in the interier. New newspapers will be issued newsprint according to the requirements with a 4 months supply to start with. To deal with the problems faced by the tyre and the tube industry emanating from the June 16, 1976, 25 per cent excise relief scheme to a number of specified cemmodities, the government in July 1978 announced a 12.5 per cent excise relief on tyres and tubes produced in factories which commenced production before April 1, 1976. Those producing after that date will have to pay 25 per cent excise. The relief is for factories with licensed or installed capacity not exceeding 5 lakh tyres and 5 lakh tubes and is restricted to clearances for home consumption upto a maximum of 75 percent of licensed capacity. With regard to the electronics industry, the country's electronics production was over Rs. 500 crores in 1977, representing a growth of 24 per cent. All sub-sectors grew at rates ranging from 13 to 60 per cent, the latter being recorded by computers, controls and instrumentation. In 1977 radio receiver sets production was 3.70 million, with production in the small scale sector surpassing that of large sector. Similary the small scale sector contributed 75 per cent of the 2.4 lakh TV sets (up from 1.5 lakhs in 1976), bringing down its price by Rs. 250. Exports in 1977 rose by 36 per cent from Rs. 27 crores, to Rs. 37 crores comprising consumer electronics (Rs. 8.3 crores), radios (Rs. 11 crores) and computer software (Rs. 2.5 crores).

Agricultural Production: Wheat procurement by mid July crossed 54 lakh tonnes during the current rabi marketing season, compared to 50lakh tonnes procured at the time in the last season. Out of 58 lakh tonnes of market arrivals, private traders not being active, government procurement was above 54 lakh tonnes. Nearly 75 per cent of the procurement was in Punjab (31 lakh tonnes) and Haryana (9 lakh tonnes). Procurement in Uttar Pradesh has been 11.5 lakh tonnes. It is expected that another 10 lakh tonnes will be procured before the marketing season ends. As for the forthcoming kharif crop the good south west monsoons provide indications of another record crop which may surpass the 1977-78 kharif record of 77 million tonnes. Precipitation has been timely and adequate so that sowing was either completed or in full swing by early July. The northern states report proper germination of the kharif seeds and most northern states have set themselves a higher rice target and in some states pulses output is being expanded. States like Punjab, Haryana and West Bengal are poised to exceed their targets, in Bihar, Gujarat, Madhya Pradesh sowing operations and result indicate a crop above that of the last kharif season. In Karnataka, Andhra Pradesh and Kerala and southern Tamil Nadu with well distributed rains, kharif prospects are good. Andhra Pradesh for instance has fixed its grain production target at 98 lakh tonnes (against 1977-78 output of 86.6 lakh tonnes), with kharif rice at 65 lakh tonnes and jowar at 14 lakh tonnes. Kerala estimates an output higher than last year's 5.2 lakh tonnes, and Karnataka having achieved self-sufficiency in cereals, has brought 3 lakh hectares under pulses and oil seeds. In Maharashtra which has set a kharif target of 7.5 lakh tonnes, kharif sowing was completed in July and rainfed cotton sowing started in Vidharaba and Marathwada. In Assam, Meghalaya, Arunachal Pradesh and West Bengal the outlook for both food crops and the two cash crops, jute and tea, is bright. Timely adequate supply of High Yielding Varieties seeds and fertilisers inputs ensure that the crop will be good. If as forecast, the 1978-79 kharif crop exceeds last season's 77 million tonnes, the foodgrain output for the current year could reach the target of 130 million tonnes. Another crop doing well is potatoes which is estimated at 77.87 lakh tonnes against last year's 72.87 lakh tonnes. Haryana, Punjab and Uttar Pradesh, the major potato producing states estimate their total production this year at 44.8 lakh tonnes against last year's 38.5 lakh tonnes. And yet potato prices are at Rs. 45 per quintal above the minimum support price of Rs. 40, so that NAFED, the government purchasing agency, has not had to intervene in the market. On the other hand due to large scale exports, basmati rice has shot up by 100 per cent—from Rs. 4.75 per kg to Rs. 7 50 and even begami rice from Rs. 1.90 to Rs. 3 per kg. However, if the annual growth rate of agriculture continues at the recent 3.98 per cent and food grains at 3.61 per cent compound, India's production of food grains in 1983 will be 142 million to 144.5 million tonnes against a demand of 140.8 to 144.8 million tonnes. Increased irrigation is a key in this policy of expanded and self-sufficient food production involving an increase to 17 million additional hectares in the next 5 years. The Union government has asked the states to set up independent monitoring units to assess the progress of various irrigation projects in the state and set up a similar unit at the project level, with small cells at each of the circles. This will ensure careful and maticulous planning of the details of the projects, advance preparation of construction programmes and full execution. This programme will also involve increasing fertiliser production by 1982-83 to 6 million tonnes, requiring an installed capacity of 7.5 million tonnes against the present production of 2 million tonnes and an installed capacity of 3 million tonnes of nitrogenous fertilisers. Further ICAR is giving pulses and oil seeds research the highest priority with a national research centre to be established in this area. Also priority is being given to increasing and production of oil seeds, pulses, cotton and fibre crops and giving more research emphasis to agricultural energy use and post harvest technology. To increase its production, pulses are being grown in irrigated areas as part of farming rotation, as companion crop and their production in the traditional rainfed areas increased. Rice prices at higher support levels and the principle of parity between the price at which the farmer sells his products and the prices at which he buys the goods he needs are under examination. July saw a serious flood situation in Assam, Bihar, Uttar Pradesh, Madhya Pradesh and Rajasthan involving the loss of over 100 lives, damage to lives of 60 lakh persons, and loss of crores of rupees of crops and properties. One of the urgencies is to set up a flood protection programme for the northern states where the people are visited by this annual calamity. On the negative side, a study by the agricultural university in Uttar Pradesh reports that 83 per cent of all agricultural credits extended to the priority sector by commercial banks in Uttar Pradesh are being cornered by big farmers, who own more than 3 hectares of land. Only 15 per cent of banks loans go to small farmers owning 1–3 hectares, and only 2 per cent to marginal farmers owning less than 1 hectare. This needs to be borne in mind in the implementation of the Reserve Bank of India's directive to the commercial banks to make adequate provision in their annual credit budgets for the energisation of 6 lakh pumpsets during the next 5 years. In making these priority advances and delegating powers to state level officers, the needs of small and marginal farmers should be borne in mind and effectively met.

Exports: For 1977–78, the tentative reckoning is that there is a trade deficit of Rs. 600 crores (against the surplus of of Rs. 72 crores in 1976–77). This was due to the low growth of exports at around 4 per cent compared to the previous year's 27 per cent and an expansion of imports. The deficit also is a reflection of the growth of protectionism in the industrialised countries. Bearing these trends, the government plans to announce in December the cash assistance scheme for exports in 1979-80, to help trade and industry plan their export strategies well in advance and effectively. This together with the liberalised export–import policies and the resurgence of the economy ought to lead to resumption of export growth. Back of a plan for increased exports should be increased production, depending on increased demand and increased investment. Also at the end of July, the Union government set up a committee under the Chairmanship of the cabinet secretary to consider the recommendations made earlier by the Alexander committee (see Vol. VIII, p. 218) on import–export policies and procedures on cash assistance for exports and duty drawbacks. The current year's budget has provided Rs. 232 crores as subsidies for trade development and export and also announced the government decision to reduce the different kinds of subsidies which this year would amount to Rs. 1,150 crores (up from Rs. 117 crores in 1971–72). The Draft Plan also emphasises the need for a sharp reduction in subsidies for which a provision of Rs. 7,400 crores for the 5 year period is made. The Vadilal Dagli Committee is also examining this issue. Plans are under way to increase exports from the small scale sector which exported Rs. 154.99 crores in 1971–72 rising to Rs. 637.45

crores in 1975-76. In some areas like sports and jewellery, 100 per cent of exports are from the small scale sector, cashew kernals (91.75 per cent) tobacco and products (94 per cent), agarbathies (93 per cent), rayon and synthetics (90 per cent), finished leather and leather goods (80 per cent), and woolen hosiery (80 per cent). Engineering goods from the small sector exported now at Rs. 95 crores will increase to Rs. 276 crores by 1980-81 and electronics goods increased from Rs. 16.83 crores to Rs. 27.54 crores. The main thrust now is to increase use of the small industry's capacity to 80 per cent (it was about half of that five years ago). Electronics exports as a whole increased from Rs. 27 crores in 1976 to Rs. 37 crores in 1977, against a total production of Rs. 500 crores. The government is planning to restore cash subsidy on jute goods exports which should be backed up by a modernisation programme in the jute mills industry. Among the invisibles, 1977 recorded the visit of over 1 lakh more of foreign tourists who numbered 6.4 lakhs—which was an increase of 20 per cent compared to the world tourist increase of 11 per cent. United States, West Asia, Japan and Australia accounted for the greater part of tourists. The government in July raised the export floor price of steel to $ 290 a tonne in line with the JPC price of billets (Rs. 1,830 a tonne). The extent to which this would affect the exports depends on Japanese exports to West Asia from which it had withdrawn and where its price is $ 300 a tonne. The government is also giving consideration to the shipping area which faces a series of continuing deficits due to rise in operating costs and the world recession. The industry needs government aid now to meet its capital requirements as well as capital repayments. The government is studying the question of restricting the import of polyster fibre to protect the country's infant industry. The Marathe Committee which has examined this question is finalising its report and is addressing itself to the question of how to protect this nascent industry against low priced imports.

Aid: The Kuwait Fund for Arab Economic Development announced in July a loan of $ 44 millions to finance the Kopily hydro-electric project. The loan is repayable in 25 years, with a five year grace period. Also in July negotiations with the World Bank officials for a $ 196 million loan for the Bombay water and sewerage scheme were concluded. The project will increase the availability of water by 100 million gallons per day and improve the city's sewerage facilities.

International:

Bangladesh: In July, India and Bangladesh ministers held the 15th meeting of the Indo-Bangladesh Joint Rivers Commission to examine the means of augmenting the dry season flow of the Ganges. Agreement could not be reached on the rival plans—India's relating to linking Brahmaputra with the Ganges through canal which will cross Bangladesh, and Bangladesh's plan for bringing in Nepal to build dams on the Ganges flow in the upper reaches of the Ganges. Also in July negotiations were started between the two countries for an air agreement to promote greater traffic by air between the two countries. Bangladesh is also negotiating for road transit facilities from India.

