# Trends in Level of Living in Urban India

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With reference to urban India, this paper examines how absolute levels of living of different groups of the population have been changing over time and whether disparity in levels of living across different groups has worsened. Also examined is the incidence of urban poverty over a long period spanning almost four decades.

A GOOD number of studies have been made on the incidence of rural poverty with its possible time trend and on intra- and interregional disparities in rural level of living in this country. These studies are mainly based on the NSS data on household consumption expenditures collected from nationwide samples of households almost continuously from the early 50s.

Obviously, studies on rural level of living are extremely important, as nearly three-fourth of India's population live in rural areas. However, not many studies exist on urban level of living, although an increasing need is being felt for such studies, in view of widespread urban unemployment and low rates of industrial growth in India.

A study on level of living may focus on two different aspects. It may examine how absolute levels of living of different groups of population have been changing over time. It may also seek to ascertain whether the relative level of living, i e, the disparity in level of living across different groups has worsened or not. The present paper intends to address to both the issues for urban India. It also examines the incidence of urban poverty over a long period spanning almost four decades. Such a long time series of the extent of poverty in urban India is not examined in any earlier study.

The paper is divided into four parts. Part I reviews a few studies which have attempted to examine the tevel of living in urban India. Part II discusses the nature of data used and methodology followed in this paper. Part III presents some fresh results for a period of about 40 years from the early 50s to the late 80s. Part IV makes some concluding observations in the light of the results obtained in this study.

## Review of Studies

Many studies have examined the time trends in inequality in the distribution of per capita consumption expenditure (PCE) in both urban and rural sectors in India. Most of the studies show that in the urban sector, gini coefficients of nominal PCE remained stable up to the NSS 12th round (March-August 1957) after which it de-

clined. In a detailed study, Radhakrishna and Sarma (1976) found inequality in nominal consumer expenditure to have declined in the urban sector during 1952-53 to 1968-69. In addition, the percentage shares of various fractile groups in the distribution of population by nominal PCE also showed a clear decline in disparities over time.

Another exercise by Murty (1985) examined consumption data for the two sectors at both current and constant prices. Using Atkinson's inequality indices Murty showed a statistically significant trend decline in inequality in nominal consumption and absence of any significant trend in inequality in real consumption during 1960-61 to 1970-71.<sup>2</sup>

On the basis of the NSS data Dutta (1980) attempted to examine changes in the incidence of poverty and relative inequality for both the sectors as well as changes in the inter-sectoral disparities during 1960-61 to 1973-74. The author used two alternative measures: (i) head-count (HC) ratio, i e, the percentage of people below a fixed poverty line; and (ii) Sen's poverty index, i e, a normalised weighted sum of poverty gaps of the different units, the weight for a unit being its rank in the interpersonal welfare ordering of the poor. Relative inequality was measured by gini coefficient.

The results of the study show that there were no trend movements in either measure of index of poverty of the economy. The index of poverty showed a similar movement in both the sectors—namely, poverty index, increased in the first half of the 60s, reached a maximum in 1967-68 and declined thereafter. In both the sectors, the inequality in the distribution of per capita consumption expenditure recorded a trend decline and no trend improvement in mean per capita expenditures was observed. In the urban sector in particular, the relatively affluent had experienced a decline in per capita expenditure.

Two relatively recent studies on urban poverty are those by Minhas and Jain (1990) and Minhas et al (1991). They presented all-India as well as state-specific estimates of the incidence of poverty, separately for the rural and urban

population.<sup>3</sup> Also in Minhas et al (1991a), the state-specific cost of living indices for the entire rural and urban populations of 20 states for four consecutive agricultural years (July-June) from 1984-85 to 1987-88, based on two alternative weighting diagrams relating to the base years of 1970-71 and 1983, were introduced. Using the retail price data base of this latter study (1991a), Minhas et al (1991b) made the following observations:

- (1) The incidence of poverty in urban India declined from 46.2 per cent in 1970-71 to 39.7 per cent in 1983 and further to 37.8 per cent in 1987-88.
- (2) The absolute numbers of the urban poor (in million) rose from 50.4 in 1970-71 to 69.2 in 1983 and further to 77.5 in 1987-88, thus indicating an annual rate of growth of about 2.5 to 2.6 per cent between 1970-71 and 1987-88.

