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A Facility-Based Qualitative Study**

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Prevention of Chronic Noncommunicable Disease in Mongolia: A Facility-Based Qualitative Study

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Introduction

Nutrition, physical activity, smoking, and alcohol consumption are major causes of morbidity and mortality related to noncommunicable diseases (NCDs). Hypertension, diabetes type II, cancer, and chronic pulmonary diseases cause 60 percent of deaths worldwide and will likely increase by 17 percent during the next 10 years. Eighty percent of deaths caused by NCDs are registered in low- and middle-income countries in the working-age population and contribute to the growth of poverty [1,2,3].

During the last 15 years in Mongolia the leading causes of mortality have been cardiovascular disease and cancer.

This qualitative survey is one part of the Facility-Based Impact Study (FBIS) and was funded by the MCA Health Project. The overall goal of the MCA Health Project is to reduce mortality and morbidity caused by NCD and traffic accidents. Over a period of five years, the project aims to provide the population with essential knowledge about health promotion, the prevention and early detection of NCDs, and the adoption of healthy lifestyles through capacity building for the health system and, more specifically, for the preventive facilities. One main activity of the project is to improve primary health services related to NCDs through interventions for capacity building on the level of health facilities. This FBIS focuses on assessing the current situation in the facilities to enable a later comparison of the results of this baseline study and a later follow-up study to evaluate the impact of the Health Project on the performance of health staff, their knowledge, attitudes, and practice in the facilities, and

the preparedness of facilities in terms of equipment and staff. The survey was carried out by a joint team of local and international consultants from the MCA Health Project, EPOS Health Management and THL Finland, and researchers from the School of Public Health.

Purpose and Objectives

The purpose of the facility-based qualitative study is to gain deeper insights into the current situation, resources, and potential problems of facilities in the provision of NCD prevention and early detection.

Objectives

1. To study the current situation and needs for NCD-related health services in primary and secondary health care facilities
2. To determine the key issues of the MCA-Mongolia Health Project, including potential problems, possibilities, and recommendations for the implementation

Study Design and Data Collection

The cross-sectional study was conducted in health care facilities in urban and rural areas of Mongolia. In the sample frame, Soum Hospitals and Family Clinics as primary health care facilities, Aimag and District General Hospitals, including ambulatory units, as secondary health care facilities were included. Quantitative and qualitative methods following triangulation were used for the data collection and analysis.

The *target groups from health professionals* included:

- Health staff working in primary health care– level facilities (doctors, nurses/bagh feldshers, NCD program coordinators/facilities’ directors)
- Health staff working in secondary health care– level facilities (internal medicine/cardiology/endocrinology doctors and nurses, obstetrics and gynecology/oncology doctors and midwives, cytology/pathology doctors and technicians, NCD program coordinators / facilities’ directors / quality managers)

For the qualitative method, focus group discussions were conducted to evaluate the current situation of NCD-related health services from the perspective of health professionals and to get insights to institutional and professional experience related to management, implementation, and coordination of earlier-conducted NCD prevention activities.

Sampling for the Qualitative Study

A total of 15 focus group discussions were conducted, of which six were conducted in the city and nine in rural areas. In the rural areas, eight discussions were held at Soum Hospitals and Family Clinics, and three discussions were held at Aimag General Hospitals, representing the secondary health care facilities. As for Ulaanbaatar city and Orkhon, three discussions were held in secondary

health care facilities and three in Family Clinics. The total number of 97 participants was involved in FGDs (Table 1.5).

Purposive sampling was applied for the focus group discussion participants. The discussions conducted at Family Clinics and Soum Hospitals consisted of five to seven participants, of which two to three were doctors and three to four were nurses and feldshers. Even though the interviews at primary health care facilities were planned to involve eight to ten participants, the actual number of participants was limited to five to seven, due to the limited number of available personnel. In the second group of sampling, professionals such as internists, cardiologists, endocrinologists, oncologists, obstetrics and gynecologists, oncologists, cytologists, pathologists, and so on, were involved.

Each FGD included a moderator and a note-taker who were trained beforehand. The moderator conducted the interview and elicited thoughts, comments, and recommendations from the participants, based on the question guide for the focus group discussion. The duration of the discussions was 40 minutes to an hour.

