

WORKSHOP

**USE OF MASS MEDIA
IN THE EPIDEMIC CONTROL
AND MANAGEMENT OF
DIARRHOEAL DISEASES**

ICDDR,B LIBRARY
DHAKA 1212

M09170

689



Proceedings of the Workshop on
USE OF MASS MEDIA IN THE EPIDEMIC CONTROL AND
MANAGEMENT OF DIARRHOEAL DISEASES

ICDDR,B LIBRARY
DHAKA 1212

USE OF MASS MEDIA IN THE EPIDEMIC CONTROL AND MANAGEMENT OF DIARRHOEAL DISEASES

PROCEEDINGS OF A WORKSHOP

1985	10	06	0001
Dhaka, Bangladesh			
6 October 1985			
1000			100000

International Centre for Diarrhoeal Disease Research, Bangladesh
GPO Box 128, Dhaka, Bangladesh

ICDDR,B LIBRARY
DHAKA 1212

ICDDR,B LIBRARY	
ACCESSION NO.	027522
CLASS NO.	P 90
SOURCE	COST

P 90
W926p
1985
Cap. 1

Published by:

International Centre for Diarrhoeal Disease Research, Bangladesh
GPO Box 128, Dhaka 2
Bangladesh

June 1986

Special Publication No. 25

Production: Hasan Shareef Ahmed and
Md. Nurul Huda

Cover Design: Asem Ansari

Manuscript typed by: Sharon Sargeant and
Alfred Roy

027522

11 o MAR 1996

ACKNOWLEDGEMENTS

The Workshop on Use of Mass Media in the Epidemic Control and Management of Diarrhoeal Diseases and the publication of its proceedings were supported by the Ford Foundation, United Nations Children's Fund (UNICEF), Directorate General of Health Services, Government of Bangladesh, and the International Centre for Diarrhoeal Disease Research, Bangladesh (ICDDR,B). ICDDR,B is supported by countries and agencies which share its concern about the impact of diarrhoeal diseases on the developing world. Current major donors giving assistance to ICDDR,B are: Aga Khan Foundation, Arab Gulf Programme, Australia, Bangladesh, Canada (Canadian International Development Agency and the International Development Research Centre), the Ford Foundation, Japan, Norwegian Agency for International Development, Saudi Arabia, Swedish Agency for Research Co-operation with Developing Countries, Switzerland, United Kingdom, UNICEF, United Nations Development Programme, United States Agency for International Development, World Bank, and World Health Organization.

TABLE OF CONTENTS

PREFACE

INTRODUCTION

1. Conception, Planning and Organization

1.1 The Concept Takes Shape

1.2 ICDDR,B -- Overview of the Research Findings

1.3 The Objectives of the Workshop

2. Contributions

2.1 Inaugural Address

2.2 Concept and Practice of Health Education Through Use of Mass Media in the Epidemic Control and Management of Diarrhoeal Diseases in Bangladesh

2.3 Epidemiology of Diarrhoeal Disease in Bangladesh

2.4 A Study in the Use of Mass Media in Bangladesh

2.5 Efforts and Experiences on Media Support to OTEP

2.6 Communication Strategy for Lifelong Education

2.7 Essentials of Communication for a Diarrhoeal Disease Control Programme

2.8 Mass Media for Health Education and Epidemic Control

2.9 Cognition of Problems and Needs: Macro and Micro

2.10 Discussion

3. Recommendations

3.1 Organization

3.2 Strategy

3.3 Message/material development

3.4 Research

Appendix 1: Workshop Programme

Appendix 2: Responsible for the Preparation and Organization of the Workshop

Appendix 3: List of Participants

Appendix 4: Workshop Evaluation

PREFACE

It gives me great pleasure to write this PREFACE for the document of the proceedings of the Workshop on the Use of Mass Media in the Control of Diarrhoeal Diseases.

I can see that there is a great potential for reaching a wider segment of our population and for strengthening the messages to them if we plan and activate a concerted mass media programme. While the dissemination of information on the control and management of diarrhoeal disease is the topic of this workshop, the principles will hold for other health topics, such as nutrition, MCH, public health and sanitation.

I am sure this workshop will set the pace and hereby provide newer approaches for health education for all and continuing education for health personnel.

Manzoor ul Karim

Secretary, Ministry of Information and Broadcasting

(October, 1985)

Secretary, Ministry of Health and Population Control

(November, 1985)

Dhaka, Bangladesh

INTRODUCTION

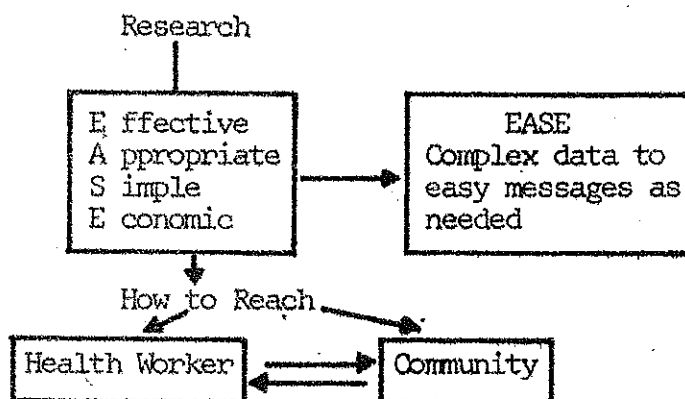
Training, Extension and Communication (TEC) of ICDDR,B, is concerned with the rapid communication of the relevant research findings that may reduce and control diarrhoeal and other related disease in the Third World countries.

TEC has trained over 500 health personnel from 64 countries in the management of diarrhoeal diseases, particularly in the use of oral rehydration salt solution. But this number is not adequate. The search for more ways to reach more people is continuing. We are seeking the participation of the public in life saving health programmes. We wish to help them to utilize the services offered nearby at their doorsteps.

Motivation, training and support are provided to the general population in management and control of diarrhoeal diseases in order to enable them to take timely measures for saving life and controlling epidemic outbreaks. Attempts to establish good linkage between service outlets and communities are made so that the communities get easy access to better service and the service providers get timely information about epidemics.

ICDDR,B is at a point of take off where the knowledge related to the control and management of diarrhoeal diseases can be widely disseminated. Technical facilities, such as radio and television, are available in Bangladesh. But their use for spreading this information has yet to be explored. This Workshop constitutes an important milestone in the never-ending quest for good health and long life.

Research results are published in highly technical scientific journals. It is not easy to filter and collate the often complex research results for the understanding and the benefit of the public. Innovative approaches are needed for reaching the people. The following represents the area for innovative approaches.



The workshop on 'Use of mass media in the epidemic control and management of diarrhoeal diseases' provides some new insights for the approach that can be used in the continuing education of health profession in control of diarrhoeal diseases.

Dr. K.M.S. Aziz
Associate Director
Training, Extension and Communication
ICDDR,B, Dhaka, Bangladesh

1. CONCEPTION, PLANNING AND ORGANIZATION

All applied research has an element of 'communication'. This is much more true when the research findings have to be disseminated widely for the good of the largest number of people. The research work carried out at the International Centre for Diarrhoeal Disease Research, Bangladesh falls in that category. The work done so far has not only identified scores of organisms responsible for causing acute watery diarrhoea and their mechanism but has gone further to identify measures for clinical and home management of cases of acute diarrhoea. One of the most important products of this multi-disciplinary research is oral rehydration therapy (ORT) and the discovery of rice based ORS. These developments have been tested for their effectiveness in clinical and field trials in Bangladesh and several other countries. The simplicity of these measures and their effectiveness in preventing dehydration, which is the main cause of diarrhoeal deaths, has been established. It is essential that this information be disseminated widely especially in countries with high risk of diarrhoea. To what extent can mass media be used in the field of health care for (a) education of the public and (b) continuing education of health workers? This question formed the basis for holding the workshop on "Use of Mass Media in the Epidemic Control and Management of Diarrhoeal Disease in Bangladesh".

The use of mass media for education is not new in Bangladesh. The Workshop organization was not the first to think along these lines. The Ministry of Health and Population Control of the People's Republic of Bangladesh has used both radio and TV for popularizing ORT. One of the non-government organizations BRAC has also used TV for providing information on how to prepare the home-based ORS solution. The Bangladesh Institute for Distance Education has been conducting a school education programme and has recently introduced a graduate course through distance education. It was the overall objective of the workshop to share the experiences of various governmental and non-governmental organizations in order to identify strategies in the use of mass media in health programming with focus on epidemic control and management of diarrhoeal diseases.

1.1 The Concept Takes Shape

Training, Extension and Communication Unit of ICDDR,B (TEC) has the prime responsibility for conducting training programs of various categories for health workers of Bangladesh in the field of diarrhoeal

diseases. One such program covers training of civil surgeons, Upazila health officers and teachers of MAT schools for epidemic control of diarrhoeal diseases. The international training program covers a wide range of topics such as clinical aspects, laboratory aspects and epidemiological aspects of diarrhoeal diseases. One course was also designed to cover health education aspects of the diarrhoeal disease control program.

Both the physicians in the epidemic control group and the health educators attending the international course identified the importance of the use of mass media in a health education program. Interest increased when health educators from the People's Republic of China, who were attending the health education course, related their experiences in the use of radio and video for propagation of health education. The informal discussions held with subject matter experts along with participants recommendations in the health education course have been the predisposing factors for organizing the workshop.

These views were shared with the Director, ICDDR,B, Dr. K.M.S. Aziz and Mr. M.R. Bashir, Associate Directors of ICDDR,B who supported the idea.

They felt the need to establish a dialogue between physicians, public health workers, representatives of government and voluntary organizations and media experts to identify a pattern of joint collaboration in the health care related program.

1.2 ICDDR,B - Overview of the Research Findings

The International Centre for Diarrhoeal Disease Research, Bangladesh (ICDDR,B) as the name indicates has devoted itself to the study of diarrhoea and related subjects with a view to finding effective and inexpensive ways to reduce mortality from this group of diseases. On a worldwide estimate approximately 5-6 million people die per year due to diarrhoeal diseases in Africa, Asia & Latin America. Most of these deaths are in the under five age group.

The ICDDR,B succeeded the previous organization called Cholera Research Laboratory with a view to investigating all other organisms besides cholera that cause diarrhoea. The first major breakthrough of multi-

disciplinary research at ICDDR,B was in 1962 with the discovery of Dhaka Solution which could only be given intravenously, in aseptic conditions and under medical supervision.

The search continued to find suitable alternative fluid that may be given by mouth to treat and prevent dehydration. The conventional Oral Rehydration Salt Solution, also described as ORS Solution is a result of multinational efforts and consists of salt, sugar, bicarbonate and water in a certain proportion. The work at ICDDR,B has been extended further to experiment and report on other home-based ingredients such as gur and rice. Prompt administration of ORT in a case of acute watery diarrhoea can tide over the crisis in approximately 90% of cases without any complication. The results with the use of home-based rice ORS solution are equally promising.

The work done at ICDDR,B has therefore passed through stages of laboratory investigation, clinical trials and field work studies to support the claims in favour of Dhaka Solution, conventional ORS solution and now rice ORS solution. This multi-disciplinary research spans over a period of 25 years. ICDDR,B is interested in a wider dissemination of these results for the benefit of larger communities where diarrhoea continues to be a high risk to further survival of 0-5 years age group.

1.3 The Objectives of the Workshop

1. To identify the educational needs of a diarrhoeal disease control program in Bangladesh that may require the intervention of mass media.
2. To review the current status of use of mass media in health care related programs.
3. To discuss the importance of mass media in the continuing education of health personnel working at the periphery.
4. To recommend strategies that can be field tested in the use of media for:
 - (a) health education of the public
 - (b) continuing education of the health personnel in Bangladesh.

2. CONTRIBUTIONS

2.1 INAUGURAL ADDRESS

- Manzoor ul Karim
Secretary
Ministry of Information
Government of Bangladesh

Introduction

Information has become the essential basis for the progress of human civilization and society. This has been recognized in most countries and in those with large investments in research and development, complex information systems have been created to meet the special needs of policy planners, administrators, various professional groups and people at large, particularly those working in the socio-economic fields. In developing countries, where resources are usually more limited, the need for giving high priority to information is also now being recognized.

Better information helps to achieve a society in which citizens, individually and collectively, can cope with the problems of everyday life, can improve human relationships in their own communities and between people of differing cultures and traditions and thus contribute to better understanding and world co-operation.

The development of an information system based on modern techniques which provides a means of channelling knowledge and spreading it more easily would obviously accelerate the pace of building up a progressive society as has been visualised by ten thinkers who believe in living under the umbrella of one world-brotherhood. As a result, many countries have been examining the need for more systematic planning of their present information infrastructures so as to utilize fully the information originating and accumulating at the national level and to be able to participate in and benefit from existing and future world information systems in various fields of activities.

Role of Mass Media

To engender the attitude of active participation in the development activities of the emerging nations, the social dynamic of development has a vital role to play. It is here that the information media as the

"mobility multiplier" provides the needed prop and support towards the infusion of the mobile personality who can see himself in other's situation and who is, in fact, the newspapers reader, the radio listener, the television viewer, the voter and the active participant who accepts and advocates change. Therefore, mass communication in a developing country, to be worth its salt, must be for the common good and for the overall well-being of the nation.

