

## THE PRICING SYSTEM IN PUBLIC ENTERPRISE IN INDIA

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This review of pricing in Indian public enterprise is broadly concerned with the relationship, planned or actual, between prices and surpluses, the distinctive techniques of pricing adopted by different public enterprises, and the conceptual as well as the practical implications of the pricing policies adopted in the public sector. Except for a few remarks on state government enterprises which, in fields other than electricity and road transport, yet constitute a relatively small segment of the public sector in the country, the present study relates mainly to the enterprises of the central government.

**B**riefly, pricing in a public enterprise differs from that in a private enterprise in that it has a macro motivation, both conceptually and operationally. The propriety of a given price in the public sector is evaluated in terms of its inter-enterprise and inter-industry implications, such that it turns out to be good or efficient from an over-all point of view. And the power to give effect to an "appropriate" pricing structure is derived from the governmental prerogative of giving directives to the public enterprise managements; often this is exercised informally, without recourse to a statutory directive.

Public enterprise prices may be of three kinds, on grounds of motivation :

(1) **Resource-oriented Prices:** An enterprise may operate at prices designed to raise resources either for its own expansion or for developmental investments elsewhere in the economy. Such prices are possible only when the enterprise enjoys some degree of monopoly power. This obtains significantly in a developing economy marked by scarce resources, strong demands, and new technologies. Under these conditions private enterprises themselves work toward resource-raising, but the effort can be more efficacious in the public sector since the accrual of the resources raised does not go to the benefit of private investors. In a sense the prices are in lieu of indirect taxes and may often appeal to the government as a convenient measure, though they raise serious economic and constitutional questions of tax elements pervading the pricing systems, without passing through parliamentary debate and vote.

(2) **Promotion-oriented Prices:** Where the external economies of an enterprise significantly outweigh the merits on its own accounting surplus, "relatively low" prices, constituting an indirect subsidization of the beneficiary activities, may be preferred. It is obvious that such "policy prices" are impossible on the part of a private enterprise unless it is offered a subsidy by the government; even then it is improbable for private capital to flow

into the promotional lines when alternative choices of investment exist in lines that do not call for a governmental subsidy. The most familiar areas of promotional prices are the public utilities; in other cases where the sale is not effected directly to the consumer the likelihood of middlemen exploiting the eventual consumer, openly or covertly, has to be countered if the intended effects of the low prices are to be realized. Fertilizers are a case in point.

(3) Impact-oriented Prices: A public enterprise may operate at prices that intend to have an impact on private enterprise prices in one of two ways:

(i) Private enterprises are forced to sell like outputs at equally low prices. Strictly, this effect is probable if the public enterprises are in a position to release supplies on such a large scale as to defeat any possible monopoly or restrictive practice on the part of the private enterprises. Or else, the consumer may find himself eventually in a worse situation: the low-priced outputs of the public enterprises may be routed through middlemen at higher prices.

(ii) A public enterprise may offer a product, particularly a basic or intermediate good, to the consuming industries on condition that they sell the end products at "reasonable" or agreed prices. This situation assumes particular relevance in a developing economy working within the framework of a mixed economy, the public sector occupying the basic or strategic points of several industrial complementaries.

The above classification excludes the competitive situation where the public enterprises, by hypothesis, are unlikely to operate at "policy prices" of one kind or another but are obliged to adopt the prices ruling in the market, which are under the influence of the efficient units in the industry, whether private or public.

Let us briefly consider how effective these different pricing motivations have been in practice in India. Resource-oriented prices, however desirable, have been exceptional, on the whole. An interesting example of resource-oriented prices is State Trading Corporation of India Ltd., whose activities significantly include monopoly areas of import, export, and domestic trade. In its absence the easy and high profits from these scarce-product transactions tend to enrich private traders. The point of interest is not that this enterprise tried to keep prices down but that it kept them high enough to mobilize for the public exchequer incomes that the strong demands concerned have been willing to pay.

The data on reserve accumulations provided later in the paper support the conclusion that resource-oriented prices have not been common in the public sector in India. Even the reserves raised are subject to a severe qualification, viz., that it is not in every case that the enterprises built up reserve *after* paying dividends, i.e., after meeting the finance costs. Hindustan Antibiotics Ltd., one of the most successful in the present context, never declared any dividend till 1960-61, by which year its reserves stood at Rs. 271.28 lakhs or about 110% of the equity capital figure. The dividends foregone by the government during the four years of profit prior to 1960-61

amounted to Rs. 90.69 lakhs at a notional 6.25%. To give a general impression on reserve accumulations vis-à-vis dividend payments, we may note that of the 36 running enterprises that made some net profit, after interest on capital, in 1965-66, only 19 proposed dividends—at rates varying between 2% and 15%. In five of these the rate of dividend was below 5%.<sup>1</sup>

Promotional prices have been practiced at certain points of the public sector—but only in a few cases by design and prior deliberation. A good example is the National Small Industries Corporation Ltd. It has adopted certain “promotional activities”—prototype production and training centers, and industrial estates—which depend mainly on government subsidy. (The subsidy amounted to 10% of its receipts from the sale of goods in 1964-65.) Its other operations also contain promotional price elements, e.g., hire purchase schemes; and enquiries have revealed that these have facilitated “a substantial expansion in the production capacity and actual output” of small-scale industries and brought about “a transformation of workers into owners.” In fact, many of the assisted units have “outgrown their small industry status.”<sup>2</sup>

Impact-oriented prices have been rare indeed. The recent spate of super-markets illustrates the limited area of consumer goods where several prices in close-by retail markets in the private sector have been somewhat restrained through the operations of the public-sector super-markets. The main limitation on this kind of prices is that the public enterprises are unable to provide outputs sufficient to keep the market prices low; for example, the low-interest loaning operations of the financial corporations in the public sector have been too small for the needs of potential borrowers; so that while the recipient of the loans do benefit, the operations do not have a highly powerful effect of making cheap loans available to every one in the market.

## I. SURPLUSES AND PRICES

In adjudging the propriety of a price or pricing system one has invariably to compare it with the related cost, i. e., the cost at which the product concerned is made available to the consumer. Assuming that the cost is legitimate and represents a condition of efficiency, we may term as “high” prices that exceed the (all-input) costs and vice versa. In converse, when an enterprise realizes a surplus its prices may be construed as relatively high or resource-oriented; and when it makes a deficit, the prices may be termed as relatively low and perhaps promotion-oriented—a motivation that has to be proved. This is a prima facie reason why a pricing study has to concern itself significantly with the question of surpluses. Our review of surpluses proceeds in four steps, viz., (1) the surplus targets, (2) the actual surpluses, (3) the considerations underlying the disparities between (1) and (2), and (4) the implications of the price-surplus linkage.

<sup>1</sup> Central Government, *Audit Report (Commercial)*, 1967, pp. 12-68.

<sup>2</sup> Secretary of The National Small Industries Corporation Ltd., *Annual Report for 1964-65*, New Delhi, pp. 5-7.

