



ORIGINAL RESEARCH PAPER

Community Medicine

A HEALTH STATUS REVIEW OF CHILDREN OF COMMERCIAL SEX WORKERS RESIDING IN A METROPOLITAN CITY AREA

**KEY WORDS:** Morbidity profile, Children of CSWs.

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ABSTRACT

**Introduction:** Commercial Sex work is one amongst the oldest professions in the history of mankind. Besides commercial sex work, routine social activities go on in any red light area which includes pregnancy, childbirth and rearing of children. The children in such an area are at high risk of being deprived of education, protection and healthcare. Hence, this study was planned to review the health status of children of Commercial Sex Workers.

**Objectives:**

1. To assess the morbidity profile of children of Commercial Sex Workers of study area.
2. To assess the nutrition status of children of Commercial Sex Workers of study area.

**Methodology:** It was a cross-sectional study carried out in red light area of Mumbai city with the help of a local NGO. Information was obtained from children, their mothers (CSWs) and local NGO workers.

**Results & Conclusions:** A total of 81 children were included in this study, which were almost equally distributed over three five-yearly age groups (5-9, 10-14 and 15-19 years). 18.5% had skin itching and 21% had pain in gums and teeth. On examination it was seen that 14 out of 81 had clinically evident pallor. It was found that 34 participants had Dental Caries, 19 had ear wax while 12 had refractive errors.

**Introduction:**

Commercial Sex work is one amongst the oldest professions in the history of mankind. In the modern era commercial sex work has existed in form of red-light areas or brothels in cities and towns of our country. Besides commercial sex work, routine social activities go on in any red light area which includes pregnancy, childbirth and rearing of children. The children in such an area are at high risk of being deprived of education, protection and healthcare. Such children also face stigma from the society which further hampers their chances of a normal upbringing.<sup>(1)</sup>

Children born and brought up in such areas may have unattended health issues since birth. Such children may be partially immunized or at times may even be non-immunized. They are risk of suffering from skin infections, malnutrition and other recurrent illnesses.<sup>(2)</sup> Hence, this study was planned to review the health status of children of Commercial Sex Workers and to look for common morbidities among these children.

**Objectives:**

1. To assess the morbidity profile of children of Commercial Sex Workers of study area.
2. To assess the nutrition status of children of Commercial Sex Workers of study area.

**Methodology:**

This study was conducted in Kamathipura area of Mumbai. The study participants were children of Commercial Sex Workers. The participants were recruited with the help of local NGO. All available children in the age group of 5 – 19 years were included in this study. Informed consent was obtained from mother of the study participant. Whenever mother was not available, the NGO caretaker signed the consent document as a guardian of the child. Also, assent was obtained from the children before including them in this study.

Further, information was taken from informants (either mother or NGO workers) and study participants on the basis of a semi-structured pre-validated questionnaire. Besides, personal details question were asked about their enrolment in school and whether they were currently working somewhere. Participants were also asked about current and past health problems. This was followed by examination of study subjects which included anthropometry, general examination and systemic examination. Nutrition status was calculated on basis of BMI for Age and Height for Age charts

using the WHO Anthro Plus software.<sup>(3)</sup> Whenever a child was found to have any kind of morbidity, a referral note for higher centre was issued for appropriate management of the problem. The data collected was entered in Microsoft Excel Spreadsheet 2007 and analyzed using OpenEpi version 2.3.1.

**Results & Discussion:**

A total of 81 children were included in this study. Informants included mother of the child (whenever available), NGO caretakers and children themselves. Out of 81 study participants, 33 (40.7%) were females and remaining 48 (59.3%) were males.

The study participants were almost uniformly distributed across the three 5-year age groups of 5-9, 10-14 and 15-19 years with around a third of total sample belonging to each of the age groups.

All the children were currently enrolled in school. Most of them played games (outdoor as well as indoor) and did school homework during the non-school hours. Only a small proportion of participants (9 out of 81) did some kind of part-time work after coming back from school. It included working as assistant to tailors or working in a shop.

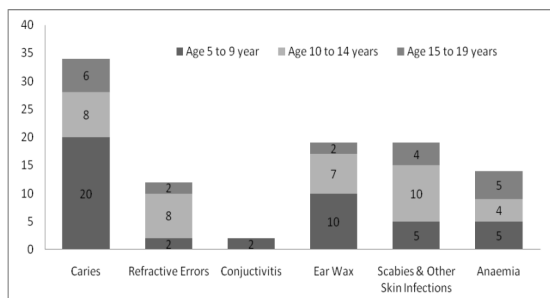
From the information summarized in table 1, it is evident that a significant proportion of children had some or other complaints. Toothache, Itching in eyes and ears and skin itch or rashes were the major complaints presented by children of CSWs of study area. Only 5 children had history of hospitalization in the past for conditions like Pneumonia and diarrhoea. 12 out of 33 girls had attained Menarche. 9 of them gave history of having irregular periods. The age of attaining menarche varied between 11 to 13 years.