Afghanistan: The first consignment of 16,000 tonnes out of the loan of the 50,000 tonnes of wheat was despatched on July 10. The wheat loan agreement was signed in July and the entire lot will be supplied to Afghanistan by November. The wheat is moved by train from Amritsar to Peshawar from where it is being conveyed to Kabul by trucks.

China: As a result of a visit by the Association of Indian Engineering Industry Trade Mission to China, India will be exporting steel, tubes and pipes, wire ropes and prestressed concrete wires to China. China is also negotiating for Indian exports of oil fields exploration drilling machinery, mining, packaging, transport and material handling equipment. In return China will export to India zinc, mercury and antimony.

World Economy: The 1977 UN World Economic Survey reports that the domestic production of the developing countries increased by 6.3 per cent in 1977, while the recovery of the developed market economies weakened in 1977 compared to 1976. There was a slowdown in world trade which declined from 11 per cent in 1976 to 4 per cent in 1977., The export volume of non-oil exporting developing countries rose only by 3.6 per cent compared to 1 3 per cent in 1976 while the oil exporting developing countries exports did not increase at all. The exports of the developed market economies grew by 4.6 per cent while the exports of the Soviet Union and Eastern Europe increased by 9 per cent. There was a deflationary process at work in the world economy, calling for coordination of demand management policies of the developed market economies. Increase in domestic output and employment was sacrificed to price stability and there was reluctance on the part of Germany and Japan to lesson their dependence on export led growth. Hence there was a general air of uncertainty.

UNCTAD and GATT: Government experts from developing and developed countries began a 2 week meeting of UNCTAD in Geneva in July. For the 30 least developed countries the income gap dividing them from other developing countries has been growing, according to the UNCTAD report. Taking the decade as a whole, the average annual economic growth rate of the developing countries has been 2.7 per cent and the average per capital GDP was $ 491. For the least developed countries the per capita GDP was $ 135, the annual growth rate 0.6 per cent and for 11 of them there was a decline There is need for a major international effort to help the group expand their exports and cut their dependence on aid-Official Development Assistance and that from multilateral agencies like the World Bank was $ 2.2 billion—which was less than half of the United Nations Decade target. The developing countries attacked a document worked out by United States, East European countries and Japan at the General Agreement on Trade and Tariffs (GATT) negotiations. The document is to be discussed at the Bonn summit and has been drawn up without consultation with the developing countries who want an expansion of agricultural trade, particularly that of tropical product exports. As a result, the developed countries agreed to extend their deadline at GATT on agreement on measures to stabilise the functioning of international markets in industrial commodities.

Bonn Summit: The fourth meeting of the Heads of States or Governments of the Big Seven (United states, Canada, Japan, Germany, United Kingdom, France and Italy) was held in July in Bonn and agreed upon a minimum programme to correct distortions in trade, and payments which have held back the expansion of the world economy. The minimum programme comprises: (a) United States cutting down oil imports and slowing down its growth rate in oil consumption through higher prices, (b) West Germany to boost domestic demand through some reflationary fiscal and monetary policies, (c) Japan promising to examine in a couple of months measures to expand domestic demand for imports via a supplementary budget and (d) more generally in countries whose balance of payment situation and inflation rate do not impose special restrictions, a policy involving faster rise in domestic demand to be followed, while in countries where rising prices and costs are creating strong pressures, anti-inflationary action is to be taken. The agreement has two gaps. These countries have large increased capacities such as the 17 million unemployed in the OECD countries and while the overall inflation rate of the countries have been halved, the US inflation rate is high, leading to protectionist policies in United States and the industrialised countries. West Germany and Japan however recognised that if they expanded their domestic demand by 1 per cent of their GNP this year, West Germany's GNP will go up by 2.01 per cent and Japan by 1.85 per cent (because of the multiplier effect) and if these 2 export led growth countries allowed imports into their economies to meet this small increased domestic demand, then there would be a great revival in world trade. The second problem is that the meeting did not formulate a liberalised trade policy for the developing countries on the continuing deadlock as the GATT negotiations demonstrate.

United Nations Disarmament Conference: The United Nations Conference on Disarmament concluded on June 30 after 5 weeks. The consensus document it adopted as a result of extensive discussion and negotiations was a diluted and weak statement of generalities, as the major nuclear powers were not willing to accept a concrete programme of nuclear disarmament where this vital disarmament programme—vital for the preservation of the human race—should start. The conference agreed to establish a disarmament commission composed of all the 149 member states of the United Nations to continue the discussions on disarmament. Also the Geneva disarmament groups' functioning is to be changed with the removal of the dominating roles in it of the US and USSR through throwing open the Chairmanships of the committee to all countries on a rotating basis. This poor performance is recorded at a time when according to SIPRI and the US disarmament agency, the world is spending \$ 400 billion a year on armament, with the developing countries being the main buyers of the armaments.

International Irrigation: The International Congress on Irrigation and Drainage meeting in June in Athens recommended a transfer of surplus water from one region to another to meet the drinking water and irrigation needs of the people. It noted that US, China, USSR are engaged in discussion and experimentation on the transfer of surplus water across the basins and the proper use of surplus waters for drinking and irrigating purposes. For India this programme would mean relieving the country from continuing reliance on the vagaries of the monsoons.

World Food: The International Wheat Council raised its preliminary estimates of world wheat production in 1978 from 395 to 405 million tonnes to 400–410 million tonnes and the 1977 production of 385 million tonnes. World wheat trade, excluding intra EEC trade, is estimated at 65–69 million tonnes compared to 70.5 million tonnes in 1977. The reduction is due to the fall in requirements of USSR and EEC. US crop prospects are good and in the USSR the wheat crop is expected to be 100 million tonnes compared to last year's 92 million tonnes.

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II Agricultural Development

Paddy and Other Crops:

In July with the copious rains of the south west monsoon, the pre–samba kuruvai season is in full swing, the paddy sowings being completed in Thanjavur, Tiruchirapalli, Tirunelveli and South Arcot districts. The kuruvai paddy in the state is the small crop compared to the rabi crop but the kuruvai prospects are good and encouraging. During the current season, the Department has introduced an improved technique for raising seedlings. In place of pulling them up, carrying them in small bundles and replanting them, nurseries are being laid out in a small area of 20 square metres with fragmented 2 metres x 1 metre polythene lined beds in which soil manure mixture along with limited quantities of NPK and DDT into which seeds pretested with micro nutrients and anti–biotics are planted. With the watering of the seeds and the spouting of seedlings, when the latter have reached the usual height, the polythene bed is rolled up and transported to the field for transplanting. Through this technique, there has been the growing of more reliable seedlings and a great deal of saving of water, particularly in water scarce areas or where water has to be saved for the later stages of growth of the paddy crop. During the current season, while in Tirunelveli and southern districts ASD-1 is generally being grown, in Chingleput, North and South Arcot districts a new variety AS–3827 developed by the Ambasamudram Paddy Experimental Station is growing popular. It was widely used successfully in the last pishanám season (October–March) in Navarai in Chingleput (October–February) and Samba in Thanjavur (July–October). This year during the sornavari season, AS–3827 is being used and is coming up satisfactorily with strong resistance to all forms of pests and diseases. In order to accelerate the paddy production programme, the ground rules for energising agricultural pumpsets have been reviewed and changed. Hitherto a 10 per cent return on gross investment was required, so that in granting energisation of a pumpset its remunerative aspects was given prominence. This led to a good deal of manipulation and some favouritism and corruption, with farmers in a position to influence the officials in various ways being able to secure approval of their applications, superseeding those who had priority because of their earlier application or because they belonged to the small or marginal farmer groups. Under the revised rules as when and applications are received they are to be registered and serial numbers given to them and this priority listing which is to be publicly listed on the notice boards of divisional offices is to be strictly followed, with preference being given to special cases covered by IDA, LDB, REC and ARDC. The total number of applicants for energisation of pumpsets as of October 1, 1977 was 2.17 lakhs since when no fresh applications were entertained. This rule too has been dropped and fresh applications are being entertained. A special effort is being made in the state to cultivate jute. 50,000 acres in the districts of Thanjavur, Tiruchirapalli and Tirunelveli could be brought under jute cultivation. From the point of view of adaptability, mesta has an advantage over jute in that it can be grown in different types of soil ranging from clay to sandy loam. In the next 10 years jute goods demand will expand so that an additional amount of 15 lakh bales of jute and mesta fibre will be required. On the basis of an yield of 5 bales of mesta per hectare, 3 lakh hectares of additional land will be necessary for growing 15 lakh bales of mesta. At present mesta is under cultivation over 3.5 lakh hectares. The state can contribute from 50,000 to 60,000 hectares to this objective, starting now with 20,000 hectares. Another crop which is coming up plentifully is the new variety of chillies—MDU - 1 which is performing better than the traditional varieties K-1 and K-2 because the new variety bears the chillies in large clusters unlike the latter which are single fruit bearing on each branch. Because of its heavier yield, the farmer growing this variety earns Rs. 1,300 more per hectare compared to that from the older varieties.

Research Results:

Among the bio-fertilisers, Azolla has emerged as an important one for the paddy crop as it fixes atmospheric nitrogen to the soil and enriches it. Introducing Azolla in one acre of paddy enables 4 tonnes of green manure to be obtained, giving 12 kg of nitrogen for the paddy crop. If there is adequate sunlight, it multiplies in a standing paddy crop to twice the quantity in a week's time. By allowing 100 kg of Azolla during the samba and thaladi season and using an intercultivator, nearly 3 tonnes of green manure is obtained. In the Paddy Experiment Station, Aduthurai 54 collections were experimented on and it was found that Azolla from the Thirunallar region was heat tolerant even at 38° centigrade and increased sizeably the paddy output. It can also be cultivated during the one fallow month following the June to October kuruvai season. Azolla can also be used as green forage for livestock and its high protein content of 13 per cent is a valuable intake for livestock. During the winter months 3 tonnes can be obtained from one acre in the course of

2 months. In general legumes help in the greater production of pulses, enrich the organic content of the soil and nitrogen *in it. The amount of nitrogen left* by different legumes to enrich succeeding crops varies from 50 kg. to 250 kg. per hectare. Research has shown the importance of rhizobium innoculation. In IARI black gram and bengal gram increased their nitrogen excretion 10-15 times as a result of such innoculations, which are being popularized among farmers. Another research area yielding results is the coordinated project in post harvest technology centred in Coimbatore and 9 other centres in the country. The Coimbatore research has shown *that in the* comb and drum type of groundnut strippers, the drum type whose outturn is 15 kg per hour is more economical. Also the losses from pests in the storage of harvested grain can be reduced by use of neem leaf powder which solves the insect infestation problem. HYV paddy does better in milling, giving 56 to 74 per cent head yield compared to the 38-56 per cent of the traditional varieties. The use of a solar dryer on Jaya paddy reduces the moisture level from 21 to 12 per cent in 6 hours, involving 800 kg of paddy. A sun drying rack dried the grain 25 per cent faster than the traditional drying on the ground. Also at Coimbatore a *bullock drawn groundnut digger* covered a hectare at the cost of Rs 54, saving Rs. 18 which the conventional method would have cost. A metal bin dryer reduced the moisture content of the pods from 29 to 9 per cent in 12 hours at a cost of 50 paise per kg. These are the start of the research in post harvest technology, an area which will have to pay concentrated attention to problems of poor harvest handling of crops, poor attention to processing and curing, and unsound storage practices from which anything upto 10 per cent of the annual food grain output is lost to the people and the country.