### 1. Surplus Targets

Though the public sector has been an expanding agency of economic development in India, there is yet no statutory definition of the financial returns expected of the units comprising it. Not even the corporation Acts, which represent specific attempts to legislate appropriately on all aspects of working of the enterprises concerned, stipulate the rate of return targets or the maximum beyond which surpluses ought not to be raised or the minimum below which surpluses ought not to fall. The nearest approximation to a stipulation consists of the "convention" on railway dividends to the general exchequer, quinquennially adopted by Parliament. The current convention stipulates that the railways shall pay a dividend of 5.5% on the capital invested up to 1963-64 and 6% on later outlays.<sup>3</sup> This, however, is a minimal provision; what the railways can raise by way of a surplus in a year is left undefined. There is hardly another instance of a defined surplus; the figure of 11% is canvassed for the electricity supply industry;<sup>4</sup> but it neither has statutory force nor is attained by any Electricity Board so far.

That the public sector should bring in resources for developmental investment was given some shape as national policy at the time the third plan was formulated in 1961-62. Earlier plans did not cite the resources from public enterprises, other than railways, as a specific item of plan finance. The quantum and relative importance of this source under the third plan, the (still-born) "fourth plan" (draft outline), and the annual plans for 1966-67 and 1967-68 are shown below.

Table 1. Resource Targets from Public Enterprises

Resource (1)	(Rs. crores)			
	III Plan (2)	IV Plan (3)	Annual Plan 1966-67 (4)	Annual Plan 1967-68 (5)
Surpluses from Railways	100	260	34	-29
Surpluses from Other Public Enterprises				
(a) Central Government	300	1,085	164	168
(b) State Governments	150		54	71
<b>Total</b>	<b>550</b>	<b>1,345</b>	<b>252</b>	<b>210</b>
<b>As a Percentage of Total Plan Resources</b>	<b>7.3</b>	<b>8.4</b>	<b>12.1</b>	<b>9.1</b>

Source: *The Third Plan, The Fourth Plan (Draft Outline)* (Original), *Annual Plan for 1966-67, Annual Plan for 1967-68*.

Two comments may be made on these estimates. Firstly, these are based on "inadequate data"—a qualification repeatedly inserted in the Planning Commission's documents.<sup>5</sup> Secondly, these are not estimates strictly of the

<sup>3</sup> Vide the recommendations of the Railway Convention Committee, 1965.

<sup>4</sup> Vide Venkataraman Committee Report.

<sup>5</sup> Government of India, Planning Commission, *The Third Plan Mid-Term Appraisal*, Delhi, 1967, p. 35; *The Third Plan Progress Report 1963-65, 1967*, p. 23.

surpluses but include "net accrations to depreciation reserve funds and other funds" which, it is hoped, will not be drawn upon for replacement purposes in these early years of the enterprises. To the extent these funds remain idle with an enterprise, three alternative courses of utilization are available, (i) to invest them in government securities, (ii) to use them as working capital and (iii) to sink them in fixed assets (for expansion). The second channel seems to be the best; for the funds are liquid enough (within a time-lag of a year at the most) for meeting replacement needs whenever these arise; besides, many public enterprises find themselves in stringency vis-à-vis working capital and are committed to heavy rates of interest. If the funds are invested in expansions, the enterprise will be obliged to go in for fresh capital *from outside* as soon as replacements of assets, for which the funds were originally created, become necessary. The government will be about the only source of such capital and has to procure it from the open market. Alternatively, the enterprise will have to plan surpluses that cover a, say, ten-year amortization of the depreciation funds currently used up for expansions. We have to dismiss this as a highly unrealistic proposition considering how poor the current surpluses of public enterprises are. Thirdly, the depreciation-inclusive resources estimated for the third plan period from the central public enterprises (non-railway) work out at no more than 3.7% of the average capital outlay (1961-66) of the enterprises enumerated in the C.A.G.'s Audit Reports.

An elaborate exercise was made by the Perspective Planning Division of the Planning Commission in 1964, which aimed at giving long-term precision to the estimates of resources from public enterprises, among other sources, for the successive plans. The assumption on which the estimates were based was that "the productive efficiency and the pricing policy of the public sector enterprises will be such as to yield a return of 10% on investment; this return would accrue with a lag of between two to four years from the year of investment."<sup>6</sup> Somewhat lower returns—about 6%—were assumed in the case of Railways and Posts and Telegraphs. The surpluses estimated by the Perspective Planning Division for 1965-67 at quinquennial intervals are as follows:

Table 2. Resources from Public Enterprises

Resource (1)	(Rs. crores)		
	1965-66 (2)	1970-71 (3)	1975-76 (4)
Net Profits	2,150	4,420	10,660
Depreciation Funds	1,380	3,100	5,650
<b>Total</b>	<b>3,530</b>	<b>7,520</b>	<b>16,310</b>
<b>Total Investment</b>	<b>84,510</b>	<b>171,950</b>	<b>284,150</b>

Source: *Notes on Perspective of Development India: 1960-61 to 1975-76*, Planning Commission (1964), Appendix K.

<sup>6</sup> Government of India, Planning Commission, *Notes on Perspective of Development India: 1960-61 to 1975-76*, p. 27.

they include not only the estimated return on investment, exclusive of corporate taxation and interest charges on the loan portion of the capital outlay (or dividend in the case of Railways and Posts and Telegraphs) but also net depreciation resources.

While the 1970-71 estimate of surplus is a little more than double the 1965-66 estimate, corresponding to a similar investment relationship between the two years, the estimate for 1975-76 is relatively high—4.6 times the 1965-66 figure and 2.2 times the 1970-71 figure, while the 1975-76 investment will be only 3.4 times the 1965-66 figure and 1.7 times the 1970-71 figure. This implies a progressive utilization of capacity and ironing out of outlay-gestations.

The sector-wise estimates of surplus—in aggregate as well as the main component of net profits—are indicated below. These reflect the varying rates of resource mobilization expected from the constituent sectors of public enterprise.

**Table 3. Surpluses as Rate of Investment** (%)

Sector	1965-66		1970-71		1975-76	
	Net Profit as % of Total Investment	Total Surplus as % of Total Investment	Net Profit as % of Total Investment	Total Surplus as % of Total Investment	Net Profit as % of Total Investment	Total Surplus as % of Total Investment
(1)	(2)	(3)	(4)	(5)	(6)	(7)
Railways	2.70	2.70	3.65	3.65	5.21	5.21
Post and Telegraphs	2.85	3.80	3.61	4.72	5.00	6.20
Electricity	1.27	3.00	0.92	2.69	2.01	4.04
Road Transport	5.00	11.00	3.90	10.00	4.93	1.22
Steel	3.68	7.01	2.43	5.59	3.89	7.42
Fertilizers	2.56	7.05	2.77	6.29	3.95	6.89
Machine Building	1.20	2.40	2.70	4.00	3.74	5.22
Oil	3.20	7.41	3.08	7.24	4.09	7.06
Mining	3.02	6.27	4.59	6.89	3.74	7.35
Others	2.82	5.64	2.30	4.69	3.89	6.77

Source: Same as for Table 2.

Except for the departmentally-organized railways, Posts and Telegraphs and 50% of road transport, whose profits are tax-free, the various sectors, curiously, are estimated to earn very similar rates of return. The rates are rather low, in any case.

## 2. Actual Surpluses

Public enterprise surpluses have actually fallen below the low targets outlined above. While the contributions from railways were satisfactory during the third plan period, the surpluses of the other central government enterprises were "of the order of Rs. 70-80 crores" during the first three years of the plan and those of the state government enterprises were about Rs. 75 crores.<sup>7</sup> The Progress Report for 1963-65 cited the figure of Rs. 266 crores

for the first four years of the plan, as against the five-year plan target of Rs. 450 crores and feared "a substantial shortfall."<sup>7</sup> The actuals in 1966-67, the first year after the third plan, were as follows:<sup>8</sup> railways: Rs. 6 crores, as against a target of Rs. 34 crores; and other public enterprises: Rs. 144 crores, as against a target of Rs. 218 crores.