As the tempo of development activities in Bangladesh is uniformly wide-spread and as the country's plans have succeeded in generating new forces of far-reaching importance, it is imperative that more and more interpretation should condition the reflex of the output of the information media with the required reshuffling of emphasis in matters of dissemination of information, education and entertainment.

For attaining such an objective in the information media sector, vital determinants like audience interest, content analysis, literacy variables, demographic factors, existing predispositions and other influencing factors of an attendant nature must, of necessity, be put to effective evaluation.

Development Communication

Communication is a fundamental social process which grows out of the basic human needs and drives. It takes place between individuals and institutions and in turn flows from one group to the other and vice versa.

In any society the communication system depends on social, economic and political factors and must be consistent with cultural values. While a number of countries may share some common features in their communication systems, the objectives, functions and policies would differ depending on the degree of development and the political philosophy of a particular country. There is no place for universal application of one given model.

With the launching of vigorous development programmes in the countries of the developing regions, the new component that has been added in the overall functional area of the mass media is development communication.

Contrary to the commonly held beliefs, development communication is more than just dissemination of information regarding development activities.

The role of development communication is an integral element in the overall development planning and implementation process which necessitates the communication people to become an integral part of the central development decision-making process also. It is not just telling people about the development programmes. This part of communication is no more than public relations or public information activity and definitely not development communication. The function of development communications, being an integral part of the development process is basically management and non-formal education.

The process of nation building, economic growth and social progress all require the active and purposeful use of many different channels of communication — person to person communication, communication to organized groups, and above all, communication through the mass media of print, broadcasting and film, and through traditional media. It is only in this way that leaders can reach their people, can give and get the guidance that determines national progress. It is through the two-way process of communication that the understanding and cooperation of the people can be enlisted to achieve community and national goals. It is through communication that influences are brought to bear to change traditional ways of living and working, during the 'ascent to modernity'.

The mass media have a central role in this process. They are 'multipliers' which extend the range and magnify the influence of leaders and teachers and thus speed up the whole programme of economic and social development.

The proposition which is being explored is that an adequate flow of information, and in particular an appropriate use of the mass media, can make a substantial contribution to national, economic and social development.

The Mass Media Situation in Bangladesh

Although communication plays a vital role in any development strategy, the infrastructural inadequacies, technological backwardness and lack of proper appreciation of the role of communication contribute to the present communication situation in Third World countries. The two news agencies of Bangladesh are the victims of these infrastructural inadequacies and

technological backwardness.

Although Bangladesh subscribes to the view that there have to be strong national news agencies for a balanced international news flow, in reality there exists a serious imbalance in the flow of information. The current inflow and outflow ratio is 9:1. The main reason is the lack of transmission facilities.

In Bangladesh, radio is the most extensive medium of mass communication. Radio Bangladesh has six stations, which physically cover the whole country. The total number of radio sets is over three million, i.e., only 3.33 sets for every 100 persons.

The question of easy availability of radio sets is vital. The Government has sold cheap radio sets during the last few years. By now a number of assemblers are in a position to sell radio sets at prices that people can afford. The problems of maintenance and the erratic price-fluctuation of dry cell batteries continue to bother the radio set owners.

Radio Bangladesh Dhaka broadcasts a total of 18.00 hours of programmes daily between 0600 hours and 12 midnight. On an average, a total of 87.5 programme hours are put on the air every day from all six stations.

Television appeared with its audio-visual charm and attraction in the mid-sixties. It is yet to become a common man's medium because of high costs. It is still largely confined to urbanised areas. The Government has been distributing subsidised TV sets, both electricity and battery-operated, for community viewing in the rural areas. These TV sets in the rural areas have become the source of both information and entertainment.

Television covers more than 90 percent of the country. At present there are about 350,000 television sets in the country, i.e., 0.25 set per 100 persons. But taking into account the community TV sets, the total number of TV viewers is estimated to be more than 2 million.

Television transmits about 8 hours daily which include programmes on development, entertainment and canned foreign films beamed through one

channel. Bangladesh TV introduced colour in December 1980.

Coming to the print media, newspaper plays a vital role. It is estimated that the gross circulation of 50 dailies, 198 weeklies and 381 other periodicals and journals is about one million and a half, i.e., 1.66 copies per 100 persons. Because of our low level of literacy (about 23.3) print media touch only a fringe of the vast population of 99 million. Most newspapers are city-based and cater to the needs of the urban dwellers. The news flow is largely from urban areas to the rural areas, though each newspaper will have a page or so to cover rural news. Absence of rural newspapers is a major reason for current imbalance in the news flow in the real sense. There are, of course, a few district-town based newspapers, but their circulation and effectiveness can be termed far short of the requirement.

Nevertheless, the position of all three media is still far below the minimum desirable standard of mass media availability formulated by UNESCO in the 1960's and universally accepted: ten newspapers copies, five radio receivers and two television receivers for every 100 inhabitants.

Film has been popular with the masses of this country for nearly half a century, mainly as a source of entertainment. Despite its tremendous potential, its role as an instrument of arousing enthusiasm for national development has not been exploited. On an average 50 feature films are made yearly. As of June 1984, Bangladesh has 291 cinema halls with a total seating capacity of only 1,85,575, i.e., there are only 0.22 cinema seats for 100 persons and one cinema hall for every 3,19,000 people.

The Department of Mass Communications is responsible for direct, inter-personal communication with the rural masses in particular through discussions, distribution of reading materials and exhibition of films on development, population control and entertainment. This agency is also responsible for feedback to the Government of the opinion and views of the rural population on various activities and policies of the Government. They also utilise the traditional means of communication such as folk songs, Kabigan and Jatra.

A large number of extension workers employed in the rural areas by various government departments is engaged in interpersonal communication. They are important change agents. The effectiveness of their communication depends on the tact, capacity and skill of these change agents.

Making People Aware

Let us now focus a little more close attention to the main theme of my paper -- making people aware of the health problems in general including epidemic control and management of diarrhoeal diseases and motivating them through mass media programming. The task is obviously not an easy one.

Health Programmes

It is now widely publicised that Bangladesh is committed to provide health for all by the year 2000. No doubt it is a stupendous task in the context of the continuing alarming growth of population. Indeed there has been some progress in this regard particularly in the areas of infrastructural facilities and manpower. The country is riverine with widespread poverty and malnutrition, and diseases of various forms. Diarrhoeal diseases are still considered one of the top killers. I consider it worthwhile to quote from the report of an international agency just made available to provide some sort of idea about maternal and child health care: "The health status of the population is unacceptably low by all conventional measurements. Infant mortality is estimated at 125 per 1000 live births, compared with 94 in India and 96 in Burma; child mortality (1-4 years) remains at an estimated 23/1000 population. Infant mortality varies substantially by region although variation by social class and income is small due in part to uniformly low standards of hygiene and sanitation and universal and prolonged breast feeding. Deaths in infancy are concentrated in the first month of life with an estimated neo-natal mortality rate of 80/1000 live births; this represents 60% of infant mortality against an international norm of 30-50%. Surveys indicate that the principal causes of neonatal death are tetanus (59%), birth trauma and prematurity (32%) and pneumonia (9%). A further 60 deaths per 1,000 live births occur in the succeeding eleven months due principally to late emerging tetanus (24%), respiratory infections (27%) and diarrhoea (27%). In the second year of life, covering the weaning period, diarrhoeal disease is the predominant cause

of death (43%) with contributions from respiratory infections (24%) and measles (7%). In the 2-5 year age group, diarrhoeal disease accounts for 63% of deaths. Maternal mortality is estimated at 6/1000 live births which is about 10 times higher than rates for developed countries".

About mass media programming on health and relevant matters, I would prefer to say that the mass media has picked up the component as an integral part of the national development process encompassing the gamut of the mass media, i.e., print, film and electronic media. Radio and television are broadcasting health education programmes regularly. However, there are lot of things yet to be done. I have no hesitation to mention that our development communication programmes cover less than ten percent of the total broadcasting and telecasting hours. Steps are being taken to increase the volume of programming in this area both in qualitative and quantitative terms.

The support given by mass media to health programming in Bangladesh is not documented in many studies. This communication support takes various forms: 1) providing information to make the people aware of health matters in general and primary health care in particular, 2) making health care socially desirable and acceptable, 3) stimulating persons and groups to discuss health programming and reinforcing these discussions, 4) neutralizing rumours and correcting misinformation associated with health care, 5) motivating or persuading persons into action through a series of messages via variety of communication channels and 6) causing a shift in attitude from non-acceptance to acceptance of many of the health care facilities.

In conclusion, I would like to assert that though the mass media have been quite extensively used in health programmes, very few scientific studies have been done to assess their effectiveness in such programmes. Moreover, the KAP surveys done in Bangladesh make little or no attempt to relate levels of knowledge, attitude and practice of health knowledge to a particular mass medium or the mass media in general. But one will tend to agree with health programme planners and implementors that the health problems are much too urgent for us to sit by and wait for scientific media studies to be conducted and their effectiveness to be confirmed before they are to be used in health care programmes. We are to go ahead.

2.2 CONCEPT AND PRACTICE OF HEALTH EDUCATION THROUGH USE OF MASS MEDIA IN THE EPIDEMIC CONTROL AND MANAGEMENT OF DIARRHOEAL DISEASES IN BANGLADESH

- Mrs. Khurshida Khanom*

1. Introduction

Health Education has emerged as a new discipline in the field of Public Health only during the 19th century. Though a new member in the health team, health education has been identified as one of the important components of the basic health services. In recent years, a further impetus has been given to health education activities as a part of primary health care. A basic tenet of health education is behavioural change. Human behaviour plays a vital role in the etiology and epidemiology of many of the diseases of greatest importance in contemporary society. Nevertheless, the promotion of health and the prevention of diseases with educational efforts are dependent on health consciousness and community participation in identifying and solving health problems. Health education efforts are therefore significantly important in the types of interventions that require lasting behavioural changes such as in the prevention of diarrhoeal diseases.

II. Health Education - A Definition

Health education as defined by the World Health Organization is a process which effects change in the health practices of the people and in the knowledge and attitude related to such change. Health education requires an exchange of thoughts or ideas between people. This will require communication which is a vital factor for successful implementation of a health education programme. Media are the tools or means of communication employed in dissemination of health information.

Like any other workman, health educators require tools for their work. Mass media is one of the many tools that are used by health educators in order to communicate with the people. This paper will consider some of the important aspects of health education related to epidemic control and management of diarrhoeal diseases in Bangladesh. Firstly, it will be desirable to review some of the important characteristics of

*Associate Professor of Health Education - National Institute of Preventive and Social Medicine, Dhaka.

diarrhoeal disease in Bangladesh.

III. Bangladesh - An Overview of Health Problems

Bangladesh is a developing country. Like many other developing countries, it has a high morbidity and mortality due to communicable diseases. Epidemiological studies carried out in Bangladesh and many other countries have demonstrated the close association between communicable diarrhoeal diseases and the socio-environmental condition in which the people live. In the case of diarrhoeal diseases, it is the sanitary environment of water supply and excreta disposal that play a vital role in predisposing to or perpetuating diarrhoeal diseases. Health education can help in resolving many of these problems as a part of a primary health care program in Bangladesh.

IV. Objectives

Briefly stated, the objective of the educational activity will cover three major areas namely:

i) Educational aspects of oral rehydration salt solution

This will include both situations, namely hospital or clinic and the home. In view of the recent work done at ICDDR,B on the preparation of home-based rice ORS, the educational programme has to reach the homes of millions in Bangladesh specially in the rural areas where communication is difficult.

ii) Improved hygienic way of life

The educational programme in this area will focus on personal hygiene, use of safe water, food sanitation and use of toilet facilities.

iii) Provision of safe water supply and toilet facilities

Since the improvement of the physical environment is directly related to the occurrence and prevention of diarrhoeal disease, health education needs to focus attention on provision of these facilities in the homes or as near as possible.

The list is not complete as many other associated problems can become a part of the health education content. These could include nutritional care, immunization services, maternal care and family planning.

Even this brief outline provides an indication of the broad coverage of educational content for a programme aiming to control diarrhoeal diseases. The vastness of the problem (diarrhoeal disease) and the need for reaching the people as quickly as possible requires some innovative approaches to health education. In such conditions, how effective can the use of mass media be to provide back-up support to the health education programme?

We have limited experience in Bangladesh. Much of the work has been done by BRAC or the Ministry of Health and Population Control. There is some evidence available from other parts of the world where innovative approaches in the use of media for health education programs have been tried and pre-tested. I will be referring to some of the important projects undertaken in this connection.

V. Use of Mass Media - An Overview

Review of the world literature on mass media shows an increasing use of the media being made both in developed and developing countries. Broadly, this can be considered under three aspects.

i) Media for health education of the public

-BBC has developed a mixed media course under the title "Health Choice". It consists of a package of written material including the "Good Health Guide", a handbook to provide information on healthful living. The additional material consists of posters, relevant literature, cassettes and other material which are related to radio broadcasts.

-Two large scale intervention programs through use of television have been undertaken by Stanford University (U.S.A.). These are multi-packaged programs consisting of T.V. programs and spots, interviews, newspaper columns and other printed material. The mixed media program was reported to be highly successful.

Work on radio supported programs has been reported from two studies in Tanzania. A population of 1.5 million was covered through a campaign "Man in Health"; and the other "Food is Life". Both programs were evaluated and the results showed a remarkable change in health and eating habits of the people exposed to mass media.

