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# ROLE OF HOSPITALS IN AMBULATORY AND DOMICILIARY MEDICAL CARE

## Second Report of the Expert Committee on Organization of Medical Care

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WORLD HEALTH ORGANIZATION

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## EXPERT COMMITTEE ON ORGANIZATION OF MEDICAL CARE

Geneva, 16-21 March 1959

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## ROLE OF HOSPITALS IN AMBULATORY AND DOMICILIARY MEDICAL CARE

### Second Report \* of the Expert Committee on Organization of Medical Care

The Expert Committee on Organization of Medical Care met in Geneva from 16 to 21 March 1959.

Dr M. G. Candau, Director-General of the World Health Organization, opened the meeting, welcomed the members of the Committee and pointed out that in 1951 the Fourth World Health Assembly had recommended that studies be undertaken on the role of hospitals and domiciliary services in the promotion of health of the people.<sup>1</sup> He drew attention to the fact that the Expert Committee on Organization of Medical Care in its first report<sup>2</sup> had suggested the subject of ambulatory and domiciliary medical care for further studies by the Committee. In countries with a well-developed hospital system, a great number of hospital patients are aged people suffering from chronic diseases, and with this type of patient the individualization of care provided by domiciliary services added to the success of treatment. On the other hand, in countries where there is a shortage of hospital facilities, it would be unrealistic to base the organization and improvement of medical care services only on a rather expensive programme of hospital construction.

The terms of reference of the present Expert Committee were established as follows :

To discuss measures for the organization and co-ordination of comprehensive preventive and curative medical care services provided to the individual outside the hospital wards. For this purpose a redefinition of the expression medical care may be

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\* The Executive Board, at its twenty-fourth session, adopted the following resolution :  
The Executive Board

1. NOTES the second report of the Expert Committee on Organization of Medical Care (Role of hospitals in ambulatory and domiciliary medical care) ;
2. THANKS the members of the Committee for their work ; and
3. AUTHORIZES publication of the report.

(Resolution EB24.R4, *Off. Rec. Wld Hlth Org.*, 1959, 95)

<sup>1</sup> Resolution WHA4.20, *Off. Rec. Wld Hlth Org.*, 1951, 35, 24

<sup>2</sup> *Wld Hlth Org. techn. Rep. Ser.*, 1957, 122, 27, 28

advisable in order to adjust it to this more modern approach rather than the narrow formal definition of simple treatment of illness. From the organizational point of view, information on the relative participation of the institutions concerned, such as health centres, polyclinics, out-patient departments, industrial medical services, etc., with special consideration of the role that general practitioners should play in an organized programme of ambulatory and domiciliary medical care, would be of valuable assistance to many national health administrations which are dealing with the organization of such services.

Dr A. Engel was elected Chairman, Dr G. Almenara, Vice-Chairman and Dr D. N. Chakravarti, Rapporteur.

#### DEFINITION OF MEDICAL CARE

The Committee first discussed the definition of medical care in the light of a modern concept of patients' care and of the present scope of activities carried out by physicians and medical services when dealing with medical problems of the individual.

There was general agreement that public health and social medicine aim at the promotion and maintenance of the highest possible level of health of the community. Medical care, on the other hand, places the emphasis on the individual rather than the community, and its methods and procedures depend very much on the personal relationships between members of the medical and allied professions and the patient. It was suggested that medical care should concern itself only with the individual in need of care, in other words, with persons suffering from illness. After much discussion, the view prevailed that medical care should not only consist in the application of measures for the restoration of health to the sick through medical treatment and rehabilitation but should also include carrying out certain measures aimed at the promotion of health, the prevention of disease, and the discovery of asymptomatic illness. Thus health counselling, immunizations, and prophylactic health examinations when applied to the individual are all to be considered within its purview.

The relationships between the individual and the environment were also given careful consideration. It was agreed that the physician, in giving medical care to the individual, cannot ignore his physical, social and emotional environments which can have definite influences on his health and disease. Nevertheless, it was the consensus of opinion of the Committee that these environmental influences should be borne in mind in so far as they may affect health or cause disease, but the physician or the service responsible for providing medical care is not expected to act directly on these environmental conditions. The responsibility for this action remains with the public health (or sanitary) and social services. In this context, medical care should be understood in its wide conception

of preventive and curative services rendered to the individual by physicians and allied medical personnel.

It was, finally, agreed that the extent of these preventive and curative medical care services will depend on local conditions such as prevalence of disease, organization of services, and availability of qualified personnel, and will vary from one area to another.

As a result of all these considerations the Committee agreed on the following definition of medical care :

Medical care is a programme of services that should make available to the individual, and thereby to the community, all facilities of medical and allied sciences necessary to promote and maintain health of mind and body. This programme should take into account the physical, social and family environment, with a view to the prevention of disease, the restoration of health and the alleviation of disability. The extent of these services will vary according to local conditions.

## **SCOPE OF AMBULATORY AND DOMICILIARY MEDICAL CARE**

### **Preventive and curative medical care**

The Committee studied the various methods which hospitals can adopt for the application of the programme of social and preventive medicine. It was agreed that the hospital can participate to a very large extent in this programme but that, nevertheless, it cannot be responsible for the implementation of the whole of such a programme.

The various tasks in a preventive programme, as enumerated by the Expert Committee on Organization of Medical Care,<sup>1</sup> can be fulfilled by the general hospital in various ways according to local circumstances, but where both hospital and public health services have been satisfactorily developed it is desirable that there be close co-ordination and as much integration of services as possible.

In certain rural areas, hospitals and polyclinics may have to be responsible for practically the whole programme of preventive medicine. The inhabitants are drawn to the hospital in the first place because they are ill or have been the victims of accidents ; they become acquainted with the personnel and the methods employed in the establishment, and this provides the opportunity to facilitate preventive work, including health education.

Much has still to be done, however, before integration of curative and preventive medical services can be achieved in all countries and at all levels. In most countries preventive medicine activities have been developed

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<sup>1</sup> *Wld Hlth Org. techn. Rep. Ser.*, 1957, **122**, 12

by bodies independent of the hospitals. In some countries, for example, medical practitioners undertake most of the preventive vaccinations; they also establish pre-marital certificates and on this occasion carry out special medical examinations. In addition, voluntary organizations specialize in the prevention of disease, and in a number of countries preventive medicine centres (also called prophylactic dispensaries) have been set up for routine examinations for the detection of tuberculosis, cancer, venereal disease, etc. In others, the preventive medicine centres are created and run by public bodies, the State, or sometimes by large industrial undertakings.

Nevertheless, the Committee recognized that there is a general movement in favour of closer liaison between preventive medicine services and hospitals.

It is admitted that when social medicine is practised independently of the hospitals its methods are costly because of the necessity to provide special personnel and equipment. Preventive examinations have been extended to so many fields that it is necessary to provide teams of specialists working in close association so that all diseases of social importance may be detected during the course of a single examination. The Committee recognized that, due to lack of facilities and/or personnel, these preventive examinations may have to be limited to certain particularly exposed groups of the population or to certain specially prevalent diseases.

It is for these reasons that personal preventive services can be more easily developed when they can count upon the support of the hospital and make use of the latter's technical facilities (laboratories, radiological equipment and specialized personnel).