Let us now go deep into the question of returns from public enterprises.

(i) The performance of the central government companies has been unsatisfactory, as the following figures indicate.

Table 4. Annual Returns from Central Government Companies

(1)	No. of Enterprises Covered (2)	Total Capital Employed (Rs. crores) (3)	Total Return (Rs. crores) (4)	% of Return on Capital Employed (5)
1960-61	43	920.43	8.52	+0.93
1961-62	46	1090.75	-7.65	-0.70
1962-63	46	1294.11	-4.68	-0.36
1963-64	52	1573.59	+26.27	+1.67
1964-65	60	1868.82	+46.59	+2.5
1965-66	68	2225.88	+53.03	+2.4

Source: Central Government, *Audit Report (Commercial)*, for the years concerned.

The term "total capital invested," as employed by the C.A.G., includes equity, loans, and free reserves; and "total return" refers to profit (before tax), plus interest on long-term loans.

(ii) Since the public sector is functionally heterogeneous, let us examine the rates of return on the basis of its classification under the heads: under-construction, running, promotional and developmental, and financial enterprises.

Table 5. Returns from Enterprise Categories: 1965-66

Category (1)	Total Capital Invested (Rs. crores) (2)	Total Return before Tax (Rs. crores) (3)	% of Total Return to Capital Invested (4)
1. Under Construction	155.16	(-) 0.42	(-) 2.71
2. Running Concerns:			
Hindustan Steel Ltd.	960.10	20.65	2.2
Others	1151.19	35.10	3.04
	2111.29	55.75	2.64
3. Promotional and Development	179.72	3.37	1.89
4. Financial	1.89	0.10	5.3
Total	2448.06	58.80	2.40

Source: Central Government, *Audit Report (Commercial)*, 1967, Annexure "A".

<sup>7</sup> Government of India, Planning Commission, *The Third Plan Mid-Term Appraisal*, 1963, p. 35.

<sup>8</sup> Government of India, Planning Commission, *The Third Plan Progress Report, 1963-65*.

<sup>9</sup> Government of India, Planning Commission, *Annual Plan, 1967-68*, p. 33.

While the enterprises under construction are marked by deficits on grounds of gestation, the others have not done very well at all. The low returns from the promotional enterprises may merit some justification on grounds of motivation of such enterprises in operating at promotion-oriented prices. But the main category of running concerns made too low a return, viz., 3.04%, before tax, exclusive of Hindustan Steel Ltd., and 2.64% only inclusive of that giant company.

(iii) The unequal surplus potentialities of different enterprises are indicated by the following classification of enterprises by surplus (in 1965-66), *vide* columns (2) to (4).

**Table 6. Surplus Classification of Central Government Enterprises**

Rate of Return (%)	1965-66			1961-66		
	No. of Enterprises	Total Capital Invested	% of col. (3) to Total col. (4)	No. of Enterprises	Total Capital Invested	% of col. (6) to Total of col. (7)
(1)	(2)	(3)	(4)	(5)	(6)	(7)
Less than 0	25	281.82	11.28	17	537.80	22.11
0- 3	13	1654.97	66.25	13	1446.90	59.52
3- 6	10	366.17	14.66	8	288.37	11.86
6- 8	3	73.67	2.94	4	45.94	1.89
8-10	2	7.17	0.29	4	15.64	0.64
10 and above	17	113.88	4.56	19	96.30	3.96

Source: Calculated from the data from the Audit Report.

Of the 70 central government enterprises, including four corporations, classified here, only nineteen earned 8% or above in 1965-66; their relative position in the aggregate of investment is small indeed—about 5%, as per column (4). These are the ones that followed pricing policies, by design or accident, which resulted in raising resources. No less than three-fourths of the total outlay earned too low returns, either through promotional prices by design or because of gestation or high cost structures. Columns (5) to (7) are added on the basis of the average rate of return recorded during the five years, 1961-66, in the hope that these figures are free from the peculiarities

**Table 7. Non-Cost Reserves as Rate of Capital Outlay (1965-66) (%)**

Reserves as % of Capital Outlay	No. of Public Enterprises	Capital Outlay (Rs. lakhs)	Col. (3) as % of Total
(1)	(2)	(3)	(4)
0	18	157,045.79	69.61
Up to 5	8	29,943.05	13.27
5-10	8	12,661.90	5.61
10-15	6	12,265.73	5.43
15-20	7	10,360.79	4.59
20-30	2	1,292.28	0.57
30 and above	5	2,039.85	0.90

Source: Same as for Table 6.



of a single year (1965-66). The inference is similar, on the whole; the 1965-66 surplus structure is naturally slightly superior to the 1961-66 average position.

(iv) At this stage some direct evidence on the extent of mobilization of internal resources by public enterprises may be added. Column (1) below shows the proportion of non-cost reserves as a percentage of total capital outlay; columns (2) and (3) respectively show the number of enterprises and the outlays concerned at different proportions of surplus resource.

Enterprises under construction have been omitted from this tabulation, as they cannot be expected to accumulate free reserves. Of the 54 running concerns (manufacturing, promotional, and development), eighteen had no non-cost reserves at all at the end of 1965-66 and, together with the eight enterprises having up to 5% of reserve promotions, constitute more than four-fifths of the total outlay. The seven enterprises with reserves of 20% of total outlay or above, are: Indian Telephone Industries Ltd., Hindustan Antibiotics Ltd., Hindustan Insecticides Ltd., Garden Reach Workshops Ltd., State Trading Corporation of India Ltd., Hindustan Steel Works Construction Ltd., and Rehabilitation Housing Corporation Ltd. These, however, are a minor segment of the area covered by the tabulation, accounting for less than 1.5% of the total outlay. Inclusive of the seven enterprises marked by 15-20% reserve proportion, the figure rises to no more than 6%. Herein lies clear evidence of resource-oriented prices not having been effectively operative in the public sector yet.

### 3. *Shortfall in Surpluses*

A major explanation of the serious shortfalls in surpluses from public enterprises is that the surplus targets held by the Planning Commission have been neither based realistically on the actual conditions and potentialities of the individual enterprises nor translated into operative terms in respect of each enterprise. An over-all surplus aim for the public sector as a whole has little meaning unless it is broken down into targets realizable by individual enterprises through their pricing policies. Most enterprises that could raise surpluses because of monopoly conditions were exposed to unresolved clashes between their surplus criteria on the one hand and social preferences originating externally on the other. In illustration we may refer to the criticism of the prices of fertilizers leading to high profits of the Fertilizer Pool and the frequent subordination of surplus aims to low prices in the case of electricity.<sup>10</sup>

<sup>10</sup> The Minister for Industries, Madras, contended recently that "the Electricity Board was not functioning with an eye on profit and naturally it was too much to expect huge gain on their capital investment of over Rs. 250 crores. Its main aim was to supply as far as possible energy at a lower rate to agriculturists, domestic consumers, and industrialists." (*The Hindu*, November 29, 1967.)

Another instance: The Finance Minister, Mysore State, stated recently that the Central Government and the Planning Commission had put pressure on Mysore to increase its electricity tariffs for augmenting the state resources but the state had resisted it so far. (Reported in *The Hindu*, December 23, 1967.)

