MANPOWER DEVELOPMENT FOR MATERNAL— CHILD HEALTH AND FAMILY PLANNING PROGRAM: A—NEP LESE CASE STUDY

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Background

Nepal has 11.33 million people, 90% of whom depend on agriculture for their livelihood. The estimated growth of population is 1.95 % per year. Infant mortality is 200 per 1,000 live births per year^{**}. By far the largest proportion of the total population resides in the Hill Districts of Nepal, see Table 1 below.

TABLE 1

Region	Area (KM)	% Area	1971 Population	% Population	Districts
1. Mountain	46, 760	31.08	1,079,979	9.52	16
2. Hills	61, 896	45.42	5,379,431	47.45	36
2. Plain	32, 791	23.00	4,292,598	37.86	20
4. Kathmandu					
Valley	764	.50	586,920	5.17	3
Total:	42,211	100.00	11,338,928	100.00	75

(1971 Census, Central Bureau of Statistics, His Majesty's Government of Nepal)

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• National Planning Commission, His Majesty's Government of Nepal, 1970-75.

^{**} Nepal National Health Survey, 1965-66.

There is one trained medical doctor for every 36,456 population, one paramedical staff, including all categories and trained by the Ministry of Health per every 1,268 population. A total of only 55 hospitals and 36 health centers means that there is one bed for every 5,628 population. There is a total of 153 health posts in the country which are manned by Auxiliary Health Workers alone. Most of the health facilities are concentrated in or around Kathmandu, which means that part of the country is without any service.

There are now three Assistant Nurse Midwife Schools, two professional Nurse Midwife Schools, one Auxiliary Health Workers School. Additionally, the Maternal-Child Health and Family Planning Project has been sending students to India for nursing and assistant nurse-midwifery training.

Approximately 10% of the Nepalese people can read and write and 32% of the total number of primary school age children were enrolled in primary schools in 1970. Approximately 6.8% of the national budget had been allocated for education for the fiscal year 1971-72. UNESCO has projected that there will be, on the basis of 60% enrollment, more than 1.1 million children in the elementary schools by 1980. The new Education Plan† envisages a sizeable increase in expenditures on education for the expansion of primary and secondary vocational education in relation to the national budget. The conception and the designing of the Education Plan is consistent with the acute needs felt in implementing most development projects. The Maternal-Child Health and Family Planning is only one of several examples of this need.

His Majesty's Government adopted a family planning policy in 1965 with a view of bringing a balance between the economic and population growth. The Family Planning Program was merged with the then newly started Maternal-Child Health Project within the Ministry of Health.

The Maternal-Child Health and Family Planning Centers* have been expanded in close coordination with the basic health service. Apart from meeting the conveniences of the people, this also has made the referral services available to the MCH & FP clients from the medical doctors assigned to the hospitals and health centers, which otherwise would not have been possible due to the lack of such personnel in the country. Besides, the range and an important consideration was its integration with the health services. The Maternal-Child Health and Family Planning Project, through its centers, seeks to serve primarily the married couples between the ages of 14-45, and children under 5 years of age. These Centers are

† The New Education Plan was developed by the National Education Advisory Council appointed by H. M. King Mahendra with main objective of meeting the manpower requirements of the development through the spread of scientific and technical education.

* MCH Project and MCH & FP Center, will be known hereafter as Project and Center, respectively.

usually located at the premises of the existing Health Centers and Hospitals. The Maternal-Child Health and Family Planning Centers provide the clinical as well as educational services through their Children's, Antenatal, Family Planning Clinics, and through their home-visiting programs.

Problem

Expansion of the Maternal-Child Health and Family Planning services was officially adopted as an integral part of the policy objective of the government early in 1965. However, during the period 1964-67, only 12 such Centres were established. Possibilities of accelerating the expansion of these Centres, in the light of an expanding demand for such services (See Figure 1), were also very meek mainly due to the lack of technical manpower of all categories.

