

URBAN HEALTH AND SANITATIONS OF THE BELOW POVERTY LINE FAMILIES

Dr. G.R. Rathod, *Director*,

Bharati Vidyapeeth University, Social Sciences Centre, Pune.

Dr. Athing Ningshen, *Postdoctoral Fellow*,

Indian Council of Social Science Research, New Delhi.

Mr. Vijay Koli, *Ph.D. Scholar*,

Bharati Vidyapeeth University, Social Sciences Centre, Pune.

Abstract

The urban below poverty line (BPL) family's health problems is a cumulative result of inadequate shelter, lack of clean water, sanitation and sewage disposal systems. Moreover, poor health is a major determinant of household vulnerability. Serious illness of the health demands of a sickly child, or an aging or any family member push poor households to insurmountable levels of poverty.

The data is obtained from 370 below poverty line families from 12100 household of 27 wards of Imphal Municipal council by using Krejcie and Morgan models for determining the size of the samples. The present research objectives are an attempt to explore and examine the conditions of living spaces, foods habits, health care and sanitations of the urban BPL families in Imphal city. In this study the health and sanitations are analyzed on the health-related issues of housing density and space; contaminated water and food; economic inconsequence of health care as well as poor drainage and garbage collection and inadequate sanitation, etc.

Keywords: *Urban Health and Sanitations*

Introduction

Imphal is a rapidly growing urban area and a bustling town. A characteristic feature of this urban has been growing rapidly much faster than the medium and small towns. Many urban BPL families areas covered had small scale economic activities which seriously threatened the health of residents and workers. The urban BPL poor suffer from disease and

injuries resulting from proximity to toxic and hazardous wastes, lack of clean water and sanitation and water, air pollution. They are particularly vulnerable to typhoid, diarrhoeal diseases, cholera and intestinal worms from contaminated water and food as well as diseases associated with poor drainage and garbage collection such as malaria. The poor are more likely to suffer serious illness during their lifetime. They tend to live in higher-risk areas, with greater exposures to pollution, disease agents, and natural hazards such as floods.

Many of these areas lack in infrastructure for water supply, sanitation, and solid waste disposal. The resulting environmental pollution creates a situation inimical to the maintenance of good health. The urban BPL families living in these areas are most at risk. Inadequate solid waste collection has also led to contamination of surface water and groundwater resources and of the ambient air from waste burning.

The urban BPL families make a tradeoff between the quality and the location of their living spaces – living in areas with poor, insanitary environments in order to be in a preferred location with access to livelihood-generating assets.

Furthermore, as well as threatening men and women's health and security, poor urban health has directly affect their ability to undertake livelihoods activities by occupying time which could be otherwise be used for productive tasks.

1. Results and Discussion:

Following are the results and discussion based on the objectives of the study referring from the sources of Primary and Secondary data:

Table: 2.1

Type of House

Condition of house	Frequency	Percent
Semi-pucca	19	5.1
Kuccha	336	90.8
Hut	15	4.1

Condition of house	Frequency	Percent
Semi-pucca	19	5.1
Kuccha	336	90.8
Hut	15	4.1
Total	370	100.0

The above table revealed that most of the BPL families had a kuccha house type whereas very few percentages had semi-pucca house and hut structure of house. The BPL families has infected to many diseases that still plagued due to their dwelling conditions of housing density, space, ventilation, dampness and mould.

Table: 2.2

Atmosphere Surroundings

Atmosphere Around	Frequency	Percent
Clean	22	5.9
Average	341	92.2
Dirty	7	1.9
Total	370	100.0

Based on the fact and figure of the above table an overwhelming majority of the BPL families had average condition of atmosphere surroundings. Composition of the energy generation, transportation and deposition in these areas had created gaseous pollutants, odours and SPM (Suspended Particulate Matter) such as dust, fumes, mist and smoke which affect human health, especially the lungs and respiratory system.

Table: 2.3**Food Intake in a Day**

Food Intake	Frequency	Percent
Less than one full meal	73	19.7
Usually two meals a day	297	80.3
Total	370	100.0

The above table signified that the BPL families Food's insecurity with lower food expenditures, low fruit and vegetable consumption, and lower-quality diets has causes a burden of disease which falls disproportionately.

Table: 2.4**Breakfast Intake in a Day**

Breakfast	Frequency	Percent
Only tea in morning	127	33.1
Light snack in morning	138	35.9
N.A	119	31.0
Total	384	100.0

It is observed that considerable percentages of the BPL families had normally taken light snack & only tea for their breakfast in morning in a day. Some nutritional experts have long referred to breakfast as the most important meal of the day, citing studies that find that people who skip breakfast are disproportionately likely to have problems with concentration, metabolism, weight, and cardiac health. So below poverty line families are one among them.