Animal Husbandry :

The state government jointly with the government of Kerala has proposed for the Union government's approval a disease free zone for livestock in 18 districts in the 2 states at a cost of Rs. 42 crores. The 8 districts in this state to be covered by the project are Thanjavur, Pudukottai, Tiruchirapalli, Coimbatore, Madurai, Ramanathapuram, Tirunelveli and Kanyakumari. Bounded by the Cauvery river in the north and by the sea on the other sides, the districts are in an advantageous position in that these boundaries constitute a natural barrier against infiltration of disease causing organisms, along with the absence of contagious bovine pleuro pneumonia, the low incidence of foot and mouth disease and rinderpest. The area is also an intensive cross breeding area where 40 per cent of the cattle is being replaced by cross bred animals, utilising modern breeding techniques. Also the area will develop into an export pocket of superior animal products of hygienically acceptable quality in relation to foreign marketing needs and demand. In time the whole 10 *million cattle in these districts* will be free from contagious diseases. Also a buffer zone of 50 kms length from the border of the disease free zone is to be created and all the cattle in this zone will be protected against foot and mouth diseases through biannual vaccination and rinderpest through annual vaccination. Ten quarantive stations will be established along the borders of the zone. Migrating animals will be quarantined for a fortnight, when they will be vaccinated against the 2 diseases and branded and certified before being allowed to enter the disease free zone. On the dairy front, the Indian Dairy Development Corporation has sanctioned Rs. 136.20 lakhs for Tamil Nadu, so that the Tamil Nadu Dairy Development Corporation's milk chilling centres, at Tiruppur, Acharapakkam, Baluchetti-chatram, Srivilliputtur and Sankarankoil may be expanded, a new centre started at Villupuram, and 19 more vans bought for purchase and distribution of milk. The state has already spent Rs.9 crores given by IDDC for increasing milk supply in the urban areas. There are plans for setting 4 further chilling centres at Sethiope, Tiruvallur, Neyveli and Chinna Salem when IDDC makes available the necessary funds.

Fish Farming:

A proposal (made by a team of FAO experts) to improve the operational efficiency of the fishermen in the state at a cost of Rs. 72.6 lakhs is under study by the government. The project will be organising trials on modernising the craft and gear of the traditional fishermen and enhancing their operational calibre, all of which will increase the landings of these fishermen and their income. Another fishery project under consideration is that for opening approximately 750 retail fish marketing depots in the state in a phased manner in the next 18 months with the financial help of the Repatriates Bank. Under this project, 1,000 repatriates will be employed, 750 as salesman in the fish depots on a commission basis and the rest for procurement of fish and allied tasks. The Tamil Nadu Fisheries Corporation will arrange supply of fish to all the depots at reasonable prices. In the Department, there is also study of Rs. 3 lakh scheme for subsidising manufacture or purchase of types of net other than travel nets by marine fishermen. A 25 per cent subsidy on the total cost of nets for the gear like purseseine, mid water trawl, gill net and purch trap will diversify the fishing industry and exploit the available sources fully.

Tea:

In July discussion centred around the government decision not to abolish the Rs. 5 per kg export duty on tea. The tea board estimates that the production in 1978 will not reach the target of 600 million kg, nor the 1977 production of 560 million kgs. In the first 4 months, tea production this year was down by 4.4 million kg compared to the production in the first four months of 1977. In May and June there was a little pick up, production for the year will be lower—some estimates placing it at around 500 million kg. As for exports, the tea trade estimates that the target of 225 million kgs will not be reached. The trade reports that in April 1978, 6.23 million kgs were exported compared to 7.15 million kgs in April 1977 and the earning was Rs. 12.74 crores compared to last year's April Rs. 18.98 crores. It points out that the unit value of tea has fallen from Rs. 26.53 per kg to Rs. 20.44 per kg which justifies removal of the export duty. Exports from South India in May 1978 was 3.7 million kg against 6.6 million kg in May 1977. The cumulative exports from January—May fell from last year's 25 million kg to 16.9 million kg. United Kingdom buying has declined from 3.85 million kg to 1.22 lakh kg, United States from 5 millions to 0.4 million kg during the period January to May 1977 and in 1978. London prices have fallen from 130 pence per kg to 118.50 pence per kg. The trade also reports that overseas enquiries have dried up, that producers and shippers find no incentive because the net average price realisation for Indian tea in London auctions are below their prime cost for many efficiently managed gardens and Sri Lanka and Kenya will capture Indian markets. The trade holds that exports for the current year will be 150 million kg compared to 220 million kg in 1977. This means that the domestic retention of tea will be of the order of 400 million kg compared to 1977 internal supply of 340 million kg which will lead to a complete collapse of internal tea prices. On the other hand, the Union Minister of Commerce points to the FAO estimate that the demand for tea in 1978 will be 697 million kg while the world supply will be only 685 million kg, which will lead to a rise in tea prices within the next 3 or 4 months. He is of the view that the decrease in exports has been arranged by the trade to force the abolition of the export duty on tea and to take advantage of future higher prices. The minister in April announced on export target of 235 to 240 million kg for 1978, provided the production touched 600 million kg. Now since the production will be less by 30 to 100 million kg of the assured 600 million kg, the government's export ceiling is bound to be lowered. As for the danger of Sri Lanka tea replacing Indian, the government points out that there is a poor crop in most other countries including Sri Lanka. Meanwhile the government calls attention to the wholesale and retail prices of tea rising from Rs. 8 to Rs. 10 and Rs. 12 to Rs. 14 per kg and the need to bring down domestic prices. In other words, the government case for continuing the export duty is its expectation of a fall in current year's production. This may be in part true but there is a case for some reduction in the export duty until such time as prices rise again.

Rubber :

The government announced its decision in mid July to permit import of 25,000 tonnes of rubber in view of its rising prices. Thus almost over night, the surplus situation in rubber, with exports of that commodity from the country has been turned around. Kerala government and the rubber growers protested this decision and made strong representations against it to the Union government because the import may further bring down the price of rubber domestically. The government has assured the growers (1,00,000 small and medium ones on whom another 2,00,000 are dependent) that if the import lowers prices or is above the domestic rubber price, it will be discontinued. In light of the assurance of the Kerala government and rubber growers to bring down prices to Rs. 1,000 per quintal, the government on July 29 deferred its decision to import rubber.

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III Industrial Development

Neyveli :

The first bucket wheel excavator made in the country by Southern Structurals, with West German collaboration, was made available to Neyveli Lignite Corporation at the end of July, costing Rs. 2 crores. The excavator will be used by Neyveli for its mining operations. Neyveli will have 7 excavators for its second mine and the equipment delivered is above average quality. About 40 to 50 per cent of the parts are manufactured indigenously.

BHEL :

Bharat Heavy Electricals Limited's 100 ancillary industrial units in Thuvakudi-Tiruverambur industrial belt reopened on July 7 on the basis of agreement between the workers and the managers of the units. The management of the units have agreed to implement all the labour laws in the interest of smooth and effective functioning of their units and meeting their commitments to BHEL. BHEL also reports establishment of plans to improve the physical and financial performance of the two factories in Bangalore—Mysore Porcelain (MPL) and Radio and Electrical Manufacturing (Remco) — which were taken over by it in 1976 (see Vol. VI, p. 386). The losses involving items have been dropped and new items which add to the profitability of the factories have been taken on as a result of which an increase of 87 per cent production in 1977-78 over the previous year was recorded by MPL and a marginal profit against the previous year's losses. For the current year production will be Rs. 10.2 crores and profit Rs. 75 lakhs. MPL is concentrating on import substitution. REMCO also has had operational improvements in existing product lines along with introduction of new products. A record output of 4.5 lakh single phase meters in 1977-78 is reported and this is being increased to 5 lakh single phase metres and 50,000 polyphase metres in 1978-79. The contribution of the new products is estimated for this year at Rs. 2.71 crores.

Hindustan Photo Films :

Hindustan Photo Films started in July direct sales of photo, cine, X-ray items to the dealers and consumers in place of the distribution of its products through four agents, as happened till then. The entire marketing of its products will be done by its seven depots and four regional offices. Also the company's participation in the Photo and Cine Fair in Cologne in 1976 has brought export orders from US (black and white films), Pakistan (cine films), Sri Lanka and Bangladesh (X-ray films and photo paper), West Germany and German Democratic Republic (Silver nitrate) and Nepal (photographic meterials).

Southern Structurals :

Southern Structurals engaged in manufacturing electrical overhead cranes and mining equipment is yet to be nationalised as decided by the government in 1975, and on which the Assembly adopted legislation which has not yet obtained the President's assent. The state government is considering whether fresh legislation should be undertaken on this matter in the coming session of the legislature. The annual turnover of the company for the last year was Rs. 5 crores as against Rs. 2 crores in 1972-73.

