

URBAN PUBLIC HEALTH & SANITATION- A SOCIOLOGICAL STUDY

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Abstract

To live a healthy life, people must practice proper hygiene and sanitation. This would also include proper understanding of the value of potable drinking water, proper nutrient intake and physical exercise. There are various research works being done on the relationship between health status of the people and sanitation practices. The underpinning of the present study emphasizes on the necessary aspects of how to study water condition, sanitation status and hygiene practices of people at household and community levels, both in urban and rural areas. Sanitation can be seen as the policy and practice of protecting health through hygienic measures. In the view of World Health Organization, sanitation generally refers to the provision of facilities and services for the safe disposal of human urine and faeces. Urban development schemes, programmes, and projects target to infrastructure development, delivery of services, and strengthening of local governments. It further highlighted on implementation of reforms at state and ULB level. At the Union Government level, there are some schemes and policies that focus specifically on water and sanitation in the urban setting. In order to minimize these impacts, Government of India has under taken several measures including increased investment in urban sanitation, policy initiatives, regulations, and public campaigns to improve sanitary conditions in the country. Ministry of Urban Development, Government of India, launched Swachh Bharat Mission in October, 2014 with a view to eliminate open defecation and improving the sanitary conditions in urban areas.

Keywords: Health and Sanitation, water.

Introduction

Providing environmentally safe sanitation to the people is a challenging task. In order to minimize these impacts, Government of India has under taken several measures including increased investment in urban sanitation, policy initiatives, regulations, and public campaigns to improve sanitary conditions in the country. Ministry of Urban Development, Government of India, launched Swachh Bharat Mission in October, 2014 with a view to eliminate open defecation and improving the sanitary conditions in urban areas. Weak sanitation has significant health costs and untreated sewage from cities is the single biggest source of water resource pollution in India. This indicates both the scale of the challenge ahead of the Indian cities and the huge costs incurred from not addressing them. India's bigger cities have large, centralized sewerage systems with vast underground pipelines, pumping stations and huge treatment plants. These systems are expensive to build and even more expensive to operate, as they require continuous power, a large amount of water, skilled operators and extensive electro-mechanical maintenance. Currently on-site pit latrines, septic tanks and other such systems account for a substantial proportion of toilets in urban areas while the containment of human waste will be largely achieved under SBM, its treatment still poses a huge challenge. In the absence of adequate safe and sustainable sanitation, many Indian cities are already suffering the consequences, in the form of health ailments and serious pollution of water and

soil resources. In contrast with the large proportion of on-site sanitation systems, limited attention has been accorded to proper construction, maintenance management and safe disposal of faecal sludge and septage from septic tanks and pit latrines. Limited capacities and resources with Urban Local Bodies resulted in little regulation of maintenance and cleaning of septic tanks and pits – in many cases, households do not report cleaning for a number of years. Some ULBs have desludging equipment or there are private players providing cleaning services but the supply of desludging services is far from adequate. In many instances, faecal sludge and septage is dumped in drains and open areas agriculture fields posing considerable health and environmental risks.

Status of Urban Sanitation

The situation in urban areas is better than rural areas, but still one-third of the urban households have no access to piped drinking water in 2011 and the progress during 2001-2011 was just 2 percentage points. Similarly one-fifth of urban households were not connected to any drainage facilities and similar proportions have no access to toilet facilities in urban areas. Also, in urban areas, there is no difference between the proportions of households with television/mobile/telephone facilities on the one hand and toilet facilities on the other as observed in rural areas. State level variations in access to water and sanitations remain same as seen in rural areas. Slums add an acute dimension to the sanitation and unhygienic conditions in urban areas as one-fifth urbanites live in slums according to 2011 Census. It is not possible to have toilet facility in every slum household due to space crunch, therefore public toilets were provided in some of big cities like Mumbai.