#### II Methodology and Data

The basic data needed for the study are: (i) PCE at current prices for urban India, and (ii) appropriate urban prices index number(s) for building.up a time series of urban PCE at constant prices. Again, for the purpose of assessing how absolute levels of living of different groups of urban population or disparity in their levels of living have been changing over time, we need data on size distributions of consumption expenditure for urban India. The National Sample Survey (NSS) provides such data through its consumer expenditure enquiries covering nation-wide samples of households almost continuously from 1950. The latest available results relate to the 45th round (July 1989-June 1990).

As is well known, for each NSS round, estimate of average monthly PCE are available in grouped form separately for 12 to 14 size classes of PCE along with the corresponding estimates of population. These estimates are available separately for rural and urban sectors and for the whole of India. Statewise estimates are also available for later rounds of the NSS. The estimates for fixed classes of PCE at current prices may, however, be converted through interpolation to get estimates by decile groups of population ranked in ascending order of

PCE.<sup>4</sup> The present study utilises NSS consumer expenditure distributions for urban India by fixed classes of PCE as well as by decile groups of population for the period 1953-54 (NSS 7th round) to 1989-90 (NSS 45th round).

There are two measures for the empirical verification of time trends in the incidence of poverty. One is called the headcount ratio (HC) which estimates the percentage of population falling below a normatively determined poverty line. The other is Sen index (SI) which takes into account not only the HC, but the mean and the Lorenz ratio of PCE for the population below the poverty line.5 For computation of these indices a poverty line applicable to urban India is usually determined in terms of the minimum level of PCE at base period prices. The poverty line at current prices for other periods is then computed by adjusting the poverty line at base period prices with the help of an appropriate consumer price index (CPI) for urban India. In the literature various CPIs have been used for this purpose. Some examples are given below.

While Dutta (1980) used CPI for industrial workers as a proxy for urban CPI, some others [Minhas et al 1987 and Suryanarayana and Geetha 1992] have considered a weighted average of CPI for industrial workers (CPIIW) and CPI for urban non-manual employees (CPINM) as an appropriate CPI for urban India. In

their later studies Minhas et al (1988 and 1991), however, refrained from using such weighted CPI and instead, constructed fresh urban (and also rural) cost of living indices at the state and all-India level on the basis of retail price data collected from 95 urban centres for the CPIIW and CPINM series. They computed such indices for four consecutive agricultural years from 1984-85 to 1987-88.

The practical difficulty of carrying their series backward is that the series have been computed by utilising individual price quotations for each commodity for each centre under the two series and that such detailed information for earlier years is not available in published form. Moreover, it is seen that there is not much difference between the series derived by Minhas and others (1988) and official series CPIIW. For these reasons we have chosen to work with the method suggested earlier by Minhas and others (1987).

Thus, we have first computed CPIIW and CPINM (with base 1960 = 100) corresponding to different NSS rounds, averaging the monthly indices of each series over the survey period of each round. We have next combined the two series using the weights (37.5 and 62.5 per cent for CPIIW and CPINM, respectively) derived by Minhas et al (1987). It may be mentioned that for years prior to 1960-61, CPINM series is not available and for years prior to 1968-69 a different series was available

for industrial workers which was called CPI for working class (with base 1949 = 100). We have extended the CPIIW series backwards with the help of the earlier series, namely, CPI for working class. In spite of this, we have been able to construct the combined index for NSS rounds 16 to 45. For the rest, the combined index was carried backward on the basis of the movements of the CPI for working class only. The index constructed in this way is presented in Table 2 and will be referred to as CPIU. We shall now present the results of our analysis in the following section.