SPIC :

SPIC reports that its fertiliser production was 4.26 lakh tonnes in 1977-78, crossing the 1 million tonnes mark since it started production in 1975-76. It also *did not for the first time incur any financial* loss in 1977-78, for which year it registered a cash accrual of Rs. 5 crores. The capacity utilisation of ammonia was 66 per cent, a 20 per cent improvement over the previous year and the highest daily production attained in September 1977 at 1,054 tonnes against the installed capacity of 1,100 tonnes a day. The urea plant was working at 73 per cent capacity due to unavailability of ammonia. The phosphatic group of plants started production in November 1977 only, though the daily rated production had reached a maximum of 109-115 per cent of the design. SPIC is now creating fertiliser dumps in Tiruchirapalli to transport fertilisers by broad gauge wagons. Also fertilisers are being transported by ship to Andhra Pradesh. Its Rs. 30 crores accumulated interest liabilities to banks and financial institutions have been frozen so that no further interest liability can be incurred and the liabilities met as the firm becomes viable. A consortium of financial institutions and banks have *agreed to reduce the interest rates for* its term loans to 8 per cent for financial institutions and 11.5 per cent for banks for working capital loans from 14.5 to 14 per cent. It is importing ammonia and phosphoric acid at cheaper prices than the local production rates to augment and diversify its fertilisers output.

Neyveli Building Materials:

Neyveli engineers report that with a grant of Rs. 2.10 lakhs from the National Building Organisation, the fly ash from the Neyveli lignite mine has been used to make bricks and building material with which 12 houses are being constructed, 8 of which are completed. The 600 MW thermal station produces one lakh tonnes of waste fly ash a year and *this fly ash along with* gypsum collected from the waste material of a nearby ceramics factory and lime are used to make the bricks (92 per cent fly ash, 4.5 per cent lime and 3.5 per cent gypsum). The bricks compare favourably with chamber bricks and are cheaper. Besides brick making, the fly ash is also used in concrete, construction mortar, plastering mortar and RCC, with 35 per cent fly ash replacing cement. The NLC engineers have put fly ash to use in constructing houses, pre cast RC frames for doors and windows, pre cast ribbed slab roofing and fly ash flooring.

Rice Mills:

The proposal of the state government to take over rice mills in the state to ensure their modernisation and prevent misuse ot their resources is under debate. The mills concerned oppose the proposal on the grounds that it is opposed to the Draft Plan policy of promoting small and tiny industries, that the mills, being small agro rural units, require personal interest and supervision and not high level technology, that it would discourage investment in the sector and the installing of *improved machinery* and use of scientific methods by the mill owners to achieve greater output and quality and that the government had the powers to check erring mills in any malpractices they *may* be involved in. The discussion is good as it puts the mills on guard with regard to their modernisation and honest and effective functioning.

NTC:

The Tamil Nadu and Pondicherry unit of the National Textile Corporation reports that all 14 sick textile mills taken–over since 1974 and modernised at a cost of Rs. 12 crores had turned the corner, with capacity use at 95 per cent. A corporate plan for each of the 14 mills has been prepared for IDBI financing of their continuing modernisation. A processing factory attached to Bharathi Mills, Pondicherry will enable NTC to introduce the latest designs to meet customer's demands. Yarn production is being diversified and hosiery yarn is being produced and plans for producing of sewing thread established. Cloth production has increased from 160.80 lakh metres (Rs. 443 lakhs) in 1974-75 to 230.98 lakh metres (Rs. 1,059.53 lakhs) in 1977-78. Yarn production which was limited to 30 and 40 counts has now moved to finer yarns of 60 counts and its production is 120.74 lakh kgs. The sale of cloth increased from Rs. 280.35 lakhs to Rs. 968.47 lakhs and yarn from Rs. 2,333.98 lakhs to Rs. 3,335.33 lakhs. As a result of modernisation, the spindle point production has increased from 52.45 grammes in 1970 to 72.7 grammes in May 1978 and the mills have switched from selling grey cloth to polyster blended varieties of shirting, sarees and cotton dress materials. Terry wool suiting are to be produced and the yarn depots at Salem, Madurai, Kadayanallur, Coimbatore and Erode are establishing direct contacts with handloom weavers. In 1976-77 this NTC unit's exports were Rs. 289.68 lakhs of cloth and Rs. 93.68 lakhs of yarn. It has also adopted weaver villages in Salem and Coimbatore for providing weavers with technical assistance and marketing facilities.

Hosur and Small Units Problems:

SIPCOT is spending Rs. 23 lakhs on improvement of the Zuzuvadi industrial complex at Hosur during 1978-79 of which Rs. 15 lakhs is for civic works and the balance for water supply improvement. Also out of the Rs. 210 lakhs given as capital subsidy for the industries in the state from the Union government, Rs. 65 lakhs is being used as capital subsidy for the industrial units at Hosur. The 110 KW substation at Hosur is being completed and will be commissioned by March next. The estate itself was occupied by ancillary and small scale industries in August. The estate has 41 developed plots and 30 industrial sheds, each shed costing Rs. 1 lakh, of which already 30 plots and 24 sheds have been allotted to various units. With regard to the small units problems, the growing sickness in this sector in the state is giving concern to the government which has asked commercial banks to pay special attention to these sickness causes and deal with them with some flexibility in the overall interest of the state's economy. For this purpose the government has asked commercial banks to speed up opening of new rural branches. The branch expansion in most of rural areas in Tamil Nadu is slower, against a branch for 19,000 of population in the rural areas for the southern region, Tamil Nadu has a branch for a population of 21,000. There are also interdistrict disparities, the districts of South Arcot, North Arcot Dharmapuri, Pudukottai, Tiruchirapalli being the most under-banked ones. The state ministry of finance has set up a cell for dealing with banks problems and the cell in consultation with the lead banks and the district collector is drawing up a minimum programme of branch expansion in the rural areas of the districts.

TIDCO :

TIDCO reports that a public sector Rs. 8 crores rolling mill is to be set up at the Tamil Nadu Steels, Arkonam to undertake production of special steel billets as a means also of diversifying the Arkonam units. Another public sector project is a Rs. 1.66 crores asbestos cement plant at Alangulam with a 36,000 tonnes per annum capacity. In April Rs. 2 crores magnesium metal plant to be operated in collaboration with CECCRI and NRDC was approved. TIDCO will also be used by the state government to set up a newsprint project at a capital cost of Rs. 100 crores, using sugarcane bagasse as raw material. It reports that the first kiln of the Rs. 29 crores 5 lakh tonnes capacity Ariyalur cement project in the Tiruchirapalli district will be commissioned in September as scheduled. Also an alloy foundry unit at a cost of Rs. 1.20 crores is being located in the Hosur complex. A joint sector unit in cooperation with the Handloom Weavers Cooperative Society—Co-optex—for the manufacture of napthols and fast colour bases needed by the handloom weavers at Cuddalore at a cost of Rs. 3.5 crores is being established.

Handlooms :

The spindage capacity mainly in the weavers cooperative mills sector is to be increased by one million over the next 5 years in order to make yarn available to handloom weavers at reasonable prices. At the all India level, the study team headed by Mr Hate has made this recommendation and others. The total credit requirement for the handloom sector as a whole is estimated at Rs. 600 crores over the next 5 years, including Rs. 240 crores for the cooperative sector. It has recommended a time bound programme of revitalisation of dormant societies as well as a provision of consumption loan for handloom weavers, which will remove one of the causes making for dormancy. Also provision of credit to apex marketing societies for export marketing has been recommended to improve marketing facilities and also the provision of managerial subsidy to handloom cooperative and rationalisation of interest rate structure. The efforts taken to increase raw material supply, ensure organisational improvement and toning up of marketing set up has started showing results in improved and stable production. Also the Hate committee recommendation to raise the credit limit for silk and all silk weavers from Rs. 2,000 to Rs. 5,000 per loom to meet the increased working capital requirement for using manmade and mixed fibers has been accepted by the Union government.

Leather :

July reports from the Export Promotion Council for Finished Leather and Leather Manufacturers are that leather exports rose by 6 per cent during the first 2 months of the current financial year at Rs. 46.63 crores (compared to Rs. 43.915 crores in April-May 1977). Commoditywise exports of ET tanned hides fell from Rs. 15.52 crores to Rs. 12.73 crores (17 per cent), that of wet blue chrome from Rs. 8.12 crores to Rs. 5.82 crores (28 per cent), while the export of finished leather recorded a sharp rise of 52 per cent from Rs. 14.69 crores to Rs. 22.37 crores. The total exports of leather goods rose from Rs. 95.75 to Rs. 150.51 crores (58 per cent), with a great increase of 382 per cent in leather garments. In this connection, the finding of the ECA expert was the country could earn an additional Rs. 2.5 crores from its sales of hides and skins if there were better handling and collection methods, which involve better slaughter houses. At present about 2 million pieces are lost each year and the loss through wastage of other byproducts of slaughtered animals is of the order of Rs. 50 to 60 crores. The two criticisms of the expert refer to our reliance for bovine hides on the dead and fallen animals and the slaughter houses not paying attention to their by-products—such as hides and skins. To counter these, it is proposed to spend Rs. 17.5 crores to build new slaughter houses starting with Bangalore, Hyderabad, Calcutta and Delhi, and improve existing slaughter houses at the rate of Rs. 50,000 per town.

Private Sector Reports :

MALCO's report for 1977 shows another year of no profit but one of no loss also, with a cash surplus of Rs. 30.55 lakhs which is inadequate for the provision of depreciation of Rs. 1.9 crores. The arrears of depreciation for 1975 and 1976 were cleared, reducing the reserves from Rs. 6.01 crores to Rs. 2.50 crores. Upto 1977, the company suffered severely from electricity shortage and from 1978 the government supplied it with 7 MVA which will enable it to maintain production at the rate of 23,000 tonnes per annum. In order to become viable, the company is diversifying its products through the manufacture of Aluminium Extrusions at the rate of 2,000 tonnes per annum, of continuous cast sheets at the rate of 7,000 tonnes per annum and the expansion of the alumina plant from 120 tonnes per day to 140 tonnes per day. The company proposes to install cold rolling mills with allied facilities for the production of cold rolled sheets for which continuous cast sheets will form the stock. The capital expenditure for this will be Rs. 3 crores. The company will expand its aluminium production to 31,000 tonnes per annum as its immediate goal.