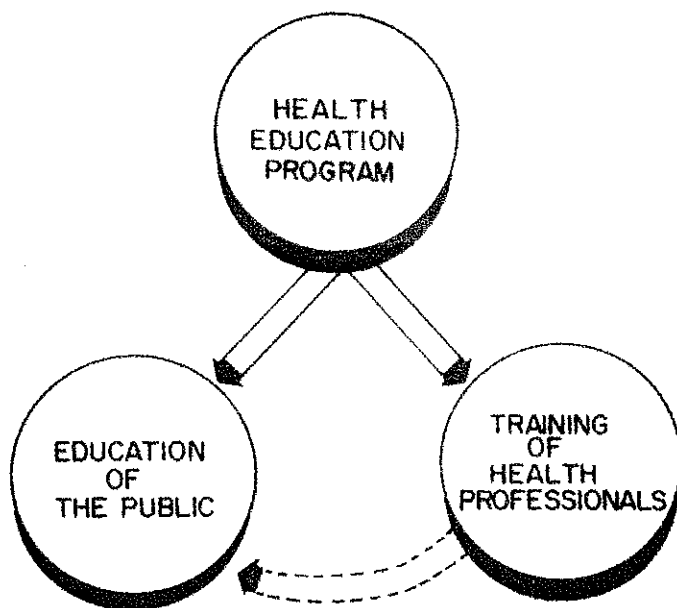
These are but only a few examples of the success stories where mass media has been used effectively as a part of the educational program. Multi media appears to be the preferred approach in most of these projects but one could also presume that there are projects where media has not been able to meet the expected input in a health education program.

ii) Media in the training of health professionals

Health education on a conceptual plane is a part of every health workers' activity. However, in practice, the health education component of the tasks of an average health worker is eclipsed by what is otherwise considered as the main responsibility of the individual workers. One of the possible reasons could be lack

of adequate training of the field staff in the skills related to health education.

**HEALTH EDUCATION PROGRAM
THROUGH USE OF MASS MEDIA**



Is it possible to provide a continuing education program through use of mass media?

The experience from other countries in the training of teachers,

industrial and agricultural workers shows that mass media has been used. In Bangladesh, the program for Distance Education has been conducted by Dr. K.M. Sirajul Islam who is one of the speakers in today's workshop.

It would be of interest to know what role mass media can play in the continuing education of health professionals.

One can therefore ask a few questions when considering intensive mass media support for health education programmes for diarrhoeal disease control and management:

1. What should be the approach in the use of mass media?
2. What are the limitations in the use of mass media for health education in a country like Bangladesh?
3. How to evaluate the success?
4. What sort of back-up support is needed for the use of mass media in the existing framework of health services.

REFERENCES

- Bedworth, David A. and Albert E. Bedworth. Health Education: A Process for Human Effectiveness.
- Galli, Nicolas. Foundations and Principles of Health Education.
- Hobson, W. (ed.). The Theories and Practices of Public Health. Oxford University.
- Meyer, Manfred (ed.). Health Education by Television and Radio: Conference Report. Munich: Internationales Zentralinstitut für das Jugend- und Bildungsfernsehen, 1981.
- "New Approaches to Health Education in Primary Health Care." WHO Technical Report 690. 1983.
- Rubinson, Laur Na and Wesley F. Alles. Health Education for the Future.

2.3 EPIDEMIOLOGY OF DIARRHOEAL DISEASE IN BANGLADESH

- Dr. F. Anjuman Ara*

Epidemiology is the study of the incidence and distribution of disease within a population by person, place and time, and more focused study of the determinants of disease or reasons for relatively high or low frequency in specific groups.

Diarrhoea is commonly called loose or watery stool. According to WHO, three or more loose or watery stools in a day can be considered as diarrhoea. Diarrhoeal diseases are a major cause of morbidity and mortality particularly among infants and children in Bangladesh. Approximately 29%*** of children below five years of age die of diarrhoea in Bangladesh.

Therefore, to prevent and control diarrhoeal diseases, epidemiology plays a big role. For prevention and control, some characteristics such as age, sex, seasonality, reservoir of agents and vehicle of transmission are to be kept in mind.

The purposes of the epidemiology of diarrhoeal disease are:

- 1) to define the problem of diarrhoeal outbreak or situation;
- 2) to identify cause or etiologic agents of diarrhoeal disease;
- 3) to guide or help the health administration in planning preventive strategies;
- 4) to use the knowledge in subsequent outbreaks and investigations of similar nature; and
- 5) to utilise the data for research or for forming a hypothesis.

Host-agent-environment are normally in equilibrium. Imbalance in any of the three factors contributes to the occurrence of diarrhoeal diseases.

*Training Physician - International Centre for Diarrhoeal Disease Research, Bangladesh, Dhaka

**Dr. Md. Aftabuddin Khan, Mr. Ananda Mohan Das and Dr. S.M. Khalilur Rahman, Report on Morbidity and Mortality Survey on Diarrhoeal Diseases, p. 10.



The course of disease depending on interaction amongst man (host), disease (agents) and the environment is also described as the natural history of the disease process. An understanding of the natural history of disease helps one identify the disease cycle as it affects man and take appropriate measure for prevention, control and management of diarrhoeal diseases.

- i) Host characteristics include age, sex, nutritional status, and other diseases which make someone vulnerable to diarrhoeal disease.
- ii) Disease agent: its toxicity and mechanism as it affects the course of disease in man.
- iii) Environment: social, physical and biological which undermine host conditions, and both pre-dispose and perpetuate the infection.

Apart from being endemic throughout the year, sometimes the disease becomes not only hyperendemic but epidemic also. In Bangladesh, twice a year, i.e., from March to May and again from September to November, hyperendemicity and epidemic outbreaks have been noted. Bangladesh is a fertile ground for diseases which are spread by faecal-oral route. Infectious agents enter the body via mouth but rotavirus may spread by droplet infection. Man is the reservoir of infection and his role as a carrier is essential for the spread of infection. *Shigella*, a causative agent for dysentery, is transmitted from person to person directly by hand in addition to food and water which are common in all diarrhoea cases. Flies being abundant in Bangladesh play a role in transmitting diarrhoeal disease specially *Shigella* and *V. cholerae*.

Being a deltaic country with the largest flux of fresh water in the world, waterborne diarrhoeal diseases thrive well in Bangladesh. Deltaic, water logged areas are endemic for diarrhoea specially cholera. Epidemic outbreaks are mostly reported from the flood affected areas. In the northern districts of Bangladesh where surface water is not so much in abundance, people suffer more from *Shigella*.

Children are at greatest risk, although almost all age groups are infected by pathogens (causative agents) which usually cause diarrhoea in Bangladesh. Bacterial, protozoal and viral infections are responsible for 90% of diarrhoeal cases. Common bacterial pathogens in Bangladesh are enterotoxigenic E. coli, Vibrio cholerae, other vibrios, Shigella, Salmonella and Campylobacter. The two most important protozoa are E. histolytica and G. lamblia. In children under 2 years of age, Rotavirus is responsible for 50% of diarrhoea cases.

Laboratory services are very limited in Bangladesh like other developing countries. Systematic random sample of rectal swabs can be sent from the field in Cary Blair media or blotting paper to the laboratory facility where it can be processed to identify the enteric pathogens.

A morbidity and mortality survey on diarrhoeal diseases in the rural areas of Bangladesh was done from 17th December 1982 to 16th December 1983* Some of the findings were as follows:

1. Diarrhoeal diseases continue to be a major health problem in the country particularly for children under 5. It is a major killer claiming more than 200,000 children annually.
2. The number of annual episodes of diarrhoea per child is 3.60, giving a total of more than 57 million episodes involving 16 million children. Thus, it is a cause of enormous anxiety and suffering.
3. The efficacy of ORS therapy by health workers and volunteers is well established; hence an ORS strategy can substantially reduce the case fatality rates.
4. The use of oral rehydration therapy is inadequate in the rural areas. An in-depth study is necessary to identify the cause of low utilization including psychological/cultural blockages.
5. Environmental sanitation and personal health behaviour are of critical importance to the prevention of diarrhoeal diseases. These are long-term measures subject to resource constraint and dependent on the overall socio-economic development. In view of this, the

strategy of ORS therapy deserves high priority and efforts should be undertaken to integrate gradually this into the overall disease prevention strategy.

2.4 A STUDY ON THE USE OF MASS MEDIA IN BANGLADESH

- Mr. Golam Rahman*

"In fact, in most less developed countries, radio seems to reach more villages than any of the other mass media". (Everett M. Rogers with Lynna Svenning, *Modernization among Peasants - The Impact of Communication*, p. 104).

An evaluative study of radio in rural Bangladesh in the late '70s revealed that 73.05 percent of the respondents listened to radio whether they owned the radio sets or not and 26.95 percent of the respondents neither had radio sets nor the listening habit. (*An Evaluative Study on Effectiveness of Radio as a Means of Communication in Rural Bangladesh*, Sufia Khanam (ed.), Radio Bangladesh, p.6).

An investigation in the rural areas of Bangladesh in 1981-82 observed the following findings on radio exposure. (Ph.D. thesis (unpublished) Mysore University, "A Study of Some Factors Affecting Mass Media Exposure in Rural Bangladesh").

Among the respondents in the traditional villages, about 84 mean percent listen to radio. Listening to radio is common in the behavioural pattern of the villages because almost two-thirds of the total sample listened to radio either on the day the interviewer approached them or the preceding day, indicating the regularity in listening. The trend in listening to radio, even with less regularity, has a great impact in purposive communication.

Listeners in the traditional villages generally like the radio programmes in arbitrary choices such as: News - 19.73 mpc; agricultural programmes - 16.33 mpc; folk songs - 15.53 mpc; drama - 12.80 mpc; family planning programmes - 9.68 mpc; film songs - 8.24 mpc; regional songs and other variety - 7.57 mpc; advertisements - 3.41 mpc; Nazrul songs - 3.34 mpc; modern songs - 2.54 mpc and programmes like discussions, talks etc., a small proportion.

*Lecturer - Department of Media and Journalism, Dhaka University.

In the traditional villages 23.89 mpc of respondents listen to radio for a duration from half an hour to one hour a day; 21.89 mpc listen less than half an hour a day; 18.59 mpc listen from one to two hours a day; 17.22 mpc listen to radio programmes for more than six hours a day; and other groups of listeners listen for various other durations.

Among the listeners in the traditional villages, about 66.90 mpc agreed that they benefit by listening to radio in specific terms; 23.92 mpc have acknowledged partial benefits; 4-20 mpc have not been able to specify in what way they are benefited. The benefit obtained by listening to radio can be considered high, because about two-thirds of the total beneficial listeners have identified their material gain by listening to radio.

The respondents are asked that if there is a provision for a free radio set in the villages do they think that the people in general will listen to and follow the instructional programmes on agriculture, health, family planning, etc. regularly. Among the respondents in the traditional villages, 92.71 mpc think that the people 'may listen and follow'; 3.73 mpc think they 'may listen but may not follow'; 1.48 mpc 'may listen only'; and 0.78 mpc think 'may not listen at all'.

Among the listeners, 55.44 mpc in the traditional villages are inspired by radio to work; but 44.56 mpc do not have any experience as such. Among the inspired 93.97 mpc people can specify their activities. They have planted trees; sown seeds of particular variety; followed a procedure for better quality fibre from the jute plant; cultivated a high yield variety of paddy; used pesticides on crops to prevent pest attack during a particular period; attempted to establish poultry farms with better and new varieties; (students) studied following the radio lesson; went for 'Namaj' listening 'Azan'; used fertilizer; and practised family planning.

In the traditional villages, 93.20 mpc feel that listening to radio is needed for social activities. A majority of the rural listeners say that radio listening is needed for guidance in their everyday work as well as social activity.

Respondents in the villages listen to religious programmes of Radio

Bangladesh. Either regularly or casually, 96.07 mpc listen to these programmes. The common people and more of elderly age group in particular prefer religious programmes.

Religious programmes which incorporate other instructional programmes such as agriculture, industrial, family planning, and social welfare will be appreciated by the audience, according to the opinion of 90.10 mpc respondents of the traditional villages.

Like most other countries in Asia, the Radio in Bangladesh reflects the official viewpoint and is used extensively as an instrument of government policy. The projection of the regime in power on the radio has resulted in an increasing credibility gap between the medium and the people. Not only does it seek to reflect the official viewpoint but it also devotes itself to be used widely and deftly as an agent of political mobilisation and instrument for partisan role many a time. Its partisan nature has obviously come in for serious criticism, and has vastly strengthened the demand for extending its facilities for projecting opposition and non-official viewpoints so that people could be in a position to choose that which seems sound, rational, reasonable, and logical. Radio should be a free market place of views and ideas. The credibility would also be there to a great extent.

2.5 EFFORTS AND EXPERIENCES ON MEDIA SUPPORT TO OTEP

- Mr. Anish Barua*

BRAC's Oral Therapy Extension Programme (OTEP), which began in July 1980, is a nationwide programme to educate one female member in each of the 13 million households in Bangladesh to correctly prepare and use the 'lobon-gur' (salt-local brown sugar) oral rehydration solution (ORS) for the management of diarrhoea, the lone major child killer.

This ORS is prepared by using one 3-finger pinch of lobon and a fistful of gur dissolved in 0.5 litre of safe drinking water. ORS is given to a person with the onset of the first watery motion. Lobon-gur solution (LGS) is a readily available household treatment for diarrhoeal disease - it is simple to use, safe, cheap and effective.