The gap between the supply and ever-increasing demand for technical manpower, was not unique to this project alone, but extended to all other branches of health services. This situation was further aggravated by the inability of the government's Nursing School to recruit sufficient trainees to meet its capacity. It was argued that the nursing profession was the least popular profession among Nepali women. This was attributed, to a large extent, to the very conservative social attitude.

The challenging problem that the Project authorities faced was to evolve an effective means of expanding the MCH & FP services to fulfill national objective as well as meet the demands of the communities inspite of the prevailing obstacles.

Methodology

The following methodology is but a simple procedure of exploring possible innovative policies with the help of easily available field observations and operations. The Project has been basically service-oriented, thus did neither have time nor resources to undertake a lengthy, expansive, "academically sound", and "statistically significant" experimental study. The basic service-oriented field study had met the immediate research needs of the Project by identifying the problems, recommending possible treatments, and demonstrating the effectiveness of such treatments in expanding the MCH & FP services to the rural areas of Nepal. The methodology adopted by the Project was designed in three stages:

STAGE 1;

Field Observations: Dimensions of Existing Situation

In order to arrive at a logical solution of the above stated problem, it was important for the Project to review its activities in relation to the community's perceived needs. The nature of the services demanded by the communities, should decide the value of the technical

Figure 1

Total Yearly Number of New Visits of Children
(0-5 years of age) Antenatal and Family Planning
Clients, to all MCH & FP Centers by year(1964-67)

skills that were required. This, if studied in relation to the functions performed by the various categories of technical manpower working in the existing typical MCH & FP Center, was assumed to be meaningful in finding the possible solution to the problem stated above. Thus, to begin with, compilation of the number of new clients who came for the three different clinics, such as Children's, Antenatal, and Family Planning, during 1964-67, was done, as is presented in Figure 1. The heavy attendance of the new children at the Children's Clinic reflected the high perceived demand of the community for such services. Thus, the Children's Clinic was used for study to find out the nature of the technical skills required. By so doing, it was assumed that the extend of the basic technical skills capable of managing the Children's Clinic would be capable enough to manage the Antenatal and Family Planning Clinics as well.

Bhaktapur Maternal-Child Health and Family Planning Center* was chosen for the study of the nature of the community's perceived child health problems. The clinical findings, as noted from the clinical cards of the 434 children under 5 years of age during the period June 17th through October 11th, 1964, were indicative of the perceived needs of the community. The disease pattern, as presented in Figure 2, represents the clinical observations of the medical doctor based on initial physical examination of the 434 children during their first visit to the Children's Clinic.

A study was also carried out to observe the functions performed by the various levels of health manpower then working in Bhaktapur's MCH & FP Center. The findings of this study are presented in Table 2.

An analysis of the data presented in Figure 1 and 2, and Table 2, led to the following field observations:

a) The Children's Clinic was by far the most heavily demanded Clinic. It was also noted that the Children's Clinic provided a ready access to a large group of young parents for family planning and antenatal services as well.

b) As much as 80% of the 434 new children of 0 to 5 years of age, over the period of 5 months, primarily came with the simple health problems which could be managed by an intermediate level of health manpower. However, these simple health problems such as Diarrhea, Protein Calorie Malnutrition, and Upper Respiratory Tract Infection, unless tended promptly, could lead to serious complications such as dehydration, kwashiorkor, and pneumonia. It is also observed that diarrhea, malnutrition, and upper respiratory tract infection made up 41%, 20% and 12% of the total sick children (Figure 2), thus making these as the three major child health problems as perceived by the community.

c) The Project did not have Auxiliary Health Workers of the category described in Table 2, column 5.

* One of the most heavily attended Children's Clinics, located in a semi-rural area in the Kathmandu Valley.

FIGURE 2

Disease Pattern as seen in 434 new children attending Bhaktapur Maternal-Child Health and Family Planning Centre through June 17th to October 11th, 1964¹

Gastro-intestinal diseases	154 ²
Malnutrition	76 ³
Upper respiratory infections and pneumonia	45
Impetigo abscesses	24
Allergic dermatitis	12
Otitis media	10
Scabies	9
Suspect pertussis	7
Anaemia, not specified	6
Conjunctivitis	3
Lymphadenitis colli	3
Other diagnoses	27 ⁴
No complaints no findings	58

² These children presented with diarrhea as the main complaint.