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IV Education, Science and Health

Education Reform :

The major development in July in the area of educational reform was the meeting of ministers of education in Delhi on educational policy and the educational structure. The meeting decided that in place of continuing the numerical debate of the school and college structure (10+2+3 or 8+4+3), the structure should be elementary, secondary and higher secondary stages and the undergraduate stage of 3 years or a 2 year pass and 3 year honours. The universalisation of elementary education and a massive programme of non-formal education as parts of it, special efforts for the enrolment of girls, scheduled caste and scheduled tribe students providing the necessary incentives such, as midday meals, uniforms, attendance scholarships etc., were further decisions. Private donations for school improvement should be attracted by making such donations tax exempt. The highest priority was given to adult education and the role of sports and yoga in the development of education was recognised. Physical education and arts should be part of the curriculum. The three language formula and education through the regional language were reaffirmed. On this basis a draft national policy on education was approved which after further work will be placed before the Parliament. In late July, 8 states at Culcutta made a strong plea to return education from the concurrent to the state list. NCERT announced that it has started work on a suitable school curiculum for socially useful productive work on the basis of the Ishwarbai Patel and Adiseshiah reports. Accordingly the NCERT is concentrating on preparing revised school text books, in addition to the 142 school text books it had brough out for the current year's academic session. The regional colleges of education are to be developed as regional centres of education to help the states in the twin priorities-universalising elementary education, the national adult education programme, together with the vocationalisation of secondary education. The updating of teachers is a continuous task which NCERT and its regional colleges will be helping the states to undertake. The state goverment approved in July a further list of 75 high schools in the state to be upgraded as higher secondary schools and extended the last date of admission of students to higher secondary to August 31. It announced that out of 90,000 students admitted to Plus 2 course, 19,000 have chosen the vocational stream. The age of admission to this stage has been revised from 15 completed years which will still hold except where a student has been given exemption in the 1-10 years which will continue into the 11th class. For other underaged children, exemption upto 6 months can be granted by the District Educational Officer or Inspecting Officer of the Department. In July an ordinance was promulgated to change the name of Madurai University to Kamaraj University to perpetuate the memory of Mr Kamaraj. The Vice-Chancellors of the 17 Uttar Pradesh Universities have recommended that the admission of students in undergraduate classes depend on the student securing 55 per cent marks, that no student should be a regular student of the university beyond 7 years, that student with criminal or anti-social records should be denied admission and those guilty of violence should be expelled, that students who fail in the examination in undergraduate or postgraduate classes, should be allowed to continue as private students, that 30 per cent of seats in a university should be reserved for scheduled caste, scheduled tribes and backward class candidates with 33 per cent as admission requirement and that elections to student unions should be indirect. These recommendations are under discussion by the public and students and teachers in Uttar Pradesh, some of which do not seem sound.

Adult Education and Mass Media:

The Regional Directorate of Workers Education is organising functional adult literacy courses for workers of plantation and textile industries during the present year under NAEP. The Directorate is also organising safety courses for industrial workers in collaboration with the factories department of the state. AIR announced in July that a 10 KW medium wave transmitter is to be installed in Madurai and the Radio Station will start broadcasting from 1981. The construction of the station will start at the end of the year. Four more powerful transmitters are to be set up at Delhi, Nagpur, Bangalore and Great Nicobar Islands for use exclusively of national programme, releasing time by the existing stations to exploit local talent. Also a transmitter is to be established in each district and the necessary frequency allocation has been made by the International Union of Telecommunication Engineers. India has also reserved space for 2 geo-stationary satellites. AIR broadcasts now cover 92.5 per cent of the country and long term plans have been made for developing 4 channels.

Technical Education :

In July at long last Presidential assent to the Perarignar Anna University of Technology was announced and the bill on the university comes into force on July 23. The university comprises the College of Engineering, Guindy, the 4 departments of the A.C. College of Technology of the University of Madras and the Madras Institute of Technology, Chrompet—as a unitary university. Now the Vice-Chancellor and the Registrar of the new university should be appointed and action should be started on operating the university. The Regional Engineering College, Tiruchirapalli did well in the BE examination, the first seven ranks, one in each of the seven branches of the college, have been secured by the college. It has also scored 100 per cent passes in 5 branches and the overall aggregate was 97 per cent passes. The Technical Teachers Training Institute, Madras has introduced from this year modular courses in education technology, industrial training pedagogy, teaching—learning practices and educational management. The teachers are free to choose any module according to training needs. Each modular course is of 3 months' duration. For earning a diploma, a teacher trainee has to complete 3 modular courses. Also the duration for the diploma in technical teacher training has been reduced from one and a half to one year without any sacrifice of contents. To check corrupt practices, the state government has evolved a strict code of regulation for streamlining admissions to the Industrial Training Institutes. Aptitude tests will be conducted for admission to 19 engineering trades The non-cultural test evolved by ILO and the Union government will be used for admission to 6,410 seats or 87 per cent of engineering trades seats. While not all applicants who fulfil the requisite academic criteria will be called for the test, marks scored in this test and marks obtained in science and mathematics at the SSLC examination would alone form the basis for admission. For the non-engineering trades, admission would be based on marks at the SSLC examination. In July some confusion was caused among 100 senior nurses in various hospitals with regard to a government's alleged requirement to pass a Tamil test. The question is complex as the order traces back to 1956 when the requirement for nurses to learn another language and Tamil was continuously changed, giving them time to pass the test and requiring those who did not to return their increments. The latter requirement cannot be made retrospective and nurses should be given time till 1980 to learn Tamil. In July, the teachers of the Tamil Nadu Agricultural University went on mass casual leave with regard to their conditions of pay and allowancess but suspended their decision to strike awaiting the decision of the Chief Minister and the Board of Management on the issues that they have raised. It is reported that all graduates of the university are absorbed by the government department; an additional 210 B.Sc (Agricultural) graduates are needed for the vocational plus 2 courses.

Science :

The Central Glass and Ceramic Research Institute, Calcutta has designed a process and assigned it to the National Research Development Corporation for making bricks with alumina content ranging from 70 to 95 per cent from indigenous raw materials like bauxite, diastone, technical alumina and other materials and can be produced through factory plants. The Sanjdeep Engineering Enterprises, Bangalore has designed and erected a cement handling plant for transporting loose cement arriving in rail wagons to the two silos at the Kalinadi hydro electric works by means of a 30 metre screw conveyor and a 7.5 metre cross conveyor. The Central Water and Power Research Station at Pune has developed according to UNDP into one of the ten best research centres in the world. Starting with iriculture (irrigation system for agriculture), it has developed research capabilities for cooling systems for thermal stations, river and canal projects, construction of ports, ship model testing etc. It has on hand 476 sponsored projects. There are also plans to have a number of micro processors as data acquisition systems and front end processors. In Madras University, an institute of Polymer Science has been launched to carryout basic studies in bio and synthetic polymers, make available advance testing facilities to industry and establishments, organise and conduct courses in polymer technology at diploma, undergraduate and postgraduate levels, and train persons for polymer, elastrom fibre, surface coatings and adhesive manufacturing industries, develop, dessiminate and assimilate technology till now not available in the country in relation to manmade fibres, and promote horizontal transfer of technology between the university, research institutions and the industry. India plans to acquire a geostationary satellite to help forecast cyclones and other weather phonomena 24 hours in advance. The satellite is to be put in orbit in 1980 and initial tests completed in 1981. The US now sends India weather pictures from its satellites twice a day but they do not keep a close watch on events and some of the pictures are blurred, making interpretation difficult. The ISRO satellite to be purchased from the US will cover about one third of the earth's surface. Every half an hour a computer will feed the information it transmits into a picture which will help determine wind speed, shape and keep an eye on cloud formation and movements.

Health :

The function of health inspection in the state has become a particularly important one with the alarming spread of malaria, now affecting 75,000 persons in the state, the new place given to primary health care in the vast rural areas and the new urgencies of the family planning programmes in a year when the performance has been catastrophically poor. The state government announced in July that it was working out a scheme to provide cash incentives and basic facilities to encourage doctors to serve in the rural areas.

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V Employment

The ministry of labour announced that in 1977 due to industrial unrest 22 million mandays were lost from 1,409 disputes and the value loss was Rs. 152.04 crores. On the employment side, the All India Handicrafts Board has decided to prepare a detailed employment plan to create 6 lakhs additional jobs in the handicrafts sector by 1983. The employment plan will identify the crafts, work out a statewise break up and annual phasing to ensure that the goal of 6 lakh additional jobs is achieved. The expansion of the carpet industry alone will provide 3 lakh additional jobs and the board will identify 200 centres in the country and about 10 lakh families of craftsmen who are below the poverty line. The ministry of steel also announced that the outlay of Rs. 2,546.53 crores in steel production envisaged in the Draft Plan for 1978-83 will generate additional direct employment for 38,600 persons. The Union government announced once more that it had developed a plan to eradicate completely rural unemployment within the next nine years, through intensive development projects in the 5,004 blocks in the country. To start with, 2,500 blocks are to be taken from next year, and there after 300 blocks will be taken up each year. Rs. 5 lakhs will be spent on this programme per block. The plan is coordinated with state employment programmes which will use the infrastructure created by the Union government efforts. The ministry of labour reports that 1.5 lakh graduates are among the 18.3 lakh chronically unemployed in rural areas. According to the NSS October 1972-September 1973 survey 53.70 lakhs of the total chronically unemployed are above primary and secondary level, 18 per cent being literate upto primary level and 20 per cent illiterate. The Andhra Pradesh government announced in July that it has launched an employment programme for one lakh educated unemployed scheduled castes and tribes and backward class youths, through training them for self-employment particularly in production and marketing and during the training period they will be paid a monthly stipend. The Institute for Techno-Economic Studies released the results of its cost-benefit analysis of the works implemented in the Mangalur block of South Arcot district under the Pilot Intensive Rural Employment Project. The main conclusion of the Rs. 60.7

lakh project which commenced in 1972 and ended in 1976 through works directly related to agriculture (improvement of minor irrigation tanks, afforestation construction of percolation tanks, improvement of supply channels, construction of community wells), project indirectly helping agriculture (formation and improvement of roads, metalling of roads, construction of culverts) and those helping in the general development of the area (construction of school buildings and play grounds) is that the formation and improvement of roads give the maximum benefit-cost ratio and generate maximum employment, with metalling of roads providing the second both in high benefit cast ratio and employment generation, afforestation third in cost benefit results but was fourth in generating employment, with improvement of minor irrigation giving a smaller benefit cost ratio but standing higher in employment generaation than afforestation, the same being true for building community wells.

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VI Other Items

Director's Section: Half-day Seminar on Chinese Development Pattern

The Half-day seminar on Chinese Development Pattern held at the Institute from 9.30 a.m. to 1 p.m. on Saturday, August 12 was the first of the new programme to get a wide cross section of society involved in discussions relating to development issues. It was attended by about 30 invited participants who included economists, physical scientists, political scientists, medical practioners, engineers, businessmen, administrators, trade union workers, journalists and those directly involved in programmes of village reconstruction. The leaders of the Seminar were Mr. N. Ram, Associate Editor of *The Hindu* and Mrs. Susan Ram, who had recently visited China. Two background papers were distributed to the participants ten days before the seminar.