Table: 2.5**Supplementary food**

Supplementary Food	Frequency	Percent
Sometime in a week Salad / Fruits / Milk / Dairy product, etc.	68	18.4
Only one of (Salad / Fruits/ Milk / Dairy product, etc.) in a day	29	7.8
N.A	273	73.8
Total	370	100.0

Supplementary foods according to the present study are salad, fruits, milk, dairy product, etc. A great majority of the BPL families had no supplementary foods and only few percent had supplementary foods occasionally in a week. The major food issues of concern among BPL families are insufficient or imbalanced intake of foods or nutrients which lead them to harmful consequences.

Table: 2.6**Food consumption**

Food consumption	Frequency	Percent
Combination	270	73.0
Stale	29	7.8
Fresh	71	19.2
Total	370	100.0

It is observed from the above table that majority of the BPL families usually took combination (mixtures of stale or fresh) and few took fresh and stale foods.

It can be affirmed that BPL families largely seems to unaware about the food security (see table No. 2.3) that puts women and children at greater risk of malnutrition.

Table: 2.7**Water Purification Methods**

Water Purification Methods	Frequency	Percent
Filter	40	10.8
Boiling	281	75.9
No purification	49	13.2
Total	370	100.0

The above table implied that large majority of the BPL families had water purification method of boiling and few percent had no water purification method. Another chronic water logging is a serious problem. These results inconvenience for the people and high possibility of spreading of diseases.

It can be affirmed that the BPL families had inadequate safe water supplied for their domestic purposes, like for cooking, etc, other than the drinking water by boiling method.

Table: 2.8**Health Treatment**

Health Treatment	Frequency	Percent
Govt. hospital	311	84.1
Mystical	25	6.8
Pvt. hospital	34	9.2
Total	370	100.0

An overwhelming majority of the BPL families had health treatment in government hospital and few in private hospital. Some still believed in mystical treatment (6.8%). The poor are more hard pressed in meeting unexpected health care expenditures and encountered to early death and illness from chronic conditions due to economic consequences. The high cost of treatment for illness is a major cause of indebtedness for the BPL families, and income loss through illness can be a major shock to the household economy.

Table: 2.9**Healthiness**

Specify the reason	Healthy			Total
	Yes	No	N.A	
Dreaded	0	20	0	20
	0.0%	5.4%	0.0%	5.4%
Seasonal diseases	0	23	0	23
	0.0%	6.2%	0.0%	6.2%
N.A	307	0	20	327
	83.0%	.0%	5.4%	88.4%
Total	307	43	20	370
	83.0%	11.6%	5.4%	100.0%

$$\chi^2 = 3.700E2^a$$

$$df = 4$$

$$P = 0.000$$

The above table disclosed the distribution of healthiness of the respondents that a majority of the BPL families are found healthy and few percent are reported to be unhealthy due to seasonal diseases and dreaded diseases infections. Chi square test was applied and it indicated that there exists a strong significant among the two variables.

Table: 2.10**Immunization Levels**

Immunization Levels	Frequency	Percent
Fully immunized	340	(91.9)
Partially immunized	19	(5.1)
N.A	11	(3.0)
Total	370	(100.0)

The distribution of respondents according to immunization level of their children is that, majority of the BPL families had taken child immunization and very few percent had partially taken child immunization. This shows that BPL families are clear about need of child immunization or the outreach of immunization service is very strong.

Table: 2.11**Family Planning Measurement**

Family Planning Measures	Family Planning			Total
	Yes	No	N.A	
Condom	27	0	0	27
	7.3%	0.0%	0.0%	7.3%
Nature	13	0	0	13
	3.5%	0.0%	0.0%	3.5%
N.A	0	0	16	16
	0.0%	0.0%	4.3%	4.3%
None	0	310	4	314
	0.0%	83.8%	1.1%	84.9%
Total	40	310	20	370
	10.8%	83.8%	5.4%	100.0%

$\chi^2 = 6.622E2^a$

df = 2

P = 0.000

The above table shows that great majority of the BPL families are unaware about the family planning measures where it contribute to a large family sizes which leads them to poverty and vulnerability through its impact of household savings, labor supply, parental earnings, and education of children. Very few percent had measured family planning by nature itself and using condom method for birth control.

Chi square test was applied and it indicated that there exists a strong significant among the two variables.

Table: 2.12**Reason for More Babies Born**

Reason for more babies born	Frequency	Percent
Selection of Sex	65	17.6
For Future	88	23.8
Wanted Big family	123	33.2
N.A	94	25.4
Total	370	100.0

It is also found that, 75 percent of the respondents exposed the reasons for more babies born to them was that, 33 percent wanted a big family believing that more the children they have more the bread earners they will have, while 24 percent wanted more babies for the future prospects and only 18 percent reported as been incidentally increased by sex selection.

Table: 2.13**Average Spacing between Children**

Average spacing between children	Frequency	Percent
Upto 1 year	19	5.1
1 to 2 years	159	43.0
2 to 3 years	72	19.5
3+ years	26	7.0
N.A	94	25.4
Total	370	100.0

It is found that, 43 percent of the respondents spaced their children between 1 to 2 years, while 19 percent spaced their children between 2 to 3 years and few between 1 year and above 3 years.