³ Of the children with malnutrition, 32 had protein-calorie malnutrition (of whom 7 had xerophthalmia also), 33 children had marasmus (of whom 2 also had xerophthalmia), and 11 had only xerophthalmia.

⁴ Of the 434 children, 15 had evidence of having suffered smallpox previously.

¹ Roundworm-infestation of the children was reported by about 20% of the mother and can be presumed to be much higher.

Source: Nepal's FP & MCH Project - His Majesty's Government of Nepal

Table 2

Qualitative & Quantitative Profile of Health Manpower, by their Function Performed. In A Typical MCH & FP Center (Bhaktapur)

Title of various categories of health manpower	Medical Doctors	Public Health Nurse	Assistant Nurse-Midwife	Auxiliary Health Worker
# of years spent in technical training after: { High School 8th grade	7	4½	2	2
Total number available in the entire Project	2	6	3	None
Functions Performed	Physical examination of all New children; Diagnosis & treatment of all common child diseases; Insertion of I.U.C.D.; Prescribe oral contraceptives; Perform vasectomy; Physical examination & treatment of all antenatal cases; Technical Supervision of Clinic.	Interview clients and fill clinical cards; Weigh the children; Health and family planning education; Supervise management of clinic; Supervise home-visiting; Supervise record keeping and record writing; Account of supplies and expenditures; Urin examination of pregnant women for albumin;	Assist clients with doctors; cleaning the premises; First aid; Intramuscular injection & vaccinations; Dispense medicines as instructed; Explanation as to how to take medicines; Distribution of milk powder & explanation of how to prepare; Health & family planning education; Sterilization of instruments & I.U.C.D.;	Record keeping & report writing; Home visit; Demonstration of cooking techniques in preparation of balanced diets for children; Lining up clients for examination

d) The ultimate delivery of the desired MCH & FP services, regardless of its nature depended totally on the medical doctors who were the most scarce health manpower resource (Table 2), thereby limiting the expansion of services seriously.

e) Although the child disease pattern as presented in Figure 2 is related to the factors other than health and family planning alone, nevertheless frequent pregnancy was recognized as one of the major attributing factors. For example, in the course of discussion, it became clear that the mothers themselves related the protein-calorie malnutrition syndrome** of their children with the onset of their subsequent pregnancy that gradually led to the stoppage of lactation - the only source of first class protein available to most of their young children. The recognition of this on the part of the mothers would help to a great extent in classifying contraceptives as one of the necessary measures in preventing major maternal and child health problems. Thus, it called for the initial approach of family planning measures as being positive tools in preventing maternal and child health problems rather than pursuing a traditional line of cutting down the family size alone. In this setting, family planning was viewed to be more acceptable as a means of promoting the health and survival of young children.

f) Most of the functions in Centers (Table 2) were performed by Assistant Nurse Midwives (ANM) who were only 3 in number then available for the entire Project. The prospect of increasing their supply to the Project was also very slim. The training period for the ANM's was 18 months as they were required to undertake broader responsibilities than the limited functions performed by them in the MCH & FP Center. It was however, felt that an adult person, having the same level of school education as that of the ANM's could be trained in a much shorter duration to undertake the specific functions as was carried out by the Assistant Nurse Midwives in the MCH & FP Center (Table 2, column 4).

STAGE 2:

Recommended Measures and their field Application

From the above observation, some specific measures were evolved and recommended to the Project. The Project in turn adopted the recommended measures as possible treatments, and which included:

a) The requiring of medical doctors, assigned to government or private hospitals, to devote part of their time providing care to vasectomy, IUCD, referred cases of mother and children. This treatment was adopted in view of the acute shortage of trained medical doctor in the country and the Project could not possibly man each one of its Centers with trained medical doctors.