In some countries, after the organization of a certain number of independent preventive services, the attitude has completely changed so that now an effort is being made to obtain more and more complete integration with the hospitals. The Committee recognized, however, that there must be some limitation to the hospital's preventive activities. For example, the preventive examinations often demand a considerable number of laboratory analyses. If these analyses are carried out in the hospital's laboratory, and if this latter is not adequately equipped to meet these numerous demands, a bottle-neck is created which may even compromise the rational operation of the hospital itself.

The Committee emphasized the fact that some caution must be exercised in the extension of preventive medicine campaigns. The cases of disease detected must be treated. In many instances it has been necessary to slow down application of the case-finding programme because the hospital was unable to deal with the number of cases detected. This applies mainly in countries where hospital equipment is not yet adequate or where the social and economic conditions, and in particular the housing conditions, of the population do not permit the desired development of domiciliary care services. Another case in which the application of mass preventive examina-

tions is questionable is that of population groups with a very low prevalence of the disease under investigation. In such circumstances the cost of each case diagnosed may be so high that it is no longer worth while to continue the programme.

When the hospitals are more or less completely integrated with the preventive medicine services, the former can participate very largely, and in the best conditions, in the early case-finding services. All patients attending the hospital, whether for out-patient consultation or for treatment in the wards, can be examined—whatever their disease—and these systematic examinations can be extended to the persons accompanying them.

This preventive work can be done in a number of fields which the members of the Committee examined in turn. Uterine cancer can be detected in its early stages in the obstetrical and gynaecological services; the hospital out-patient departments can play an important role in the detection of chronic and degenerative diseases such as cardiovascular disorders and rheumatism; the search for syphilis is made systematically in blood donors and pregnant women, and it can be extended to all patients attending the hospital so that venereal disease case-finding will cover a very large proportion of the population. The hospital provides a very wide field also for mental health activities. For the past 15 years it has been recognized that psychological factors have an important influence on an increasing number of what are known as “ psychosomatic ” diseases. The hospital services will therefore be more and more in need of the advice of a team of psychiatric workers who, in turn, will find innumerable opportunities for detecting, helping and following up patients with psychological difficulties. The hospital can also help in the detection of diabetes, in the determination of blood groups, in the discovery of rickets in children, and of allergic conditions; in its specialized out-patient services unsuspected sight and hearing disorders can be revealed.

Systematic photo-fluoroscopy of all persons attending the hospitals is routine practice in some countries, and gives very good results.

Co-ordination of preventive and curative activities has many advantages from the economic point of view, and makes it possible to put qualified personnel to the best use. Moreover, it offers the possibility of a total medical service adapted to the needs of each individual. The organization of complete preventive and curative medical care guarantees that the needs of each individual will be met, whether these needs are psychological, physical, strictly personal or related to the community to which the individual belongs. Man, the individual element in society as a whole, is then considered as a unit to which total medical care is applied.

There must nevertheless be great flexibility in application, for although complete integration can be recommended at the rural level, it should be noted that in the large population centres the network of hospitals and of preventive and social medicine centres does not necessarily coincide.

The preventive health centres must, in fact, be decentralized so as to serve each local population group. The two networks often overlap to some extent. Any large hospital may find it useful to create a preventive medicine service and establish close liaison with the health centres outside its walls.

### *Health education*

The Committee studied the hospital's opportunities in the field of health education. It was agreed that during a stay in hospital all patients acquire some knowledge of illness and its prevention. This spontaneously-acquired knowledge can, however, be supplemented by advice given by the establishment's medical and nursing staff. It is recommended also that in out-patient departments the time in the waiting-room should be used to impart the elements of health education. The Committee, nevertheless, admitted the limitations of these methods since it is agreed that hospital physicians and nurses are so fully occupied that it is impossible for them to give sufficient time to the health education of patients. In some cases social workers have been trained to establish contacts between hospital services and patients. Utilization of voluntary personnel has not always given good results.

In view of the difficulties, it was unanimously agreed that health education can be more effectively imparted on the occasions when ambulatory or, better still, domiciliary care is provided. In the field of paediatrics, where hospitalization is becoming less and less popular and necessary, home care of children with the help of visiting nurses is found to be not only effective but also extremely valuable from the point of view of educating parents: it is in the family circle that health education becomes really effective, whether it be in urban districts where housing problems are often very acute, or in rural areas where bad housing conditions are further aggravated by environmental sanitation problems.

A domiciliary care service is sometimes considered of very little use at the outset, but after a certain period it begins to make itself felt and gradually becomes indispensable. It is therefore necessary to persist in efforts in this direction for a long time before any judgement can be passed on the system.

It should be emphasized that health education is an intimate and personal matter inherent to medical and nursing practice. The best results will be obtained through the close contacts which can be established by medical practitioners, nurses and social workers with patients in their family circles and homes.

Domiciliary care services organized by the hospitals can use this method for the benefit, for example, of paediatric, psychiatric and obstetrical patients. The results obtained are even better when small groups are formed in which each participant can choose, from among many possible

solutions, the one best suited to his own needs. Such groups provide some participants with real help in regard to the psychological attitude to be adopted towards a long-term invalidity or some addiction such as alcoholism.

### **Domiciliary care**

The Committee recognized the necessity for as much development as possible of domiciliary care services. Such services may vary considerably according to the particular conditions in each country or region. There are organizations which have for a long time provided home care for indigent patients. Such systems began to be used at the end of the 18th century but, in general, they had very little to do with the hospital organization. It is only recently that hospital administrations have begun to organize domiciliary care for certain categories of patient. The first experiments were with respect to patients suffering from chronic disease, whose financial position did not permit them to pay private practitioners' fees. Under this system, patients are visited at their homes by medical specialists, nurses, home-helps and social workers. The hospital administration settles all problems concerning transport in the event of an acute crisis, supply of medicaments, rehabilitation and physiotherapy equipment, and laboratory analyses. The system makes for the individualization of medical care, economizes in hospital beds, and costs less than hospital treatment. Many services of this type have been set up, but their scope varies considerably: the simplest merely provide social services for patients confined to their homes; others add nursing services; still others provide medical treatment.

The Committee recognized that there may be obstacles to the general development of domiciliary care services.

Domiciliary care is a rational solution only if treatment is simple or does not have to be applied at frequent intervals. Long-term and chronic maladies are, therefore, best served by such a service, although a number of examples of domiciliary care applied to acute cases, and particularly to children, were cited. It is obvious that housing conditions must allow for the patient to be relatively isolated; another prerequisite is that the family must also be able to give the necessary care, and the patient must not feel himself a burden or a cause of overwork.

The attitude of the medical practitioners may constitute an obstacle when there is no frank and effective collaboration between the family physician and the domiciliary care service. The Committee agreed that no service of this kind organized by a hospital can achieve maximum efficiency without close collaboration between the organization and the medical practitioners.

The problems of nursing output and shortage of nurses also hamper the development of domiciliary care. It cannot be denied that the time

taken in travelling from place to place, whether in towns or rural areas, could be devoted by nurses to their patients if these latter were gathered together in the hospital. There is, moreover, a general shortage of qualified nurses, and it is often impossible to free any of them from hospital wards for the purpose of going to patients' homes. For these reasons, hospitals which are experimenting in the organization of such a service have either entered into contracts with private nursing associations or constituted a special body of nurses for domiciliary work. In some countries an organized home-help service has also been set up to meet the needs of some families who can undertake the care of a patient provided that they are relieved of certain domestic duties.

