

PRIORITIES IN MEDICINE

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By W. O. Phoon

May I first express my deep appreciation for the great honour accorded me today—to deliver the Singapore Medical Association lecture for 1972, although I must confess I feel somewhat like the philosopher Socrates must have felt before he took the poisoned cup.

The title of my lecture this evening is "Priorities of Medicine". Before I launch forth into the subject proper, I would like to state that while I gratefully acknowledge the advice and assistance of many of my friends and colleagues—both medical and lay—in the preparation of this talk, that the views expressed are entirely my own. If they do not tally with the views of many of my distinguished colleagues here assembled—I can only plead that—like everyone else—I am to some extent a prisoner of my own experiences and environment—and can express only my own views on various matters. I shall try to be as detached as possible from the various issues I shall raise, but I may not fully succeed. While preparing for my talk, it has crossed my mind that the right sort of speaker for the subject "Priorities in Medicine" may not be a medical specialist in any particular field or a general practitioner—as both may tend to emphasize only their own particular areas of interest—but perhaps should be a layman (who should know what his medical needs are) or better still—a Martian (who would take a more detached view of things)!

Recently, a consultant in a certain discipline came from overseas. At the end of his visit, he expressed the usual courtesies about the high standards of medicine in Singapore—and follow them up with the equally usual "but". His "but" was that there was an hiatus in the scheme of medical care in our country. I replied that there was not only one but probably several hiatuses.

He, however, brushed my retort majestically aside with the answer, "But I happen to be particularly interested in this one hiatus." I quote this little story because the whole field of Medicine encompasses so many different facets that I am bound to leave many gaps or hiatuses in the treatment of my subject. All I can hope to achieve is to point out certain things which, to my mind, require urgent thinking or re-thinking about.

With your leave, for ease of discussion I propose to divide my talk into two main parts—firstly, priorities in medical care and secondly, priorities for the medical profession.

In the priorities of medical care, there can be various guidelines to follow.

More Emphasis on Care of Young Required

First of all, we can assign priorities according to the demographic composition of the population. In Singapore, we have a young population. More than half of the population are under the age of 21 years¹. It is therefore important that we should lay sufficient emphasis on the provisions of adequate medical services for the young, who form so large a segment of our population. As a nation, it is worthwhile investment for Singapore to start thinking seriously of such provisions as Well Child Clinics and Adolescent Clinics. I am not gainsaying the fact that we do have a good Maternity and Infant Welfare service—but after their primary courses of triple and polio immunisations and their booster doses of the same toddlers and pre-school children are not usually regularly examined unless they fall sick. It is, to my mind, far better if they are still seen at regular intervals even if apparently healthy—to make sure that they are developing sound minds in healthy bodies.

Geriatrics should not be Neglected

Nevertheless, the majority of the present cohorts of young children and young people will in a few decades—short of major natural cataclysms or hydrogen bombs—grow into middle and, later, old age when they will be exposed to the many degenerative and malignant diseases in the later age groups. With the rapidly increasing expectation of life in Singapore, we shall have more and more old people. Geriatrics—or the medical discipline

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catering for the special needs of the old—cannot thus be ignored, but should be encouraged to develop side by side with paediatrics.

The Need for Family Planning

Again, the demographic patterns and trends of Singapore², indicate that, at the present growth rates, the population will be more than three and a half millions at the turn of the 21st Century, or less than thirty years from now. It seems imperative, in the light of this knowledge, to pursue a vigorous family planning programme with unmitigated efforts. Otherwise, there may be standing room only for our children or grandchildren in Singapore!

Cardiovascular Diseases and Cancer the Leading Causes of Death

Another means whereby we can determine medical priorities is by consideration of the main causes of mortality in our Republic. In recent years, the two main rivals at the top of the League Table for causes of death have been cardiovascular diseases and cancer³. This state of affairs is in sharp contrast to that prevailing less than ten years ago, when tuberculosis took the largest toll of life. Tuberculosis has, in fact, plummeted to a lowly seventh or eighth ranking in the past few years⁴. There are various things we can do to try to reduce the number of deaths from cardiovascular disease. We can start screening the general population for hypertension and nephritis. We can look for predisposing causes to coronary heart disease like obesity and diabetes mellitus, and try to rectify them. We have also to think seriously of further provisions for the care of people suffering from cardiovascular and cerebrovascular disease—such as more coronary care units, ambulances specially equipped to cope with coronary cases, or more rehabilitation workshops for hamiplegic patients.