Table: 2.14**Death in a Family**

Cause of death	Any death		Total
	Yes	No	
Accident	9	0	9
	2.4%	0.0%	2.4%
Drugs addiction	11	0	11
	3.0%	0.0%	3.0%
Seasonal disease	5	0	5
	1.4%	0.0%	1.4%

Dreaded disease	14	0	14
	3.8%	0.0%	3.8%
N.A	0	331	331
	0.0%	89.5%	89.5%
Total	39	331	370
	10.5%	89.5%	100.0%

$$\chi^2 = 3.700E2^a \quad df = 4 \quad P = 0.000$$

The above table represented that about 11 percent of the BPL families had casualty of death in a family in last 1 year due to the dreaded diseases, drug addiction, accident and seasonal diseases infections.

Table: 2.15

Garbage Management

Garbage	Frequency	Percent
Rubbish depot	125	33.8
On the street	41	11.1
Outside the house	70	18.9
Door to door collection	17	4.6
River side	59	15.9
Canal	58	15.7
Total	370	100.0

The above table revealed that solid waste productions in BPL family's areas are growing in volume and in toxicity which eventually impacted the public health and

environment due to the reasons of improper garbage's depot (61.6%); improper garbage in street, canal, river side and outside their house, whereas few percentage used proper rubbish depot and maintained door to door collection.

Table: 2.16
Contaminated Areas

Specify the dump site	Contaminated area		Total
	Yes	No	
Garbage depot	60	0	60
	16.2%	.0%	16.2%
Drainage	48	0	48
	13.0%	.0%	13.0%
Lavatory	65	0	65
	17.6%	.0%	17.6%
Insanitary	17	0	17
	4.6%	.0%	4.6%
N.A	0	180	180
	.0%	48.6%	48.6%
Total	190	180	370
	51.4%	48.6%	100.0%

$$\chi^2 = 3.700E2^a$$

$$df = 4$$

$$0.000$$

$$P =$$

The above table illustrated that about 51 percent of the BPL families had improper contaminated areas of lavatory (17.6%), garbage depot (16.2%), drainage (13.0%), and

insanitary (4.6%). Due to these amounts of uncouth factors, the BPL families are inflicted to several respiratory problems with the outcomes of soil pollution and air pollution.

Chi square test was applied and it indicated that there exists a strong significant among the two variables.

Table: 2.17

Lavatory

Type of toilet	Private Toilet		Total
	Yes	No	
Septic tank	99	0	99
	26.8%	0.0%	26.8%
Kuccha pit	214	0	214
	57.8%	0.0%	57.8%
Semi-pucca pit	53	0	53
	14.3%	0.0%	14.3%
Other	0	4	4
	0.0%	1.1%	1.1%
Total	366	4	370
	98.9%	1.1%	100.0%

$$\chi^2 = 3.700E2^a$$

$$df = 3$$

$$P = 0.000$$

It is observed through the above table that, 100 percent of the BPL families had private toilet out of which 58 percent had kuccha pit type structures, while 27 percent had septic tank type structures, another 14 percent had semi-pucca type of structures and only 1 percent had used others or community toilets.

Chi square test was applied and it indicated that there exists a strong significant among the two variables.

2. Conclusions

The BPL poor dwelling conditions of housing density, space, ventilation, dampness and mould has causes to many diseases that still plagued.

Hazardous atmosphere of their surroundings are due to composition of the energy generation, transportation and deposition in these areas had created gaseous pollutants, odours and SPM (Suspended Particulate Matter) such as dust, fumes, mist and smoke which affect human health, especially the lungs and respiratory system.

Food insecurity with lower food expenditures, low fruit and vegetable consumption, and lower-quality diets are the burden of disease falls disproportionately on people of poverty line families. The major food issues of concern among BPL families are insufficient or imbalanced intake of foods or nutrients which lead them to harmful consequences.

The poor are more hard pressed in meeting unexpected health care expenditures and encountered to early death and illness from chronic conditions due to economic consequences. The high cost of treatment for illness is a major cause of indebtedness for the BPL families, and income loss through illness can be a major shock to the household economy. Some of BPL families had casualty of death in a family in last 1 year due to the dreaded diseases, drug addiction, accident and seasonal diseases infections.

Large majorities unaware about the family planning measures which contribute to poverty and vulnerability through its impact of household savings, labor supply, parental earnings, and education of children.

Solid waste productions are growing in volume and in toxicity which eventually impacted the public health and environment. Due to these amounts of uncouth factors, the BPL families are inflicted to several respiratory problems with the outcomes of soil pollution and air pollution. Another chronic water logging is a serious problem. These results inconvenience for the people and high possibility of spreading of diseases.

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