Some affirm that the development of domiciliary care services may overburden the hospitals and the staff and thus jeopardize the traditional curative and preventive activities—and it is for this reason that some organizations hesitate to embark on this new venture. Co-operation with voluntary associations such as the Red Cross gives excellent results, and all possibilities of obtaining help should be explored.

Hospitals which may be contemplating a programme of domiciliary care should not be discouraged by the difficulties. In some countries social security bodies have been able to give the hospitals effective help in this field. For the patients whose condition does not necessarily demand that they be kept in a hospital department but who, nevertheless, being confined to bed, cannot get to an outpatient service, an organization comprising a central office for the reception of calls, a section for the keeping of the clinical records and the files, and the setting-up of teams of nurses, auxiliaries and home-helps, has rendered extremely valuable service.

Some countries have organized mobile teams in rural areas with scattered populations : these teams move from village to village giving skilled medical care not otherwise available. Any such service must maintain close and constant contact with the hospital specialists and laboratories. In the field of obstetrics, difficult deliveries should be directed to the competent hospital department. Chronic as well as acute cases can be cared for by such a service.

#### *Health problems of the aged*

The Committee agreed that health problems related to the aging of the population were serious in some countries. The ever-increasing proportion of old people and the rise in the average expectation of life inevitably entails an ever-advancing occupation of the hospital departments—since aged persons are particularly liable to long-term illness. The available documentation shows that the proportion of hospital beds occupied by old people suffering from chronic or long-term diseases is increasing to a point where it raises serious problems for public health administrations. Further-

more, in countries where certain old people are housed in special homes, an analysis of the situation has shown that an increasing proportion of the inmates of such homes are often suffering from unsuspected diseases which would justify serious medical treatment.

The Committee was unanimous in recommending that there should be no segregation of such patients in separate establishments: an effort should be made to care for them within the general hospitals by means of special provisions which do not come within the scope of this report. Nevertheless, it would still be preferable to set up an organization that would make it possible for most of them to be cared for in their homes. In some countries the hospitals can send medical and nursing staff, medicaments and even special diets to the homes of patients. Similarly, certain treatments can be given during the night after the closing of the hospital out-patient departments.

Finally it was pointed out that a service which would provide nurses, auxiliaries or home-helpers for aged people in their own homes would be very valuable indeed. This would enable such people to receive regular medical care; they would also be encouraged to attend clubs and gatherings, thus facilitating the task of public health personnel.

In all cases, domiciliary care must be adapted to the conditions in the various countries. Where there are sufficient physicians who can count upon a group of specialists, patients are treated in their homes on the responsibility of private practitioners who, of course, can hospitalize patients for a short period for some special diagnosis or in the acute phase of a disease. Where a hospital system is decentralized on a regional basis from the village to the large town there will be a whole series of health services of varying sizes, adapted to local needs. It is for the medical practitioners to make use of these different services in the interests of their patients.

The problem of nursing staff is a particularly disquieting one. In some countries, the number of qualified nurses far exceeds the number of those actually exercising the profession. The reason is that some nurses abandon their career for family or personal reasons, or engage in related activities. It is to be hoped that some of the inactive nurses may be attracted to a domiciliary care service which would provide them with part-time work and enable them simultaneously to attend to their homes or to any other occupation in which they may be engaged.

In conclusion, the Committee agreed that the system was one to be recommended as a worth-while aim, seeing that it would undoubtedly permit better utilization of hospitals, and very probably economize beds and running costs. The members nevertheless were unanimously of the opinion that domiciliary care cannot replace hospital care but that it should be considered as a valuable addition to the existing medical services provided for the use of the community.

It is only in countries where the health situation is a matter of serious concern and where economic conditions have not yet made it possible to establish a hospital system of sufficient capacity that a complete and extensive domiciliary care organization can provide a solution for the most urgent problems. One of the members of the Committee has developed a very complete system by virtue of which a very large population group could receive full medical care despite the clear inadequacy of the number of hospital beds. In such case, when housing conditions are obviously unsatisfactory and isolation of the patient in his home is impracticable, it would be advisable to build, as inexpensively as possible, infirmaries completely separate from the hospitals, but where patients not strictly in need of specialized hospital installations could be visited by doctors, nurses and auxiliaries specially attached to this service, which would establish constant relations between the patients, the main hospitals and health centres, both curative and preventive. In this case the existing hospitals—already overloaded with work—should not undertake this new activity, and domiciliary care should be undertaken independently.

On the other hand, it has been found that in certain countries having a national health service or a social insurance programme for medical care, and where the hospital system is well established, an organized service of domiciliary care is more effective when it is based on the hospital.

#### **After-care and medical rehabilitation**

The rising cost of hospital care and the relative shortage of hospital beds with respect to needs in most countries tend to force hospital authorities to keep the hospitalization of patients down to as short a period as is compatible with safe and sound medical practice. This is particularly true of the general hospitals which admit mostly acute cases of illness requiring elaborate diagnostic and skilled therapeutic procedures, and which are therefore very expensive to operate. Moreover, modern medical practice, inspired by the concept of active and early rehabilitation, tends also to shorten the period of rest in bed and hospitalization after the critical period is over and to accelerate ambulation. In all these cases the patient may be discharged from the hospital much earlier than used to be the case, but after discharge some form of post-hospital treatment and rehabilitation is necessary and should be given in order to ensure that complete recovery without any complications or relapse is attained.

In the case of many chronic illnesses and certain conditions which commonly result in some impairment of bodily function or disability, these patients reach a stage whence recovery to normality is slow, if it occurs at all, and they no longer need the intensive care provided by the general hospital. It is obvious that follow-up treatment and medical

rehabilitation is essential to patients discharged at this stage, and without it they could not be regarded as being well cared for.

The Committee noted that in some quarters the opinion still prevails that the hospital is responsible for the care of patients only so long as they remain within its walls, and that their follow-up care, if needed after discharge from the hospital, is the responsibility of some other agency, official or voluntary. The Committee felt, however, that the modern view—that the hospital or the physician in charge should as far as is practicable be responsible for the patient until he is fully recovered and medically rehabilitated—is to be recommended. The degree to which the hospital can be responsible for this function and to which it can be carried out would depend on local conditions, especially in regard to facilities and personnel.

After-care and medical rehabilitation may be given to the patient on discharge from the hospital when he is ambulatory or when he still needs domiciliary care. If he is ambulatory, such after-care and medical rehabilitation may best be undertaken in the out-patient department of the parent hospital in which the patient received treatment in the first instance, assuming that the hospital or its outpatient department has adequate medical rehabilitation facilities and personnel. This has the advantage of maintaining in the same hospital continuity of treatment and medical rehabilitation started before discharge, avoiding any serious interruption of care which might result if the patient is referred to some other institution. If, however, the facilities of the out-patient department for such follow-up treatment and medical rehabilitation are either not available or inadequate, separate arrangements may have to be made with a medical rehabilitation department of another hospital or polyclinic or an independent rehabilitation centre.