#### III Results

TRENDS IN ABSOLUTE LEVEL OF LIVING

In Table 1 we present some data on average PCE per month at current prices for different decile groups over various NSS rounds starting from the 7th (1953-54) to the 45th (1989-90). It appears from Table 1 that the average PCE for each group has increased several times over the period of 40 years. The important thing is that the average PCE in nominal terms both for the poorest and the richest 20 per cent of urban population has registered a substantial increase in the late 80s compared to the early 50s. This improvement in the standard of living of various groups of urban masses may be vitiated if the

TABLE 1: AVERAGE MONTHLY TOTAL CONSUMER EXPENDITURE PER PERSON (PCE)—ALL-INDIA URBAN

NSS		Average PCE (in Rs) per 30 days by Fractile Group (Per Cent)										
Round	Survey Period	0-10	10-20	20-30	30-40	40-50	50-60			80-90	90-100	General Population
7	October 1953-March 1954	6.75	9.57	11.92	14.56	16.77	19.62	23.07	28.28	38.94	69.66	23.91
8	July 1954-March 1955	6.67	9.64	12.03	14.10	16.71	19.92	23.56	29.19	38.67	75.59	24.61
9	May 1955-November 1955	7.09	9.83	11.82	14.19	16.50	19.91	23.82	29.54	37.45	66.24	23.64
10	December 1955-May 1956	8.09	10.30	12.80	15.46	17.36	20.41	24.61	29.98	39.64	74.76	25.24
11	August 1956-February 1957	6.93	9.62	11.94	14.47	16.54	19.44	23.73	28.30	36.78	82.85	25.06
12	March 1957-August 1957	7.46	10.62	13.02	15.36	17.77	20.60	24.21	29.37	39.13	79.07	25.66
13	September 1957-May 1958	7.67	10.79	13.23	15.64	18.29	21.40	25.28	30.09	39.43	70.16	25.20
14	July 1958-June 1959	8.51	12.82	15.88	17.90	20.39	23.35	27.36	32.69	41.64	80.06	28.06
15	July 1959-June 1960	8.93	12.27	14.66	16.96	19.40	22.29	26.33	31.92	41.42	75.15	26.93
16	July 1960-August 1961	9.37	12.96	15.86	18.55	21.27	24.53	28.41	34.93	45.90	83.86	29.56
17	September 1961-July 1962	9.36	13.61	16.46	19.51	22.09	25.16	30.28	35.90	46.59	89.64	30.86
18	February 1963-January 1964	10.78	14.80	17.29	19.99	22.85	26.40	31.29	37.97	50.79	107.00	33.92
19	July 1964-June 1965	12.05	16.32	19.45	22.50	25.96	30.18	34.52	41.93	55.17	102.23	36.03
20	July 1965-June 1966	12.68	17.21	20.13	23.53	26.50	30.67	36.19	42.68	56.36	100.56	36.06
21	July 1966-June 1967	14.04	19.18	23.23	26.55	30.91	35.21	39.26	48.08	62.68	116.29	41.54
22	July 1967-June 1968	15.32	21.20	25.14	28.97	32.05	37.82	44.25	52.61	73.86	116.99	44.82
23	July 1968-June 1969	15.74	21.41	25.56	30.13	34.32	38.34	46.08	55.48	77.89	115.47	46.04
24	July 1969-June 1970	16.69	23.10	27.37	31.09	37,71	40.08	48.83	60.03	93.52	125.47	50.39
25	July 1970-June 1971	17.92	24.62	29.70	33.75	38.49	45.85	50.19	63.51	103.61	120.88	52.85
27	October 1972-September 1973	21.86	29.86	36.05	38.34	48.43	41.43	63.64	72.49	96.28	174.92	63.33
28	October 1973-June 1974	27.13	36.63	40.98	48.88	53.36	64.00	64.80	85.89	106.44	179.59	70.77
32	July 1977-June 1978	31.68	44.81	53.59	61.30	69.86	82.07	90.62	120.54	135.76	271.27	96.15
38	January 1983-December 1983	57.45	78.27	92.56	111.94	119.14	137.22	170.90	189.31	246.13	455.07	165.80
42	July 1986-June 1987	74.68	103.92	120.50	142.58	173.14		221.78	257.74	492.14	498.32	226.02
43	July 1987-June 1988	85.04	115.24	135.00	154.01	178.52		240.50	290.78	379.20	713.78	249.93
44	July 1988-June 1989	92.29	124.31	148.18	171.65	197.43		266.52	315.43	406.34	719.17	266.85
45	July 1989-June 1990	101.93	135.66	161.56	188.41	213.87	244.87	282.24	343.53	433.82	847.11	298.00

