

Acute Childhood Illnesses and Health Seeking Behaviour among under five children in a village of Hooghly district, West Bengal

Indira Dey (Pal)¹, R. N. Chaudhuri²

¹Associate Professor, Deptt. of Community Medicine, Nilratan Sircar Medical College, Kolkata

²Deptt. of Maternal and Child Health, All India Institute of Hygiene and Public Health, Kolkata

ABSTRACT

Background: – Acute respiratory infections and diarrhoeal diseases are important causes of morbidity in children worldwide. IMNCI component is addressing these two illnesses in a major way and is concentrating on health care practices of community. **Objective:** – to find out their health seeking behaviour. **Methodology:** – A community based , cross-sectional study was conducted in the Mollasimla village of Hooghly district of West Bengal using 2 weeks recall for acute illnesses. **Results** – It was found that 56.8%, 23.8% and 18.9% children suffered from ARI, fever and diarrhea respectively. Overall treatment rate was above 93% and most of the children were treated in hospitals and health centre. **Conclusion:** – Acute illnesses are still largely prevalent in the rural community. As mothers are the first care givers, they should be made aware of the preventive measures and the need for seeking treatment.

Key words: acute childhood illnesses; diarrhea; ARI health seeking behavior; under five children

INTRODUCTION

In spite of the epidemiological transition of diseases globally, child morbidity still remains a challenge in the developing world. Children aged less than five years, who are naturally innocent, vulnerable and dependent on their parents often suffer from viral and infectious diseases.¹ Infection impedes the body's metabolism and retards its immune response. The poor appetite of a sick child leads to a fall in dietary intakes and may dictate a morbid condition thus forming a vicious cycle. ARI, diarrhoeal diseases, measles and other infections are important causes of morbidity in children worldwide. Children below five years of age in the developing world suffer about 5

episodes of Acute Respiratory Illness and 1.7 of diarrhea annually. Integrated Management of Neonatal and Childhood Illnesses incorporates the integrated approach to manage these illnesses and is concentrating on health care practices of the community to reduce child mortality. Early recognition and prompt treatment of these diseases are life saving. However, within a given social setting and a given availability of health services, an individual's health seeking behaviour may be determined by factors such as distance, availability, affordability and the appropriateness and adequacy of services as perceived by the users. So, this study was conducted to assess the pattern of acute childhood illnesses among under five children and to find out the health seeking behaviour of the mothers in respect to the child's illness.

Address for correspondence: Dr. Indira Dey (Pal)

29A, Kali Kumar Banerjee Lane

Kolkata-700 002

West Bengal, India

Mobile: 9830621012

E-mail: indiradeypal@rediffmail.com

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MATERIAL AND METHODS

This was a community based cross – sectional study carried out in the Mollasimla village of Hooghly district of West Bengal, the rural field practice area of All India Institute of Hygiene and Public Health, Kolkata. The village Mollasimla had a population of 3176. This was

purposely selected as this was a backward village in respect to the literacy status in spite of having provision of schools and health care facilities and was well connected with roads and railways. The area is served by the Nasibpur Union Health Centre which is at a distance of about 3 kms by road. The population also utilizes the service of a number of private medical practitioners, one allopath and four homeopaths. One ICDS centre is also located in the village.

All the children, 0–59 months of age belonging to the study area were included as study subjects. The mothers of the children were the respondents. Care was taken to ensure that the family of the particular under five was a permanent resident of the area and not a frequent migrant. Those who could not be contacted during the first visit were given two more visits.

The research protocol was approved by the local ethical committee and informed consent was obtained from each subject prior to inclusion in the study. A predesigned and pretested semi structured interview schedule was used to collect the data. The mothers were interviewed for detail information regarding socio-demographic details and acute illnesses especially ARI, fever and diarrhoea in last two weeks prior to the visit as these are the main contributors to child morbidity. The health care seeking behavior for such diseases including the place and person consulted for disease, the treatment availed, the money spent and the distance travelled were also enquired. Records were analyzed whenever available. Proportions and percentages were used for analysis.

RESULT

The study population comprised of 227 under five children, of which 116 were males and 111 females. Majority of the study population were Muslims (63.4%) by religion and this trend was observed in both the sexes. The rest of the study population were Hindus. Distribution of children in different age groups of one year span were almost equal and majority (55.1%) of the study population belonged to a nuclear family. The children mostly belonged to first birth order (47.1%) and both the genders had almost similar distribution of the birth orders. 6.6% of children belonged to birth order greater than or equal to five.

About 48% of the fathers and 53.3% of the mothers were illiterate. Agriculture was found to be the commonest occupation of the fathers (28.2%) and 8.4% of the

children had their fathers living in other states to support the family.

Majority (56.8%) of the children suffered from ARI, followed by fever (23.8%) and diarrhoea (18.9%). A higher percentage of females (60.4%) suffered from ARI than the males (53.4%) whereas diarrhoea occurred in a higher percentage of males (Table 1). Treatment was sought for 93% of the children with ARI, 90.7% of the children with diarrhea and 98.2% the children with fever.

A higher percentage (36.8%) of the episodes of illness among males were treated by the private allopathic practitioners compared to that of the females (27.3%). In most of the cases among females, (36.4%) treatment was taken from health centre. In 9.1% of children, parents purchased medicines using previous prescriptions or used over the counter drugs. For the children, 7.5% of the episodes of illness were not treated at all (Table 2). In majority (72%) of the episodes of illness, treatment was sought within two days. No difference was observed between the two sexes (Table 3). The commonest reason for not contacting a health personnel was that the

Table 1: Distribution of male and female children according to the common acute illnesses*

Common Illnesses	No. and percentage of children		
	Males (n = 116)	Females (n = 111)	Total (n = 227)
ARI	62 (53.4)	67 (60.4)	129 (56.8)
Fever	29 (25)	25 (22.5)	54 (23.8)
Diarrhoea	23 (19.8)	20 (18)	43 (18.9)
No illness	32 (27.6)	25 (22.5)	57 (25.1)

(Figures in parenthesis indicate percentages)

Multiple Responses

*Common illnesses suffered during the last 2 weeks were considered.