The Committee, however, urged that in view of the importance of starting rehabilitation early in order to be effective, even small hospitals, say of 100-bed size, should endeavour to provide a minimal staff and equipment for medical rehabilitation purposes. The Committee was of the opinion that although the medical aspects of rehabilitation are the chief concern of the medical institutions mentioned, it is extremely difficult to dissociate clearly the medical aspects from the other aspects of rehabilitation if the welfare of the patient as a whole is taken into account.

If the patient on discharge requires domiciliary care, this should accordingly be arranged as discussed earlier (see pages 9-10). Post-hospital care and rehabilitation may be given in other types of institution after the patient has been discharged from the general hospital and before he returns home. Examples of such institutions are the so-called "half-way houses", "night hostels" and "day-hospitals". They are designed to meet the special needs of patients who require, not so much the intensive care and treatment of a general hospital, but certain specific measures appropriate

to the disorder from which they are still suffering (for a more detailed discussion, see pages 23-25).

## HOSPITAL CARE AS COMPARED WITH AMBULATORY CARE

### Effective use of hospital beds

The Committee carefully examined the criteria for assessing hospital efficiency and output. Among these criteria, two warrant special attention, namely the *bed occupation rate* and the *length of stay*.

It was recognized that these two criteria vary considerably according to the conditions in each country and according to the particular establishment. It was recommended that a thorough study be made of hospital statistics so as to arrive at coherent results.

It has been found in a certain number of countries that there is a correlation between the bed occupation rate and the average length of stay, arising from certain administrative and financial rules. When the daily hospital cost is the only criterion adopted for their administrative control, then in areas where the number of hospital beds is amply sufficient the average length of stay may be slightly lengthened so as to increase the bed occupation rate. Such a practice goes against economic and general interest and should be changed.

The age of patients and the aging of the population were also recognized as a cause of an important increase in the average length of stay in hospital, since elderly patients remain longer than adolescents and adults. According to the documents submitted, it appears that persons over 74 years of age require more than six times as many hospital days as those between 17 and 44 years of age.

The function fulfilled by the hospital at the regional level, and its capacity, are also factors which can have a profound influence on the criteria under study. It has been shown mathematically, and confirmed by experience, that small establishments cannot have such a high occupation rate as larger ones.

As regards the length of stay, it has been found that during the last few years this value has tended to increase to a considerable extent, particularly in regard to chronic and long-term patients. However, this phenomenon can also be seen in medical and general surgical departments where it may be taken that the complexity of modern methods of diagnosis and treatment lead to an increase in the average length of stay.

In small rural hospitals the lengths of stay are shorter because the dispersion of the population and the scarcity of country doctors result in hospitalization of patients for minor complaints. Conditions are different, however, when such hospitals look after a high proportion of old people

and chronic cases, when the length of stay is sometimes higher than in large hospitals.

The social status of the patient also has an influence on the average length of stay. Although present-day hospitals no longer admit solely the indigent, and the hospital system in modern countries is open to all social classes, nevertheless the hospital is still found to exercise some selection and to draw its patients from a population group which, although certainly large, has poorer economic resources than the population as a whole. Statistical studies carried out on the clientele of the general medical departments in hospitals usually show that the proportion of patients whose social, family and economic conditions are precarious is higher than in the total population from which they come. Thus, hospitals attract a relatively large number of poorly-housed patients without a family, with no fixed occupation, or threatened by unemployment. It will be understood that under these conditions the average length of stay of these patients is higher because they endeavour to remain in hospital until they have completely recovered from their illness. For this group of patients, the organization of domiciliary medical care is particularly difficult.

The type of social legislation also plays a certain part. It is unanimously recognized that the application of a social security system increases the demand for medical and hospital care. This phenomenon should be considered as favourable, since it corresponds to a raising of the level of health of the population and so favours productivity and the general economy. Thus, the more or less completely gratuitous nature of hospital care plays a certain part in the average hospital occupation rate. In general, the nationalization of health services and the extension of social security to almost the whole population has produced, in countries enjoying this system, an increased demand for medical and hospital care.

The influence of technical equipment also plays an important part in the factors analysed above. Contemporary medicine calls for more and more extensive technical equipment for the diagnosis and treatment of disease. However, each technical service, whether surgical, biological or radiological, can carry out only a given number of acts of diagnosis or treatment, depending upon its staff and equipment. If the number of such acts renderable in a given time is lower than the demand, an excessive time interval inevitably arises between demand and response. This time-lag, which may reach several days in hospitals suffering from a lack of personnel and technical facilities, must be added to the average length of stay and increases the bed occupation rate.

There is a relationship between the status of the physician and the conditions under which the hospitals function. In countries where there is a private practice of medicine and where doctors are paid for each act of treatment or diagnosis there is a certain tendency on their part to treat patients at home, while when they are paid on a salaried or per capita

basis they more frequently recommend the hospitalization of their patients. The status of the hospital doctor probably plays an essential part. When he is attached to a hospital full-time, he can treat patients more often and reduce the delays necessary in diagnosis and treatment. However, full-time status does not reduce the length of stay in the case of doctors looking after patients suffering from long-term disease.

Finally there is an additional reason for variation in the length of stay in hospital, related to psychological factors. The attitude of the population to the hospital and the care given there depends on its prestige and on the average level of general education. In many countries where hospital facilities are very inadequate the reputation of the hospital is not good, for, in addition to the fact that living conditions there are mediocre, the mortality rate is found to be high because of the almost exclusive admission of serious cases. One point is worth special emphasis—namely, the hospitalization of children. In a certain number of countries the attitude of the mother is decisive to such a point that the hospitalization of a child is accepted only if his mother can accompany him, but this raises the problem of other children left at home and of the work done by the mother for the family business or farm. In such cases, domiciliary care is often preferable.

Analysis of the main factors modifying the bed occupation rate and average length of stay would seem to be of major importance since the total capacity of the hospital system depends on them. The number of factors affecting the criteria considered above is so large that it seems impossible to recommend a fixed value for the bed occupation rate and the length of stay. However, the nature of the situation and analysis of the factors governing it should make it possible to come near to the optimum conditions, which are :

(a) a high occupation rate, permitting, however, admission of urgent cases in periods of peak activity without detriment to the working conditions of the staff and without endangering the hygiene and comfort of the patient ;

(b) a length of stay reduced to a minimum but compatible with correct treatment of disease, everything possible being done adequately to diagnose disease in the out-patient services before admission and to round off hospital treatment by after-care at home, in a polyclinic, or in a convalescent and rehabilitation establishment.

#### **Social and psychological aspects**

The Committee reviewed all the reasons for treating certain patients by preference at home.

First, it should be stressed that in most countries the population no longer retains its former fear of the hospital, which with its out-patient departments, has in general become so popular that its services are accepted and even requested by the public. However, there still exist very marked

differences between various countries, arising on the one hand from the relative size of the hospital system and, on the other, from the distribution of the population. Thus, there are countries where almost all women are delivered in hospital and others, on the contrary, where the proportion of deliveries in the home is nearly 100%.

The growing reputation enjoyed by the hospital has facilitated the development of hospital-based ambulatory and domiciliary care services for certain groups of patients. Long-term patients and the aged can generally be better cared for at home when it is possible to organize a service in which the medical practitioner, the district nurse and possibly voluntary workers attached to philanthropic associations all participate.