** Locally known as "Sukenaas" in the hilly region of Nepal.

b) The demand for more intermediate technologies was substantial. Such intermediate technologies included immunization, sulfadruugs, penicillin, anthelmintic drugs, contraceptives, nutritional supplement (See Figure 2), etc. This, coupled with the acute shortage of medical doctors, led the Project to view the Auxiliary Health Workers of the category described in Table 2, column 5, as the best suited intermediate personnel for the job. Such category of health workers were not available to the Project until then. The Ministry of Health allocated a total of 49 Auxiliary Health Workers during 1968-70.

c) In order to make effective utilization of the Auxiliary Health Workers, the Project had prepared a list of 7 medical questions for the AHW's to use in screening the medically fit clients for oral contraceptives. Similarly, list of standard prescription was prepared to deal with the common child health problems. This enabled the Project to serve the large populace, while the medical doctors' time could be devoted to the most needed cases. Table 3 presents a revised functional allocation of health manpower working in a typical MCH & FP Center.

d) It was envisaged that even the maximum possible supply of Auxiliary Health Workers would not have filled the gap adequately as the AHWs trained by the Ministry of Health were all males from whom the female clients did not want to seek family planning and antenatal advice and services. In view of this fact, it was decided that a new category of basic health worker consisting primarily of local females should be created and trained to undertake the specific function as presented in Table 3, column 6. These were called Health Aids.

The decision to create a new category of health workers initially met with hostility from both the medical profession as well as from the governmental bureaucracy. It was by no means an easy task to overcome these hurdles. This proposal finally did receive approval from His Majesty's Government in 1967. While the policy and bureaucratic hurdles were overcome, the proposal had yet to withstand the most difficult of all tests. The question was that whether the rural community would respond by providing, from their own communities, female trainees, which made up 2/3 of the total trainees required for this proposed Health Aid Training Program.*

The qualifying academic requirement for the Health Aid Trainees was stated to be completion of the 8th grade. Required age of the eligible candidate would be between the years 18 and 35, preferably married and mature candidates. However, the majority of the recruited trainees were young and unmarried due to the fact that the older married applicants did not meet the academic requirement. The total duration

* As has been pointed out earlier in this paper, the reason for having the half empty nursing schools in Nepal was believed to be due to the society's conservative outlook towards the women holding nursing profession.

of the training period was 12 weeks, which was equally divided between classroom and practical teachings. The syllabus as presented in Table 4, which was adopted for the Health Aid Training Program, aimed at making the graduates capable of understanding the functions as presented in Table 3, column 6. The monthly salary for each of these Health Aids was to be, Rupees 155 (U.S. \$1.00=10.4 Nepali Rupees). The total estimated number of trainees to be recruited was 104, during 1967.

The areas of the Central Hills, Southern Tarai, and the Kathmandu Valley, were placed in a priority order of a,b,c respectively, for the recruitment of these 104 Health Aid Trainees. This priority order was adopted in accordance with the proportion of the population living in these three geographical areas of Nepal. For the reasons already mentioned, existence of some form of health service along with presence of one or more medical doctor in the vicinity, was one of the important criteria used in selecting the exact village of recruitment. The Central staff of the project was involved in planning recruitment, and implementation of the entire training program.

The process of recruitment, which involved active participation of the project and the community in overcoming the prevailing negative social attitude, was indeed a fascinating experience. Since the author had undertaken to recruit the female candidates from the Central Hills, the following findings represent personal observations and insights into the complexity of the decision-making process in a rural society.

To cite an example, an experience in a place known as Doti District to the north-western part of Nepal, is presented here. It took 4½ hours of travelling in a small Stoll aircraft. The landing of the Stoll itself brought a crowd of inquisitive people, mostly interested in seeing the aircraft, with the exception of a few government officials who came to check the landing permit, etc.

Once accepted by the local government officials, the initial approach to the community began on the spot and took the form of a mass meeting. The concerned local government official and the doctors working in the hospital were previously briefed about the purpose of this visit. The local doctors (husband and wife teams) who were very popular among the people there, helped the recruiting team to meet with the leaders of the local women's organization. A standard procedure of explaining about the mission was adopted and used at all levels of contacts within the community so as to avoid any kind of confusion on both sides.