nominal PCE figures are expressed in real terms. The best method for obtaining real PCE figures would be to deflate nominal PCEs of each group by a CPI appropriate for the group in question. Unfortunately, such decile groupwise CPI numbers are not available for urban India. We have, therefore, no alternative but to use the common price index (viz, CPIU) to deflate nominal PCE figures of each group.

Table 2 gives average PCE per month at 1960 prices for various rounds of the NSS for general population as well as four fractile groups, viz, lowest 20 per cent, bottom 50 per cent, upper 50 per cent and highest 20 per cent of urban population. The remarkable fact is that over the entire period the real average PCE of each group has fluctuated around almost a horizontal trend. In fact, an average urban person who used to spend (at 1960 prices) about Rs 28 to Rs 31 in the 50s was still spending around Rs 31 in the late 70s. In the 80s some mild improvement in real expenditure is noticed and this is true for all sizeclasses of urban people. Against such a background of time trends in level of living, a study of intertemporal changes in inequality in urban consumption expenditures is relevant. This is what has been taken up next.

TRENDS IN INEQUALITY IN LEVEL OF LIVING

In order to examine the disparities in level of living across decile groups, we have used the most commonly employed index of income inequality, namely, the Lorenz ratio (LR). The Lorenz ratios of the size distribution of PCE for the urban areas of the country are presented in Table 3. The table shows that by and large there are two phases of movement of LR. The first phase representing the 50s and the early 60s has shown some tendency of LR to decline. However, over the period between the mid-60s and the late 80s. LR has remained almost stable. Thus, it is seen that in 1989-90, its value was 0.35, a value which it assumed about 25 years earlier in 1964-65. The same pattern is revealed if one examines shares of different decile groups in aggregate urban consumption expenditures.8 For instance, over the entire period the share of the poorest 20 per cent of urban population has exhibited some rising trend, but that rising tendency is really observed only during the 50s and the early 60s. Afterwards, its share has remained almost stagnant except for a substantial rise in the 28th round (1973-74). Similarly, since the mid-60s the share of the richest 20 per cent has remained stable around a value of 43 per cent, except for a drop to 40 per cent in the 28th round.

All these evidences thus suggest that the disparities in level of living between urban rich and urban poor have not widened while there has been some mild improvement of standard of living of these two classes of people. It is now of our interest to study the changes in the extent of poverty in urban India in time perspective.