A wide exchange of views took place regarding the number of consultations that might be expected in out-patient services according to the volume of the population covered. It was recognized that conditions vary considerably from one country to another. However, the Committee noted that the average number of medical consultations per inhabitant and per year varies between two and four, not including preventive examinations. In countries where preventive medical campaigns have spread widely and cover the population as a whole, as well as in areas where living conditions favour the spread of social diseases, the number of medical consultations necessary may increase to a considerable extent and even reach a figure of about 10 per inhabitant per year.

#### **The results of ambulatory and domiciliary treatment**

The Committee reviewed a number of local experiments in the ambulatory and domiciliary treatment of certain diseases. In the field of *infectious disease*, a very rapid development can be observed in regard to the effectiveness of antibiotic treatment, and thus the need for hospitalization has decreased.

Results of recent experimental studies in the therapy of *pulmonary tuberculosis* are of such a nature that they may imply a substantial modification of the organization of care for this disease. However, the Committee stressed the need for caution in proceeding with revolutionary changes in the treatment of tuberculosis patients. It was emphasized that the number of patients with active tuberculosis has hardly decreased despite the fall in mortality and the drop in the number of new cases, and that the smaller number of consultations to organizations well equipped for the cure of pulmonary tuberculosis is partly due to the fact that in many cases doctors undertake domiciliary treatment. This state of affairs has very serious drawbacks when relations with the dispensaries and specialists are no longer continuously maintained. Domiciliary care can certainly be of very great service, but medical practitioners in charge of these cases should undergo special training.

Patients suffering from *psychoneuroses* similarly would benefit by a domiciliary care service, since the hospital environment may aggravate such disorders.

In the field of *paediatrics*, good results have also been obtained by bringing the necessary medical advice and nursing care to the patient's home.

The Committee recognized the possibility of employing domiciliary care in a certain number of other diseases, particularly infectious hepatitis and diabetes. Patients suffering from *infectious hepatitis* should, in principle, be admitted to hospital for purposes of diagnosis but can be sent home after a very short time, provided that they are ensured treatment organized with the hospital as a base. In the field of *diabetes*, the establishment of "patients' clubs" has enabled patients to discuss with one another their diets and ways of assessing the trend of their disease. A considerable decrease in complications peculiar to diabetes has been recorded among patients receiving regular dietetic advice and education, and suitable treatment.

Similarly, it seems possible to allow certain *patients who have undergone surgical operations* to return home provided that they can follow rehabilitation treatment and that the social service looks after them.

In the same way, children and adolescents suffering from *rheumatic fever* can also be suitably treated at home, subject to follow-up surveillance for as long as is necessary by the hospital specialists.

## ORGANIZATION AND ADMINISTRATION

### Role of participating services

The Committee agreed that the main functions to be carried out by out-patient services should be as follows :

(a) Early diagnosis, using the best possible modern medical techniques, including prophylactic examinations for the detection of undiagnosed diseases.

(b) The ambulatory and domiciliary treatment of all cases which can be treated at the clinic or at home.

(c) The admission, or referral for admission, to the hospital of those patients who need it. A good practice should be that first admissions to the hospital should go through the out-patient services unless otherwise adequately examined and diagnosed.

(d) After-care and medical rehabilitation when necessary after discharge from the hospital.

(e) The promotion of health of the individuals under their care by means of health education.

(f) The use of out-patient facilities for the training of medical and nursing students.

(g) The keeping of records and collection of data for epidemiological and social research and for periodic assessment of medical work.

The Committee agreed that in carrying out these functions continuity of care is of the utmost importance, in the sense that there should be an easy transition of the patient from ambulatory and domiciliary care to hospital care and back to his original physician. According to administrative patterns, some agency, institution or individual will be responsible for the medical care of a given population, and what is most important is that whoever is responsible should not lose sight of the fact that medical services are dealing with people, and are often administering public or voluntary funds. Every effort should therefore be made to co-ordinate services so as to avoid overlapping, to refer patients to the place where they can best be cared for, and to pay special attention to the emotional factors which will have a definite influence on the success of the medical treatment.

Different patterns of medical care services are being tried out in various countries, and it was the opinion of the Committee that no one single pattern has yet been sufficiently explored to merit universal application. In this report some general principles are suggested, but the Committee is well aware that their application should be subject to adjustment to local conditions.

#### *Dispensaries*

The Committee studied the participation of dispensaries in a medical care programme for a given community, and recognized two different kinds of dispensary.

The traditional pattern of the dispensary has been, and still is in some countries, that of an out-patient clinic offering the services of a general practitioner for ambulatory consultation with the assistance of a pharmacist or "dispenser" to provide elementary and standard medicines according to the physician's prescription. Some simple records are usually kept, but in some instances, because of considerable overcrowding, there is not even an attempt to identify the patient. This type of dispensary has been of great help in the provision of basic medical care services to large populations in countries where more developed services are not yet available. Voluntary and philanthropic organizations have made extensive use of dispensaries, and in some countries they are being transferred to local health authorities.

The other type of dispensary is the so-called "prophylactic dispensary" which is a mostly preventive institution serving as the basis for a mass campaign against one particular disease. Anti-venereal dispensaries were

quite well known in the past, and until recent years anti-tuberculosis dispensaries have served a very useful purpose in developing BCG vaccination and tuberculosis campaigns in different countries of the world. Dispensaries for the control of cardiovascular diseases and for cancer have been coming into being during the past few years, as a result of the shift of importance of morbidity and mortality in these fields in many communities, following the control and eventual eradication of certain communicable diseases. These dispensaries are usually fully equipped to prevent, diagnose and treat the disease or group of diseases for which they are intended. In some countries these institutions are the centre for special mass campaigns and, with the participation of satellite centres and mobile units, they have reached the stage of real institutes for the control of special diseases.

#### *Polyclinics and out-patient departments*

The polyclinic is a more developed institution for the provision of general medical care services as well as specialist services on an ambulatory basis. The Committee agreed on the concept that the same kind of services as are offered to in-patients by the regional general hospital should likewise be offered to out-patients of a given community by the polyclinic. According to the definition agreed upon by the Committee, the services provided by the polyclinic should be of both a preventive and a curative character.

The Committee took note of the fact that social insurance institutions in a number of countries have used the polyclinic as the main centre to provide for the ambulatory medical treatment of their beneficiaries. Conditions of work in these circumstances have a special character, in that the polyclinic does not cater only for the medical needs of its clientele; social and economic protection of the patient and his family becomes an extremely important aspect of its activities. Public relations with the society and human relations with the patients have therefore to be developed to a greater extent. It was stressed that when these polyclinics are entirely independent of, and lacking technical and administrative links with, a hospital, they tend to become too expensive since they must have their own general and technical services and, which is more important from the medical point of view, there is no continuity of care. One result of this is that technical personnel as well as patients may have a feeling of frustration because they lose contact with one another. For these reasons the Committee felt that it was a better arrangement for polyclinics to be always closely linked with, if not physically attached to, a general hospital. When the polyclinic shares the same building with a general hospital, it becomes what in many countries has been called the out-patient department of the general hospital. The polyclinic offers ideal conditions for the teamwork of physicians, and when it is closely related to a general hospital

they can benefit from the advice of highly-qualified specialists belonging to the hospital team.