The OTEP method is taught in a simple health message, "Seven Points to Remember" which includes: causes and symptoms of diarrhoea, preparation of LGS, administration and dosage of LGS, dietetic and nutritional care of the patient, need for safe water use for all purposes, personal and environmental cleanliness etc. Teams of trained female Oral Rehydration Workers (ORWS) systematically cover the countryside educating one female in every household on the "Seven Points". Each ORW averages 10 house calls a day, 6 days a week. The workers are allotted only 30 minutes time as an average for each house call and a month later the woman's retention of the message was monitored to measure the effectiveness of ORS teaching. Once the objective of educating one woman in each family in a Union has been accomplished, the team either moves to a new Union or returns to headquarters for a refresher course. Each ORW team consists of 7-8 ORW's, 2 team coordinators (TC's) and one cook. A team usually covers a union in about a month, and then they move on to the next union in the project area.

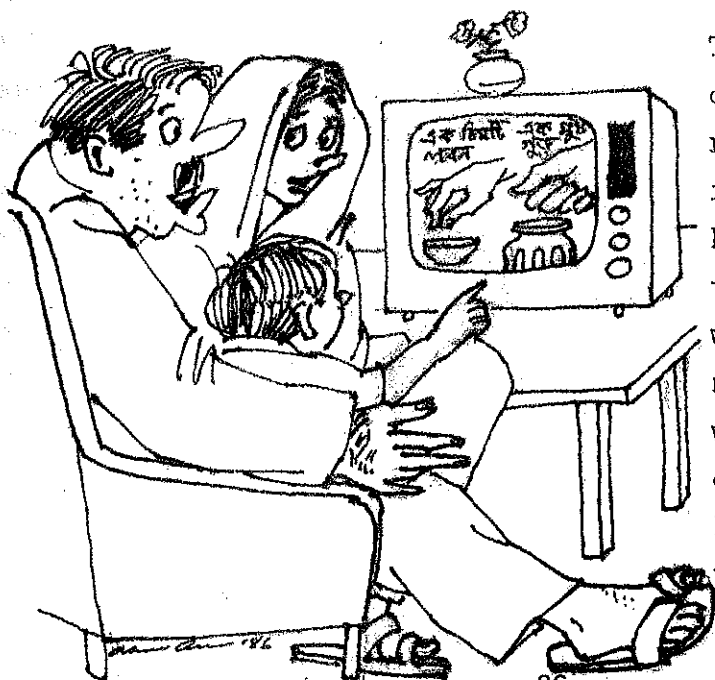
The TC's organize meetings with the male villagers seeking the community's cooperation and assistance in advance of the ORW's arrival. Discussion forums are also arranged in mosques, community centres, and clubs to develop people's familiarity with OTEP and LGS. Diarrhoea control cam-

*Development Communication Manager, Bangladesh Rural Advancement Committee.

paings are also organized in primary and secondary schools and the children are taught LGS preparation and its usage.

Phase I of OTEP was completed in September 1983 having covered 2.5 million households in 20,668 villages. Up to July 1985, under its 2nd phase, OTEP has covered 2.5 million households, bringing the total to 5 million households.

When the teams of blue-clad ORW's started touring the countryside in 1980, they encountered a lot of mistrust and suspicion. More often than not, they were mistaken for family planning workers. It was felt that creation of a favourable atmosphere was essential. Therefore, BRAC developed a poster on the preparation and administration of LGS, with emphasis on the visual so that the illiterate villagers could easily comprehend the message. These posters have so far been revised three times and displayed in schools, Union Council Offices, market places, restaurants and barber shops. A flip chart on the '7 Points to Remember' based on a story was used by the ORW's in their work to avoid the effect of mere lecturing and to involve the female member in a participatory dialogue. While departing, the ORW left behind a leaflet on the '7 Points to Remember' to refresh the participants memory. Of necessity, these leaflets were pictorial. Two separate folders, one of the programme and the other on diarrhoea and LGS were produced to create general awareness among the local elite. All the materials were pretested before final production.



These efforts helped to a certain extent, but it was realized that the challenge for a national programme had to be met on a national scale via the national media. Newspapers were deemphasized as they do not normally reach rural areas and were read by only a small percentage of literate population. But radio coverage was a likely prospect.

In the latter part of 1982, the first of the many BRAC messages on Diarrhoea were broadcast. The messages were presented in various forms, such as jingles, dialogues or neutral words, and contained 3 important points:

- 1) awareness about diarrhoea and the importance of LGS;
- 2) preparation and administration of LGS; and
- 3) diet and nutrition information.

This support cut the initial distrust of the villagers towards ORW's and their message. It also helped in creating awareness about diarrhoea and credibility for the use of LGS to prevent dehydration among the people. No longer were the OTEP personnel strangers; they were now elevated to the rank of 'doctors' among the simple villagers! However, it was found that the usage rate of LGS although registering an increase, had not made as much of an impact as was expected. This was because the retention of one health message among many other commercial ones, was weak. Therefore, BRAC decided to intervene through the popular audio-visual media - the television.

In 1983, the first of the many OTEP messages were broadcast. The initial spots were a failure as the film presentation and the message had to be within one minute's time. It was then decided to give just flat messages directly, leaving out the film presentation. Both the audio and video presentations were pretested before going on the air. In this form, the transmission and retention of OTEP messages was much better. It was found that although TV was an elite media, there was at least one television set in most of the villages in OTEP operation areas. Some of these were located in the Community Centres and the prime viewing of the villagers was between 7 to 9 p.m. The messages were aired during this period for their benefit. It was found that owing to the visual presentation and the frequency of the messages, credibility was high. This resulted in a concurrent retention and usage rate taking an upward swing. Dissemination of the messages on diarrhoea, and LGS usage was also wider as the people transmitted it through word of mouth.

Occurrences of diarrhoea are frequent and common. Those who live in urban areas see TV in the evenings either in their own homes or clubs, community

centres, hotels or even in their employers' homes. When they go to the villages for visits and find incidences of diarrhoea they know what to do and tell others. Thus, both credibility and usage is established through word of mouth dissemination via the TV. During emergencies, such as epidemics, flood, cyclones and drought special messages were prepared and broadcast.

To further buttress the work of the ORW's, large billboards have been put up at prominent places in the BRAC project areas as well as the OTEP regions. With minimum words and effective visual presentation these boards are displayed at market places, near railway stations, bus terminals, river ports, etc.

BRAC has developed suitable training modules with flip charts and posters for quacks, and dais, on awareness about diarrhoea, its causes, LGS preparation and administration, water use and sanitation. By enlisting their support, OTEP felt they would not be anti-ORW's. The student community was also conscripted to help in the dissemination of LGS. A poster of LGS with space for writing the class routine at the bottom was distributed among the students. They were also given small badges inscribed "Help prevent diarrhoea". A photo booklet on basic health education was also produced and distributed.

It is now felt that the two objectives for the mass media campaign, viz. 1) to create national awareness and 2) support the ORW's work, has been achieved to a considerable extent.

A recent study carried out by the BRAC Research and Evaluation Division found that there is 87% knowledge rate in the OTEP operational areas. UNICEF is also carrying out an evaluation of the mass media campaign of OTEP and it will be interesting to know what the results are.

The experiences of this media support to OTEP and LGS may be summed up as follows:

- a) LGS is not a medicine in the strict sense. The ingredients in LGS have to be collected, correctly measured, mixed and then administered. It is not a product that can be bought from the shops, dissolved in

water and taken. So, the designing of the messages needed special care to combine the elements of motivation and education.

- b) One of the ingredients of LGS-'Gur'-is considered to be a laxative. Hence, the people were reluctant to use it for a diarrhoeal patient. The concept that 'gur' was efficacious for diarrhoea had to be instilled in their minds.
- c) The concept of rehydration is only meaningful if one understands the concept of dehydration. Appropriate descriptions with practical examples helped in the clarification of this very important concept.
- d) Administration of LGS at the onset of the first watery motion needed emphasizing , as the people did not consider this situation as alarming. It was usually after the fifth or sixth time that one took notice of the patient and decided to do something about it.
- e) Practice of normal diet during diarrhoeal episodes posed another problem in developing the message content.
- f) Intervention of diverse messages, especially in the mass media, on the use of sugar, water measure and corresponding amounts of ingredients etc. created some confusion in the initial years. This has affected the credibility of both the methods.

As may be seen from the above, all these points are technical and behavioural in nature. To change any ingrained traditional habits and attitudes needs time. However, awareness about the dangers of dehydration is making headway and people are beginning to take rehydration solutions.

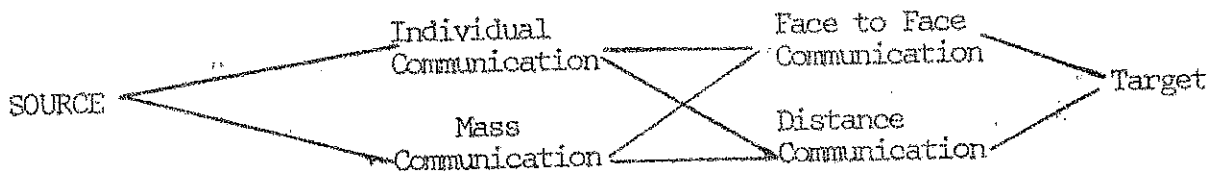
I. Introduction

Human beings by birth are social creatures. They cannot live alone. A newly born baby declares its arrival through a loud cry. At the time of death, friends and relations, publicise the demise of the soul through crying. From birth to death they are always involved in various types of communications; communication for expressing their joy and sorrow, wish and will, experience and expectation. Handing over the multi-dimensional experience from generation to generation is a must for their very existence. Most of the other animals survive through their traditional inborn instinct. A jungle fox collects its food in, more or less, the same way as its forefathers have done several thousands of years ago. A bull defends with its powerful horns, a tiger uses its claws and teeth exactly in the same way as it was done hundreds of years ago. Today scorpions sting in the same way as it was done by their ancestors thousands of years ago. But what about human beings? Are they having the same food and the same lifestyle as their predecessors? Definitely not. Man, the superior creature on earth, with the ever changing environment must learn new techniques to maintain his superiority. Old experience must be preserved for future guidance. This can only be done through communication. The communication is done through the 5 sense organs, eyes, ears, nose, skin and tongue or in other words through sight, sound, smell, touch, and taste. The conveyance of the communication may be electronic media such as radio, tv, film, computer, telegram, or telephone facsimiles; may be print media such as books, journals, newspapers, or other audio-visual aids such as puppets, dramas, models, diorama, posters or vocal message. Whatever may be the media, the ultimate aim is communication of knowledge and experience. This communication of knowledge and experience may be termed education. From cradle to grave, we learn. Education is a lifelong process. Some of us might have a misconception about education. They might think that education is a process which is to be secured during student life only. That may be true in the field of full time formal education, but life oriented education is a lifelong continuous process. There is no end to this. One must learn the way of achieving better health and hygiene

throughout one's life.

II. Mode of communication

Educational Communication from source to target may be presented in the following flow chart:



The communication may be done either individually or in a group. The target audience in a group, or individually, may be either in direct touch with the communicator or may be at a distance. The best way of communication is the face to face communication from communicator to the individual person. In such situations a more human relationship may be developed. The targets may get the satisfaction of most of their individual queries. The other way of face to face communication is with a bigger audience. In such a situation, public address system or closed circuit tv may be used to communicate the message more effectively. In such a situation although some human relationship may be developed, it usually becomes too difficult to satisfy individual needs. By arranging written questions from the audience, the need may be satisfied to a great extent.

The other type of communication is the creation of modern science. In this communication the audience, either individually or in a mass, remains at a distance. In such a situation various print or electronic media such as newspapers, letters, posters, audio/video cassettes, films, slides, slide/tapes, telephones, computer and fascimiles may be used. The major disadvantage of the distance education system is that in most situations the communication is one way, i.e., the communicator sends the message but there is very limited scope for satisfying individual queries. This lack of feedback may be partially satisfied by arranging letter correspondence or two-way talk as is possible in telephone or fibre optics type of radio/tv communication.

III. Mass communication strategy in Bangladesh

Bangladesh with extreme poverty and a low literacy rate, is blessed with a monolingual population of the same cultural background. The land is compact and flat with wide coverage by Government controlled national tv and radio networks. Except international communication, there is no need of satellite broadcasting. The syllabus and textbooks up to secondary level of education are the same for the entire country. This has created an ideal situation for large scale operation through mass media.

There are reasonable numbers of national dailies and weeklies, but owing to the poor literacy rate (only about 23%), the scope of printed mass media for mass education is very limited. The vast majority of illiterate clientele with the dire need for mass scale education for public health and hygiene, family planning and population control, drinking water and sanitation, environmental pollution and ecological balance may not directly benefit through printed mass media, but the literate planners and administrators can definitely be motivated and guided to assist in the management and execution of literacy programs for the masses.