TABLE 2: CONSUMER PRICE INDEX FOR URBAN INDIA (CPIU) AND AVERAGE TOTAL MONTHLY CONSUMPTION EXPENDITURE PER PERSON

NSS	Consumer Price Index for Urban	Average PCE per 30 Days (at 1960 Prices) of Selected Fractile Groups (Rs)							
Round	India (CPIU)	Lowest	Bottom	Upper	Highest	General			
	(Base 1960=100)	20 Per Cent	50 Per Cent	50 Per Cent	20 Per Cent	Population			
7	85	9.60	14.01	42.25	63.88	28.13			
8	80	10.19	14.74	46.74	71.41	30.76			
9	78	10.85	15.24	45.37	66.47	30.31			
10	81	11.35	15.80	46.52	70.00	31.16			
11	88	9.40	14.60	43.72	67.98	28.48			
12	89	10.16	14.44	43.22	66.40	28.83			
13	91	10.14	14.42	40.91	60.22	27.69			
14	98	10.89	15.41	41.86	62.09	28.63			
15	100	10.60	14.44	39.42	58.29	26.93			
16	101	11.06	15.45	43.10	64.24	29.27			
17	105	10.94	15.44	43.34	64.88	29.39			
18	112	11.42	15.30	45.26	70.45	30.29			
19	128	11.09	15.05	41.26	61.48	28.15			
20	138	10.83	14.50	38.62	56.86	26.56			
21	154	10.78	14.80	39.16	58.11	26.97			
22	166	11.00	14.78	39.22	57.49	27.00			
23	166	11.19	15.32	40.15	58.24	27.73			
24	173	11.50	15.72	42.54	63.29	29.13			
25	179	11.88	16.14	42.91	62.71	29.53			
27	212	12.20	16.47	43.28	63.96	29.87			
28	250	12.75	16.56	40.06	57.21	28.31			
32	309	12.38	16.91	45.32	65.86	31.12			
38	500	13.57	18.37	47.95	70.12	33.16			
42	648	13.78	18.98	50.77	76.42	34.88			
43	709	14.12	18.84	51.66	77.08	35.25			
44	766	14.13	19.16	50.51	73.47	34.84			
45	820	14.50	19.57	53.20	79.85	36.34			

TABLE 3: SELECTED MEASURES OF INDEX OF POVERTY—ALL-INDIA, URBAN

	Poverty	Index of	Poverty	Measures of Disparity					
NSS	Line at	Head-Count	Sen Index	Lorenz	Shares of S	nal Groups			
Round	Current	Ratio		Ratio		Consumption Expenditur			
	Prices	(HC)	(SI)	(LR)	Lowest 20	Bottom 50			
	(Rs)				Per Cent	Per Cent	Per cent		
7	19.26	53.20	0.249	0.372	6.89	25.09	45.33		
8	18.12	48.98	0.227	0.390	6.58	23.92	46.65		
9	17.67	49.39	0.222	0.371	6.94	24.70	44.37		
10	18.35	47.80	0.202	0.368	7.29	25.36	44.92		
11	19.94	56.58	0.271	0.399	6.61	23.74	47.73		
12	20.16	53.66	0.242	0.394	6.87	24.38	47.54		
13	20.62	51.72	0.236	0.359	7.26	25.74	44.03		
14	22.20	51.08	0.217	0.348	7.61	26.91	43.37		
15	22.66	55.18	0.239	0.357	7.65	26.16	44.24		
16	22.88	49.87	0.210	0.348	7.61	26.58	49.42		
17	23.79	50.94	0.216	0.358	7.45	26.26	44.13		
18	25.37	51.61	0.214	0.360	7.77	26.16	44.96		
19	29.00	53.60	0.224	0.349	7.87	26.71	43.69		
20	31.27	56.40	0.241	0.339	8.16	27.30	42.81		
21	34.89	55.51	0.235	0.337	8.00	27.43	43.08		
22	37.61	54.59	0.231	0.333	8.15	27.38	42.57		
23	37.61	52.35	0.218	0.329	8.06	27.61	42.00		
24	. 39.19	51.05	0.209	0.340	7.91	27.00	43.44		
25	40.55	48.15	0.193	0.320	8.06	27.34	42.48		
27	48.03	47.62	0.186	0.341	8.16	27.55	42.83		
28	56.64	48.88	0.181	0.310	9.01	29.25	40.42		
32	70.01	44.96	0.174	0.345	7.96	27.17	42.34		
38	113.28	39.16	0.140	0.330	8.18	27.71	42.30		
42	146.81	37.01	0.136	0.330	7.90	27.21	43.83		
43	160.63	37.74	0.131	0.352	8.01	26.72	43.73		
44	173.54	36.15	0.126	0.336	8.15	27.50	42.18		
45	185.78	34.40	0.118	0.351	7.97	26.89	43.89		

TRENDS IN THE EXTENT OF POVERTY

Presented in Table 3 are the results of two popular measures of poverty, namely, the head-count ratio9 and the Sen index. As the table shows, the intertemporal behaviour of the extent of poverty measured by either of the indices shows fairly wide fluctuations. Yet one can locate two patterns of the movement of the magnitude of poverty. The percentage of people lying below the poverty line increased up to the mid-60s (20th round) and then declined very sharply up to the latest round of the NSS (i e, 45th round). (The exception is noticed in the case of 28th round.) Movements in Sen index also present a similar picture. This intertemporal behaviour in the extent of urban poverty is in sharp contrast to that of either LR or shares of bottom decile groups in total expenditures which have been observed to have remained almost stagnant after the mid-60s.

