



Hygiene Practices amongst School Children in Cachar District of Assam: A Cross-Sectional Study

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ABSTRACT

Background: A majority of morbidity and mortality in developing countries is attributed to communicable diseases. Poor health among school children results from lack of awareness of the health benefits of personal hygiene. The children of today will be the adults of tomorrow. By focusing on children today, by giving them tools and knowledge to change behaviour, future generations can be stronger and healthier.

Aims: To assess the basic hygiene practices among school children in Cachar district of Assam.

Methods and Material: This cross-sectional study was carried out among 120 randomly selected school children from schools in Cachar district of Assam using a pretested, structured questionnaire containing questions on personal and household hygiene practices.

Results: Majority of the school children have knowledge about basic hygiene practices. Parents and teachers are the primary sources of information about hygiene amongst the school children.

Conclusions: Most of the students were practicing hygienic methods with few neglected practices among them. Sustained personal hygiene education with greater involvement of parents and frequent medical examinations may yield more benefit to the students.

Keywords: School children, practices, communicable diseases, sanitation,

Children are the worst hit due to the neglect of basic personal hygiene. WHO states that globally around 1.7 billion cases of diarrhoeal diseases occur every year killing around 7.6 lakhs of under five children every year². Studies show that unsafe water, inadequate sanitation and lack of hygiene claim lives of more than 1.5 million under five children every year from diarrhoea². Each year, children lose 272 million school days due to diarrhoea, and one in three school-aged children are infested with intestinal worms³. In India, only 59% urban and 22% rural people have access to improved water and sanitation facilities⁴.

A significant proportion of childhood communicable diseases can be prevented by promotion of hygiene practices, especially proper hand washing practices among school children through proper health education and behaviour change communication by their parents and teachers. Childhood is the best time for children to learn hygiene behaviours. These behaviours become habits later, which will remain permanent and unchanged. Children are the best instruments to carry health education messages to their families and friends, thereby facilitating community development. Hence this study aims at assessing hygiene practices among school children and to know their perception regarding importance of maintenance of sanitation and hygiene.

I. INTRODUCTION

The foundations of lifelong responsibility for the maintenance of personal hygiene are laid down in childhood, which is important for a healthy childhood, for a healthy adulthood and for the development of positive values about health and the use of health services.

The increased burden of communicable diseases among school children due to poor personal hygiene practices, lack of knowledge and inadequate sanitary conditions remains a concern on the public health agenda in developing countries¹.

II. MATERIALS AND METHODS

Study design:

Cross sectional observational study.

Study group:

The target population included students of both sexes in 6-12 years age group.

The study population was defined as follows: -

Inclusion criteria:

Students of both sexes between 6-12 years of age who were available at the selected schools in rural area of Cachar district in the state of Assam.

Exclusion criteria:

Students who were sick or absent during the time of data collection.



Methodology

Standard pre-tested structured questionnaire used in 'Hygiene survey among school students' by Centre for Environment Education, Bangalore and Dettol HABIT Study⁵ was modified according to the study population and used. The questionnaire consisted of two sections: socio-demographic details and questions on personal hygiene. All the hygiene practices were assessed based on their activities in the past 7 days.

Permission was obtained from the school authority. The questionnaire was drawn up in English, translated in Bengali (local language) and

back translated in English to check the translation. The selected school was visited on a pre-assigned day of each week and one grade was covered every week. The students from each grade who were absent on the specific day of the study were excluded. Thus, after excluding absentees, a total of 120 students were finally included in the study. The parents were invited on the specific days of the study. Good rapport was built up with the students and informed verbal consent was obtained from them and one of their parents. Briefing was done regarding the questionnaire provided to the students and they were asked to mark the responses.

III. RESULTS

Table 1: Socio-demographic profile

Sl. No.	Characteristics	Category	Frequency (n=120)	Percentage
1.	Age (in years)	6-9	42	35
		9-12	78	65
2.	Gender	Male	45	37.5
		Female	75	62.5
3.	Religion	Hindu	32	26.6
		Muslim	88	73.3
4.	Socio-economic	Upper	0	0
		Upper Lower	32	26.6
		Lower Middle	54	45
		Upper Lower	28	23.3
		Lower	6	5
5.	Grade (in school)	1-2	22	18.3
		3-4	43	35.8
		5-6	55	45.8

Table 2: Hygiene practices among the participants

Sl. No.	Practices	Category	Frequency (n=120)	Percentage
1.	Brushing teeth	Never	0	0
		Once a day	85	70.8
		Twice a day	35	29.1
2.	Bathing habit	Twice a week	0	0
		Once a day	78	65
		Twice a day	42	35
3.	Using soap for bathing	Yes	120	100
		No	0	0
4.	Washing hands before meals	Yes	94	78.3
		No	26	21.6
5.	Nails Trimmed	Yes	76	63.3
		No	44	36.6
6.	Nose Picking	Yes	70	58.3
		No	40	33.3
7.	Uniform is clean	Yes	64	53.3
		No	56	46.6



Table 3: Information sources of personal hygiene

Information source of personal hygiene	Frequency (n=120)	Percentage
Parents	65	54.1
Teachers	32	26.6
TV	18	15
Other sources	5	4.1

Table 4: Perception about hygienic practices amongst children

Perception about hygiene practices	Frequency (n=120)	Percentage
It helps to prevent diseases	88	73.3
It doesn't help to prevent diseases	12	1
Don't know	20	16.6

IV. DISCUSSION

In the present study, the hygiene practices of 120 students between age 6-12 years were studied. The median age being 10.1 years. Majority of the participants were girls (62.5%), while (37.5%) were boys. 45% of the children belonged to the lower middleclass strata of the society. Amongst the participants, majority of them were students of 5th-6th grades (45.8%), 35.8% of the children were in the 3rd-4th grades and 18.3% of the children were in 1st-2nd grades.

Amongst the 120 students, majority(70.8%) of them brushed their teeth once daily while 29.1% brushed their teeth twice daily.65% of the children took bath once daily, while the remaining 35 % took bath twice daily. All the participants used soap while bathing.78.3 % of the children wash their hands before meals, while 21.6% of them didn't wash their hands before meals. 58.3 % of the participants had the habit of nose picking, while 33.3% said that they did not have the habit of nose picking. The school uniform was washed and clean among majority(53.3%) of the children, while the remaining of them (46.6%) had soiled uniform. 63.3% of the participants had their nails trimmed while the remaining (36.6%) had untrimmed nails.

The results obtained in this study is similar to those obtained by Chaudhari A et al⁶ in Ahmedabad, Pati S et al⁷ in Odisha and Sarkar M et al⁸ in Kolkata.

This present study also took into account the information sources of personal hygiene. Parents and teachers were listed as the sources of information by 54.1% and 26.6% of the children respectively. Regarding perception of hygiene practices, 73.3% of the children said that healthy practices prevent the spread of diseases while 16% of the children were unsure about it. A study conducted by Mohammed Ghanim et al⁹ in UAE found similar results.

V. CONCLUSION

In developing countries like India, communicable diseases arising out of lack of hygiene and sanitation are among leading causes of morbidity and mortality. Children are often considered as frontiers of the nation and still it is a vulnerable group of our society, since they are susceptible to various communicable diseases due to lack of hygiene such as acute gastrointestinal disorders, worm infestations etc., which are responsible for most of the causes of sickness absenteeism in schools.

Strong and sustained reinforcement through health education camps, participatory techniques, increasing emphasis on hygiene promotion in the school curriculum and setting up rallies, competitions and posters that increase awareness along with the school health services will help to improve the child health, self-esteem, life skills and behaviour.

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