(i) A popular explanation of the low-profit or losing public enterprises has been that they belong mainly to the basic or intermediate goods category and that they ought not to neglect promotional price policies for the sake of raising surpluses. (For instance, steel forms 41% of outlays of central public enterprises, other than railways and posts and telegraphs, engineering 20%, petroleum 12%, chemicals 9%, minerals 7%, and aviation and shipping 5%.<sup>11</sup>) While there is some force in this plea, two qualifications are necessary: first, that the investments involved are so heavy that the economy cannot long be insulated from the impact of their real or full costs; and second that, if this plea were seriously meant, the planners, while formulating the plans, ought not to take credit for a resource that does not exist from "steel plants, fertilizer plants, oil refineries, other industrial enterprises, power projects" and so on.<sup>12</sup> Perhaps it is fair to conclude that, whatever the theoretical aims of the planners, individual public enterprises have been exposed variously to irresistible social and political considerations.

(ii) Another common plea is that of gestation. The age structure of the Central Government's industrial and commercial enterprises is as follows, in 1965-66.

Table 8. Age Structure

Age (1)	% of Total Capital Outlay (cumulative) (2)
2 years or less	3.18
3 years or less	8.76
5 years or less	17.26
8 years or less	31.15
10 years or less	52.63
15 years or less	98.19

The picture is not strikingly one of utter infancy. In fact the Perspective Planning Division of the Planning Commission assumed a return "with a lag between two to four years from the year of investment."<sup>13</sup> Experience indicates that the main cause for concern has been severe under-utilization in many enterprises, e. g., Heavy Engineering Corporation Ltd.;<sup>14</sup> Neyveli Lignite Corporation Ltd., and Heavy Electricals (India) Ltd., because of lack of orders or persistent production difficulties, including labor unrest; and excess capacities and wrong production planning have been complacently mistermmed as gestation in many instances.

<sup>11</sup> Minister of Finance, *Annual Report on the Working of Industrial and Commercial Undertakings of the Central Government, 1965-66*, p. 4.

<sup>12</sup> *The Third Plan Mid-Term Appraisal*, p. 35.

<sup>13</sup> *ibid.* p. 27.

<sup>14</sup> The production at Heavy Engineering Corporation Ltd., Ranchi, at 1,100 tons of structurals per month, remains heavily behind schedule, as against a target of 32,000 tons for 1967-68. (*The Statesman*, December 3, 1967.)

(iii) A major cause of low surpluses in the high cost structure of many a public enterprise—a matter of particular relevance in a pricing review. This is partially the result of uneconomical locations, e. g., the Barauni refinery, long gestations, as in Nagarjuna Sugar Project, under-utilizations, which are quite ubiquitous, heavy inventories, as in Surgical Instruments Plant at Madras, surplus labor, e. g., in Sindri Fertilizer Plant, Rourkela Steel Plant and Hindustan Shipyard, work stoppages, as in Heavy Electricals Ltd., poor materials handling, as profusely illustrated by the Committee on Public Undertakings in its 40th report,<sup>15</sup> and so on. To no small extent have high costs stood in the way of price enhancements that could bring in surpluses, within the range of what the consumers could bear; and the theoretical

Table 9. Computed Rates of Return on Non-township Outlays (1965-66)

Public Enterprise (1)	Rate of Return on Total Capital Outlay (2)	Computed Rate of Return on Non- township Outlay (3)
1. Air India	6.8	7.01
2. Ashoka Hotels Ltd.	13.24	14.09
3. Hindustan Aeronautics Ltd.	2.33	3.28
4. Bharat Electronics Ltd.	16.58	24.38
5. Bharat Heavy Electricals Ltd.	-1.40	-1.65
6. Cochin Refineries Ltd.	1.73	1.78
7. FACT	-0.58	-0.60
8. Fertilizer Corporation of India	2.78	3.12
9. Heavy Electricals (I) Ltd.	-6.54	-7.88
10. Heavy Engineering Corpn. Ltd.	0.41	0.49
11. Hindustan Antibiotics Ltd.	24.75	30.93
12. Hindustan Cables Ltd.	-0.99	-1.36
13. H.M.T. Ltd.	6.83	8.54
14. Hindustan Insecticides Ltd.	16.26	20.58
15. Hindustan Photo Films Mfg. Co. Ltd.	2.01	2.36
16. Hindustan Shipyard	0.29	0.35
17. Hindustan Steel Ltd.	2.2	2.36
18. Hindustan Teleprinters Ltd.	10.0	15.63
19. I.D.P.L.	-0.33	-0.39
20. I.O.C. Ltd.	3.25	3.53
21. Indian Rareearths Ltd.	10.12	11.00
22. I.T.I. Ltd.	20.9	33.17
23. Manganese Ore (India) Ltd.	23.3	40.87
24. N.C.D.C.	2.97	3.58
25. N.L.C.	2.52	2.77
26. O.N.G.C.	1.6	1.65

Source: Calculated on the basis of data on townships from the *Eighth Report of Committee on Public Undertakings, Third Lok Sabha, May 1965.*

<sup>15</sup> For instance, Rs. 111.07 lakhs worth of stores did not move for three years in National Coal Development Corporation Ltd.; Rs. 607 lakhs worth for a year in Rourkela Steel Plant. (p. 10 of the Report.)

potentialities of surplus that monopoly holds could not come to fruition in the public sector which undoubtedly has significant elements of monopoly power. The question of high costs will be considered later in the section on surplus-price linkage.

(iv) There is validity in the contention that the rate of return looks lower than it is because of the heavy doses of outlay on townships (and welfare) which public enterprises, unlike many private enterprises, undertake. In order to steer through this point we may compute the rate of return, by expressing the actual return as a percentage of outlay exclusive of townships. It would have been better if net annual expenditures on townships were deducted from the rate of return, but the expenditure data are not readily available.

True, the computed rate of return is higher than the book figure but not sufficiently high to invalidate the broad conclusion of low surpluses. Incidentally, these data lend an analytical aspect to the pricing study. Townships may be conceded as an element of social policy through the agency of public enterprises; and naturally the quantum of outlay on them is an "external" determination. While the economist may not opine on its justification, the question may be raised as to whether it is proper for the consumer of the product concerned to bear the whole burden of a broad social cost. When we note that not all enterprises either in the public sector or in the two sectors have invested equally on townships, the inequity of different consumer groups being charged with different magnitudes of social cost is obvious. So public enterprise prices should be unconcerned with township costs—let us say, for reasons of convenience, beyond the proportion of say 10% of total outlay. The actual proportions in the case of 32 central government enterprises are as follows; and about two-fifths of the aggregate outlay is marked by a proportion of 10% or more—covering 22 out of the 32 enterprises to which the data refer.

**Table 10.** Outlays on Townships (1965-66)

% of Outlay on Township to Total Outlay (1)	No. of Enterprises (2)	Total Outlay (Rs. lakhs) (3)	Percentage of col. (3) to Total (4)
Less than 5	3	1894.00	0.76
5-10	7	143556.20	57.67
10-15	5	24969.82	10.03
15-20	6	68097.09	27.34
20-30	6	2658.36	1.07
30 and above	5	7799.09	3.13
<b>Total</b>	<b>32</b>	<b>248974.56</b>	<b>100.00</b>

At this point we may add that there is another item (of revenue expenditure) calling for the same kind of policy treatment as outlined above, namely the high, non-statutory welfare expenditure. Once again these are unequal among the enterprises—per employee or unit of output value—and result from arbitrary managerial decisions.