Table 2: Distribution of episodes of illness among male and female children according to utilization of health services

Agency of medical care	No. and percentage of episodes of illness among children		
	Males (n = 87)	Females (n = 88)	Total (n = 175)
Health centre	24 (27.6)	32 (36.4)	56 (32)
Hospital	9 (10.3)	5 (5.7)	14 (8)
Private allopathy	32 (36.8)	24 (27.3)	56 (32)
Private homeopathy	10 (11.5)	10 (11.4)	20 (11.4)
Others	5 (5.7)	11 (12.5)	16 (9.1)
Not treated	7 (8.1)	6 (6.7)	13 (7.5)
Total	87 (100)	88 (100)	175 (100)

(Figures in parenthesis indicate percentages)

Others include medications by using previous prescriptions and over the counter drugs.

Table 3: Distribution of episodes of illness among male and female children according to the day of availing the treatment

Day of availing treatment	No. and percentage of episodes of illness among children		
	Males (n = 87)	Females (n = 88)	Total (n =175)
1	27 (31)	30 (34.1)	57 (32.6)
2	34 (39.1)	35 (39.8)	69 (39.4)
>=3	19 (21.8)	17 (19.4)	36 (20.5)
Not treated	7 (8.1)	6 (6.7)	13 (7.5)
Total	87 (100)	88 (100)	175 (100)

(Figures in parenthesis indicate percentages)

parents thought the illnesses to be of mild nature and self limiting. Poverty was also found to be responsible. Home remedies were used in 2 of the cases.

DISCUSSION

As ARI, Diarrhoea and fever are the common illnesses occurring among the under five children, they were taken into consideration for the present study. It was found that ARI occurred in 56.8% and diarrhoea in 18.9% of the under five children, sometimes in the two weeks preceding the survey. Fever is a major manifestation of malaria and other acute infections in children, contributing to high levels of malnutrition and mortality. Fever occurred in 23.8% of the rural children. Grover VL *et al*² in an urban resettlement colony of East Delhi also found ARI to be the commonest cause of illness (16.01%) among under five children followed by diarrhea (10.2%). Venkatesh S and Bansal RD³ in their longitudinal study in a semi urban area observed ARI to account for 42% of the morbidities followed by diarrhea. On the contrary, NFHS-3⁴ revealed that 6%, 15% and 9% of the children suffered from ARI, fever and diarrhea respectively. A higher prevalence of ARI in the study population is likely to be due to collection of most of the data in winter months.

The present study revealed that more girls (77.5%) suffered from some form of illness compared to the boys (72.4%) whereas Grover VL *et al*.² found that morbidity was significantly higher in boys.

In the study population, overall level of treatment seeking was above 93 percent which was very encouraging. NFHS-3⁴ found that 69% of children with ARI, 71% with fever and 74% with diarrhea were treated. The difference in the overall level of treatment seeking is because the present study considered any treatment that was available to the

child but the country wide study excluded home remedies, pharmacy and shops.

In the present study, a higher proportion of females were treated for their illness. Contrary to this finding, a higher proportion of boys than girls were taken to a health facility or provider for ARI, diarrhea and fever in India as revealed in NFHS-3.⁴ Table 2 shows that the children were mostly treated by the allopathic system, similar finding was noted by Grover VL *et al*.²

A higher percentage of episodes of illness of the males were treated by the private allopathic practitioners (36.8%) compared to that of the females where most of the episodes of illness (42.1%) were treated at the Govt. health facilities. Ganatra and Hirve (1991)⁵ studied health care utilization in 45 villages in Pune district of Maharashtra and found that a significantly higher proportion of girls (18.8% compared to 6.7% for boys) were taken to paramedical worker. On the other hand a significantly higher proportion of boys were treated by registered private practitioner and this difference persisted even after adjusting for severity of illness.

The present study found that medical advice was sought on the second day of illness in most of the episodes of illness irrespective of the sex of the child. Similar observations have been reported by Ganatra and Hirve (1991) in Pune district of Maharashtra.⁵

Therefore, acute illnesses are still largely prevalent in the rural community. As mothers are the first care givers, an attempt should be made to try and improve their skills through health education so that they can use simple and effective treatments for minor illnesses. They should also be taught to recognize the life threatening conditions and to seek care early and to persist with treatment.

CONFLICT OF INTEREST: None.

REFERENCES

1. Impacts of Bio-Social Factors on Morbidity among children aged under five in Bangladesh. *Asia-Pacific journal*, 2007;**22**,No.1:65
2. Grover VL, Chhabra P, Malik S, Kannan AT. Pattern of morbidity and mortality amongst under fives in an urban resettlement colony of East Delhi. *Indian J Preventive and Social Medicine*.2004;**35**(1&2):21–26
3. Venkatesh S, Bansal RD. A longitudinal study of morbidity among under five children in a semi urban area. *Indian J of Community Medicine* 1986; **11**:1–20.
4. International Institute for Population Sciences and Macro International (IIPS).2007.National Family Health Survey (NFHS-3), 2005–06:India: Vol-I. Mumbai:IIPS.
5. Ganatra B and Hirve s.Male bias in health care utilization of under-fives in a rural community in Western India.*Bulletin of World Health Organization*,1994;**72**(1):101–104.