### *Health centres*

The Committee recognized the definition of a health centre given by the Expert Committee on Public-Health Administration in its second report as "a place in which the appropriate basic services [are] rendered"<sup>1</sup> and since the same Expert Committee accepted that among the basic health services to be given to the community, medical care is one of fundamental importance, it was accepted that health centres should be considered as a part of the medical care system for ambulatory patients in so far as they are engaged in medical care activities. It was also noted that there is great variation in the concept of health centres in different countries, and, while in some areas the health centre is a purely preventive institution, in others the main emphasis is on medical care. In this latter case, the health centres correspond more or less to what elsewhere has been called "group medical practice". A trend is nevertheless evident towards the establishment of health centres for both preventive and curative medicine, especially for such centres situated in rural areas. Though the emphasis of these health centres is on the preventive aspects of medicine, they are slowly but steadily taking on medical care activities. In some cases also co-ordination has been developed between the health centre and the hospital, medical practitioners and other medical care services. The activities of health centres in a given area and their co-ordination with other medical services have served the purpose of introducing a preventive element into medical practice. Their contribution to a programme of ambulatory medical care is not negligible and many amount to a great proportion of the total programme in countries of a predominantly agricultural character.

### *Medical practitioners*

It was stressed that the medical practitioner is the person most closely connected with the family economic, social and emotional problems of the patient, and that he is a unit necessary in any medical system. In some countries the medical practitioner in his private office works in isolation, although sometimes several practitioners combine to form a group medical practice and share a common building, either of their own or set up by the health authority (in some places these medical buildings are called health centres). In countries where medical services are organized by the State and offered free of charge to the whole or a part of the population, practitioners work in hospitals and polyclinics as salaried employees.

<sup>1</sup> *Wld Hlth Org. techn. Rep. Ser.*, 1954, 83, 4

The Committee noted that medical practitioners, especially when they work in isolated rural areas, tend to become more and more separated from the modern development of medical science. This undesirable situation may be corrected to a certain extent by the establishment of permanent technical links between the medical practitioner and the hospitals, and also by the organization of refresher courses. These relations between doctors in private practice and hospitals are better developed when there is some sort of organization of the medical work. By the same token group medical practice offers more comprehensive preventive and curative medical care to the beneficiaries, allows participating physicians to share expensive medical equipment, and at the same time offers the possibility of co-ordination with local hospitals to which patients are referred back and forth with a summary of their medical records and laboratory or other tests.

#### *Industrial medical services*

It was generally accepted that industrial medical services can play a very important part in a programme of medical care for the population. Such services were expected to protect the health of the workers who represent the productive sector of the population, and are usually organized to meet the requirements of labour legislation as regards protection against occupational hazards. These requirements are usually confined to the prevention of occupational injuries and diseases, and this preventive approach should be the main characteristic of industrial medical services. Nevertheless, these services very often embark on programmes of medical care for workers and sometimes also cover their families. Regardless of whether such services are financed by the employer, by the trade unions, by social security institutions, by governments or others, the fact is that they represent a very important element in the provision of medical care and cannot be ignored when a programme of medical care for the whole community is organized. On the contrary, they should be given their own responsibility and the important place they deserve in the framework of the whole organization. Co-ordination of these services with local hospitals and local health centres is of the utmost importance in order to avoid duplication and overlapping, and to take the best advantage of the medical resources available.

Where medical care services for the general population are not readily available, either because medical facilities and personnel are insufficiently developed or because of geographical isolation (e.g., on oil-fields and mining camps), industrial medical services may have to extend their activities into a broader preventive and curative medical care service to the whole population. The Committee took note of the situation prevailing in different countries regarding the organization of industrial medical services, and stressed that great difficulties arise from lack of their co-ordination

with other medical services, and because of the participation of several different authorities in their administration and supervision. A new trend has developed in recent years to entrust industrial medical services to the local hospital and local health authority, and in this case a polyclinic, an epidemiological station and even a small hospital may be organized within the factory premises under the technical supervision of the health authorities for the district concerned. It was stated that such a pattern of organization might be implemented only when the services are directly dependent from the Ministry of Health, when there is a guarantee of full employment, and when services are available to the family.

It was also mentioned that in different countries trade unions have organized medical care services for members and sometimes also for their families.

#### *Medical rehabilitation centres*

The Committee noted that the subject of medical rehabilitation had been discussed at length by the Expert Committee on Medical Rehabilitation in 1958, and also noted that in the report of that Committee<sup>1</sup> a number of different kinds of medical rehabilitation organization were enumerated. The Committee agreed that in this context the general post-hospital medical rehabilitation centres are of the greatest use to ambulatory patients who either have left the hospital for follow-up and after-care, or have been referred to the centres by out-patient departments, polyclinics or medical practitioners. These centres have the advantage of being fully equipped and staffed with trained medical personnel, including physical, occupational and other therapists. Moreover, such centres can give a more intensified rehabilitation regime to the patient wherever necessary.

The Committee stressed the importance of medical rehabilitation centres in a comprehensive scheme of after-care and medical rehabilitation since by their judicious use the period of convalescence and the time taken to return to work or home can be greatly shortened. The Committee recognized that such medical rehabilitation centres are still scarce in many parts of the world, and recommended that for reasons of economy health authorities should endeavour to establish them gradually, firstly on a regional basis, and in a co-ordinated manner. The importance of training the necessary technical personnel before establishing such centres need hardly be emphasized.

#### *Intermediate institutions*

Under this heading are included various kinds of organization for institutional care, such as convalescent homes, "half-way houses", day-hospitals, night hostels, etc.

<sup>1</sup> *Wld Hlth Org. techn. Rep. Ser.*, 1958, **158**, 24

The Committee agreed with the opinion that for acute conditions patients should stay the briefest time possible within the hospital. For those patients who need convalescent care but who cannot go back to their home and their family environment, it is necessary to provide for different kinds of institutions for their continuous care. In many countries a wide range of homes and hostels has been developed for this purpose; they could be grouped under two categories: first, in accordance with the living conditions of the patient—(a) patients who can neither return to their homes nor immediately resume work; (b) patients who cannot resume work but who can go home for the night; (c) patients who can resume work but whose normal environment and physical or psychological conditions are such as to impede recovery; second, in accordance with the disease from which they are suffering—among the cases which may commonly benefit from such institutional care are victims of casualties, mental disorders, tuberculosis patients, psychosomatic disorders, alcoholics, etc.

*Convalescent homes, "half-way houses", rest homes, "sanatoria"*

These are specially designed for caring for patients who must receive medical care but who do not need such facilities as are provided by the hospital.

Some of these homes specialize in caring for persons with locomotor disorders, or for those who have undergone amputation, or for patients who are stricken with paralysis. For the care of these patients medical rehabilitation facilities, including the necessary aids and appliances, should be provided in such establishments.

In some countries the stress has been put on rest homes located in health resorts in which a wide range of patients are received during holidays. These institutions also admit patients suffering from cardiovascular diseases, digestive disorders and ailments of bones and joints.

In many of these convalescent homes it is essential to provide vocational guidance and rehabilitation services, either independently or through liaison with vocational rehabilitation centres.