4. The Price-surplus Linkage

There has yet been no deliberate linkage of pricing policy with surplus targets in Indian public enterprise, except for a few belated attempts by railways, Road Transport Corporations and State Electricity Boards to raise their prices so as to meet their minimal obligations of dividend or interest on capital, which have been set by statute or convention. In the generality of public enterprises surplus realizations present such wide disparities from one year to another that do not certify to the conscious application of remedial price techniques at all.

(i) It is an interesting exercise to examine the disparities in the rate of return from year to year during 1961-66. The following is a cross-classification of coefficients of variation, i.e., standard deviations as percentages of averages (of rates of return), and average rates of return during 1961-66 in respect of 59 central public enterprises.

Table 11. Cross-Classification of Rates of Returns and Dispersions (1961-66)

Standard Deviation as a % of Average Rate of Return (1)	Average Rate of Return (%)						Total No. of Enterprises (8)
	Less than 0 (2)	0-3 (3)	3-6 (4)	6-8 (5)	8-10 (6)	10 and above (7)	
0- 20	3	—	4	—	1	5	13
20- 40	2	1	1	—	—	5	9
40- 60	—	3	—	3	2	4	12
60- 80	2	—	2	—	1	1	6
80-100	2	1	1	—	—	2	6
100-150	2	—	—	—	—	—	2
150-200	—	3	1	—	—	—	4
200-500	—	3	—	—	—	1	4
500 and above	1	2	—	—	—	—	3
<b>Total Number of Enterprises</b>	<b>10</b>	<b>13</b>	<b>7</b>	<b>3</b>	<b>4</b>	<b>8</b>	<b>59</b>

Two points emerge: (1) A large number of enterprises are marked by a high degree of dispersion in rate of returns, implying either the absence or ineffectiveness of pricing policies designed to stabilize the rate of return. (2) Many of the highest-surplus enterprises present low degrees of dispersion. Of the fifteen with a rate of return of 6% or above, as many as ten have a coefficient of variation of less than 60%. The ten best—i.e. those having a combination of highest rates of return and lowest dispersions—are: Indian Telephone Industries Ltd., Moghul Lines Ltd., Ashoka Hotels Ltd., Rehabilitation Housing Corporation Ltd., Export Credit & Guarantee Corporation Ltd., Bharat Electronics Ltd., Hindustan Antibiotics Ltd., Hindustan Housing Factory Ltd., National Projects Construction Co. Ltd., and State Trading Corporation of India Ltd. (The majority of these, however, are relatively small concerns.)

(ii) The moment pricing policies begin to be linked directly with surplus

targets, two serious questions arise. Firstly, should an increase in surplus be earned through a general enhancement of prices or a general reduction in prices or a pattern of discriminatory adjustments in the different markets served by an enterprise? The demand elasticities supply part of the answer; what is equally important is that the managements should be capable of, and interested in, exploring the efficacies of alternative price policies. The limited experience we have of price measures—particularly in road transport and Indian Airlines—is one of blanket enhancements from time to time. The easiest course for a monopoly is price enhancement, and many (central) public enterprises enjoy monopoly power; they ought to aim at price structures consistent with maximizing outputs, while raising surpluses, making due but deliberated compromises between the two maximizations wherever necessary. In simple words, if a choice exists between high prices, low outputs and a given surplus on the one hand and low prices, large outputs and the given surplus on the other, the latter should be preferred; and fundamentally the management should be capable of exploring and identifying the choices.

Secondly, should a price be enhanced for the sake of increasing (or even raising) a surplus, without first reviewing the cost structure? If the costs can be demonstrated as excessive for any of the reasons cited in an earlier section, it will be purposeless to devise price changes for the sake of a surplus; (if this were all to do, nothing would be easier for a callous monopoly than to jump at the policy.) On this ground it appears that many public enterprises in India are faced with a complex problem of pricing decision; viz., that their costs are “excessive” or burdensome to the consumer while their returns are low;<sup>16</sup> should prices be raised automatically?

(iii) Many a public enterprise is so large, multiplant and multiproduct in nature that the size of the over-all surplus or rate of return ceases to be the whole point of interest. It may result from an intensely discriminatory pattern of prices within the enterprise; a loss, a low surplus or a high surplus may be the end result of quite dissimilar cost-price relationships in its markets. The concept of a linkage between surplus and the over-all or average price (or revenue) serves little purpose in such a case. Instead, the role of price as an instrument of surplus has to be stipulated, market by market, or product by product, in broad terms and as far as possible. This is generally not done today. A few examples of enterprises that warrant such a meticulous pricing approach are the railways, Electricity Boards, Damodar Valley Corporation, Indian Airlines Corporation, State Trading Corporation of India Ltd., and Neyveli Lignite Corporation Ltd. Where a part of the operations of an enterprise is promotional by design, the propriety of price differentials, vis-à-vis related costs, among its products or markets becomes a matter for particular decisional caution with regard to the exact incidence of the promotional

<sup>16</sup> Just one random instance of “Excessive” costs. In March, 1966, 24.73% of the total wage was paid as “overtime” without any corresponding increase in production in Durgapur Steel Plant. (Vide, *The Hindu*, September 15, 1967 reporting a Parliamentary Study Group’s findings.)

prices. (How promotional are the promotional prices and who bears the deficits involved?)

## II. PRICING TECHNIQUES

We shall now examine the major methods into which the diverse price practices of the public enterprises may be classified.

### 1. "Cost-plus" Prices

Two aspects of these prices deserve notice. Firstly, all costs are recovered through prices; one may use the term "full-cost pricing" to describe this method, but with the qualification that there exist no market tests of the legitimacy of the costs. Secondly, the predetermined "plus" implies a deliberate surplus design.

The enterprises adopting this technique are few in number, e.g., Hindustan Cables Ltd., Hindustan Aeronautics Ltd., and Indian Telephone Industries Ltd. These have for their main or only customer the government and enjoy monopoly in supplying the products in question; or else prices on the basis of whatever the costs cannot be maintained.

Two reasons in support of this technique may be advanced in particular. (i) It is justified in the early stages of an enterprise in a new-technology area, where the production problems and long-term cost conditions cannot be predicted exactly; so that once we decide on having the manufacture in the country it is fair to meet the actual costs in full. (ii) The government has the choice of either paying a price that covers all costs and a return on investment, or stinting on price but meeting the costs of capital of the enterprise through a direct or indirect subsidy from the public exchequer. For, the government happens to be in the position of an underwriter of the interest payments in respect of the capital supplied by it to the enterprise.

This method of pricing has revealed certain deficiencies. Firstly, it does not penalize inefficiency, for whatever the costs, the price is sufficient to meet them. In fact it tends to place a premium on inefficiency. An interesting aspect of the formula is the addition of a set percentage to the cost of a product in order to arrive at its price. If the cost shoots up, due to work stoppages, material wastages or any other reason, the "plus" rises too! Within the limits of valid applicability of this technique, an adjustment factor in respect of the "plus" percentage should be designed in such a way that neither an inflated cost at once raises the surplus nor the investment gets over-remunerated for that reason.