To start with, the MCH & FP services were briefly presented in simple language as related to their day-to-day health and socio-economic problems which led to a good two-way discussion resulting in a positive response from the audience. In the course of discussion, the audience was informed of the government's plan to provide these services to their community. This news was received with enthusiasm by the community.

Table 3

Revised Functions of the Newly Adopted Manpower Pyramid

Title of various categories of health manpower		Medical Doctors	Auxiliary Health Workers	Assistant-Nurse Midwife	Public Health Nurse	Health Aids*
# of years spent in technical training after:	High school 8th grade	7	2	1½	4½	3 months
Reallocated functions		Diagnosis and treatment of referred mothers & children; Perform vasectomy; Insertion of I.U.C.D.; Technical Supervision.	Diagnosis and treatment of all common child health problems; Recognition of serious illness & refer to nearest medical doctor; Physical examination of all children; Prescribe oral contraceptives after using screening techniques; Motivate clients for vasectomy & refer to medical doctor; Supervise management of Clinic; Vaccination for Diptheria, Tetanus & Whooping Cough.	Health & FP education; Demonstration & applied nutrition for children; Intramuscular Injection; Super-vise record keeping & report writing; Prescribe oral contraceptives after using screening techniques; Recognition of abnormal pregnancies & refer to medical doctors; Urine examination of pregnancy mothers for albumin; Vaccination for Diptheria, Tetanus & Whoping Cough.	Contribute through planning the standard nursing care; Home visiting procedure and participating in training and field visits.	Interview clients; Fill out clinical cards; First aid; Vaccination-small pox; Dispense medicines as instructed; Distribute milk powder; Health and family planning education; Distribute condoms as well as oral contraceptives after using screening techniques; Demonstration of cooking techniques in preparing balanced diets for children; Sterilization of instruments and I.U.C.D.; Cleaning the place; Record keeping and report writing. Home visit Assisting clients to locate referred service and lining up clients in orderly fashion.

* This was the newly created category of Health Workers.

Table. 4.

Syllabus Adopted for the Training of the 104 Health Aids in 1967

Subject Contents	Total Time Devoted in Theoretical and Practical Teaching
a) Introduction to Nepal's MCH & FP Project with greater emphasis on its objectives at the service level unit: Centers b) General ethics and disciplines c) General and Personal Hygiene d) General Procedures and manners in eliciting the history from clients while filling the clinical cards. e) Book-keeping and report writing procedures f) General cleanliness of the premises	2 weeks
g) Introduction to the human body h) Anatomy and physiology of the Reproductive System i) How pregnancy occurs j) How to prevent pregnancy k) Contraceptives as the means to prevent unwanted pregnancy l) Detail introduction to vasectomy, I. U. C. D., condoms, and oral contraceptive pills m) How to screen clients for oral contraceptives by asking seven medical questions and how to prescribe the oral contraceptives. Details regarding the use and disposal of condoms	3 weeks
n) Introduction to a balanced diet o) Nutrition deficiency diseases, i. e. protein calorie malnutrition, Marasmus, and night blindness leading to xerophthalma p) Introduction to cooking techniques in preparing a balanced diet for children	1 week
q) Brief introduction to micro-organisms causing common communicable diseases i. e. cholera, typhoid, small pox, etc. r) The role of immunizations in preventing such diseases s) Vaccination techniques for small pox	1 week
t) Introduction to various common child diseases and to the common medicines used in the form of standard prescriptions u) Sterilization techniques, i. e. autoclaving, boiling, clinical methods	2 weeks
v) Routine procedures for home visiting w) Health and family planning education techniques x) First aid techniques	3 weeks
	12 weeks

Source: Nepal's MCH & FP Project—His Majesty's Government of Nepal

It was at this stage that the audience was made aware of the fact of the acute shortage of technical manpower which was the only constraint in providing the MCH & FP services to their community. Therefore, they were urged to locate eligible female candidates for the Health Aid Training Program organized by the government and thereby ensuring the return of these trainees to their own communities, to work in close collaboration with the hospitals doctors and other staff. The audience seemingly turned cool when told of the need for them to provide the female trainees. However, they appeared interested in discussing further details of the proposal, especially with regard to the possible career ladder of the female Health Aids.