*Day-hospitals*

Day-hospitals are establishments in which patients can receive attention during the day and return to their home and family for the evening meal and the night. Thus the day-hospital must be located in the town in order to shorten the travelling distance for patients.

Many types of patient can benefit from this kind of institution. First, mental patients whose condition is sufficiently satisfactory to enable them to leave the psychiatric hospital, but who in the absence of a suitable family atmosphere need constant care; second, temporarily-disabled persons who must undergo rehabilitation treatment and occupational

therapy; third, patients, especially children, suffering from nutritional disorders who must follow strictly-regulated dietary regimes.

#### *Night hostels*

Night hostels are hostels for workers who are able to work but who have difficulties in adapting themselves to their family environment or to their lodgings. Most of these hostels are for workers who suffer from slight mental and neurotic disorders. They stay there for some weeks, receiving attention after working hours from rehabilitation personnel and psychologists.

Night hostels have also been tried in order to help tuberculosis and leprosy patients but some psychological difficulties exist which prevent their full usefulness. Good results have been obtained for alcoholics and patients suffering from asthma.

It is apparent from the above brief account that some or all of these establishments may be necessary in a comprehensive scheme of ambulatory medical care. In some countries a network of such institutions has been organized on a national basis, while in others selected types have been tried. The Committee recognized that these institutions can perform either preventive or restorative functions for convalescent patients or individuals with sub-clinical disorders or early manifestations of disease. Their usefulness in relieving shortage of general hospital beds is undoubted. The Committee was of the opinion that in countries where such shortage is serious more trials of these intermediate types of institution might be considered worthwhile by public authorities administering medical care services.

#### **Co-ordination of services**

##### *Unified medical records*

Many countries have reliable mortality statistics at their disposal. Morbidity statistics, on the other hand, are so variable in quality and so heterogeneous in make-up that it is impossible to use them as a reliable guide in planning health services for a population.

Various efforts have been made to obtain more accurate information on morbidity among large population groups, but the surveys carried out have been rather expensive, and comparison between the various results was found to be difficult. A most important step would be to unify medical records by adopting at the outset a simple scheme, so that the information obtained by this means could be used as a basis for the continuity of care and co-ordination of the different services concerned. In addition, these records would provide a reliable basis for epidemiological studies.

Hospital out-patient departments seem to be particularly well placed in this respect, and it would be desirable if medical record forms, easy to fill in and relatively complete but simple, could be designed for use by various medical care services, in particular those engaged in out-patient services. Such documents would be particularly useful when patients change their address and thus come within the area served by another institution. In this case, a summary of the medical record file would be sent to the new service so as to avoid repetition of examinations and provide complete and accurate information for the new physician in charge of the patient.

The Committee agreed that such a scheme would be of great interest but that the difficulties inherent in its implementation must be borne in mind. Nevertheless, the Committee agreed that it is good medical practice to refer patients together with all the necessary information, and therefore recommended that such a scheme be tried whenever possible.

#### *Use of hospital facilities in rural areas*

The Committee recognized that medical practitioners in rural areas have difficulty in applying modern methods of diagnosis and treatment in view of the inadequacy of the technical equipment at their disposal. As a rule, it is impossible to carry out radiological and biological examinations at the local level, and this means delays and travelling expenses which discourage the use of such methods. In addition, qualified nurses can very rarely set up in private practice in villages, so that the physician has no competent person to help him with the care of patients in their homes.

In general, it was admitted that the installation of rural hospitals with modest but efficient technical equipment is very helpful to country doctors and encourages capable physicians to work in rural areas. If this objective is to be achieved, however, physicians and midwives must have free access to the rural hospital and be able to use the radiological and diagnostic equipment for the benefit of their clients. These provisions apply, of course, only to relatively-prosperous areas with sufficient inhabitants to justify the installation of a hospital and health centre with a capacity of from 10 to 30 beds and adequate technical equipment in a village in the middle of an area with between 10 000 and 15 000 inhabitants and several practising physicians and midwives. Patients and their family doctors could be given free access to the hospital and to its diagnostic and treatment facilities in accordance with agreements established to meet each particular case but which, in principle, would not present great difficulties.

In countries where physicians are few, they are as a rule employed by the health authorities and, therefore, participate directly in the activities of the local hospitals.

Finally, the rural hospital can be visited by specialists coming from a larger hospital, either on request or periodically, for the purpose of consultations and assistance in performing minor operations. Some countries have become aware of the value of such arrangements, and propose to introduce legislation which will be sufficiently flexible to permit utilization of public technical facilities by all practitioners in their respective areas.

It is nevertheless advisable to keep the activities of the rural hospital at a level compatible with its equipment, and with the absence or presence of specialists—for example, in anaesthesia. Extreme caution must be exercised in the matter of attributing major surgical functions to such hospitals.

In countries where transport facilities have been greatly improved and where communications are good, a regional type of organization can be envisaged, which determines the optimum location for and capacity of each establishment. In these countries it is often found that a competent commission has been set up to advise on the relative importance of the various elements; as a rule, it comprises representatives of the medical practitioners and of the local authorities.

Voluntary and professional organizations may also exert an influence, in providing support, grants or special facilities for hospitals adopting their advice. There are, for example, private organizations which provide laboratory services in certain rural hospitals designated for the purpose. Any such system must include facilities for easy and rapid transport to the large hospitals since these alone can be provided with the necessary equipment for difficult cases.

The solution of these problems is much easier when the hospital system is the direct responsibility of the State.

The distribution and equipment of rural hospitals will, of course, vary according to geographical conditions, and the responsible bodies, whether they be private or public, must take all relevant factors into account. Among these factors the natural tendency of doctors to move into more important centres cannot be over-emphasized.

#### *Co-ordination of work in large urban areas*

The Committee recognized that the co-ordination of medical care services in large urban areas should be improved. Many examples of duplication and lack of collaboration between comparable institutions were stressed. Countries where hospital facilities include, on the one hand, public establishments and, on the other, private institutions, usually encounter difficulties arising from the competition between such institutions. It may even happen that different hospitals belonging to the same organization request and obtain very specialized and costly installations which it

was pointless to duplicate. In a certain number of cases, suburban hospitals wish to have installations comparable to those of university hospitals. Additional hospital construction should take place in accordance with a well-ordered plan bearing in mind population served, available funds and adequate staffing. It has also been found that in one and the same urban area and at one and the same time certain hospitals are overcrowded while others have a large number of empty beds. In such cases, a central service for the distribution of patients would be of great help.

In the field of emergency care also, co-ordination would be very desirable since steps should be taken to prevent each establishment installing and maintaining a service which may not be really worth while because of the multiplicity of installations serving the same purpose.

This co-ordination varies greatly according to the country. Even in countries able to impose complete co-ordination there still remain problems arising from the continuous evolution of medical techniques and the expanding nature of populated areas. For example, in one large town where all emergency cases were centralized in a single establishment, it became apparent that it was necessary to set up secondary centres so as to avoid unduly long transport, which is dangerous in the most serious cases.