Figure: Health Status & Sanitation

Universal access of urban sanitation to poor families is major challenge as slums and backward areas have grossly inadequate sanitation infrastructure and sanitation services as compared to the urban areas. This is because of the fact that development work was carried out in only recognized/notified slums by the local bodies. However, In 2005 Govt. of India under the JNNURM Mission highlighted that all existing slums are to be integrated in the mainstream of urban planning and development. Thus, with the construction of community and public toilets in the states like Maharashtra, Karnataka, Madhya Pradesh, Gujarat and Orissa accessibility of sanitation services has been increased to the urban poor. There has been paradigm shift in urban governance in India in the recent years. The emphasis from schemes and programmes has been shifted to mission mode approach for achieving the targets and project objectives. Massive investment based programmes and schemes in mission mode approach have been implemented recently by the Ministry of Urban Development as Ministry of Housing and Urban Poverty Alleviation, Government of India. The focus of government is on development of urban infrastructure, improvement in delivery of civic services through public private partnership, implementation of reforms and improving service delivery mechanism. The government is also planning to create high quality urban infrastructure and providing smart solutions in civic services through effective use of technology and mobilizing private sectors for investment in selected cities of India. There has been larger focus on improving the sanitary conditions and eradication of open defecation in urban areas through social mobilization and construction of toilets.

Sociology of Sanitation

Sociology of sanitation is being much debated recently as there is thrust on behaviour change of people in order to improve sanitation conditions. Sociology of sanitation has emerged as branch of medical sociology in the early 1940's. The discipline that investigates the social causes and consequences of health and illness was inspired by the health and sanitary reforms that took place in Western society. It was well recognised that the relations between sociology and sanitation are extremely intimate. The individual is the essential element of the society, his social values depends largely upon his health, and his environment depends on his habits (Pais, 2015). Sociology of sanitation includes: (1) the sanitary measures at household; (2) the sanitary conditions at public places; (3) sanitation at work place; (4) relation of sanitation with the caste; (5) gender and sanitation; (6) social status and manual scavengers; (7) culture and sanitation; (8) sanitation at school or educational sector; (9) collection, storage, segregation, transportation and disposal of wastes, (10) user interface, storage/containment, emptying and transportation, treatment, and use/safe disposal of faecal sludge; (11) public policies of sanitation, and (12) community engagement and participation of CBOs / NGOs. Thus, sociology of sanitation makes a scientific study of sanitation. Thus, sociology of sanitation makes a scientific study of sanitation. It examines the role of institutions in the sanitary conditions and helps in better understanding and planning of healthy society. It also offers great solution of social problems. The culture of sanitation also helps in evolving road map and action plan for making cities open defecation free as well as launching of community led total sanitation campaign.

There are many possible definitions of sanitation. Sanitation means the safe management of human excreta and wastewater. It therefore includes both the 'hardware' (e.g. latrines and sewers) and the 'software' (regulation, hygiene promotion) needed to reduce faecal-oral disease transmission. It encompasses potential reuse, ultimate disposal of human excreta or discharge of wastewater. Sanitation refers to safe handling of many types of waste products. By safe handling we mean ensuring safety in collection, storage, treatment and disposal of all types of waste products. We generate a lot of waste in form of human excreta, household waste water, sewerage, effluents, industrial waste products etc.(Bisaria, 2015). Sanitation refers to formulation and application of measures designed to protect public health. It also refers to the safe conditions which includes lean and safe water supply, clean and safe ambient air, efficient and safe animal, human, and industrial waste disposal, protection of food from biological and chemical contaminations, and adequate housing in clean and safe surroundings (Pais, 20015). According to WHO, sanitation refers to the provision of facilities and services for the safe disposal of human urine and faeces. Inadequate sanitation is a major cause of disease worldwide and improving sanitation is known to have a significant beneficial impact on health both in households and across communities. According to UNICEF, sanitation literally means measures necessary for improving and protecting health and well being of the people.

Environmental sanitation aims at improving the quality of life of the individuals and at contributing to social development. This includes disposal or hygienic management of liquid and solid human waste, control of disease vectors and provision of washing facilities for personal and domestic hygiene. Environmental sanitation comprises both behaviour and facilities to form a hygienic environment. Most diseases associated with water supply and sanitation, such as diarrhoea, are spread by pathogens found in human excreta.

Health Conditions

To study the health conditions of people, the indicator of health seeking behaviour in the terms of health check-up has been incorporated. The study found that 60% of the respondents go for health check up during health needs and it also meant that that people who were sick recovered from them. 8% of them never had any health need based health check-up in a modern facility. During the occurrence common flu or fever people availed traditional methods of treatment like home remedy, fasting, and prayers. 3% of th respondents go for health check-up once in three months, 6% once in six month and 24% once in a year as shown in below figure. Most of these people actually suffered from major illness like tuberculosis, heart disease etc. As people are less aware of their health conditions, the status of health is not much visible. Respondents, who go for medical checkup, once in three months, mostly had ailments like hepatitis, heart condition etc., and because of non availability of tertiary health care in the area, most of them go out of the district for medical treatment.