We know that literacy is the precondition for better living. Due to resource constraints, and other unavoidable circumstances we are unable to make our entire adult active population, numbering more than 50 million, literate within a short span of time. But we can definitely educate them on the basic needs of life. We may use radio, tv, films or electronic mass media which may overcome the literacy barrier to convey important messages on public health and hygiene population control and family planning, better crop yield and poultry raising. A person may be illiterate but he can definitely be educated. Our prophet was illiterate but none can say that he was uneducated. Literacy is a technique whereas education is the assimilation of messages. To some extent basic life oriented education can be imparted effectively through electronic mass media. For this purpose community listening sets can play an important role. Listeners group formation can boost the information through the mass media for effective assimilation of the message. Besides, Bangladesh is a country with rich heritage of folk media. Through the ages, villagers have been exposed to various types of folk media such as Jatra, Jari, Shari, Kabi, and Gomvira. Through these traditional folk media,

important messages can be communicated for life oriented and life long education.

The operation of an experimental nutritional blindness prevention campaign presented below can give some idea of the role of mass media for life long education.

IV. Media vs. Xerophthalmia prevention: A case study

To study the comparative effectiveness of various communication techniques towards the prevention of nutritional blindness, Worldview International Foundation (WIF) in collaboration with Strommer Memorial Foundation and Ministry of Education started an experimental Project in Bangladesh, named Nutritional Blindness Prevention Programme (NBPP).

On the basis of the findings of the survey conducted by Helen Keller Foundation, Pirganj Upazila under Rangpur District was chosen for NBPP. The activity was started in January 1985 with an aim not to distribute vitamin "A" capsule for curing Xerophthalmia but to educate the people of the locality to grow and eat vitamin "A" rich food. The 15 Union councils of the upazila are divided into 5 blocks with 3 union councils in each block. In each block different types of approaches are used for communicating 7 fixed messages.

a) Folk singers approach

In one block, appointed local folk singers are moving from place to place singing folksongs and reading "Puthis" specially composed by the local poets for the purpose.

b) School approach

In the second block, local school teachers and students are motivated to communicate the messages through face to face contact. Schools are provided with facilities for vegetable gardening too.

c) Health workers approach

The Government appointed family planning and health workers of the third block are trained and provided with flip chart and other media materials for communicating the messages.

d) N.G.O. approach

In the fourth block, the local voluntary workers of different N.G.O's, especially those of Palli Shishu Foundation are trained and provided with the media support materials for communicating messages.

e) Comprehensive approach

In the fifth block all the above mentioned approaches are used for communicating the messages.

Besides the above mentioned approaches, local newspapers, radio broadcasts, and cinema houses are also being used for communicating the fixed messages. Slides are shown through B.T.V. and local cinema houses.

The mid-term evaluation indicates that the folk media approach is more effective in the locality. On sample enquiry we have found that most of the people of the folk media approach block can say that vegetable is a source for prevention of nutritional blindness. This also clearly indicates that preventive education can be quite effectively imparted through media to the common people including the illiterates.

V. Conclusion

With the advent of modern civilisation and technological advancement life is becoming more complex day by day. On the one hand the field of education is ever expanding, on the other hand the number of clients are also increasing enormously. Education is now the birthright of everybody. In such circumstances the traditional system of education can no longer cope with the situation, especially while the number is enormous and the need is for the lifespan of the person. Under such a situation mass media based distance education system can play a vital role. In Bangladesh, the distance education system may be applied in two ways for imparting the knowledge of preventive health measures for the entire population of the country. The first way is to arrange multimedia distance education for employed field level health workers. The second way is to arrange mass media programs for the field level clientele so that the face to face communication by the field workers can be reinforced. Moreover, messages through radio can easily reach the underprivileged backward

areas where face to face communication may be difficult as well as costly. Through community listening facilities, tv can also be used effectively.

In conclusion, it can be said that in a monolingual and unicultural country like Bangladesh, having compact flat land and high density of population, the use of mass media for life long education has great potential. Proper planning and correct execution can definitely achieve better results.

2.7 ESSENTIALS OF COMMUNICATION FOR A DIARRHOEAL DISEASE CONTROL PROGRAM

Dr. D. Anand*

I. Introduction - The problem

Diarrhoeal diseases have drawn worldwide attention in the last two decades. There are several reasons for this. First, much more is known about death and illness caused by these diseases. On a conservative estimate diarrhoea accounts for 5 to 6 million deaths affecting mostly children aged below 2. This is besides the heavy morbidity and debility resulting from diarrhoea. Children under five are the highest risk group in any country. Finally, diarrhoeal deaths and disability takes the highest toll amongst children of the Third World nations. The high mortality figures should stir up activities for prevention and cure in any country. But the fact that many of these developing countries are also faced with alarmingly high rates of population growth makes it doubly more important to protect the life of the child against the preventable causes of death.

Most of the childhood diseases such as polio, measles, diphtheria and tetanus can be prevented by specific, protective immunization. Further research on new and more effective vaccines is currently underway in many countries. The ICDDR,B's studies in the past have shown the ineffectiveness of injectable cholera vaccines. New, oral, cholera vaccine trials are currently being undertaken at Matlab - a field research station of the ICDDR,B. This however is not true as yet for the entire range of diarrhoeal diseases. A variety of viral, bacterial and protozoal agents can cause the several forms of diarrhoeal illnesses. Researchers in ICDDR,B have already identified about 80 causative agents. But this is not the end. The search continues to identify other agents that may cause diarrhoea. The leading and most well-known member has been the cholera vibrio. Others in the group, such as Escherichia coli or rotavirus are not less important.

*Consultant, Training Materials Developer, International Centre for Diarrhoeal Disease Research, Bangladesh, Dhaka.

II. Diarrhoeal diseases - important characteristics

There are certain important characteristics of acute watery diarrhoeal diseases, as a group, that influence their control or management:

- i) A large quantity of pathogenic organisms may mean higher risk of exposure to infection.
- ii) Most of these organisms multiply in unsanitary and unhygienic environments leading to contamination of food and/or water supply.
- iii) In human beings, the infection occurs when a faecal/oral chain has been established. In other words the occurrence of infection is very much connected with our style of life that maintains a direct oral/faecal route.
- iv) In case of acute attack of diarrhoea, the threat to life accrues from the loss of body fluids and the resultant dehydration.
- v) The discovery of oral rehydration therapy (ORT) that uses a combination of salts and sugar solution, has resulted in control of dehydration, the main cause of death in acute watery diarrhoea.
- vi) Most potent drugs like sulfonamides and some antibiotics, have little effect on the progress of the disease. In fact in many cases the drugs can cause more harm than good.
- vii) In the absence of any specific immunoprotection, the life saver is an early administration of an oral rehydration salt solution (ORS).
- viii) Mothers and other household members can be easily trained to prepare and administer ORS solution.
- ix) With the successful trial and use of home-based rice ORS, it is imperative that the messages on the methods of preparation of the rice ORS and its effectiveness must reach the households and communities.
- x) Lastly, in case of an outbreak of an epidemic of diarrhoeal diseases, people can be informed of their role in its control and management.

III. A revolutionary approach

The above sequence of statements, in brief, highlights two important features in the management of diarrhoeal diseases: one, the therapeutic revolution whereby an inexpensive, "grandma" recipe, has been identified as a simple and effective means to prevent dehydration and death due to diarrhoea; two, the psychological barriers, involving both the professionals (physician, nurses) and the public in their not fully appreciating the "oral rehydration salt solution" as a simple and effective management technique. They can cause changes in the actions of both those who prescribe (without conviction) and those who accept (with reservation).



IV. Communication - a two-pronged approach

The picture, as stated above, therefore calls for a two-pronged approach for management of the problem.

- (a) Family member, mothers with their sick children and other members of the community should be able to understand and confidently use this simple measure (ORS) for the management of acute diarrhoea. This message can be communicated direct to the homes of the people in high risk areas.
- (b) Health workers delivering the services for control and management of diarrhoeal diseases should:
 - develop faith and confidence in the use of ORS solution; and
 - recommend the use of ORS solution in ways different from the conventional approach to prescribing drugs.

In both situations, the element of communication is involved. The rest of this paper will focus on certain features of rapid and wide dissemination of information.

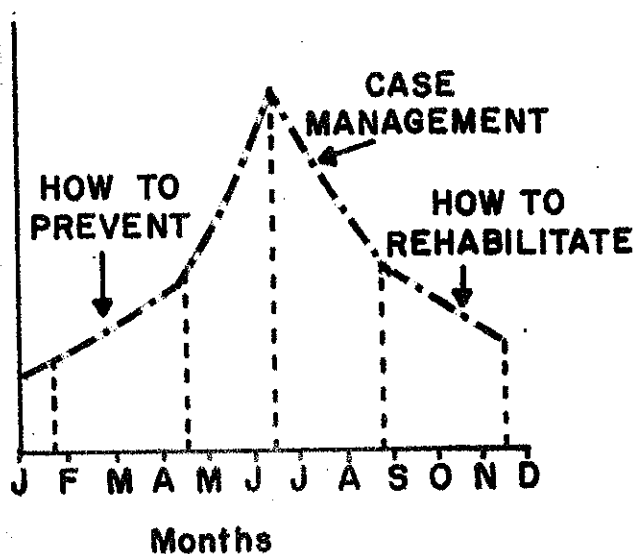
V. Newer directions for dissemination of information

In the background of the characteristics of diarrhoeal diseases stated earlier, one can identify some important characteristics for providing information on the subject.

i) Wide and rapid dissemination of information related to the management of acute diarrhoea cases should be made throughout Bangladesh. Even the poor and illiterate should be able to understand the message and act upon it and be able to prepare oral rehydration solutions. This message must reach the homes of all families, specially in areas where cases occur more frequently.

ii) Seasonal variation of disease

During certain months (May-September) there occurs a sudden increase in cases of diarrhoea. This seasonal variation is also noticed in many other countries. In spite of heavy hospital attendance, not all cases of diarrhoea will be seen in the clinic.



During this period, information should reach both (a) those attending clinics and hospitals and (b) those who stay at home and try other home-based treatment.

In both cases the information must be conveyed simply, effectively and should be repetitive so as to reach a larger audience.

During the outbreak of an epidemic, a two-pronged approach is needed to inform (a) what the health workers should do and (b) how people can protect themselves against the outbreak.

iii) Need for conceptual and attitudinal change

Reference was made earlier about barriers to acceptance of ORS solution both by consumers and the service-provider. This attitude must change as fast as possible. Can mass media help in bringing about the change?

iv) Preparation of health workers

There is a very wide spectrum of services that need to be provided for control of diarrhoeal diseases. WHO has identified four major areas of intervention in a diarrhoeal diseases control programme. These include:

- Case management
- Epidemic control
- Maternal and child health care practices
- Environmental health practices

The services in these four areas can be effectively provided by the already available manpower engaged in primary health care. Such health care personnel require training in the implementation of the four strategies. The training, in order to be effective, has to be continuous and appropriate, and tuned to their level of competence.

What cost effective training procedures exist or can be developed for providing a program of continuing education in the control and management of diarrhoeal diseases? What is the worldwide experience in the use of mass media for continuing education programs for health professionals in developing countries?

In order to find answers to the problems as stated above, one has to search for newer strategies and directions for:

- (a) health education of the public; and
- (b) continuing education of health personnel.

One of the major issues which the workshop will address relates to finding answers to these questions. There is a need to identify the contributions that mass media can play in meeting the pressing requirements of national diarrhoeal disease control programme .

2.8 MASS MEDIA FOR HEALTH EDUCATION AND EPIDEMIC CONTROL

- Mr. Jamil Chowdhury*

I Synopsis

In developing countries malnutrition and waterborne diseases are major killers. In our country millions die every year due to epidemics and diarrhoeal diseases which could be avoided by adopting timely preventive measures. A health education campaign can play a vital role for such preventive measures. Very often we see television commercials or radio spot announcements on ORT, family planning and other health related matters. Such spots and commercial announcements seldom achieve the objectives. If we analyse the problem we shall find that we often tend to forget the environmental conditions, that is, literacy rate, poverty, availability of communication channels, etc. In order to achieve the objectives, it is necessary to plan a campaign and develop a strategy.

II A SUGGESTED STRATEGY FOR HEALTH EDUCATION CAMPAIGN

Step 1: Problem identification and study of the audience

The first step will be to identify the communication support needed in a health education programme, the obstacles and their causes. It will be necessary to collect information on level of awareness, knowledge and skills of health practices, attitude towards family welfare and health related matters, income needs, collective efforts, religious and cultural values.

Step 2: Goal setting

To measure the success of any effort it is necessary to set targets or goals which can form the basis of evaluation. The goals set should fulfil criteria of identifying the group of population to whom the communication will be addressed, identifying the type and amount of change expected among them and specifying the type of measurement and the time frame for achieving the objectives.

*Director General, National Institute of Mass Communication.

Step 3: Choice of communication approach

There are four different communication approaches, namely, information transmission, instruction, persuasion and dialogue. The approaches often overlap each other in many ways and each of the approaches has certain elements common with others. The choice communication approach will, however, depend upon the results of the problem identification and analysis of the target audience. If the audience analysis indicates the necessity of a change in the level of awareness or if it is necessary to inform the audience about the availability of certain services, an approach of information transmission is considered most effective. Information transmission is characterised by heavy flow of messages, and slogans. When changes in the level of knowledge and skills, particularly thinking skills, are desired an instructional approach is more appropriate. Instructional approach has the characteristics of clearly stated objectives. If the problem identification and study reveals a negative motivation among the target group about the use of family welfare and MCH services, changes in the values and attitudes will be required. A persuasive approach of communication is more effective in bringing about such changes. When changes in the level of awareness, knowledge, attitude and values are desired an approach of dialogue with the audience will be necessary. The choice of communication approach will therefore depend largely on the outcome of preceding steps.