At the end of the meeting, which lasted approximately two hours, it was made clear to the local leaders that it was up to them to obtain the MCH & FP services in their community. The meeting was adjourned requesting the audience to send as many eligible female applicants to the recruiting team by the next day. The direct communication had very positive results. The next day several female applicants appeared for the interview. This unexpected result was attributable in the first place to the direct and frank communication with the influential members of the community. An equally important factor in this was the role of the local women's organization. These leaders were led to believe that the difference between their cooperation or otherwise meant having or being deprived of the services that their community was in need of. This instilled a sense of partnership and involvement among these leaders and contributed to the success of this program.

A similar technique was applied in all other areas of recruitment, except in Kathmandu where the media of local newspapers brought sufficient number of applicants. The result of this approach in recruiting and training of the 104 Health Aids conducted in 1967 are presented in Table 5.

As seen in Table 5, the MCH & FP Project has been successful in recruiting the trainees from the various parts of the country as planned. The trainees from the Central Hills, Tarai, and Kathmandu areas made 40.4%, 39.4% and 20.2% which was consistent with the priorities established at the beginning of the program. It was most fascinating to note that 67.3% of the total trainees were females. This disproved the usual hypothesis that the nursing-like profession was not popular among the village girls. It has been emphasized that the success in getting 67.3% of the female trainees, especially from the rural areas of Nepal, was due to the Project's success in establishing frank communication with the leaders at the grass-root levels.

An important consideration in recruiting manpower at the intermediate level is the provision of a career ladder that they could move up to. Due to the scarcity of educated female population and also biased social attitude, the Project had made provision for female trainees, a career ladder as an added incentive. This was also a factor in the success of recruiting the Health Aid Trainees. As presented in Table 6, of the 70 female Health Aids

trained in 1967, 65.7% have been provided with the opportunity for further training in Nursing and Assistant Nurse Midwives Training Schools; 20 of these rewarded female Health Aids have already returned to the Project as full-fledged rural community-based Assistant Nurse Midwives.

Table 5
Female and Male Trainees recruited for Health Aid Training Program
conducted in 1967, by their geographical location

Geographical Location	A		B		C		% of TOTAL	Total
	Absolute No.	% of Total	Absolute No.	% of Total	Absolute No.	% of Total		
Recruited no. of Female Trainees	16	22.8	24	34.3	30	42.9	70	67.3
Recruited no. of Male Trainees	5	14.7	17	50	12	35.3	34	32.7
TOTAL	21	20.2	41	39.4	42	40.4	104	100

A - Kathmandu area (capital)

B - Flat Tarai on southern part of Nepal undergoing rapid settlement

C - The Central Hills between 610 to 2,740 meters in elevation

Although no definite career ladder was planned for the male Health Aids at that time, currently the MCH & FP Project is giving serious consideration to this issue, and as a result, 8 male Health Aids from this initial group of 34, have already been promoted to higher levels, such as Audio-visual and Training Aids. It is also being planned to send 20 eligible Health Aids every year to the Auxiliary Health Worker School in Kathmandu as a reward for their good performance.

STAGE 3

Effectiveness of the Measures Undertaken

The measures undertaken in extending the basic MCH & FP services to the rural communities of Nepal, can be called a success. In quantitative terms, the results have been presented in Table 7. The increased number of Centres, as well as the clients served before and after 1967-68, indicates the viability of the new approach. The advent of a new and locally recruited cadre of Health Aids has extended the Project to the remote parts of the

TABLE 6

Retrospective Career Status of the 104 Health Aids Recruited in 1967

Health Aids	No. sent to ANM & Nursing schools		No. promoted to higher technical positions after in-service training		No. still working as health aids		No. left jobs for various reasons		TOTAL
	Absolute No.	%	Absolute No.	%	Absolute No.	%	Absolute No.	%	
Female	46	65.7	None	None	14	20	10	14.3	70
Male	None	None	8	24	20	82.4	6	17.6	34

Source: Nepal's MCH & FP Project—His Majesty's Government of Nepal

Table 7.