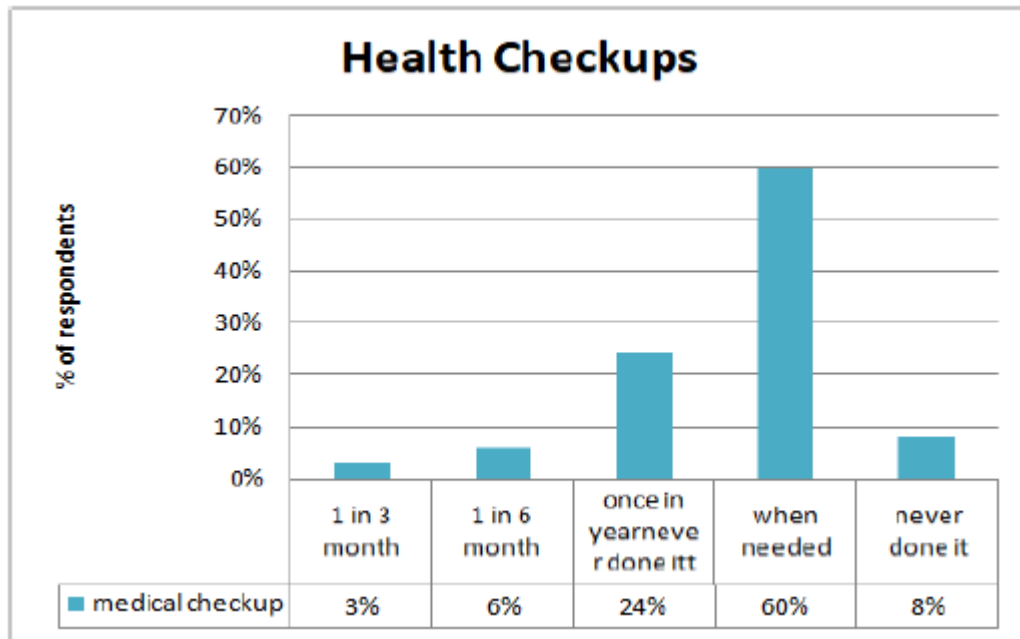


Figure: Status of Health Checkups

Sanitation

Sanitation involves the provision and services for safe disposal of human urine and faeces that has been dealt through sanitation facilities, types and their status in the area. Below figure explains on the sanitation facilities in the study area.