Step 4: Development of communication messages

Message development is a complex and creative task which requires the services of specialists. While designing and developing IEC (information, education and communication) materials special efforts should be made to give exposure to the individual or group success stories of the rural community. It is also necessary to pretest the materials to see what effects they have on a particular audience.

Step 5: Selection of media

Before a choice of the channels of communication is made it will be necessary to consider, from the results of problem identification and audience analysis, which are the channels that reach the target group. It will be also necessary to determine cost effectiveness and

the availability of the channels and evaluate them in terms of the communication approach chosen. The steps 3 to 5 can be broadly categorised as strategy development. This is a continuous process and it is at this point in time when it will be necessary to frequently look back to the preceding steps and make necessary adjustments in order to come up with an integrated approach for

achieving the objectives of the programme in a cost effective manner. In the Bangladesh context, it is necessary to remember that radio and television may not be available to the primary target group, and film media may only be partly available. Production of the message in film is time consuming and has its own limitations. The press media cannot be used due to low literacy rate. Interpersonal communication can be used but there is a great dearth of trained communicators and their distribution is also not widespread. One would therefore, have to primarily depend on secondary target group; that is, opinion-leaders, teachers, upazila officials, paramedics and health visitors. The message developed as described at step 4 has to be modified accordingly.



Step 6: Final production of information, education & communication materials
 After strategy development, including pretesting of messages, comes the final production of IEC materials. In order to make the messages more acceptable, IEC materials should be produced by using talents from among the target audience along with established professional talents.

Step 7: Dissemination of information, education & communication materials
 In accordance with the strategy developed, steps have to be taken for the dissemination of the IEC materials in cooperation with the

Ministries of Health and Information and the NGO's. Some of the IEC materials developed by NGO's and other agencies can also be used.

Step 8: Evaluation and feedback

The programme can be evaluated by measuring the effects in terms of goals achieved and collecting information on how different strategies function. Evaluation is an important management information tool which feeds back into management planning by providing helpful information. Feedback will also come from the reaction of the farmers, local leaders, extension workers, officials of the Health Ministry and others connected with the programme. The feedback information can be used for reviewing, revising, rescheduling and restructuring the activities. The programme evaluation in terms of goal achievement will, however, require some surveys to be undertaken for measuring the amount of change achieved.

A summary of the workplan with activity components, their estimated duration, required inputs, expected outputs and responsibilities needs to be compiled. A critical path analysis of the action demonstration plan and tentative work schedule can also be drawn.

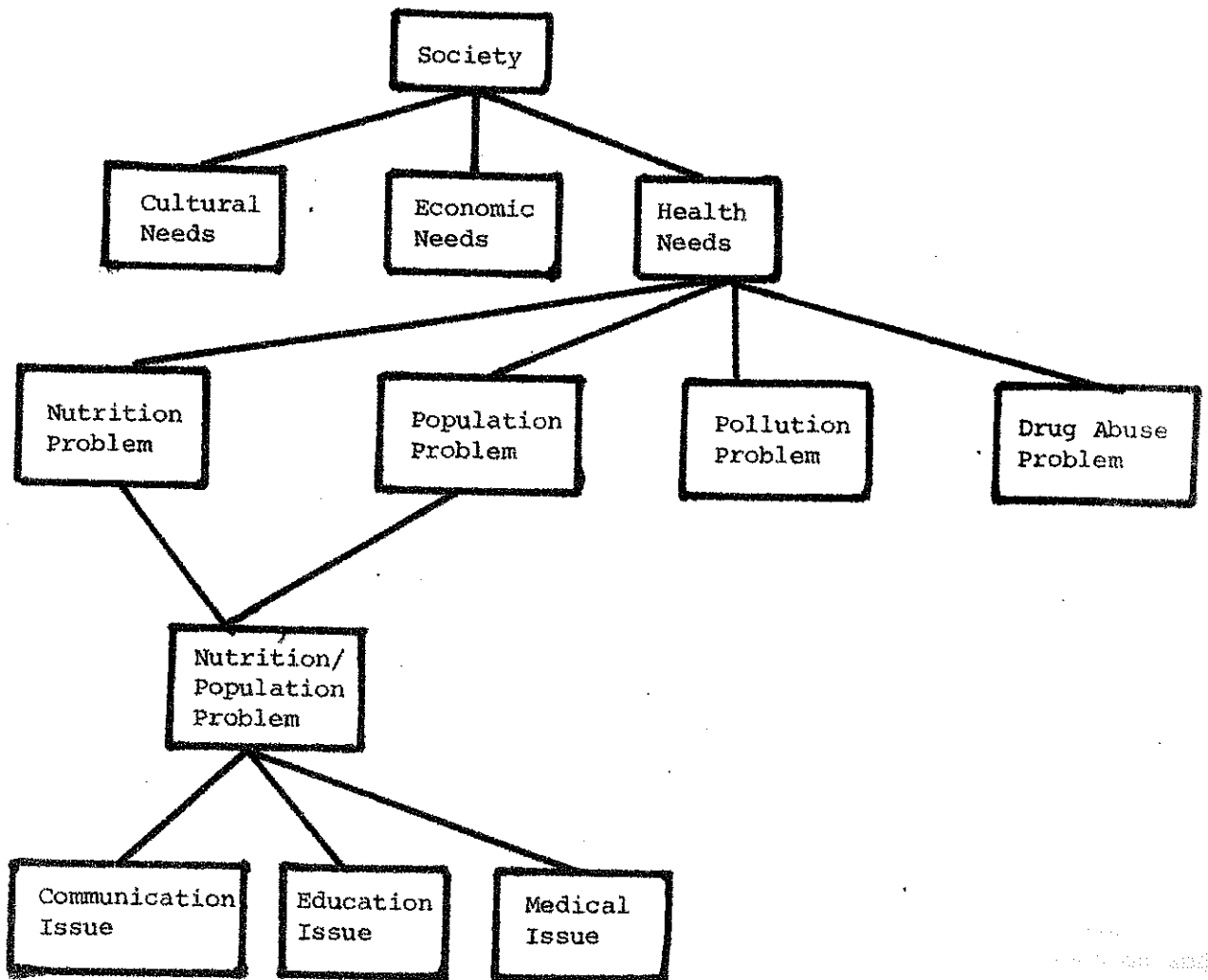
2.9 COGNITION OF PROBLEMS AND NEEDS: MACRO AND MICRO

- Professor Q.A.I.M. Nuruddin*

- Mr. Md. Tawhidul Anwar**

I. The lives of our rural people are **BARREN**
BURDENED and
BRIEF

A number of urgent societal needs that follows:



* Chairman, Department of Mass Communication and Journalism, University of Dhaka

** Assistant Professor

Communication Issue

Communication Networks

- no coordinating structure among agencies
- understand each others' goals
- coordinate activities

Communication Messages

- no nutrition messages flowing in the community health family planning
- no effective printed materials
- no effective broadcast materials

Communication Beliefs

Communication Message Problems

- no nutrition messages flowing in the community health family planning

Electronic Mode Issues

Printed Mode Issues

Message Design Issues

- circulation is limited by low literacy.
- problems in simplification of messages understandable to many

Radio

Advantages

1. It is quick in sending messages
2. It is less costly.
3. Dramas entertain, so are popular
4. News informs, rather than propagates programs

Disadvantages

1. It is an extension to Information ministry.
2. Its abuse by the authority produces narcotic dysfunction even on good programs
3. Programs are mostly stereotyped
4. Languages not understandable

TV

Advantages

1. Some programs better planned
2. Projects critical approach to some societal problems
3. Being two dimensional, involvement is more
4. Ads are more or less persuasive

Disadvantages

1. Cultural intrusion by projection of low cost software imported program
2. Too costly to own
3. Elitism in program production and preservation.

Communication issues that can be derived from identified problems of health, nutrition and family planning:

- .. Taking health, nutrition and family planning messages and services to the villages and providing family planning services as part of overall health care;
- .. transmitting central government intention to involve local governmental units in planning for, implementing, and funding family planning activities through existing or new information networks;
- .. selecting and training outreach workers in new skills;
- .. designing, testing, producing and distributing materials to support radio programs that increase public understanding of family planning, health and nutrition problems;
- .. gathering baseline data on village characteristics to identify factors that might be related to population issues.

II. Immediate Queries:

- What percentage of married women of reproductive age still have to be reached by radio programme?
- What percentage of women are aware of the existence of health and family planning unit or clinic to serve them?
- What is the extent of any shift from the more effective to the less effective methods of contraception?
- What is the extent of disparity between knowledge and practice of family planning among both urban and rural women? Any strategy to close the KAP gap?
- Do mothers' clubs exist anywhere? What are the problems in organising mothers' clubs in the country?
- How low is the credibility of professional change agents?

Communication Strategies for Outreach Activities

- Could be:
1. The promotion of Community Development, as the core of the Information, Education & Communication (IEC) process.
 2. The use of radio, as the anchor medium in IEC, and
 3. The use of field workers, as the crucial link between the radio and community involvement strategies.

Most commonly used formats for radio programs

1. Radio dramas and variety programs.
2. Forums, talk shows, school on-the-air.
3. Short spots, bulletins, jingles, mini-dramas to capsulize high priority-messages.

Some additional comments:

1. Introduction of special audience participation programs.
2. Identification of health, nutrition and family planning related persons in localities. The opinion leaders could be:
 - physicians
 - health workers
 - sanitary officers
 - pharmacy keepers
 - quacks
 - homeopaths
 - practitioners in herbal medicine
 - science teachers in schools
 - even representatives of local bodies.
3. Outside broadcast programs must have special chunks to accommodate health and family planning problems drawn from areas by continuously roving teams providing material to make the program ever-colourful, not the stereotyped ones put up over decades.
 - a) Interviews with people will be to ask about health problems and queries.

- b) Interviews with local physicians will be to ask what sort of remedies and preventive and curative measures \pm they propose locally.
- c) Interviews with pharmacy keepers will be to persuade them to discourage self-medication or excessive use of drugs.
- d) Interviews with health workers and science teachers will be to influence them to disseminate health, nutrition, and family planning knowledge.
- e) Interviews with representatives of local bodies will be to remind them of their responsibility to organise public health programs.
- f) Interviews with religious leaders will be to ask what they think about tackling population problems.

Every program must be area-specific with prior repeated announcements of the time and date of broadcast, so that the attention of that locality is really drawn to the programs where they will hear their own voice in a national radio hookup. This sense of their involvement and recognition shall make them very serious about the messages that they would give to the nation. Of course, at the end of every program, very important personalities with expertise/or position will address and suggest how best to organise their thinking to participate and why.

- 4. In areas where sending roving teams could be costly, arrangements through government medical officers, health officers or among other sources may be made to collect queries on health problems on cassettes to be sent to radio outside broadcast unit or listeners' program section for incorporation into programs and for suggestion of remedies thereof. This will be in addition to answering listeners' letters on health, nutrition and family planning.
- 5. TV health, nutrition and family planning program dramas on health and family planning themes and documentary films must find advance announcements also on radio. The radio, however, should take care that a very popular radio program which may

even attract viewers to radio listening, should not conflict at that time. Such cooperation on priority-message program between the radio and the TV may prove to be very effective.

In a word, mass media must be demystified and the media impersonification must not be allowed to alienate the mass from the media through the use of incomprehensible code, irrelevant content and lopsided treatment. Appropriate media-mix may be a strategy.

Family planning communication is

- relatively taboo
- predominately interpersonal
- mainly between highly homophilous source-receiver dyads.

1. Somous (1969) : 30% Indian women reported mass media channels contributed to their awareness of IUD.
2. Liu & Duff (1971) : Mass media played no important role in the diffusion of family planning information.
3. Lam (1968) : 92% were motivated by interpersonal channels.
4. Palmore (1968) : 16% of the Taiwanese women named mass media channels as creating their awareness-knowledge of contraceptives.
5. Balakrisnan and Mathai (1966,1967) : The percentage of female respondents naming channels like friends and relatives increased from 35% prior to an intensive mass media campaign for several months in Hoogley district, to 53% afterwards. Thus the mass media seem to set off more interpersonal communication flows and to energize the second step in the two step flow.
6. Gillespie & Longmari (1972) : In Iran friends and neighbours were the most important channels by which respondents heard of a family planning slogan, promoted in an intensive mass media campaign.

Mass media channels are relatively more important at the knowledge function, and interpersonal channels are relatively more important at the persuasion function in the innovation-decision process. (Rogers)

*Communication Channels and Family Planning: Actualities and Potentials. P.260. Common Strategies for Family Planning. E.M. Rogers.

2.10 DISCUSSION

Four of the preceding papers were presented for discussion during the workshop. "Essentials of Communication for a Diarrhoeal Disease Control Program," and "Concept and Practice of Health Education through Use of Mass Media," were considered during the first session. "Communication Strategies for Continuing Education" and "Mass Media for Health Education and Epidemic Control" were discussed in the second and third sessions, respectively.

In opening, Dr. K.M.S. Aziz of ICDDR,B, said that the theme of today's work is the Child Survival Revolution. While economic development was instrumental in improving the quality of life in the industrial world, Bangladesh and many other Third World Countries, cannot afford to wait for economic development to wipe out childhood diseases, especially during these times of recession. The health programme must go forward. The skills, attitudes and practice on primary health care must be transferred to the health workers and the public.