**Table 1: Summary of Symptoms reported by study participants**

	Symptoms	Number	Percentage
Eyes	Spectacles	10	12.3 %
	Watering/Itching	12	14.8%
	Night blindness	4	4.9%
Ears	Itching	12	14.8%
	Pain in Ears	4	4.9%
Skin	Itching	15	18.5%

	Rashes	12	14.8%
Oral Cavity	Pain in Gums & Teeth	17	21%
Bodyache	12	14.8%	
Fever	2	2.5%	

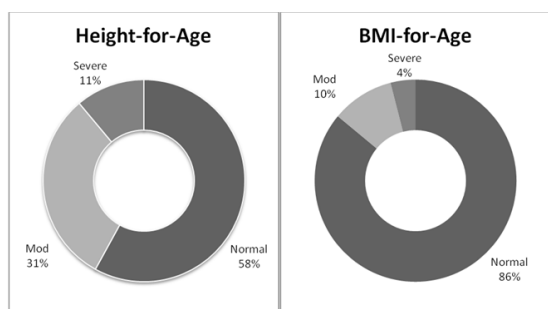
On examination, 14 participants were found to be Anaemic on the basis of clinically evident pallor. Pulse and Blood pressure was within normal range for all the study participants.



**Figure 1: Morbidity Profile as found on Clinical Examination**

It can be seen in Figure 1 that Dental Caries (34 out of 81) was the major morbidity among the research participants. It can also be seen that Caries is present in highest proportion among the youngest age group of 5 – 9 years. Ear wax was found among 19 participants among whom 10 children belonged to 5 – 9 years age group and 7 children belonged to 10 – 14 years group. Skin infections (Scabies and others) were also seen among 19 children. 12 study participants had refractive errors most of whom were in age group of 10 – 14 years. It can be seen that most of the morbidities were common in 10 – 14 age group except for caries which was common in youngest age group.

Weight and Height were recorded and Z scores were calculated for BMI-for-Age and Height-for-Age charts with help of WHO Anthro Plus software. On the basis of Z-scores, the participants were divided into Normal nutrition, moderately malnourished and severely malnourished.



**Figure 2: Distribution as per BMI-for-Age and Height-for-Age charts**

Figure 2 shows that 11% children were severely malnourished using height for age tool i.e. they were severely stunted. Similarly, 31% were moderately stunted. Classically Height-for-Age has been described as a measure of chronic malnutrition. Therefore, 42% of this study population has been malnourished chronically over a long period of time. On using the BMI-for-Age tool it was found that only 14% were malnourished (10% moderate and 4% severe.)

This study shows that Dental caries (42%), Ear Wax (23%), Skin infections (Scabies and others-23%) and Anaemia (17%) were the major morbidities found in children of Commercial Sex Workers. In a study done on a comparable group of children, it was found that major morbidities were Anaemia, Dental caries and signs of micronutrient deficiencies.<sup>(4)</sup> These findings are similar to present study.

In this study it was found that 42% were found to be stunted using the Height-for-Age chart. In a previous study done on children

from urban slum it was found that 19.9% children were stunted.<sup>(5)</sup> This huge difference in proportions of stunting shows that malnutrition is widely prevalent in children of Commercial Sex Workers and the scenario is more severe as compared to children living in urban slums.

**Conclusions and Recommendations:**

This study was carried out in a special group of children aged 5 – 19 years residing in area where commercial sex work is a routine activity. The proportion of males and females was almost similar and study population was almost equally distributed in age groups of 5-9, 10-14 and 15-19 years. The major symptoms reported included Toothache, Ear itching and watering of eyes. On examination the major morbidities were Dental Caries, Ear wax, Skin infections and Anaemia. A significant proportion of study subjects were stunted (low height-for-age.)

On comparison with previous studies it was found that the children included in this study had a morbidity profile almost similar to a comparable population group of previous study. However, the proportion of malnutrition (stunting) was grossly more in this group as compared to previously studied group. A lack of family support and neglect on part of health system are potential reasons for such a morbidity profile and nutrition status among these children. Hence, it is recommended that special health units must be setup in such marginalized areas with focus not only on Commercial Sex Workers but also on their family members, particularly their children. Secondly, it is recommended that government must encourage Non-Governmental Organizations to adopt and serve in such areas so that children in these areas may have a close to normal upbringing. Thirdly, such studies must be repeated at regular intervals and be preferably carried out by independent agencies so that real time situation of children of commercial sex workers could be presented and steps may be taken towards their betterment.

**Limitations:** This study was a cross-sectional study and hence long term changes in morbidities (Eg effects of climatic variations, etc) could not be included.

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**Conflict Of Interest:** None

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