Table 1.5. Number of focus group discussions by place and number of participants

Aimags, city	Facilities, unit	FGD	Number of participants
A. Rural areas			
Total	Family Clinic and Soum Hospitals	8	37
	Aimag General Hospitals	3	25
B. Cities			
Orkhon	Regional Diagnostic and Treatment Center	1	7
	Family Clinics	1	4
Ulaanbaatar	Songinokhairkhan General Hospital	1	6
	Khan-Uul General Hospital	1	6
	Family Clinics	2	12
Total	Family Clinics	3	16
	District Hospital	3	19
TOTAL		15	97

Statistical Analysis

The structured question guide for the focus group discussions was developed based on the main objective of the study, which was to identify crucial aspects from the perspectives of the facilities that could influence the implementation of the project. For the analysis of the FGDs a qualitative text analysis was conducted, guided by the topics of the question guide structure and the contents based on predetermined subcategories relevant for the facilities. The qualitative data material that was gathered

from the FGDs was analyzed, applying methods of a qualitative content analysis by reduction, grouping, and categorization of identified relevant quotations. Consensus on the summary of main messages was obtained directly from the participants in the focus groups.

Results

A. Current situation and needs for NCD-related health services

Health care service in Mongolia is provided by three distinct facility levels: (1) the Soum Hospitals, (2) the Family Clinics in districts and Aimag centers, and (3) the Aimag and District General Hospitals. We studied the health promotion, NCD prevention, and early detection activities provided by those levels.

Soum Hospitals

NCD prevention activities were mainly focused on secondary and tertiary measures and targeted mainly seniors and patients. There were relatively few activities of primary prevention directed toward the general population. Only a limited amount of activities was conducted that related to health promotion, health education, and healthy lifestyles targeting individuals, families, or communities who had not sought medical help from the health services directly.

Family Clinics in Districts and Aimag Centers

In general, health staff of Aimag and Districts Family Clinics reported to conduct more activities directed toward primary prevention of NCDs than the staff of Soum Hospitals. They reported that conducting activities such as training, meetings, and contests in communities and organizations is more common on this level of facility, but they also experienced shortages of equipment, especially for the screening of cervical cancer and precancer conditions and the control of cardiovascular diseases. The doctors and nurses working at the district level described a high workload.

Aimag and District General Hospitals

Participants reported that there were no prevention or training activities on NCDs conducted for the general population, organizations, and communities. Most of the conducted activities were provided for patients, such as counseling on healthy nutrition, physical activity, and follow-ups for patients with NCDs by outpatient and inpatient units of the hospitals.

The health staff reported that primary NCD prevention is not well established in Aimag and Districts General Hospitals. At present, activities are rare and are limited to the organization of some training activities, competitions, and special health days. The FGDs revealed that PHC services in terms of health promotion and NCD prevention have not reached the population and that the activities of the health professionals are oriented mainly toward the diagnoses and treatment of NCDs.

Results by Key Messages

The following summaries of contents represent the main aspects obtained from the discussions and extracted through summative qualitative content analysis. The various sections of the question guide group the contents. Quotations from focus group participants are cited to illustrate the key messages.

Need for More NCD Prevention and Early Detection Activities

The Soum and family doctors, nurses, and bagh feldshers who participated in FGDs stressed that they were aware of the increases of NCDs in Mongolia. The health professionals from Soum Hospitals and Family Clinics who participated in the FGDs concluded that organizing NCD prevention activities covering as many people as possible would be beneficial for the country.

Quotation 1.1

Currently the number of people suffering and dying from NCDs has increased and equals the number of people who suffered and died from communicable diseases in 1970-80s. For instance, in 1970-80s there were one to two deaths from stroke among people older [than] 70; now we have people in their 40s dying from stroke.

From FGD with Altanbulag Soum Hospital doctors and staff

Need for More Resources for NCD Prevention and Early Detection

The staff in the focus groups mentioned that inadequate health literacy among the population results in bypassing the PHC level and seeking health assistance from the next level of care. The majority of people attending the urban and rural Family Clinics were people from disadvantaged groups from ger districts, children of vaccination age, and pregnant women for antenatal follow-ups. The health staff mentioned that the reasons for patients moving directly to the next level of care were the lack of equipment and the limited range of services provided by primary health care facilities.

Quotation 1.5

Frankly, Soum and Family doctors and specialists lack information and materials on NCD prevention and early detection. It won't be wrong if we say that the only equipment available is the blood pressure monitor. We are limited to only giving an advice, because there is no equipment for examining breasts, cervix, and blood sugar. It is obvious that people go to the next level of service because there is no equipment at Soum Hospitals and Family Clinics. Therefore, currently there are no proper preconditions to provide NCD primary care in most cases.

From FGDs with Uvur-Khangai Aimag's Burd Soum

Need for Knowledge and Training in NCD Prevention and Early Detection

Soum and Family Clinics' staff reported that they organized health education mass media activities on NCDs in their areas of responsibility, using their own resources, due to the shortage of information, education, and communication materials, and the partly outdated available material. The FGDs participants reported that they feel a need for up-to-date training manuals for trainers and materials for the population, to be able to provide NCD prevention training, counseling, and education/information activities.