HEALTH EDUCATION

The Director General of Health Services in Bangladesh, Brig. M. Hedayet-ullah, said that of the eight basic elements of primary health care, health education is number one. The WHO and UNICEF concept of "Health for All" puts the responsibility for health on every individual, family and community, and not only on the doctors. If primary health care is to succeed, people must participate, innovative techniques must be used and health messages must be simplified. The health care system must seek the help of other systems.

This one day workshop was planned at a time when research and knowledge of diarrhoeal diseases has gained momentum and has created an information explosion. The progress began with the Dhaka Solution, intravenous fluids that saved thousands of lives from cholera. Subsequently, according to the British medical journal, Lancet, the potential single most important breakthrough in the field of medicine has been the discovery of the oral rehydration salt solution, ORS. Continued research in cereal-based ORS will take the primary intervention therapy into every home.

ORS Information has been disseminated to professionals around the world. In the last five years over 500 health personnel from 64 countries have been trained at ICDDR,B. The initial scepticism towards ORS therapy has begun to disappear.

The next task is more difficult. How can the people be reached? How can this information be brought to every home? In the last few years there has been a sharp increase in the numbers of health workers in the field. In Bangladesh alone, there are 30-36,000 field workers. These people are the backbone of the primary health care program. They receive only a short training but are supposed to provide many services to the public. They are now being asked to learn this revolutionary therapy, ORS, and teach it to the public.

What are the ways to keep these field workers well informed? Is it possible for them to continuously retain and transfer information taught in training courses; or to keep abreast of new methods and health priorities? For organized training a prohibitive amount of time and resources would be necessary, particularly for countries like Bangladesh. The health care system has limited manpower and logistical support. The mass media may be able to overcome some of these and other constraints, as well as reach a maximum number of people in a short time. The media and primary health care must be linked. The importance of this workshop is in bringing health and media personnel of Bangladesh together.

In primary health care much emphasis is expected to be given to health education. Behavioral change is a basic tenet of health education. Health educators seek to change the knowledge, attitude and practice of individuals and the community. Health educators are the bridge between health services and the public and also between health services and the media. The thought was also expressed that health educators serve as a link between the government and non-governmental agencies and the community.

CONTINUING EDUCATION

The media can be used for a two way approach: 1) training of the health professional and 2) health education of the public. Dr. K.M. Sirajul Islam

in his presentation on Communication Strategies for Continuing Education, explained the experimental programme of B.Ed through Distance Education for the inservice of untrained secondary school teachers. Written materials, and audio and video cassettes are supplied to the students. Dr. Islam explained that students are provided access to audio and video equipment supplied by the Bangladesh Institute of Distance Education to secondary schools and to teacher training colleges. To supplement the printed course materials two programmes a week are broadcast through Radio Bangladesh. A tutorial service, feedback channels and an examination system are included in the course. It was his feeling that a similar programme could be developed for health personnel in the field.

Dr. Islam pointed out that Bangladesh is in an advantageous position in that there is a relatively homogeneous culture and language and that the syllabus and textbooks for primary education are uniform for the whole country. The media and distance education could be used to reach the grass roots clientele as well as the health worker.

There have been some reportedly successful mass media health care program. In Tanzania, an evaluation of two radio-supported campaigns, "Man is Health" (1973) and "Food is Life" (1975), showed remarkable changes in the health and eating habits of the rural population. These two campaigns presented basic information about the causes and prevention of tropical diseases common in the country, and basic knowledge of food hygiene and ways to improve dietary habits. An estimated 4 million people were reached by the campaign.

In the Report of the "Health Education by Television and Radio Conference" (Munich, November, 1980) a 30-year health education program in Columbia is detailed. The non-governmental organization Accion Cultural Popular (ACPO) has used radio and written material to reach remote villages in the low-lying lands and in the Columbian Andes. A basic education program is broadcast daily. In addition to teaching reading, writing, basic agriculture and animal husbandry, fundamental knowledge on nutrition, hygiene and disease prevention is given. A long-term field study of the ACPO programme in 1979 found that:

- "after the written material (newspapers, textbooks) to go with the programmes, the radio broadcasts were most important in supplying the target groups with information;
- their effectiveness, however, depended on using the printed material and on the interpersonal communication processes within the families and the communities inaugurated and organized by ACPO, these processes being assimilated and reinforced by the media messages;
- health topics were appreciated most of all the subjects taught;
- an obvious change in nutrition habits during the period studied can only be attributed to the activities of ACPO".

Along with the mass media, primary school teachers, imams, and other community leaders should be used as communications resources. These people are involved in interpersonal communication already. Information must be transferred to them so they can transfer it to the public.

Dr. C.K. Basu, Adviser to the Universal Primary Education Project, suggested that health education be combined with the basic education system. He said that in Bangladesh there is a primary school within a 2-mile radius of every village. The teachers and children can be important agents of change. They are in a position to receive health messages and pass them on to the homes. At this level long-term attitudinal change will take place, as well as a change in practice. There are 1 lakh 58 thousand primary school teachers and 8.2 million children. It is important to consider how to make the most use of this resource.

EPIDEMIC CONTROL

For epidemic control of diarrhoeal diseases the need is to communicate to both the health worker and the public. Strategies for epidemic control include case management, MCHC and environmental control. The short-term behavioural changes needed are ORS acceptance, and improved nutritional practices. Long-term changes are better sanitation and hygiene.

In Bangladesh, as in many other countries, the seasonal variations in the incidence of diarrhoeal disease can provide the basis for different types of communication. During the pre-peak season the message is prevention. What can one do to prevent diarrhoea? This would include the long-term goals of sanitation and hygiene. Peak season communication strategy would concentrate on the management of diarrhoea, which would include ORS acceptance. Post-peak messages would be concerned with rehabilitation, particularly nutrition.

"Doctors know more about disease and its cure than about man himself," quoted Dr. Humayun K.M.A. Hye, Director of the Drug Administration. He felt the thought was quite applicable to this topic. Diarrhoea is a social disease. If left to the physician the emphasis would be on drugs. Are medicines the solution to diarrhoeal diseases? The society must be changed. Their knowledge, attitudes and practices must be changed in order to change the course of diarrhoeal diseases in the country.

The prevailing attitude toward medical treatment was described as "take a dose and go." This attitude on the part of both the medical practitioner and the client infringes upon the time and thoroughness needed in the ORS message. Dr. D. Anand, Communications Consultant to ICDDR,B, said that ORS presents a case of "double vision". He explained that doctors are hesitant to prescribe ORS because it is not the normal prescription type of drug. At the same time, patients are unsure of the therapy because it is too simple. And while ORS therapy is quite simple, more thorough communication is necessary.

However, the strategy is to build upon what does exist. Why do people behave the way they do? With regard to ORS, people do not have the concept of rehydration. But what does exist? For centuries villagers have been using rice gruel or coconut water for diarrhoea. What they know is that there is a thirst and that the thirst needs to be satisfied.

For the dissemination of ORS information several points were outlined:

- need to identify how to transmit simple, effective information;
- need to provide for the continuing education of health professional;

- need to develop information for packing and distributing commercial ORS directly to families;
- need to train families to make cereal based ORS;
- need to be careful in ORS messages; it is possible to lose credibility if blanket statements are used.

Many participants expressed the belief that through the mass media the problems and preventions of diarrhoeal diseases could be communicated, and physical constraints such as terrain overcome.

Case Study

Dr. Islam presented a case study of an approach to combating Vitamin A deficiency blindness in Pirganj Upazila, Bangladesh. No medicine or vitamins were given out, only the message -- which were the proper foods to take to help prevent night blindness. The area was divided into five blocks, each using a different communications approach: 1) schools, 2) health workers, 3) NGOs, 4) folk media, and 5) a comprehensive approach, using all the approaches plus films and local radio and tv.

An evaluation showed that the comprehensive approach was the best. However, of the individual approaches the folk media seemed to be most effective. Electronic media alone was not tested.

In discussing this case study several issues were brought up.

1. The relationship of the message to the cultural values of the people is often forgotten. Maybe this is why folk media is successful. People are not interested in health for health's sake. They need entertainment. They have social and psychological needs as well as biological needs. If the health message is hooked to these needs -- the need for beauty, for security, for humour, etc -- there will be a greater chance of success.
2. The effectiveness of the folk media approach also reinforced the thought expressed earlier that we must consider why people behave the way they do. What is their existing knowledge? "We have not dealt with the issue of how ignorant we are," said Dr. Najma Rizvi,

Scientist-Nutritionist for ICDDR,B. Community traditions resources, talents can and must be used to reach the people. Here Dr. Aziz brought up the fact that there is a strong religious belief that cleanliness is next to godliness. Why can't this belief be used to help prevent disease?

3. The effectiveness of the comprehensive approach is partly because of the reinforcement of the message from different sources. Repetition of the message is an indispensable component of any campaign.

MEDIA STRATEGY

Mr. Jamil Chowdhury, Director-General of the National Institute of Mass Communication presented the steps for developing a media campaign strategy. (See paper by Chowdhury). Briefly they are 1) problem identification, 2) goal setting, 3) selection of communication approach, 4) message development, 5) audience analysis, 6) production of IEC, 7) dissemination of information and 8) evaluation and feedback. Steps 3-5 are considered strategy development and constitute a continuous process.

Chowdhury said we tend to forget environmental conditions such as the literacy rate and the available communications channels. The type of approach used depends on the target analysis and the problem. The different approaches are information transmission, persuasion, instruction or dialogue. The approaches sometimes overlap.

During the discussion it was pointed out that we set goals for a programme, but usually fail to set them for the communication campaign and as a result fail to measure the campaign's share in the impact of a program.

THE TARGET AUDIENCE. There were strong feelings that community participation in the design and planning of the campaign from the beginning is important. Existing knowledge and practices should be considered before starting any health education program. An anthropological study of people's perception of diarrhoeal disease and epidemics and a survey of the major communications obstacles would provide a solid basis for

education, training and communication.

Both men and women should be considered in any health campaign. If the husband/father is not educated as well, the exercise will be futile. A multi-media campaign directed towards children is also important.

However, as one recommendation points out, these discussions are useless unless there is a systematic and scientific analysis of the target audience. While it was generally agreed that the audience is the general public and the health workers, the primary audience is still in question. Some felt that the primary target is the general population, but that the secondary target, the professionals, paraprofessionals and other community leaders are the ones to be considered first.

Other participants said that there should be equal emphasis in reaching the the two groups; and also that the role of the grass root workers cannot be ignored.

The question of audience was closely tied to the problem of an illiterate population. Can a mass media health campaign be directed to the general public when most people are illiterate? In Bangladesh, the literacy rate is 20.2 percent. The idea that health education and the health program would never be successful unless basic illiteracy was eradicated created lively discussion which surfaced throughout the conference. There was a general agreement, however, that while illiteracy makes the job more difficult, it does not make it impossible. Dr. M.R. Khan, Department of Paediatrics of IPGM&R, noted a study showing that when maternal education is at Class 4, health is improved 50 percent.

Illiteracy does not mean that a person cannot learn, only that the means have to be different. It was said that we underestimate the public and at the same time expect too much of them. Their needs and views are not sought out. They are illiterate and we feel we must teach them. Yet, we expect them to learn something after being told once or twice, while health professionals spend years learning the same material.

One participant pointed out that illiteracy also makes it harder for the public to communicate with the planners or officials.

METHODS. An isolated approach is neither possible nor desirable. But, the overlaps should be planned and purposeful to complement and supplement each other. Just as one approach is not possible, neither can one choice of communication channels reach all. Even some costly methods can strengthen retention and supplement the message. As the media base is broadened, the chance of reaching the target audience is greater and retention of the message would be strengthened.

By using a mix of talents -- media specialists and members of the target audience -- an interesting message which the audience can identify with can be created. The question was asked as to why there is a lack of creativity in government agencies. The constraints of time and resources were offered as reasons. However, a bit of enlightenment and creativity on the part of lead officials could overcome these problems.

Also a solution seems to be coordination and cooperation between various departments and agencies. This cooperation could maximize resources, both creative and material. By creating a common message with common materials, credibility would be strengthened and the cost of production would also be reduced.

Brigadier Hedayetullah said that intersectoral cooperation is important but lacking. Close rapport must be established now. While the role of the communication specialist is substantial, message development needs a multisectoral approach.

Pretesting is of crucial importance. Otherwise there is a waste of time, money and materials. The audience would also be prevented from sharing ideas that may help improve their lives. Negative ideas and wrong messages may even be communicated.

Monitoring and feedback should be considered operational information tools and should be ongoing. Constant feedback would be generated to improve the program and save resources. One issue was, however, that there is no system of immediate feedback with radio and TV. Mr. Chowdhury gave an example of a feedback survey where the responses of viewers were recorded after having been shown a program. The survey showed that the

programs very often failed to reach the objectives. The reason however was that the local personnel were instructed to transmit that particular type of program.

One solution to this would be formative research, where a program is designed on the basis of an actual survey. Studies have shown that a question-answer session or discussion following a media session has a great impact on the credibility and the retention of the message. It is here that local leaders, clubs, schools, etc. can play a great part.

The question was asked if there was any experience with messages that created spontaneous discussion. Is it conceivable that people could evolve their own messages based on what they have seen or heard? This may then set up a chain reaction of community activity.