Secondly, the price formula simply makes every line of production equally profitable; in any case no line ever becomes unprofitable. As a result the enterprise ceases to exercise initiatives in optimizing its product-mix. It is possible that some outputs are relatively expensive or the technical ability of the enterprise is low in producing them, it should then be right for it to give up those outputs or regulate demand into the more economical outputs. It

may even be worthwhile for the country to import such items. None of these economical measures is likely to emerge from the cost-plus formula. The experience of Hindustan Cables Ltd. is illustrative in this regard.<sup>17</sup>

## 2. *Marginal Cost Pricing*

Three situations of marginal cost pricing may be distinguished: (a) Decreasing-cost industries—the well-known case, illustrated by many public utilities where social returns are as significant as, if not more significant than, the surpluses of the enterprises themselves; (b) Within given capacities which are likely to be fully commissioned within a short period; (c) Under conditions of excess capacity, i.e., capacity created on a scale that is unlikely to be commissioned or equalled by demand over a foreseeable period.

The first case involves almost permanent subsidization from the public exchequer, of the industries whose average costs continuously decline or whose marginal costs are lower than the average costs in the ranges of demand that exists. While it is true that such public utility industries are concentrated in the public rather than in the private sector in India, their pricing policies have not been confined to the recovery of marginal costs, except for certain specific markets. For example, the railways and the Electricity Boards do not aim at marginal cost pricing on the whole.

The other two situations are very common in the Indian public sector. Many enterprises are under-utilized, e.g., Heavy Electricals (I) Ltd., Heavy Engineering Corporation, and Neyveli Lignite Corporation Ltd. Their prices are, therefore, aimed at recovering at least the marginal costs and some contribution toward fixed charges. This method is inevitable under conditions of competition; for instance, Heavy Electricals (I) Ltd., finds it necessary to reduce the factory overheads allocation as a percentage of direct labor costs from 1200 to 600 on some products like industrial motors and rectifiers in which competition is experienced. Even where competition does not exist, a strong buyer is found resisting the full burden of under-utilization; for example, Hindustan Steel Ltd. does not accept the full cost of Heavy Engineering Corporation Ltd. or National Coal Development Corporation Ltd. washeries as the basis of prices, for these are high as a result of heavy under-utilization of capacity.

The situation of excess capacity has far-reaching implications. Prices based on marginal costs, plus some contribution toward fixed costs, will be a permanent feature. At this stage we may distinguish between two facets of marginal cost pricing. An enterprise may base its price on marginal cost in order to promote the consumption of the output in question—a matter of social preference effectively imposed on the enterprise; or, an enterprise may do so because there exists practically no demand at full-cost prices. The latter is a case of wrong investment—probably the legacy of project decision without a demand survey. There are examples of grossly excess capacities in

<sup>17</sup> The author's paper "the Pricing Problem of Hindustan Cables Limited," *Applied Economic Papers*, September 1964.



the public sector. The spun pipe plant of Hindustan Steel Ltd. has few orders; only one out of the nine carbonizing plants has been in operation in Neyveli Lignite Corporation Ltd., a whole penicillin capacity is going up at Risikesh at a time when the supply is about equal to demand and the trend seems to be of a decline in demand for penicillin; and many of the railway extensions work at very low degrees of capacity.<sup>18</sup>

### 3. *Discriminatory Pricing Structures*

It is common for an enterprise with several products or non-transferable markets to operate a price structure, rather than a single price; and often discriminations can be inferred from a comparison of a price with the related cost of supply. There can be two reasons for such a policy. (i) In the absence of the relatively low-priced sales the total output or utilization of capacity will decline so as to raise the unit cost for the rest of the output; in terms of this argument the discrimination is in the interest of the apparently higher-priced markets. (ii) Alternatively, the discriminations may be the product of external pressures, open or informal; or they may result from casual pricing decisions on the part of the managements. It is fair to the consumer groups that the exact anatomy and cause of every discrimination should be established and adjudged. This is not attempted yet, by and large; and it seems to be taken for granted that a government undertaking, for that reason, operates no *mala fide* discriminations. A few of the blatant, though inadequately recognized, situations of price discriminations, are briefly outlined below:

#### (1) Railways:

There exist inter-regional and inter-functional subsidizations of a severe nature. Under the guise of uniform rates South Eastern, Central and Eastern Railways have been subsidizing the operations of North East Frontier, North Eastern and Southern Railways since 1954. Goods traffic has been subsidizing passenger traffics; and many branch lines have not been recovering even the marginal costs.

#### (2) Indian Airlines Corporation:

The cost-price relationship are diverse among the different services operated by this Corporation. The region-wise, route-wise, or aircraft-wise figures of cost and revenue offer evidence in support of this conclusion. In 1965-66 there were 17 routes where the total revenue exceeded the total cost, 15 routes on which the prices covered the direct operating costs but fell short of the total costs, 12 routes on which the prices covered only the variable direct operating costs but fell short of total direct operating cost; and 41 routes on which the prices did not cover even the variable direct operating costs. The last category is the most subsidized and unjustifiably so on sheer economic criteria.

#### (3) State Trading Corporation of India:

<sup>18</sup> Government of India, Planning Commission, *The Committee on Transport Policy and Coordination; Preliminary Report*, New Delhi, 1961.

This presents an interesting case of several heterogeneous obligations, commercial and non-commercial, ranging over various major channels of exports, imports, and internal trade. The enterprise has been making dissimilar rates of return in the different markets. An interesting case was cited by the Estimates Committee,<sup>19</sup> regarding the loss of Rs. 2.13 crores sustained in the export of ground-nut oil of the value of Rs. 6 crores. Favorable price discriminations in this market exceeded 33% of the actual price. A possible explanation in support of the transaction is that the enterprise thereby earned foreign exchange to the tune of Rs. 3.44 crores. Actually this raises certain serious questions regarding the category of pricing decisions to which this transaction belongs. For example, was this discrimination the right decision for maximizing export earnings? Could other discriminations, cheaper or more effective, have been devised for given accruals of foreign exchange? Is the pattern of price discriminations entailed by such operations approved by the government or any other authority vested with the evaluation of the national preferences through the pricing policies of this enterprise? Does the management of this enterprise have exclusive autonomy in making decisions on grounds of national interest, without clear guidance or open direction from the government?

In concluding on the technique of discriminatory prices we may refer to a subtle version of it in the form of "uniform prices." These have an appeal to the layman and the first impression they offer is one of equity of treatment among all consumers. But their inequity can be analytically established if cost of supplies to different groups of consumers are different while the prices charged are uniform. The illustrations of the railways and Indian Airlines Corporation, cited above, clearly support this suggestion. Uniform prices as an agency of price discriminations are a particular characteristic of public enterprises expanding in size, in many cases on a nation-wide scale. Strictly these call for demonstrated justification, lest gross shifts of benefit take place among consumer groups on criteria other than costs and demand conditions.

#### *4. Import-price Basis*

In the case of public enterprises which have no comparable units in the country and whose costs of production are far higher than the prices at which the products can be imported from abroad, the view has developed that the import prices would constitute a reasonable basis of price fixation. Two versions of the basis are examined below:

(i) Landed-cost basis: Some of the enterprises, in whose case this formula has been canvassed either by the enterprise or by the consumer, are Heavy Engineering Corporation Ltd., Heavy Electricals (I) Ltd., and Hindustan Photo Films Manufacturing Co. Ltd. The underlying idea is that the consumer ought not to be burdened with the high costs of production of the enterprise. However, this price basis is characterized by certain difficulties. Firstly, we cannot be certain that the imported product to which the landed-cost basis

<sup>19</sup> Estimate Committee, *49th Report, Third Lok Sabha* (in 1963-64)

applies exactly approximates, in quality and technical composition, to the product manufactured at home. It has been contended in some cases that the imports in question represent "seconds", for example, certain film imports. Secondly, the prices of the imports may be particularly low as a matter of the dumping policy adopted by foreign exporters; for example, a Japanese firm has recently quoted to a State Electricity Board a pre-devaluation price for a steam turbo-generator set, which represents about half of the corresponding price that an established firm in the United Kingdom is capable of.