The health staff representatives stated that, from their perspective, new primary prevention strategies, methods, and policies are needed in Mongolia. In general, the health staff reported a lack of NCD prevention activities at the Soum and Family Clinics level and pointed out the lack of proper management and organization and the absence of a reliable monitoring system for the current National Program on NCDs at this level of facilities.

During FGDs the health staff mentioned that they have perceived their needs for training on modern approaches to NCD prevention, early detection, and control, changing population and individual health behavior, health promotion, and healthy diet. The participants suggested developing guidelines on how to provide NCD primary care at Soum Hospitals and Family Clinics, and at secondary and tertiary levels. FGDs with representatives of Aimag and District General Hospitals and Aimag Health Departments revealed that NCDs primary care is viewed as a prerogative of Family Clinics only.

The FGDs participants mentioned that only some training activities on healthy eating, healthy behavior, physical activity, and other health topics were organized and carried out among schoolchildren and the general population. The NCD prevention activities at Soum and Family Clinics were limited mostly to annual “No smoking day” or “No alcohol day” events; nevertheless, the health staff felt that they lacked sufficient knowledge on these topics and that they were unable to conduct these events properly.

Need for Clear Responsibilities

The participants reported that, within the framework of the National Program on Prevention and Control of NCDs, it was stated that the local subcouncil headed by the Local Governor is responsible for the organization, management, coordination, and monitoring of the implementation of activities of the program at the local level, but not all Soum Hospitals had a subcouncil established or were reporting on their activities. However, the scope and contents of the activities were mainly focused on organizing some sport competitions and special health days and were limited to trainings on a few general topics.

Even though, in general, a public health nurse was in charge of NCD prevention activities at the Soum and Family Clinics level, in some Soum Hospitals and Family Clinics the nurse had combined responsibilities or no person at all was in charge of NCD prevention activities. The participants stated that NCD prevention is not solely the responsibility of PH specialists, but instead should be the responsibility of all Soum Hospital and Family Clinics doctors, nurses, and bagh feldshers. Therefore, the FGDs participants expressed a need to provide professional methodological assistance to Soum and family doctors, nurses, and feldshers in organizing activities and trainings on prevention and early detection of NCDs.

B. Potential problems, possibilities, and recommendations for the implementation of the MCA-Mongolia Health Project

The participants mentioned that local public administration authorities, such as Soum, Aimag and district governments, social policy, and other related departments should be involved in organizing checkups for the early detection of NCDs. The FGDs participants recommended inviting people for checkups and providing them with services according to a specific time schedule. For better coverage, they stated that the information about forthcoming health checks should be disseminated as early as possible with the help of the Public Health Committee, the Bagh government, volunteers, Soums, Aimags district schools, and other organizations. It was reported that Soum Hospitals and Family

Clinics do not have sufficient resources for information campaigns and information, so the outreach is limited. It was suggested that early scheduling and planning of activities would save resources and would have optimized workload to cover all baghs, districts, and streets.

To ensure the coverage of remote populations with health services, the participants indicated that it would be very important for bagh feldshers to regularly visit people for early detection, for the assessment of risk factors, and for related follow-ups.

Need for guidance on NCD prevention and early detection

There is a need to train and supply Soum and Family Clinics doctors and nurses with manuals (guidelines) on the methods of NCDs early detection. The participants indicated the importance of an NCDs training curriculum, including prevention, early detection, diagnosis, treatment, and follow up, which should be informative, and the importance of providing knowledge and skills applicable to their workplaces. Moreover, they suggested involving not only Soum Hospital managers in the training, but also nurses, bagh feldshers, and other related specialists from the secondary and tertiary hospitals.

Quotation 3.2

We do not know what we shall do for early detection of cervical cancer. The National “Healthy Mongolian Program” included a one-to-two-day theoretical training on PAP smear testing. We would like to gain more skills in PAP smear testing just like we have it for blood pressure monitoring.

From FGDs of UB city family practice, Tuv Aimag’s Altanbulag,

Need for Intersectoral Collaboration for NCD Prevention

Most of the participants noted that NCDs prevention should be conducted by joint efforts of individuals and organizations. The concept of healthy individuals, healthy families, and healthy organizations should be promoted, for example, through incentives and appreciation of the efforts of staff or organizations. From the perspective of the participants, the schools, the Soum governments, Soum Hospitals, and other organizations should be involved in NCD prevention activities.

Need for Adequate Provision with IEC Material and Facilities

The participants reported a lack of information on NCD prevention and health promotion in general and especially its absence in the mass media. Educational materials for the general population on reducing NCD risk factors such as alcohol consumption, smoking, physical inactivity, and unhealthy diet, and materials promoting healthy lifestyles were mostly unavailable. The participants also described needs in terms of facilities, such as a training room or leisure and sports facilities for the public.