Quantitative Growth of the MCH & FP Services Before & After The Application
of New Manpower Policies

Year	Cummu- lative	Cummu- lative	Cummu- lative	Cummu- lative	Cummu- lative	Cummu- lative	Cummu- lative	Total no. of New Child- ren seen	Total no. of New Ante- natal mothers	Total no. of New FP clients- seen
No. of Medical Doctors	No. of P.H.N	No. of A.H.W.	No. of A.N.M.	No. of H. Aids	No. of MCH & FP Centers	of age	seen			
1964-65	1	2	X	6	X	5	3,882	415	X	X
1965-66	1	7	X	5	X	8	8,746	1,460	X	X
1966-67	2	6	X	3	X	12	11,403	3,024	2,626	2,626
1967-68	3	6	X	3	99	27	21,625	3,498	5,132	5,132
1968-69	5	3	27	3	104	41	29,124	4,042	7,744	7,744
1969-70	11	5	49	17	124	60	38,898	5,989	29,760	29,760
1970-71	11	5	45	14	188	86**	45,668	6,119	37,633*	37,633*

Source : Nepal's MCH & FP Projects - His Majesty's Government of Nepal

- * This does not include the new clients served by the Family Planning Association, and the new clients served by commercial distribution of condoms.

** There are now 149 MCH & FP Centers (1971-72)

country. Equally important measure of the "experiment" is reflected in the more effective utilization of the scarce medical doctor's time as well as that of the Auxiliary Health Workers. All of which clearly demonstrated the feasibility of an immediate extension of the basic MCH & FP services to rural parts of Nepal as against postponing it indefinitely until the availability of adequate doctors and allied professionals.

Conclusion

Efforts made by the MCH & FP Project after 1967 leads us towards a solution to the fundamental problem of meeting ever-increasing needs of a developing society. One must view these conclusions with a degree of caution because the experience gained thus far is restricted to a smaller population. However, it is indisputable that under conditions of mass poverty and illiteracy, both intermediate technology and manpower is the best means of reaching the masses.

An earlier policy decision that Family Planning services would be combined with Maternal and Child Health services, gave a handsome pay-off by making such services both relevant and acceptable.

Lack of trained health manpower of all categories, made the task of expansion difficult which led to the creation of another basic category of health workers which contributed considerably to the success of the Project. The unique feature of the new manpower pyramid developed by the Project was its base composed of local recruits, i. e. Health Aids. The trainees were more than willing to return to their own communities and thereby extending the services immediately. This cadre of Health Aids not only met the present manpower shortage, but also formed a pool of experienced candidates for higher professional training.

This approach has enabled the Project to grow from 12 to 140 Centres in the past few years. Impressive as this result may appear, it falls far short of what the country needs to achieve the stated objective of the Family Planning Policy. Even assuming that each village panchayat* has one such basic manpower (Health Aids), the total number of Health Aids to be trained comes to a total of 3,812. The cost of manning this magnitude of Health Aids alone adds up to more than half a million dollars. (U. S.) annually.

While the Project has arrived at a workable solution in terms of the level of technical manpower, other financial aspects of this have yet to be worked out. It is conceivable that the government will find it difficult in accommodating all the requirements of the MCH & FP Project, especially in relation to other equally important demands placed upon it.

An aspect of further development of this Project, careful examination by the policy-makers, is to evolve a formula of cost-sharing between the government and communities in-

* Village Council with 3,000

expanding such services. A case can be made under which His Majesty's Government provides the cost of training, equipment, and other essential supplies, and the communities contribute local trainees, as well as the salaries and housing for them. Such an approach, besides providing a possible solution to the heavy costs, would also provide an opportunity in which the communities feel they have a say in the decision-making process and a share in their own development.

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