In their initial presentations Mr. and Mrs. Ram pointed out that the Chinese development pattern is much more than an abstract social phenomenon. It is a concrete reality to the millions of Chinese people. A sense of liberation and participation in the building up of a new society is something that peasants in the rural areas, workers in factories and women all over the country experience. The distinguishing feature of the Chinese development pattern is this popular involvement which was the central theme of Chairman Mao's philosophy of development and social reconstruction. The Chinese society today is far from the ideal of a communist society; it cannot even claim to be a fully socialist society. But it is a society in which the basic needs of food, shelter, clothing and health requirements of all its citizens are provided for; which ensures that everybody can participate in crucial decisions affecting their lives; and which has a clear sense of direction. Collective welfare, as against individual gain, has become the guiding principle of social development. And, having met the primary needs of all its citizens the Chinese are now moving to a new phase of modernization in which both moral and material incentives play a part and which is also informed by a profound sense of human welfare and creativity.

The discussion that followed was very lively. Why do the Chinese show such robust self reliance : is it a post-revolution phenomenon or is it related to the fact that unlike many other parts of Asia, China never came under imperial domination? What accounts for the tremendous popular participation in the development process in China and why has it not been achieved in our country in spite of the community development programme, the cooperative movement, the panchayati raj and a number of similar efforts all of which were meant to generate popular participation? If human development is the focus of Chinese development, is there any estimate of the human cost involved in bringing it about? And how is the human welfare defined : solely in terms of providing people the material requirements of life, or in some other ways well? What are the ways in which individual human creativity, as against organised human effort, finds expression in a society which is so vastly and deeply socialised? In the context of the Chinese experience questions were also raised about the dynamics of socialist development. Where the primary social problem is to provide the basic physical requirements of life it is easy to get a consensus on what goods are to be produced and it is easy also to mobilise effort in return for providing the basic necessities of life. But beyond the threshold of minimum physical requirements is it easy to get general agreement about what needs to be produced and is it necessary at that stage to provide material incentives to participate in productive effort? Is China today "graduating" into such a stage where choice decisions are likely to be less unanimous? If so, what are the institutional procedures to protect differences of opinion and of choice?

Naturally, questions also came up about the relevance of the Chinese experience to us in India. Even granting that the Chinese pattern offers many valuable lessons to us, how to convince our own rural people about it? How to get things moving in our villages? Is it possible to select the good aspects of the Chinese experiment and graft them on to our own social system? Why must we look at China at all? Can we not generate our own social transformation?

These questions will and should continue to be discussed. But there is one lesson that comes up clearly from the Chinese pattern. Development becomes a reality only if it is experienced by the masses of people in their daily lives. If this is the case, has the development process really started in our country?

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Future seminars in this series will include : an assessment of rural change in Tamil Nadu during the past quarter of a century; review of new health care patterns; futurology etc. Suggestions are most welcome.

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National Institute for Public Co-operation and Child Development:

A meeting of the National Institute was held in mid July at which the urgent need to fill its staff vacancies in child development, nutrition education and rural social work was taken up and acted upon. It was noted that there are highly qualified specialists in these fields and there is need for activising the Institute and orienting its functioning to meet the needs of the rural poor for whom this programme is needed.

JIPMER:

JIPMER, Pondicherry celebrated its annual day in July. The Institute has developed into a high level postgraduate and research centre in the medical sciences and has begun work on rural primary health and infant care by running and demonstrating what can be done in a pilot demonstration centre at the Institute. The work is being spread in 14 villages and what is needed is support by parallel bodies working on the economic side in these villages to enable the families to earn a little more so that the malnutrition of the mother and child which in turn is due to under nourishment in the family can be countered and all members of the family can consume an adequate amount of calories. In the Annual Day celebration the achievements of the staff and students were noted with statisfaction and a call issued to the Institute to train the new type of doctors needed for the rural community primary health care.

India International Centre and Family Planning Foundation:

The India International Centre organised in late July a panel discussion on the role of voluntary organisation in Adult Education. The discussion centred mainly on the National Adult Education Programme, its problems of execution, the motivation of both instructors and illiterates adults, and the strength of voluntary organisation to assume the responsibilities being given to them. There is also the problem of the programme being somewhat paternalistic and the means of ensuring the participation of the people for whom the programme is meant as one way of meeting the dangers of paternalism. Also in July a meeting of the Board of Trustees was held and scrutinised and approved the audited accounts for 1977-78. The conclusion of the Family Planning Foundation Seminar on Family Welfare in the Sixth Plan referred to in the last issue (p 410), were presented to the Prime Minister at the end of July by some members of the board of governors of the Foundation and the seminar. The need for all ministries and programmes participating in the family planning effort, the serious nature of the crisis now facing the country seen in the disastrous decline in family planning statistics, the need to return to the phrase Family Planning as Family Welfare has a much wider cannotation and the filling of the gap in the rural health system by training and putting in place the health assistant were discussed and agreed upon.

NSS:

The annual meeting of the NSS officers of the university at the end of July took on added importance because of the preparation being completed through the ten training centres run during the summer vacations and the detailed Adult Education projects from the colleges that are to be approved by UGC. In addition, the Union government has given Madras University an addition of 10,000 students to its NSS contigent and this is being used to provide NSS contigents to the affiliated oriental colleges (which were till last year approved colleges and so not entitled to NSS participation), as well as to add to the contigents of the arts and science and professional colleges. The meeting took all these developments into account in its discussion and conclusion.

World Social Science Development :

The World Social Science Development Committee of the International Social Science Council met in New Delhi in mid July at the invitation of the ICSSR. It reviewed the follow up of the decision made at its Rio de Janeiro session (see Vol VI pp 102 and 103) and noted that the project ideas prepared needed fuller support from ISSC and the national and regional councils and social science organisations. Its major decision was to reaffirm two of the three inter country research priorities established at Rio de Janerio, namely land ownership and land reform in rural areas and development of documentation and data centres, to which a third priority namely the role of social scientists and university develoyment was added. It was decided that a lead paper should be prepared by a member of the committee on each of the 3 subjects and on this basis, a meeting of specialists be called to formulate the detailed projects for research on an intercountry and interdisciplinary basis. It was recommended that the regional social science organisations—AASSREC in Asia, CORDESARIA in Africa and CLAF in Latin America—should become members of this committee. For the next 2 years, the committee requested ICSSR to help by providing it the secretariat, and decided that the officers negotiate with one of the regional organisation who could take over the secretariat and the execution of the research programmes.

ICAE :

The sixth meeting of the International Council of Adult Education was held in San Jose, Costa Rica in the first week of July. It was preceded by a 3 day international seminar on land reform and peasant community programmes and Adult Education in Latin America. The two conclusions that emerged from this discussion were that land reform and equitable rural relations have developed in Latin America on a permanent and effective basis as a result of peasant struggles and revolts and that the contribution of adult education becomes significant when the adult education programmes promote participation by the peasants and transfer control and finances to them in the running of both agrarian and adult education movements. The meeting of the Council welcomed 6 new members associations and noted the positive results emanating from the visits of the Vice-President Paul Mhaiki and the Secretary General Roby Kidd to China, Vietnam and the USSR. It decided that the 1979 meeting of the Council should be held in Stockholm and should be preceded by a seminar on Adult Education and the peace movement. It also decided to hold the 1980 meeting in Iraq and organise a seminar at that time on the role of Adult Education in the III UN Development Decade.

Rajya Sabha:

There was a meeting of the consultative committee of the Rajya Sabha on education at which the National Adult Education Programme was discussed and at which political parties were requested to help to make the programme a mass movement. It also reviewed the UGC policy paper and the reports of the Ishwarbai Patel and Adiseshiah committes on the 10 year high school and the 2 year higher secondary. Rajya Sabha reconvened from the middle of July and took up for consideration various bills such as the Child Adoption Bill which was deferred for future consideration, the Viswabharati bill, the repeal of MISA etc.

University Events:

In July, the Institute of Polymer Science and the cell for Molecular Biology were inaugurated and meetings of the Advisory Committee on Space Research and for launching the Tamil stream in the post-graduate courses of Philosophy, Politics, Economics and Mathematics were held. The second meeting for the year of the Advisory Committee of Industry and Trade was also held and 6 new employment preparation courses approved. The Syndicate held its monthly meeting and reviewed the progress of the execution of the approved university policy and made appropriate decisions. At the end of July the Editor of the Bulletin who is also Vice-Chancellor laid down his Vice-Chancellorship, in connection with which there were a number of functions by the teaching staff, administrative staff and syndicate to bid him farewell.

August Development Seminar:

The paper for the August Seminar, "Food Grain Reserves" by Mr R. Ramanujam, Madras together with a summary of the discussion of the paper at the seminar chaired by Mr. Alexander Joshua appears as the first article.

Second Article:

A paper on some thoughts on "The Appropriation Bill 1978-79" appears as the second article.

Food Grain Reserves

By

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The subject matter of the paper is discussed under the following sections:

SECTION I — Grain Reserves—historical background

SECTION II — Agricultural Progress that has enabled the grain reserve

SECTION III — Methods of utilisation of the reserves for developmental work.

SECTION IV — Some basic questions

SECTION I

The concept of a grain reserve for a variety of purposes was in the scheme of economic policy from very ancient times in India. In fact the entire agricultural system was supposed to be on a partnership basis with the State, the tax called Bagha being paid in kind into the State coffers. We have various references in Arthasastra to the existence of innumerable state farms for demonstration purposes besides filling in the Royal granary. The trend of uncertain monsoon that we witness must have also forced the ancients to have thought of what we call the buffer stock for meeting emergencies.

In the days Turko-Afghans particularly Aladin Khalji, grain prices were stabilised with state supplies augmenting the requirements particularly of the army, apart from the stringent and even cruel punishment for profiteering. Shivaji seems to have also kept a granary at Satara for meeting emergency. During the British period the position called for a policy to tackle farmers in different parts of the country and was dealt with in a piece meal fashion. It was only during the second world war that a fulfledged scheme of conserving food for war purposes necessitated the levy system, the procurement and rationing system. The entire food policy became an important part of the bureaucratic set up.