JOURNALISTS AND GOVERNMENT

The Ministry of Health, Health Services, Health Educators, etc., should have a close relationship with the journalists. Daily news about health topics is mostly negative -- outbreaks of cholera, or complaints about a hospital or policy.

Positive actions or results and efforts being attempted are generally not reported. The health professionals have not made the effort to share information with the press. Regular press conferences and discussions should be planned.

The mass media can create pressure on the government to enact controls which could help protect society against some types of diarrhoeal diseases. An up to date Food Safety Act, along with means of enforcing the laws and recommendations was particularly mentioned.

THE TASK

The goal of informing the public on the management of diarrhoeal diseases was uncontested. But the crux of the task was summed up in Dr. C.K. Basu's statement that people must be taught how to identify basic information. The specific information will change, so the idea of life long education must be instilled. What is most important is "how to learn".

3. RECOMMENDATIONS

All participants were requested to make recommendations regarding the main theme of the workshop. The recommendations have been classified as follows:

3.1 Organization

These recommendations identified organizational steps that could be undertaken for developing multisectoral mass media health activities and for strengthening health education input.

- 3.1.1 Constitute a task force to explore means of establishing better communication between the health services and the mass media agencies/personnel.
- 3.1.2 Establish a national health education advisory council, representative of allied disciplines.
- 3.1.3 Form a committee of health educators and media personnel to draft a proposal for a national media programme for health education.
- 3.1.4 Hold regular meetings with professionals in medical communication and management fields to promote ideas for more effective mass media messages.
- 3.1.5 Form a coordination committee of Government, national and international non-government organizations who are involved in development and production of IEC materials.
- 3.1.6 Organize similar workshops at the divisional and district level for health administrators and heads of other inter-sectoral programmes at those levels.

3.2 Strategy

These recommendations encompassed two groups -- the general public and the health professionals.

3.2.1 Health education for the public

- i) Develop audience participation programmes. Involving local people in the media will strengthen the credibility and adoption of messages. Roving broadcast teams could be used.

- ii) Include health, nutrition, and family planning education into school curriculum and textbooks, with routine visits by health personnel.
- iii) Adopt a multi-media approach, using radio programmes relevant to the rural population as the anchor.
- iv) Design an integrated media campaign, composed of health, hygiene, and sanitation.
- v) Pool resources of relevant departments to develop, pretest and produce IEC materials.

3.2.2 Professional and continuing education programme for health professionals.

- i) Earmark radio and TV programme times for retraining and continual education of specific health personnel at the village to upazila levels. Encourage the general population to listen to/see these programmes.
- ii) Phase media activity carefully so that extension/clinic activity corresponds. In considering a strategy for ORS, careful thought should be given to the marketing of packets and the role of the mass media in this. ORS must not be perceived as a medicine, nor promoted before it is widely available through commercial outlets.
- iii) Develop a multi-media program for continuing education of health personnel providing primary health care.
- iv) Use field workers as the "crucial link" between radio/TV and the community/target audience. Special emphasis should be placed on field workers, whether Government or NGO, in the delivery of health messages. Even when radio and TV are able to deliver messages to a large number of people, field workers should reinforce and clarify the messages.

3.2.3 Selecting the time and place for media

- i) Develop radio and TV programmes in regional centres for the local population.
- ii) Feed health education material into dailies and periodic publications.
- iii) Conduct an exhaustive audience analysis. Without solid data no communication plan, regardless of media effectiveness, can be successful.

3.3 Message/material development

- 3.3.1 Analyze target audience and pretest mass media material before production and distribution. Indiscriminate use of media not suitably tested in the socio-cultural milieu where it is used has failed to evoke the desired response.
- 3.3.2 Develop simple repetitive cultural and area specific messages, with emphasis on low cost traditional media such as posters and folk songs.
- 3.3.3 Plan for communication and coordination with related organizations when preparing mass media material.
- 3.3.4 Continuously monitor and evaluate media messages and use the feedback to modify the message if required.

3.4 Research

- 3.4.1 Develop operational research strategies for classifying mass media for epidemic control and message design.
- 3.4.2 Undertake collaborative research projects for message development, monitoring and evaluation for different types of mass media and for different target groups.
- 3.4.3 Conduct anthropological studies on issues related to health such as diarrhoea, immunization, breast feeding, and weaning food.

- 3.4.4 Carry out research and studies on the use of radio for health education, particularly for remote areas in Bangladesh.
- 3.4.5 Monitor and evaluate innovative approaches to rural health by public and private initiatives in different areas.
- 3.4.6 Start a small scale experimental programme immediately to gain experience using mass media for health education on the national level.

APPENDIX 1

WORKSHOP PROGRAM

<u>Hours</u>		
8:45	Registration	Ms. Carmelita Lavidés
9:00	Welcome note and introduction of participants	Dr. K.M.S. Aziz
9:15	Inaugural Address	Mr. Manzurul Karim
9:35	Vote of thanks	Dr. Anjuman Ara
9:50	Workshop procedures	Dr. D. Anand
10:00	T E A B R E A K	
10:30	<u>Session I</u>	
	- Chairperson:	Brig. Hedayetullah
	Speakers:	
	Topic I: Esstntials of Communication for a Diarrhoeal Disease Control Program.	Dr. D. Anand
	Topic II: Concept and Practice of Health Education through Use of Mass Media	Mrs. Khurshida Khanom
	- Discussant:	Dr. Humayun K.M.A. Hye
11:45	<u>Session II</u>	
	- Chairperson:	Dr. K.M.S. Aziz
	Topic: Communication Strategies for lifelong Education	
	- Speaker:	Dr. K.M.S. Islam
	- Discussant:	Dr. C.K. Basu
13:00	L U N C H B R E A K	
14:30	<u>Session III</u>	
	- Chairperson:	Brig. Hedayetullah
	Topic: Mass Media for Health Education & Epidemic Control	
	- Speaker:	Mr. Jamil Chowdhury
	- Discussant:	Mr. Anish Barua

APPENDIX 1 (CONTINUED)

Hours

16:00

Closing Session

- Chairperson Brig. Hedayetullah
- Rapporteurs report: Dr. Anjuman Ara
- Vote of thanks: Dr. R.L. Akbar
- Closing Address: Dr. M.M. Rahaman

17:15

T E A B R E A K

APPENDIX 2

RESPONSIBLE FOR THE PREPARATION AND ORGANIZATION OF THE WORKSHOP

Planning	Dr. K.M.S. Aziz Mr. M.R. Bashir
Organization	Dr. D. Anand
Preparation of Conference Documents	Dr. F. Anjuman Ara
Technical Staff	Dr. Rezia Laila Akbar Dr. Rafiqul Islam Mrs. Kurshida Khanom Dr. A.K.M. Siddique
Editing of the Final Report	Susan Brandt P. Molly Read
Secretarial Staff	Carmelita Lavidés Alfred Roy
Artwork and Cover Page	Asem Ansari

APPENDIX 3

LIST OF PARTICIPANTS

Dr. A.N.A. Abeyesundere
WHO Malariologist
House No. 20, Road No. 4
Dhanmondi R/A, Dhaka

Dr. Tofail Ahmed
Shishu Hospital
Sher-e-Bangla Nagar
Dhaka

Dr. A.A.M. Anwar
Devt. Manager-Family Planning
Social Marketing Project
House No. 105, Road No. 9-A (New)
Dhanmondi R/A, Dhaka

Mr. Anish Barua
Development Communication Manager
Bangladesh Rural Advancement Committee
66 Mohakhali C/A, Dhaka

Dr. C.K. Basu
Adviser for Training Administrators
and Supervisors, Universal Primary
Education (IDA) Project
House No. 23, Road 12, Dhanmondi R/A,
Dhaka

Dr. Shushum Bhatia
Scientist, Community Services
Research Working Group
International Centre for Diarrhoeal
Disease Research, Bangladesh
GPO Box 128, Dhaka

Mr. Jamil Chowdhury
Director General, National Inst.
of Mass Communication
59A Satmasjid Road, Dhaka

Mr. Robert Ciszewski
Country Representative
Population Service International
Dhaka

Mr. Joe S. Foote
Fulbright Lecturer
University of Dhaka
Dhaka

Mr. Hasse B. Gaenger
Deputy Representative
& Sr. Adviser on Population
UNFPA, GPO Box 224, Dhaka

Brig. M. Hedayetullah
Director General of
Health Services
105 & 106 Motijheel C/A, Dhaka

Mr. Sk. Anwarul Hoque
Health Section, UNICEF
House No. 52, Road No. 4A (New)
Dhanmondi R/A, Dhaka

Col. Mozammel Hossain
Director, CDC & ITHC
House No. 20, Road No. 4,
Dhanmondi R/A, Dhaka

Dr. Humayun K.M.A. Hye
Director, Drug Administration
80 Motijheel C/A, Dhaka

Dr. K.M.S. Islam
Director, Distance Education
Teachers Training College Campus
Mirpur Road, Dhaka

Dr. M.R. Khan
Dept. of Paediatrics
IPGM&R, Shahbagh Avenue
Dhaka

Mrs. Khurshida Khanom
Associate Professor, National Inst.
of Preventive & Social Medicine
Mohakhali, Dhaka

Mr. David Mason
Coordinator, Communications &
Information Section, UNICEF
House No. 52, Road No. 4A (New)
Dhanmondi R/A, Dhaka

Mr. Moizuddin
Chief, Bureau of Health Education
& Dte. General of Health Services
Govt. of Bangladesh, Dhaka

Mr. Mostafa Monowar
Director General, Bangladesh
Television, Rampura, Dhaka-17

Prof. Q.A.I.M. Nuruddin
Chairman
Dept. of Mass Communication and
Journalism
University of Dhaka, Dhaka

Mr. Douglas Palmer
USAID
Jiban Bima Bhaban
10 Dilkusha C/A, Dhaka

Ms. Lynne Paquette
Junior Professional Officer
UNFPA
GPO Box 224, Dhaka

Professor A.J.M. Mizanur Rahman
Director, National Inst. of Preventive
& Social Medicine
Mohakhali, Dhaka

Dr. Najma Rizvi
Scientist
Nutrition Working Group
International Centre for Diarrhoeal
Disease Research, Bangladesh
GPO Box 128, Dhaka

Mr. Charles Rycroft
Director, Worldview International
Foundation, House No. 76A, Road No. 12A
Dhanmondi R/A, Dhaka

Dr. Syed Waliullah
Director General
National Inst. of Population Research
and Training (NIPORT)
Azimpur, Dhaka

APPENDIX 4

WORKSHOP EVALUATION

At the end of the workshop, participants were asked to fill in an evaluation form. Eighteen persons responded.

Two questions required ratings:

How would you rate the workshop for

- | | | | | | | |
|----------------------------------|-----------|----|------|----|------|---|
| 1) Organization? | Excellent | 11 | Good | 7 | | |
| 2) Accomplishing the objectives? | Excellent | 2 | Good | 11 | Fair | 4 |
- (1 rating was between good and fair)

Participants were asked what they felt were the weaknesses of the workshop. The majority of responses in this category were related to the "content of the workshop". While the comments were varied and sometimes contradictory, many felt that there was a lack of information. Respondents expressed the need for more in depth studies and research information, more practical/actual examples of the use of mass media in health education, a review of current use of media and information on the target audience. One respondent felt that too little use was made of audio-visual inputs.

Other comments recorded were "too academic," "papers too general," "focus too narrow." Four respondents felt that the discussions were weak or not well directed. One person said that specific proposals should have been floated for discussion as well.

Time was a concern for four persons. Three felt that the time was inadequate; one wanted time for small group discussion. One respondent felt that the schedule could have been better maintained.

Several people felt that the lack of input from those directly involved with the target audience, from other health disciplines such as DPHE, and from editors and journalists of private newspapers was a weakness.

One person said that specific strategies should have been suggested; and another commented that there was no mechanism to consider recommendations and action.

Regarding the strong points of the workshop, the majority of responses concerned the background of the workshop participants and their involvement in the proceedings. The multi-sectoral and multi-disciplinary character of the workshop was considered a very positive aspect. A majority of respondents also mentioned the obvious concern and interest displayed by the participants, particularly in the active involvement during the discussion sessions.

The realization of the importance of communication in health education and of the need to support the use of mass media in the health program was considered a significant feature of the workshop. Important relevant issues were brought out.

As noted in the tabulations, the majority rated the organization of the workshop to be quite good. In particular, the advance circulation of papers, the range of participants and the size of the group were mentioned. Several people felt that the time allotment was sufficient and the schedule well maintained.

There were many topics suggested for future similar workshops.

Strategies -- concept, methods and techniques

1. Message development and pretesting -- the single most frequent suggestion.
2. Techniques of persuasion
3. How to improve message quality
4. How to make easily understandable and acceptable messages
5. Means and methods of folk media
6. Evaluation and monitoring mechanisms
7. Sample media materials

Operational and communications research

8. Target audience analysis
9. Radio use in remote areas
10. Community participation in the use of mass media
11. Details of operational models e.g., Firganj, BRAC OTEP
12. Research methods appropriate to mass media

Content

13. Environmental sanitation campaign through mass media

14. Achievements of mass media in health education
15. Planning health education through mass media
16. EPI and group discussion with mass media support
17. Family planning and individual counseling with mass media support

Bangladesh experience

18. Mass media exposure in rural Bangladesh
19. Improvement of government sponsored information.