Fundamentally the landed-cost basis has four variables in it: (i) the price at which the foreign producer decides on exporting the product to the Indian market, (ii) the rate of exchange between the foreign currency and the Indian currency, (iii) the import duty levied on the product, and (iv) the cost at which the foreign producer can produce the output. The first factor depends on a policy decision of the exporter, the second and the third depend on policy decisions by the Government of India; and the last one depends on the production efficiency on the part of the foreign manufacturer. On grounds of both scale of output and established experience in the technology concerned, he is likely to have attained an economical cost level, which the new entrants in the field in India will take time to reach.

An interesting example of how the landed-cost basis operates may be provided with reference to Heavy Electricals (I) Ltd. The prices of power transformers, large motors, 33 and 66 K.V. switch gear, water turbines, and generators are fixed at approximately 25% above the pre-devaluation landed-cost applicable to similar equipment imported from the United Kingdom. This involves a reduction in the allocation of factory expenses from 1800% to 1000% of direct labor costs.

(ii) International-parity prices: The Hindustan Shipyard Ltd. and Hindustan Aeronautics Ltd. constitute excellent examples of this basis. The Avro aircraft produced by Hindustan Aeronautics Ltd. is analogous in its performance to the Fokker Friendship aircraft; hence the sale price of Avro to Indian Airlines Corporation is determined on the basis of the price at which the Fokker Friendship could be imported from abroad. The difference between the cost of production and the price so arrived at is made good by the government as a subsidy to Hindustan Aeronautics Ltd. The Avro transactions of this nature are, however, a minor proportion of the total operations of this enterprise.

Hindustan Shipyard Ltd. provides a complete illustration of this pricing formula. At one time the buyer of a ship was offered price parity with a corresponding United Kingdom ship; later the principle of *international* price parity has been adopted, the reason being that the Indian shipowner who buys a ship from Hindustan Shipyard Ltd. ought not to be at a disadvantage in capital cost in the competitive international shipping operations that he conducts. The difference between the international-parity price and the actual cost of production at the Shipyard is paid by the government to the company as a subsidy. It is true that the subsidies are repayable to the government

when the company earns profits exceeding 4.5% on capital; it is doubtful how soon, or whether, that position will be reached. The total subsidy received by the company up to 1965-66 was Rs. 1169.16 lakhs. This compares with its capital outlay of Rs. 609 lakhs. The subsidy as a percentage of the cost of the ship worked out about 35-40% during 1964-66. (The figure used to be far lower—about 18% during 1962-63.) An arresting feature of the price formula is that but for the subsidy elements the entire capital of the company would have been eaten up long ago.

The difference between the landed-cost basis and the international-parity-price basis seems simply to lie in the large magnitude of deficit involved in the latter case, coupled with the well-determined assumption by the government of subsidizing the cost-price differentials. Another difference may be speculated, namely that, the enterprises to which the landed-cost basis applies are expected to break-even after a few years, whereas it is a matter of serious doubt as to whether Hindustan Aeronautics Ltd. and Hindustan Shipyard Ltd. will be able to operate at costs comparable with international prices in the foreseeable future.

##### 5. *Externally Determined Prices*

Three categories may be distinguished under this head:

(i) Certain prices are controlled by the government on grounds of essentiality of the product and for reasons unconnected with the fact that public enterprises are involved in the field. In several instances a given price control applies to both public and private undertakings, for example, road transport, and drugs. Some other major examples are fertilizers and steel; in such case, the reason for control has been twofold, namely, that the supply of the product has been scarce when compared to the demand for it, and the product is of such a basic nature either for industries or for agriculture that the market forces could not be allowed an unhindered sway in the determination of the prices. One complex problem presents itself in the case of a "mixed industry"; unequal retention prices without any qualification whatsoever promotive of efficiency on the part of the less efficient firms, tend to subsidize inefficiency, whereas a common retention price irrespective of individual factory costs tends to make abnormal surpluses available to the more efficient firms, usually, though not necessarily, in the private sector. The price control mechanism, therefore, ought to be meticulously formulated to avoid these unintended consequences.

(ii) Inter-enterprise prices: The fixation of prices as between one public enterprise and another has emerged as a complicated problem in the recent years. Some specific areas illustrating the complications are: the supply of coal from the washeries of National Coal Development Corporation Ltd. to Hindustan Steel Ltd., the supply by Hindustan Steel Ltd. of pipes to Indian Oil Corporation Ltd. and of wheels to the railways, the sale of power by Neyveli Lignite Corporation Ltd. to Madras State Electricity Board, and the supply of heavy machines by Heavy Engineering Corporation Ltd. to Hin-

dustan Steel Ltd. Experience indicates that too little use has been made of the basic principles of price determination in such cases. Neither the test of costs nor the ability of demand has been determinative; on the other hand, price fixations have been tentative and informal, placing emphasis, at the end of protracted argument, on smoothness of negotiation rather than on the economics of pricing.

(iii) Arbitrated prices: A relatively little used method yet, this may be illustrated by the recent arbitration over the price dispute between Oil and Natural Gas Commission and Gujarat State Electricity Board, involving several serious questions like the computation of capital outlay involved in the supply of gas to the Board, the structure of prices of gas supplied by the Commission in different states, and the paying ability of the Board vis-à-vis the conditions of non-availability of alternative rules within the state of Gujarat.

#### 6. *Indefinite-margin Prices*

This is a residual category and covers a large number of enterprises making either a profit or a loss from year to year, without any set guidelines from the government. No satisfactory explanation is available to the consumers and the public as to why a given enterprise makes, or is permitted to make, a certain level of profit or deficit, quite differently from another, and why the experience of profitability of an enterprise violently varies from year to year and cannot be attributed to the ordinary changes in business conditions from time to time. Three examples of the indefiniteness of margins involved in the price formula may be cited.

(i) Fertilizer Corporation of India Ltd. was expected to raise a surplus of Rs. 33 crores during the third plan period, but the management neither prepared this estimate nor was advised to aim toward this figure; actually the company hoped to raise a higher surplus—Rs. 41.32 crores.<sup>20</sup>

(ii) Nahan Foundry Ltd. formulated prices “on *ad hoc* basis” or on rough cost estimates, without having a “costing system”, and lost variously as follows:<sup>21</sup>

- Electric motors—about 37% of cost.
- Horizontal power cane crushers—52%.
- C.I. manhole frames and covers—30-35%.
- Key bearing plates—26%.

(iii) State Trading Corporation of India Ltd. put up high prices on several imports canalized through it defeating “the object of bringing down the prices by canalizing the imports through the Corporation.” “Instead of devising ways and means to regulate the prices and to see that the consumer got the goods at lower prices, the Corporation and the Government appear to have reconciled themselves to charging of high prices as the only way out.”<sup>22</sup>

Such situations leave unanswered questions of pricing motivation; for

<sup>20</sup> Committee on Public Undertakings, *Third Lok Sabha, Sixth Report*, 1965, pp. 82-83.