SECTION II

In a developing economy food plays a pivotal role. The stability of prices that is necessary to continue the process of development on to a stage of self-propulsion needs a good agricultural base. This is due to the fact that food forms 60% of the family budget in India. The first plan was an attempt to strengthen the food situation in the country so that more massive plans for development could be formulated on that foundation. The agricultural revolution in U.K and U.S.A. preceded the industrial revolution making the process successful even though spread over a longer period than what a developing country could possibly afford for its development process. There is in today's fast moving economies, technological changes that have to proceed simultaneously and telescope the use of the explosive knowledge within the shortest time schedule. The evolution of Indian agriculture to its present stature creating comfortable food reserves that can form such a base for development programme must be capitalised without delay for quickly promoting rural programme which alone can make the people feel the impact of development.

It should be at the same time remembered that food reserves are a mixed blessing since the excess also creates further problems which the state will have to meet if the grain reserves grow beyond a certain limit. This limit is determined by the quantity needed for (a) a permanent buffer stock and (b) the food requirement to maintain the public distribution system. It is expected that about 6 to 7 million tonnes of buffer stock will be sufficient to maintain the price line and the off-take by the public distribution may be placed around a million tonnes per month. This works out to about 18 to 19 million tonnes as the minimum comfortable reserve. But the present size of food reserves are growing nearly to 22 to 25 million tonnes. *

The larger stocks face three main problems. (a) The money that is kept in the hands of the people against the grain purchases contains inflationary potential (b) Lack of storage capacity—no doubt Herculean efforts have been made for increasing the godown facilities. Inspite of this open storing is found in many places. (c) Another factor is that the public distribution scheme is taking in less and less. It was a million ton a month in 1975 and 0.75 million tonnes in 1976 and has now fallen to about half a million in 1977. Hence the percentage of damage is likely to increase with more grains lying in the open due to lack of storage.

SECTION III

Hence it has become necessary to devise plans and programmes to regulate grain reserves on a rational basis. Three approaches have been opened out (a) Repayment of the wheat loan secured from U.S.S.R. (b) Food for work scheme that would put the resources to developmental work. (c) Exploring possibilities of export.

Let us examine the various proposals mentioned above. In a very critical period in our food supplies, U.S.S.R. diverted part of her wheat purchases, to be precise 2 million tonnes of hard wheat to meet the public distribution in India. Nearly half a million tonnes have been bartered off against other commodities exported. The idea of paying off the 1.5 million tonnes was a welcome project for India, since this will release godown space and reduce our commitment to U.S.S.R. on this account. A team of specialists arrived from Russia to work out the details of the programme and they found the soft wheat offered

*Refer Table on page 490 for the growth of agriculture.

unacceptable to them, and the proposal itself was hanging fire for some time. But the imported hard wheat is already available with us which is being released for settling this account. This would make way for fresh arrivals and enable us to honour our commitment to Russia.

Since the second one is the most important needing careful analysis in the context of our development programme, we shall discuss it last. The third possibility i.e. exports may now be examined. It is indeed a curious historical evolution that we are now able to talk of export of food grains in a country which at one time felt that it *cannot feed its people on its own.* A word of caution is necessary in this context. Strangely enough the rise and fall of political power at national and state level has a strange correlation with failure of monsoon and consequently fall of agricultural production. Hence nature is the most whimsical master that we can think of. At the same time there *is no denying the fact that export have to* be seriously thought of to keep the quantitative and qualitative attainments of agriculture besides the maintaining price line that would ensure stability and freedom from cost and wage push inflation.

At a diplomatic level we may as we have rightly done, induce FAO to use part of our grain resources for aid programmes. *This will reduce the cost of* programmes in developing countries besides giving us the moral stature that is needed to consolidate the power of the decolonised people of the world. The second possibility is to export to West Asia and Africa where emigrant Indians are found in sufficient numbers to appreciate this help.

If we move into the field of commercial export, particularly special varieties like Basmati Rice and Wheat products, economy will be helped in two ways. Firstly diversification and more R & D work will be put into agriculture to meet *world competition in these products.* The export of wheat products will utilise spare capacity available with the millers in India. Further these exports can be used for getting in return coarse varities to maintain the public distribution system on an even keel. But this must not upset our food position. The green revolution must be made thorough parti*cularly in the sphere of rice to think in* terms of export in food grain with out jeopardising our interests.

The third solution is indeed a very important one in view of the change in the policy of the Government viz. attempting to make agriculture and rural development priority sectors of the economy. Food for work schemes are as old as Indian history. Entire army was *maintained under a system of state* kitchen and public works were erected by feeding the labourers. Hence the idea of paying wages in kind is nothing new to Indian economy. The present Government has set a target of 46.2 million man-years of employment over a ten year perspective period. It was Sri L. K. Jha who gave out a scheme under which part of the wages would be paid in kind out of the grain reserves. This is indeed a major developmental process in using up real resources. The agricultural development and further qualitative crop pattern cannot be achieved if the level of production is not maintained. Hence a continuous use of grain reserves is a 'must' for sustaining the growth rates leave alone improving on it. Further the growth of both major industries and rural industries will create greater demand for food in the future which needs such growth rates being maintained in agriculture. The scheme of food for work covers large medium and major irrigation works, flood protection, drainage and anti-water logging works, soil and water conservation and afforestation, roads including state highways construction of intermediate and main drains, field channels and land levellings. All these as is well known are labour intensive and therefore employment oriented. The programme was first limited to the lean periods of the year. Subsequently the area of operation was extended not merely to maintain the works but also to proceed with the on-going plan and non-plan schemes throughout the year. Further some kind of favourable price for the in-kind wages were also thought of. But the problem of the drain that it would cause in the form of subsidies has to be considered. Hence the plan as such has not caught the imagination of the implementing authorities viz., the State Governments.

The Tamil Nadu Government has indicated its readiness to avail itself of the Centre's Food for Work Programme (FWP). The change in the stand of the State Government which has so far not found it possible to take advantage of the programme, has been brought about by the centre's offer of supply of jaggery under the scheme.

The scheme had, earlier, provided for free supply of wheat and milo to the State Governments to be used for payment of wages in kind for public works in rural areas. The response from the State Governments was so encouraging that the centre had earmarked one million tonnes of wheat for supply to the States in 1978-79 under this scheme.

However, Tamil Nadu could not avail itself of it, because the workers in rural areas in the State were not accustomed to wheat. The State Government has suggested that rice should be supplied or in the alternative it should be permitted to sell the wheat in Madras and utilise the proceeds for employment-oriented public works in rural areas. This was not acceptable to to the Centre.

But recently the Centre had decided that in addition to wheat and milo, jaggery could be offered. This followed large-scale purchase by the Food Corporation of India of jaggery as a measure of support to jaggery manufacturers, who were affected by a glut in production and consequent fall in prices.

The FCI has 2500 quintals of jaggery of which 1000 quintals have been offered under the Food for Work Progromme to Kerala. The Centre sounded Tamil Nadu Government and offered to supply any quantity out of the remaining 1500 quintals. The State Government has reportedly indicated its readiness to accept jaggery and take up schemes under the Food for Work Programme. Apart from this, the Centre is exploring the possibility of wheat products being supplied under this programme. The Tamil Nadu Government has indicated that if this is allowed it will accept wheat and process it into rava and maida for use under the Food for Work Programme.

The Food for Work Programme which was launched In April last year had a slow start but picked up from January this year. The encouraging response from the States made the Union Government strengthen the administrative set up to ensure effective implementation of the programme.

Mr. Narendra Pal Singh, Special Assistant to the Union Minister of State for Food and Rural Development, has been appointed director in the food department for this programme and reports show that this has helped effective monitoring and expeditious release and utilisation of the programme. In the first quarter of the current year, 3.75 lakh tonnes of wheat have been released against an allocation of 1.2 million tonnes for the whole year.

However sound a scheme may be, the success depends on the myriad inter-relationships that are needed to ensure success.

Careful project formulation, effective distribution system, sustained time bound programmes and finally, the most important, dedicated execution at all levels are needed. If these conditions become favourable the wheat and rice revolution producing the grain reserves can usher in an era of activity for eradication of poverty.

SECTION IV

A few basic questions have to be examined in connection with food grains. In the first place there are a few who argue that India has millions of unfed and mal-nutritioned people and a surplus has no meaning in such a context. The question of feeding the millions at least to a minimum level will mean not a surplus but stepping up production to higher levels.

Secondly it is wondered whether mere storing of food grains as a surplus will mean establishing rural or more specifically the agricultural economy. On the other hand it should be all round green, blue and white revolution that should raise the level of living of the people. The problem of finding adequate storing space that will save the grain from losses is indeed a big problem calling for huge investments.

AREA AND OUTPUT OF RICE AND WHEAT FOR A FEW SELECTED YEARS

(Area—million hectares, output in million tonnes)

Food grains	1950-51		1971-72		1973-74		1975-76		1976-77	
	Area	Output	Area	Output	Area	Output	Area	Output	Area	Output
1. Rice	30.81	22.05	37.75	43.06	38.01	4.74	39.47	48.74	38.61	42.79
2. Wheat	9.74	6.82	19.13	26.41	19.13	26.41	20.45	28.85	20.86	29.08
3. Jowar	15.57	6.25	16.77	7.72	16.86	8.99	16.09	9.50	15.78	10.40
4. Bajra	9.02	6.68	11.77	5.31	13.64	7.08	11.57	5.74	10.73	5.73
5. Barley	3.11	2.51	2.14	2.57	2.62	2.32	2.80	3.19	2.22	2.30
6. Ragi	2.20	1.35	2.42	2.20	2.39	2.13	2.63	2.80	2.53	2.18
7. Small millets	4.60	1.77	4.47	1.66	4.53	1.86	4.67	1.92	4.43	1.64

Summary of Discussion

In the discussion that followed the paper, several speakers mentioned that even though the paper had mentioned that the foodgrain reserves is a very old one, it must nevertheless be kept in mind that the underlying concepts are very different. Thus, the Pharaoh in the Old Testament legend built up a foodgrain reserve with the specific purpose of meeting anticipated shortages in the coming years. This is hardly the main purpose of, say foodgrain reserves being built up by the Government of India today. Things like foodgrain reserves take their properties from the social milieu in which they occur.

To understand the concept in contemporary India, it is essential to first take a look at the public distribution system. Outside of an exceptional state like Kerala, the public distribution system in India is a strictly marginal system, perhaps deliberately so. The system caters to only a small section of the urban population—which, contrary to general opinion is not the poorest section—and does not at all serve the rural population.