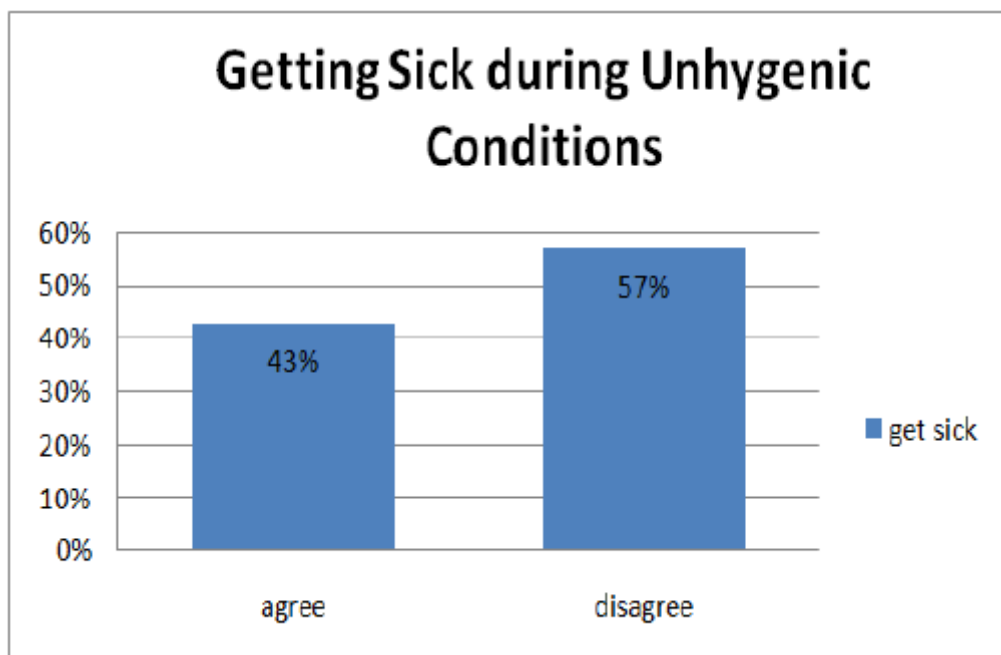


Figure: Status of Getting Sick during Unhygienic Conditions

84% of the household have sanitation facilities and 15% of household do not have any toilet facilities, for some of the household did not have sufficient space to build toilet and that they shared the same with their neighbour. 15% of them shared their toilets with others and 84%

of them had their independent toilets. The household who share their toilet were mostly built with bamboo that was connected by pit and runnel to dispose faeces.

89% of household had pit toilets and 9.5% toilets were connected with the river or runnel made of bamboo and pucca toilet and the faeces normally flowed in open area causing pollution in the environment. 3.8% of the respondents use other type of toilet like pour flush toilet and bamboo framed toilet that are connected with pit and septic tank. 3.8% household have separate toilets on the basis of gender. Though people are aware of their toilet requirements but their practice could not match up to the actual need of proper disposal.

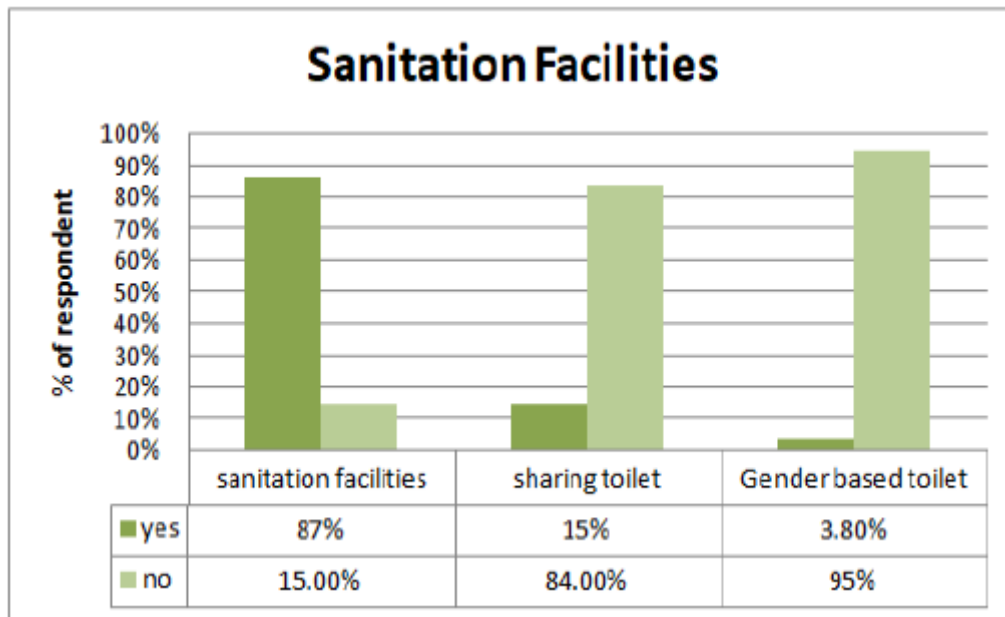


Figure: Status of Sanitation Facilities

Conclusion:

While the links between sanitation and human health are well documented, the disproportionate and overlapping disease, care giving, education, and economic, social, and dignity impacts are rarely captured together for women and girls living in urban informal settlements. Yet, improving slum sanitation can enhance child and maternal well-being, which is particularly important to global urban health since more people are living in cities and women are often primary care givers and household money managers.

India's bigger cities have large, centralized sewerage systems with vast underground pipelines, pumping stations and huge treatment plants. These systems are expensive to build and even more expensive to operate, as they require continuous power, a large amount of water, skilled operators and extensive electro-mechanical maintenance. It is for this reason that India's 7,000+ small towns do not have such systems and are unlikely to be covered by centralized sewerage systems in the near future. Thus, while the containment of human waste will be largely achieved under SBM, its treatment still poses a huge challenge. In the absence of adequate safe and sustainable sanitation, many Indian cities are already suffering the consequences, in the form of health ailments and serious pollution of water and soil resources.

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