<sup>21</sup> *Audit Report (Commercial)* 1967, pp. 180-182.

<sup>22</sup> Estimate Committee, *Third Lok Sabha, Forty-ninth Report*, 1964, p. 30.

example, was a price intended to be high or low, surplus or deficit yielding, what has been the actuality, and is there any proven explanation of the deviation of the actuality from the expectation?

### III. SOME BASIC PROBLEMS

In the light of the analysis of surpluses targeted and realized, and the pricing techniques adopted by different public enterprises in India, we may make a few concluding observations focused on certain basic implications of the pricing problems.

#### 1. *The Problem of Cost*

An important reason why most public enterprises in India are characterized by low returns is that their costs are relatively high. The causes of high costs were outlined earlier in the paper. It is fair to the consumer, therefore, that the surplus he is asked to contribute toward should come, not primarily out of higher prices, but substantially from improved productivity and economics in costs. There is yet no adequate machinery to ensure that the cost structure of (every) public enterprise represents conditions of the utmost efficiency possible in its circumstances. Few attempts have been made, as in the case of Indian Airlines Corporation, to promote cost reviews by expert committees or otherwise.

An interesting dilemma emerges from the finding, in any particular case, that the costs are too high and that the consumer ought not to be charged the full burden of costs. To the extent the consumer is relieved of the incidence of high costs, the enterprise makes a deficit which has to be met eventually by the government in some form or other. A subsidy comes out of the public exchequer in the form of an annual appropriation from the government's budget for the purposes of the enterprise, or of ultimate write-off of the capital of the enterprise, or its contraction or liquidation. It is because of this ultimate national obligation that it appears to some as of little moment to undertake the meticulous exercise of isolating the costs that the consumer need not bear through prices from those costs that he should legitimately reimburse. But the exercise is of importance not only theoretically but in practice; for, every consumer or consumer-group benefits from it by being obliged to part with that purchasing power alone which an efficient supply of the product in question necessitates.

The need for the cost isolation suggested above arises, further, from certain unique conditions under which a public enterprise works. It is subject to "propriety costs," that is, costs arising out of its anxiety to appear "proper" vis-à-vis its accountability to Parliament. It is vulnerable to several kinds of external decision, ranging between the very formulation or location of the project on the one hand, and the operating decisions like wage and incentive payments on the other. These involve a cost to the enterprise. Finally, public enterprises undertake, directly or in an unnoticed manner, several

social obligations, as a result of which their actual costs contain elements of social costs which, in the case of an average private enterprise, are incurred, if at all, by a public agency outside the enterprise.

2. The pricing policy of a public enterprise is a function of its economic and social obligations. In terms of sheer logic it can be said, in a country wedded to the concepts of mixed economy, that almost every public enterprise represents some super-imposition of social functions over the purely economic functions of production and distribution. Except in a few cases of competitive industries or those serving in a purely commercial field, most public enterprises, therefore, call for a fairly clear definition of their social obligations; then follows logically the need to reconcile between the economic and the social obligations of each enterprise, or at least of each major category of enterprises. This is by no means easy; but the problems raised by the institution of the public enterprise call for sharply analytical and computational techniques in this direction. A socio-economic classification of public enterprises may be made on a basis such as the following:

- (i) enterprises with mainly non-economic or social functions;
- (ii) enterprises with both commercial and non-commercial functions; and
- (iii) enterprises with mainly commercial functions.

It may be appreciated that these demarcations are difficult and overlapping and tend to be arbitrary unless revised from time to time. Other possible classifications are on the basis of "industry"; for example, the public sector may be divided into transport, steel, oil, mineral, engineering, consumer goods, electricity, finance, etc. and appropriate targets fixed for each category of enterprises. In this context the effort of the British Government in fixing the surplus targets of different public enterprises is worth a systematic study,<sup>28</sup> though the Indian problem is terribly complicated in that it presents a heterogeneous composition of the public sector.

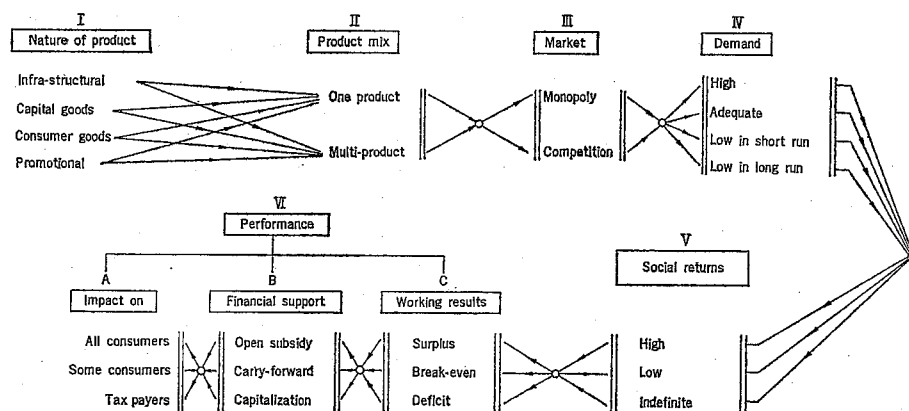
It will be useful to examine in a few cases of demonstrable social returns, whether any contribution could be required of local authorities directly benefiting from the operations of the enterprise, from the state governments concerned or from any other easily identifiable bodies. A possible example in illustration of this suggestion is that the pricing policy of Neyveli Lignite Corporation Ltd. may be designed toward a relatively low surplus, but the Government of Madras which happens to be a direct beneficiary may well be required to contribute toward its resources through an annual subsidy. So expressed, the problem is one of identifying the most appropriate agency or agencies for meeting the finance costs, if nothing more, of the enterprises significantly charged with non-commercial functions.

3. The composition of the public sector in India is already so heterogeneous that the diverse surplus or deficit conditions of different enterprises entail elements of indirect taxation or subsidies. Each enterprise has its own

<sup>28</sup> For example, the electricity supply industry was required to aim at a return of 12.4% gross, as against 10.2% in the case of gas, over the five-year period 1962-67. (Prof. Sir Ronald Edwards, *Financing Electricity Supply*, p. 10.)

characteristics on grounds of the nature of the product, the product-mix, the market, demand, social returns and performance under which sub-divisions of working results, financial support and eventual impact may be made. As a result of the mutual interactions of the exact characteristics under these heads, an enterprise eventually constitutes either a vehicle of indirect taxation of the consumers concerned, or a means of subsidizing the consumers concerned; in a few cases it remains neutral to tax and subsidy implications. It is one of the urgent requirements of public sector studies in India to identify the exact elements of budget policy indirectly, if not unnoticedly, permeating the price structures of a given public enterprise. The large number of possibilities of interactions among the different characteristics mentioned above is shown in diagrammatic form below in order to give a clear picture of the complexity of the problem.

4. In conclusion it seems to be necessary to set up a Public Enterprise Commission as an expert and recommendatory agency on the question of determining the surplus targets for different categories of enterprises, evaluating the appropriateness of the pricing systems suited to the surplus targets, the computation of social returns from different public enterprises and the balancing of such returns with their economic obligations, and all other incidental problems calling for analytical and economic expertise.<sup>24</sup>



<sup>24</sup> For a discussion of this suggestion, see author's "The Finance of Public Enterprises," Chaps. II and III.