Again, when it comes to planning for future consumption, it must be noted that the type of internal consistency models used by the Planners, as for example in the Draft Five Year Plan, 1978-83, is a demand based model. After assuming various factors, including a significant flow of income from the rich to the poor which would reflect itself in an increased demand for foodgrains, the estimated demand increase is exactly matched by a physical output target. The target is thus not a planned strategy, but is simply a piece of guess work. In the case of the current Draft Plan, it is interesting to note that despite all the heroic assumptions and the preamble about agricultural development, in physical terms the planners expect the availability per day per head of foodgrains to rise, over the five years, by a total of a mere 50 grammes. Even this "Planned" growth is a forecast more than anything else. Thus, any huge surplus, if it turns up, will only be an Act of God. Or to modify the phrase, would be a response to an Act of God.

In this sense, the reserves that have built up today, are posing a problem precisely because they represent an accident that we are quite unable to meet.

For one thing, the piled up reserves help only one section of the community, and in fact work against the interest of the bulk of the population, the rural poor. In years where the surplus is marginal, the Government does not feel impelled to mop it up, so that in a physical sense, the surplus stays scattered around the country. But when huge surpluses occur, as they did in 1975, then there is a necessity to mop up the whole lot. As a result, the grain is transferred to urban areas where they pose storage problems. Worse, when the situation changes in the following years and a deficit occurs, the machinery to transfer the piled up reserves to the countryside is found to be non-existent, even if thought of.

Again, since the mopping-up process is done by a system of subsidised prices, it is only the rural large property owner who makes a substantial surplus and is benefitted. The marginal farmer gains little from the Government activity.

It was also argued that the very concept of a physical commodity surplus is questionable. Does surplus include only the stocks held by the Government, or does it include, say, hoarder's stocks? The former may be too narrow for any worthwhile analysis, while the latter may give paradoxical results; even though it is necessary, if we deal with a concept like marketable surplus to take this wider meaning, in practical terms it may end up giving a surplus that is theoretical and not practically available.

Another way of questioning the concept would be to see it in regional terms. A surplus may occur, in physical terms in one pocket, but the area as a whole may be just at break-even point, if not in deficit. The surplus thus goes unrecognised. One implicit problem here is that involved in centralised planning. Since such planning deals mostly in aggregates, it may completely fail to notice a real problem of surplus when it occurs in some or the other area. It may be useful, in this context, to think in terms of planning from below, in smaller and smaller units of decision-making.

Procurement of surplus becomes absolutely essential in a very good year, for fear that a fall in the price will totally wreck the agricultural economy. Since the procurement is done at a subsidised price, as pointed out, the beneficiaries are the large farmers. On the other hand, the Government finds itself stuck with the stocks it builds up because there is hardly enough purchasing power among the bulk of the population to absorb the foodgrains. The Government is thus forced to think in terms of exports in a situation where the masses starve at home.

In closing, it was pointed out that to think of the problem in terms as these might prove to be altogether too negative a view point. Some lessons can be learnt from the Chinese experience in the 1950s. Whenever a good harvest resulted from a year of fair weather, the Chinese used the surplus to form a reserve that acted as the physical finance to go in for large construction projects in the agricultural sector itself, mostly in irrigation, soil conservation, and the like, thereby creating the conditions that would convert the year's "accidental" surplus into a permanent and relatively assured surplus.

Unfortunately, nobody had, it appeared, though of this more positive approach in India as yet. For instance, while many people in Tamil Nadu mourn the deterioration in the system of tank irrigation, it has simply not occurred to anyone to constructively connect the existing reserves of foodgrains with the concrete programme of renovating the tanks.

Professor Ramanujam was thanked for having produced a paper for discussion in the very short time that had been given him.

Mr Alexander Joshua chaired the seminar.

The Appropriation Bill 1978-79*

This is a rather important occasion because the Bill is appropriating a gross amount of Rs. 36,534 crores and a net amount of Rs. 18,417 crores. The Net National Product of the country at current prices was Rs. 68,298 crores in 1975-76 and is now over Rs. 70,000 crores. The importance of the Bill before the House is that it is appropriating as public expenditure over 50 per cent of the country's national income in gross terms and 24 per cent in net terms.

Second, the Bill reflects the priorities of the government and to that extent is not in itself an autonomous instrument which can be changed by just juggling around with its figures with a view to producing a different pattern. The items which deal with agricultural and rural development cover Items 1 to 10 (agriculture and related activities, irrigation) 60-61 (village small and handloom industries) and parts of Items 26, 45, 46, 70, 77, 91 and 92 (health, education, roads, water supply, and housing). For all this, the appropriation amounts to Rs. 1,535 crores which is estimated at over 40 per cent of the total fresh appropriations.

Third, the appropriation for heavy industry, which I define as those industrial units with forward linkages includes Items 29, 30, 59, 71, 79 and 81 (power, coal, industry, fertilisers, steel and mines). The appropriation for these amounts to Rs. 2,707 crores. Some of these like power and fertilizers, I assume, also figure in the rural development priority.

Fourth, the appropriation is divided into 60 per cent for developmental expenditure and 40 per cent for Plan expenditure. Apart from the inadequacies of these ratios for development and Plan projects, maintaining the integrity of these appropriations so that there will be no cutback in them, no shortfall in actual achievement depends on the implementation machinery, which is our Achilles heel.

Fifth, the Bill follows the traditional, historical distinction between grants voted by Parliament in Column 1 and the sums charged on the Consolidated Funds in Column 11. I have the feeling that the time has come to review this time worn classification. Article 112 of the Constitution lists the items to be charged to the Consolidated Fund and ends with Section (g) with an open-ended mandate thus: "any other expenditures declared by the Constitution or by Parliament by law so charged". To understand the significance of this article, the subsequent article 113 should also be studied: that

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*Extracts of note on the Appropriation Bill by Dr. Malcolm S. Adiseshiah for the Rajya Sabha in May 1978.

article states that the Consolidated Fund is not submitted to vote but is open to discussion in both Houses of Parliament.

In the Appropriation Bill before us what Parliament reviews and votes (Rs. 15,700 crores) is lower than the non-votable items (Rs. 20,832 crores). There is thus being built into every Appropriation Bill some pre-empting of the responsibility of Parliament. In theory, of course, Parliament can repeal any act which places sums under the Consolidated Fund and no session of Parliament can be bound by decisions of its predecessor. But these are only theoretical possibilities. In the present Bill, in four cases, Items 5, 26, 50, 92, the sums charged on the Consolidated Fund are larger than the sums voted by Parliament.

As the Consolidated Fund is the receiver of all revenues of the Government of India and the Appropriation Act is the only outlet for these resources, the time has probably arrived when the Ministry of Finance and the appropriate Parliamentary Committee can review this classification in the Appropriation Bill and make recommendations so as to conserve and enhance the accountability element in the Bill.

Sixth, there is the problem of the growing gap between what is appropriated here in the Bill and what finally reaches the people or project for whom or for which the appropriation is made. This is the problem of seepage, wastage and evaporation. Let us take the Rs. 1,535 crores which are to be appropriated for Rural Development. How much of this actually reaches the small farmer, the marginal farmer, the drought-prone farmer, the landless labourer, the village artisan and animal husbandry man and his family? By the time it passes through the various procedures and functionaries here in the Ministries, the Planning Commission in Delhi, the Departments and Directorates in the State and the various officers in the district, block and panchayat level, and the visible and invisible intermediaries, there is a great deal of evaporation. In evidence before the Asoka Mehta Committee, I referred to some studies made by my Institute which shows that not more than 30 to 40 per cent of what is appropriated in Delhi finally reaches the villager and his family: in the case of a state appropriation it is around 50 to 60 per cent. What is needed is .

a) the development of structures at the block or district which can plan and appropriate funds for the Plan, and

b) the decentralisation of fiscal (fund raising and disbursing authority) responsibilities to overcome this serious wastage problem.

Seventh, the appropriations presented contain in its budgetary counterpart a serious inflationary potential. This potential cannot be averted by further resort to demand management which has characterised the economy and economic administration during the last months and years. The appropriation now being voted must lead to increased agricultural and manufacturing production and a drawing down of the growing foreign exchange reserves. The country is fortunate in that quite exceptionally for four years running, the weather has been kind and foodgrains production have been good and most cash crops have yielded record outputs for the two or three years running. It is the manufacturing side which is dragging down the supply side and it is to step up production of consumer goods and consumer durables, along with an employment generation and income redistribution programmes which will provide the market for expanding production that attention has to be given. In addition, the expansion of the production sector depends on the import of machinery and spares which can be effected by drawing upon our foreign exchange resources.

Eighth, the investment proposed in heavy industry as referred to earlier is a good start but no more than a start. There are a number of industries such as heavy machines, transport and textile machinery, etc., in which the investment proposed is inadequate in terms of expansion of capacity or creating new capacity. The investments proposed in the Appropriation Bill are also no more than a start in the sense that the low rate of investment since the Fourth Plan, which is also a casual factor in industrial stagnation, needs correction. And there is an opportunity now to begin this process of correction in the wise use and deployment of the country's growing foreign exchange reserves as noted earlier.

Ninth, the Appropriation Bill continues the programme of subsidies which makes the economy a high cost economy. The direct subsidies are provided in Item 6 — Food, and Item 12, — Foreign Trade and export production and under other items; the indirect subsidies are provided under various schemes of customs and excise exemptions, reductions and drawbacks, the low-capital cost structure and exchange rates differential. It is necessary that a thorough review of all the subsidies—direct and indirect—be undertaken by a specialist committee and each area benefiting from it be evaluated against the priorities and objectives established for the year and the Plan period 1978-1983.

Finally, the Appropriation Bill includes authorisation to incur disbursement of Rs. 334 crores in the area of Science and Technology dispersed over six items—95, 99, 100, 102 and 103. There are also other parts of the Bill where such Science and Technology expenditure will be undertaken—particularly in light of the decisions to attach some of the S & T units to the user ministeries. (There is also an important amount of Research and Development programmes being undertaken by the Defence Ministry). There is need to establish an overall science policy authority, first at the scientific technical level and second at the level of policy-making, involving some cabinet members in order to coordinate the Science and Technology programme of the country and to ensure the resulting R & D fits into the country's priorities is used in the most economical manner and flows smoothly into the production processes.

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