In certain countries the legislation permits, in theory, the co-ordination of medical care activities, but practice shows that when these institutions vary greatly in administrative character—some being attached to the university, others belonging to the local authorities, and still others run by philanthropic associations or private communities—the application of the law is extremely difficult. However, it has often been possible to organize a committee comprising those mainly concerned, who can formulate recommendations regarding the co-ordination of the establishments and the standardization of their equipment. In other countries, co-ordination is ensured at the technical level by private professional bodies and at the financial level by the central government, even in the case of voluntary medical services. Under these conditions the medical associations and private hospital associations lay down standards of equipment with which establishments of all kinds must comply. The government uses the decisions of these co-ordinating bodies as a basis in granting subsidies to hospital administrations which have complied with these standards.

The Committee paid special attention to the problem of *new centres of population*. Many towns all over the world are spreading rapidly, and large cities are becoming so big that a plan of organization must be established so as to avoid certain errors which would endanger the living conditions of the population. Until recent years, the growth of large cities was almost uncontrolled by the authorities, and new dwellings were constructed at random as ground became available, either privately or with the financial assistance of the State. Consequently, health and hospital problems were

usually neglected and the inhabitants of these new districts are without the curative and preventive installations necessary for maintaining their health.

The authorities in certain countries have concerned themselves with these problems and have realized the necessity of providing the new towns and suburban districts under construction with an organized structure, including in particular a complete framework of medico-social care. It is extremely important for the inhabitants of these new built-up areas to have medical services of all kinds, and stress should be laid on the provision of ambulatory and domiciliary medical care as soon as such new districts become populated.

The solutions adopted as regards town planning vary according to the particular case. Certain countries tend towards the construction of entirely new towns, the plans for which are drawn up in advance in full detail. Other large cities envisage the construction of groups of habitations which for many activities remain connected with the centre of the city but which should nevertheless have an internal structure, including in particular adequate medical facilities.

It is advisable to carry out these plans in different stages. Of course, provision should be made from the outset for the siting of health institutions of every kind, including hospitals, health centres, out-patient clinics and polyclinics, and their construction should be undertaken at the same time as that of housing accommodation. However, it must be borne in mind that the completion of the largest installations, such as the hospitals, may take several years, during which the population will begin to install itself in the dwellings already completed. In this case, simple but effective solutions should be adopted and medical installations, such as polyclinics, health centres, etc., should be installed in temporary buildings, should be put at the disposal of those first to arrive. As regards the hospitalization of serious cases, existing hospitals can be used for some time if the means of communication are adequate.

The possibility was also mentioned of providing in these new built-up areas a few rooms for the sick in the first housing accommodation to be built; in this way small-capacity infirmaries would be set up.

The Committee recognized the advantages for the public health administrations of very close collaboration with the authorities responsible for the construction of such new towns and districts. This should include a complete exchange of views covering living conditions, needs as regards medical care, and the health status of the population settling in the new district. Similarly, when the town-planning project is established, the most suitable sites for the various constituents of the health network, the surface area required, the staff necessary, the capacity in beds and the different functions should all be clearly defined, as well as the distribution of financial resources. This enables each administration concerned to allocate in its

annual budget the sums necessary for the simultaneous construction of new dwellings and of the corresponding medico-social facilities.

#### *Central administration*

The members of the Committee recognized that disparities in hospital distribution and in the quality of health facilities are seen in all countries. For varying reasons, depending on the dynamism or deficiencies of local administrations and private bodies, the state of communications and economic conditions, the number of hospital beds varies considerably from one area to another. The same applies to the out-patient departments. Frequently, moreover, those areas which do not enjoy the best health facilities are precisely the ones which experience the greatest economic and financial difficulties in improving them, and it is not uncommon to find that differences in facilities between two areas tend to increase.

The Committee recognized that it was the responsibility of a central authority to take the measures required to distribute resources and to promote activities tending to smooth out these differences, by giving them financial and technical assistance. This central administration may be called Ministry of Health, National Health Service, Health Directorate, State or Provincial Health Department, etc., according to traditions and patterns in different countries. The expression is used in this report to indicate the authority with planning, co-ordinating and supervisory powers over the health services of a large area. The establishment of a suitably distributed health network presupposes a legislation which gives the central administration the power to act. Such action may take various forms. The construction or installation of medical care institutions may be undertaken directly and completely by the central administration, or merely be given financial aid.

In certain countries, the central government subsidizes private hospitals, with a view to strengthening and expanding their activities. The improvement of technical standards is planned and approved by special commissions. In addition, legislation gives financial support for a sound development of hospital construction.

The central administration might also endeavour to lay down the basis for a uniform system of accounting in all establishments with the aim of facilitating comparisons of the cost of services. The training of hospital administrators could also come within the province of the central authorities. The hospital plan based on regionalization of services should also be the responsibility of the central administration, which can obtain advice from institutions of varying kinds, according to the economic and political structure of each country. Similarly, the laying-down of architectural rules and standards would be found useful in facilitating the construction of new establishments and decreasing costs.

Finally, the central authority should establish its plan and decide on its actions in co-ordination with other national administrations in regard to all problems concerning the distribution of the population, the distribution of industries over the territory, the quality of communications, and the availability of building materials and technical equipment.

The Committee recognized that these co-ordination and planning problems, whether at the national level or in connexion with the construction of new districts or built-up areas, call for the most careful consideration.

### SUMMARY

The Committee began by giving a definition of medical care which put the emphasis on the individual and accepted a broad concept of preventive and curative medical care services.

The scope of such services is here considered to cover ambulatory care in outpatient services, domiciliary care, after-care and medical rehabilitation. Since medical care embraces personal preventive services, it was recognized that prophylactic examinations for the detection of undiagnosed diseases, health education and immunizations, when provided to an individual as part of a medical consultation, would fall into the field of medical care.

Great emphasis was laid upon the importance of continuity of care in the sense that there should be an easy transition from ambulatory and domiciliary care to hospital care and back to the physician originally responsible for the case.

Domiciliary services were accepted as a useful supplement to hospital care. Such services should be hospital-based when a wide hospital system is available. In certain circumstances, nevertheless, the domiciliary services will be the first step or the spearhead of a medical care organization, and in such cases they are organized as an independent service.

After-care and medical rehabilitation services must be a necessary continuation of hospital or domiciliary services, which, if well organized, will facilitate an earlier discharge and will provide for the continuity of care as well as for liaison with other educational and social services.

The Committee studied thoroughly the efficiency of hospital care as compared with ambulatory care in terms of length of stay, daily occupation rate, social and psychological aspects of hospital treatment, and medical results of ambulatory and domiciliary treatment. It was recognized that ambulatory and domiciliary care can be recommended as it compares satisfactorily with hospital care, and in certain circumstances and for certain diseases is even preferable.

Health education, domiciliary care for the aged, and the organization of medical services for new industrial towns were considered to be the major problems and were given particular attention.

The role of participating services came under review. Dispensaries, polyclinics, out-patient departments, health centres, medical practitioners, industrial medical services, medical rehabilitation centres and intermediate institutions such as "half-way houses", day-hospitals, etc., were recognized as the main elements that would contribute to a comprehensive programme of ambulatory and domiciliary medical care for a given population.

Co-ordination of such services was especially recommended at all levels of administration, to avoid overlapping and duplication and the consequent waste of time and effort. Some sort of central administration with planning, co-ordinating and supervisory powers was considered desirable.