#### IV Concluding Observations

In the preceding section, an attempt has been made to examine intertemporal movements in level of living of Indian urban population for the period 1953-54 to 1989-90. Average PCE at constant prices of a group is taken to be an indicator of its absolute level of living while relative level of living is sought to be estimated by measures like LR and shares of different decile groups in total consumption expenditure. All these estimates have shown fluctuations over time.

The main empirical findings of the present exercise are that absolute levels of living of different groups of urban population have remained more or less stagnant over this long period spanning about four decades (except for a mild improvement in the 80s) and that the extent of urban poverty has exhibited a remarkable declining trend particularly after the mid-60s. Thus in the mid-60s about 56 per cent of urban population lived below the poverty line. The figure came down to only 34 per cent in 1989-90. On the other hand, alternative measures of relative level of living reveal that the disparity in urban India has remained broadly unchanged. It may be pointed out that the measures of level of living for rural India present more or less a similar picture as their counterparts for urban India.

#### Notes

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- 1 Mention may be made of the studies done by Murti and Pillai (1960), Roy and Dhar (1960), Iyenger and Bhattacharya (1961), Ranadive (1971), Chatterjee and Bhattacharya (1974), Vaidyanathan (1974), Radhakrishna and Sarma (1976), Ahluwalia (1978), Dutta (1980), and Bhattacharya et al [1991].
- 2 This may be due to the fact that Murty used both 'consumer expenditure schedule' and 'integrated household survey schedule' during NSS rounds 19 (July 1964-June 1965) to 25 (July 1970-June 1971).
- 3 For this purpose, they have followed the procedure of simple linear interpolation between log X and P where X denotes monthly PCE and P, the proportion of state-specific population (rural or urban) with monthly PCE less than or equal to X.
- 4 Decile groups are formed by arranging sample households in ascending order of PCE and then dividing them into 10 groups, each group covering 10 per cent of the estimated population.

  Thus, for example, the lowest (highest) decile group refers to the poorest (richest) 10 per cent of population.
- 5 The Sen index (SI) is defined as follows:

$$SI = \frac{H}{Z} [Z - C_p (1 - G_p)]$$

where H is the head-count ratio, Z, the poverty line,  $C_p$ , the average PCE of the poor and  $G_n$ , the Lorenz ratio of PCE of the poor.

- 6 Minhas et al (1987) took a weighted average of two official CPI numbers, viz, CPIIW and CPINM, where the weights used were in proportion to the aggregate consumption expenditure of all urban families of the respective classes for which the series are being intended. The weights were derived by multiplying the estimated total number of industrial worker households with their respective average monthly household consumption expenditures. All the estimates were obtained from the two survey reports, viz, Family Living Survey of the Industrial Workers, 1958-59 and the Middle-Class Family Living Survey, 1958-59.
- 7 Results for the 42nd, 44th and 45th rounds are based on annual surveys on consumer expenditure carried out on thin samples. The 43rd round, on the other hand, is one of the regular quinquennial surveys on consumer expenditure carried out during the period, July 1987-June 1988. Published results for this round, however, report figures for sub-sample one only. Estimates for these rounds are taken from relevant issues of Sarvekshana.
- 8 For each round, the estimates of the size distribution of PCE over fixed classes of PCE have been utilised. Then the shares have been calculated by linear interpolation and the Lorenz ratios by the trapezoidal rule which ignores the strict convexity of the Lorenz curve.
- 9 The head-count ratio has been computed by using linear interpolation on the unsmoothed Lorenz curve for PCE.

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