

INTRODUCTION

Home hygiene and the prevention of infectious disease in developing countries: a responsibility for all

Infectious disease remains a serious global threat to health, the most significant proportion of these diseases occurring in developing countries. Prevention of infectious disease through integrated programmes relating to water supply, sanitation, food quality and community and home hygiene practice are key factors in controlling infectious disease. There is evidence that provision of sanitation services and hygiene education along with safe drinking water could reduce diarrhoeal mortality by 65% and the related morbidity by 30%.

In India and in other developing regions, experience now shows that if the health benefits from public-funded community programmes relating to water supply, sanitation, food quality, etc. are to be commensurate with the investment made, they must be better integrated with the promotion of hygiene practice within the community, in the home and its immediate surroundings.

Promoting hygiene education and developing community-based projects will empower communities and enable individuals to take more responsibility for their health in terms of hygiene in the home and its environment. This is most relevant in regions where governmental organisations may be less able to provide a standard of public health services, including Community Water Supply and Sanitation (CWSS), that is common in developed countries. The responsibility for health education and hygiene promotion needs to be shared by all stakeholders, including the private sector, interested in improving the hygienic status of the domestic and peri-domestic environment, individually or in partnerships.

With this in mind, the International Scientific Forum on Home Hygiene (IFH), in partnership with the London School of Hygiene and Tropical Medicine, Sulabh International Social Service Organisation, the Indian Public Health Association (IPHA), the Institution of Public Health Engineers (IPHE), and the Indian Association of Preventive and Social Medicine, organised an international conference entitled 'Home Hygiene and the Prevention of Infectious Disease in Developing Countries: A Responsibility for All'. This conference took place in New Delhi, India, in April 2002 and was attended by around 150 delegates from around the world.

The main conference objective was to stimulate discussion and share experience on the issues of integrated hygiene interventions related to the domestic setting. The conference covered all the main hygiene areas related to domestic and peri-domestic settings, including water, sanitation, food hygiene, handwashing and hygiene practice. A further objective of the conference was to evaluate the important and interdependent responsibilities of government, non-government and inter-government organisations, and the corporate world for developing and promoting home and environmental hygiene in areas of the world where the threat of infectious disease is high and where improved hygiene practices can bring very significant health benefits at affordable costs.


This conference supplement contains the papers, which were presented at the conference. In the first session, an overview session, the potential for infection transmission in the home was reviewed. Other papers in this session included a situational analysis of water, sanitation and hygiene firstly in India and then in the South East Asia region as a whole, together with a paper which evaluated cost–benefit assessments as a means of defining priorities for action. The overview session was followed by sessions devoted to each of the main areas of home hygiene, namely hygiene practice in the domestic and peri-domestic settings, handwashing, water, sanitation, and food hygiene. For each hygiene area, the related issues, solutions and benefits were evaluated in a keynote paper, which was followed by papers evaluating case histories of intervention measures and other community projects.

In India and other developing countries, water and sanitation-related, faecal–oral infections continue to be the major disease burden. Unfortunately, however, environmental and preventive health issues are often not given the priority they deserve, both by the policy makers, as well as, service providers. The Johannesburg Summit has highlighted the critical importance of hygiene and sanitation for sustainable development, and most developed countries have committed to giving funding support for promoting hygiene and sanitation in the developing countries. Public–private partnership is also being accepted as a viable model for developing countries.

Under the existing situation, there appears to be significant scope for public–private partnerships for hygiene promotion. An integrated hygiene-awareness and health-education programme, which includes domestic and personal hygiene, environmental and peri-domestic sanitation, as well as safe drinking water, needs to be undertaken at policy-making levels and among field and basic workers, and the general public. IFH, which has done significant work on the scientific issues of domestic and personal hygiene, would be delighted to develop linkage with UN and other International NGOs, as well as National NGOs for supporting such a programme.

We do hope that this publication will be useful for the professionals, scientists and sector leaders, as well as community organisers for promoting hygiene and public health in the developing countries.

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Conference Conclusions and Recommendations

The major conclusions made from the conference were as follows:

- Infectious disease remains a serious global problem and is a significant factor in determining the health status and economic progress in developing countries.
- More emphasis needs to be given to initiatives that are preventative rather than curative. The major hygiene-related measures relating to the home are water and food, sanitation, hygiene practice/behaviour and disposal of refuse.
- If the health benefits of public-funded community water supply and sanitation programmes are to be commensurate with the investment made they must be integrated with the promotion of hygiene practice within the home and its immediate surroundings.
- If infectious disease worldwide is to be contained in a manner which is economically sustainable, it must be a shared responsibility between government, industry, non-government organisations and the public.
- If the responsibility is to be shared by the public and community, effective programmes that combine hygiene education with motivation of behaviour change must be developed and promoted.
- There is a need to develop effective partnerships to bring about change at the community level. Such partnerships should involve the private sector together with public agencies, including health authorities, urban and rural development authorities and local government bodies.
- There is urgent need for further research, most particularly to better understand the key routes of transmission of infection in the home in developing countries, and the most effective means to bring about behaviour change.

The conference recommends the following specific priority actions:

- (1) Action to improve compliance with handwashing in the domestic setting, most particularly handwashing after defecation and before eating food. A key aim of these programmes is to reach even the poorest levels of society. Key action points:
 - Education on good handwashing practice.
 - Access to a sufficient quantity of water.
 - Access to low cost affordable soap.
- (2) Action to ensure microbial quality of water at the point of use in the home with particular reference to safe handling, storage and treatment of water in the domestic setting. Key action points:
 - Provision of affordable containers for safe storage of water in the home.
 - Availability of low-cost systems for purification of drinking water at the point of use.
 - Establishment of local surveillance systems for water quality.
- (3) Action to increase access to safe means of excreta disposal, particularly for those communities where 'open defecation' is still widespread. Key action points:
 - Mobilise resources to accelerate sanitation coverage in rural areas and also, where needed, in peri-urban and urban areas.
 - Education on the importance and practice of safe excreta disposal.
 - The governments of developing countries, like those on the Indian subcontinent, where the practice of scavenging of human excreta still occurs, must set out an immediate timetable for an active programme to abolish this practice.
- (4) Action to promote greater awareness at a national level of the importance of food as a vehicle for transmission of pathogens in the home.
- (5) Seek opportunities for inter-sectorial collaboration in promoting control of infectious disease transmission with control of air pollution, houseflies and cockroaches, etc.
- (6) Lobby for the introduction of 'home hygiene' into graduate and post-graduate medical, nursing, public health and engineering courses.
- (7) Lobby for the introduction of hygiene as a compulsory component of primary and secondary school education.

Priorities for Further Research into Home Hygiene

- i Surveillance studies to determine the actual disease burden in the community and home.
- ii Surveillance of microbiological quality of food and water at the point of entry in the home and at the point of consumption.
- iii Determine the key routes of transmission of infection in the home in order to define priorities for intervention.
- iv Intervention or other studies to quantify the separate and combined impact of hygiene-based interventions on the disease burden in the community and home.
- v Studies to evaluate current behaviour patterns in relation to hygiene of food, water, hands, disposal of faeces and waste disposal.
- vi Studies to understand what motivates people to adopt particular patterns of hygiene behaviour in the home.
- vii Test the effectiveness of new approaches to hygiene promotion and hygiene education.

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