Need for Evaluation and Monitoring of NCD Prevention and Early Detection

The participants agreed that the main public health activities such as health promotion and disease prevention tasks, and not only the treatment of patients, should be included in the job descriptions of doctors working in Soum Hospitals and Family Clinics. They also mentioned that public health activities that are presently implemented by Soum and Family Clinics doctors were not evaluated and

monitored, due to the absence of relevant assessment criteria, and that there are neither mechanisms nor incentives to support their NCD prevention and early detection.

Discussion

This Facility-Based Impact Study focusing on NCD services and prevention is the first of this kind conducted in Mongolia.

The FBIS results give hints about the needs, gaps, and starting points for a further development of public health and primary health care services related to NCDI at the level of Soum Hospitals and Family Clinics, based on reports and assessments of experienced health care providers working in the facilities in departments and units relevant for NCD prevention, care, and health promotion.

The main conclusion drawn from the findings of the FBIS can be summarized as a currently insufficient situation for the effective provision of NCD services in public health and primary health care at the selected facilities. The NCD and health services provided by Soum Hospitals and Family Clinics mainly focused on diagnoses and treatments of diseases, whereas prevention and health promotion were not sufficiently offered and delivered to the target populations (see also U. Ganchimeg and O. Chimedsuren, 2008).

The results showed that, in the assessed facilities, equipment and supplies to carry out NCD prevention, early detection, and health promotion activities were lacking and were not sufficient to provide health education and interventions at Family Clinics and Soum Hospitals. These results were similar to other conducted assessments, such as the “Primary and secondary health care assessment in Khangai region” from 2011 (R. Otgonbayr, O. Chimedsuren, and U. Ganchimeg, 2011) and clearly indicate the necessity to provide the facilities with equipment and supplies to create the essential preconditions for a facility-based capacity to provide sound services for NCD prevention, early detection, care, and health promotion.

The study clearly demonstrates the needs of primary health care doctors, nurses, and other health staff to be provided with training opportunities to enable them to improve their knowledge and skills in NCD prevention, early detection, case management, health promotion, and education by the provision of adequate teaching methods to educate and inform the population and/or specific target groups on NCD-related topics. This result is supported by statements from the FGDs where the health care providers expressed their positive attitudes, their willingness, and their high motivation to perform NCD-related activities and even demanded this kind of training, especially with a focus on the provision of knowledge related to NCDs in general, symptoms, the related risk factors, and preventive measures. Similar conclusions were drawn from the evaluation of the “Health sector development project - ADB-3” (R. Otgonbayr and B. Orgil, 2010).

The respondents mentioned as the main causes of the lacks in the utilization of primary health care services the high morbidity in the population and the population’s attitude that is currently still dominated by hospital-focused services and care. Other crucial causes for the low use of primary health services is the inadequate health care financing and insurance system for health care delivery in Mongolia, also reflected by the results of the survey on “Issues of Family Hospital development in Mongolia” (B. Tsengelmaa, B. Orgil, and O. Chimedsuren, 2010). Moreover, the survey respondents reported an overload of doctors and nurses at the district level with too many clients—on average, two

to three times more patients per doctor and nurse than determined by the Mongolian standards (O. Chimedsuren and S. Ariuntuya, 2010). Finally, there is a need to designate and ensure appropriate funding and, in general, increase the budget dedicated to public health activities and NCD prevention, early detection, and health promotion programs in the health facilities in Mongolia.

Conclusion

FGDs indicated the perception of an insufficient level of activities related to NCD prevention and early detection services on the level of facilities, especially referring to the availability of resources and capacities that are dedicated to NCD-related services.

Activities on NCD prevention, early detection, and its monitoring were not established properly from the perspective of the participants in the FGDs, and they described an absence of an integrated system of management, organization, and monitoring at Soum Hospitals and Family Clinics, District and Aimag General Hospitals, and health departments.

Health professionals reported having insufficient knowledge and capacity for promoting health, preventing NCDs, and changing risky and harmful behaviors of the general population in terms of preventing NCDs. Problems in that capacity are related to a lack of training in NCDs and in NCD prevention and early detection, a lack of time, a lack of equipment, insufficient funding for NCD prevention and early detection activities, unclear responsibilities, unclear or nonfunctioning structures, a lack of available guides such as manuals and guidelines, a lack of collaboration between the primary and secondary health facility levels, a lack of intersectoral collaboration with local structures and government agencies, a lack of a reliable monitoring, evaluation, and reporting system on NCDs, and a lack of possibilities for participation and capacity building of the health staff. The health professionals participating in the FGDs perceived the financing of national NCDs prevention and early detection activities as insufficient.

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