There are also several things we can do to try to reduce the number of deaths from cancer. There is already quite a good cytology service to detect early cases of cervical cancer among women in Singapore. However, a similar service—the detection of early lung cancer by sputum smears—has not quite got off the ground. Yet the number of cases of lung cancer deaths is greater than the number of deaths from cervical cancer. In 1967, the Singapore Medical Association, together with the Singapore Cancer Society, formed a Committee on Smoking and Health⁵. The objective was to persuade the public to give up cigarette smoking. As we all know, cigarette smoking may increase the risks of lung cancer by up to ten times or more (depending on the number of cigarettes consumed). In 1967 we were like a voice in the wilderness. Despite spirited attempts—little heed was paid to

our warnings. It is gratifying to note that there is now far greater awareness about the health hazards of cigarette smoking. The Government has set a lead in restricting smoking in public places and banning cigarette advertisements over radio and television. Perhaps the Singapore Medical Association and bodies like the Singapore Cancer Society should now redouble their efforts to promote awareness about cancer in the public and give their support to an expansion of screening tests for cancer.

The Need for Surveys to Assess Patterns of Illness

Again, we can assign priorities by study of the main causes of morbidity (or ill-health). This is not as easy as it may seem. The truth is, we really do not know the complete picture of morbidity in Singapore. We cannot decide solely by studying the causes of admissions into our hospitals—as the vast majority of sick people are not admitted into hospitals. We cannot get the full picture even by collecting complete records of cases seen by all the general practitioners and out-patient clinics, as many of our people do not go to Western physicians for their illnesses. Some may not consult any kind of doctor, “sinsei”, or “bomoh”, when ill.

Even in the most developed countries of the world and in the presence of a National Health Service—research teams have shown that there is a lot of illness which can only be uncovered by doing epidemiological surveys in the community, including amongst the apparently well. For example, in a report published by the College of General Practitioners of the United Kingdom in 1962, it was estimated that for every known diabetic there was probably another undetected⁶. The situation may be quite different from Singapore—but we just do not know, and cannot know, unless properly-planned and extensive surveys are conducted.

The fact that there is so much inapparent—or occult-disease in the community as contrasted with the obvious or overt—has given rise to the concept of a “clinical ice-berg”. As you know, only a small part of an ice-berg appears above the surface of the water, as many ship-captains have discovered to their cost when they rammed their vessels against that part of the ice-berg hidden beneath! By analogy, only a small number of people suffering from latent or early disease go to see a doctor. It is not too early, I submit, for us to take steps to determine the extent of this “clinical ice-berg” in Singapore by doing more extensive surveys of morbidity among the apparently healthy. By knowing more fully the patterns of morbidity we can assign our priorities with greater precision and effectiveness.

Social Changes Demand More Provisions of Occupational Health and Trauma Units

In the determination of priorities for medical care, we should, moreover, reflect on the social changes taking place around us, and on the changing demands for medical services they entail. Urbanization and increased affluence have brought in their train an increased number of accidents on the roads, in the factories⁷ and in the homes. Obviously, the study of ways how to lessen the number of such mishaps is of paramount importance. The medical profession can play its part in this. In certain countries, such as the United States of America, there are groups formed for the express purpose of studying the medical aspects of traffic accidents. "Road traffic accidents as a public health problem" was a theme of the technical discussions of the Regional Committee for Europe held at Budapest in September 1969, and short-term measures suggested to public health authorities included attention being drawn to the high mortality among young male drivers and child pedestrians, guidance to doctors about advice to their patients on the effects of illness, drugs, alcohol and fatigue on driving behaviour, whilst long-term measures included the establishment of a liaison committee of all government departments concerned, the promotion of accident surveys and the organization of road accident research units and university institutes of traffic medicine⁸. There is, also, a great need for more doctors to practise the discipline of Occupational Medicine, which is concerned, not only with the prevention of accidents, but also with the maintenance of health among workers and the prevention, diagnosis and treatment of diseases which can result from the working conditions and environment. It must be understood, however, that no Accident Prevention Programme can be totally effective. Hence, in the context of the rising trends in the incidence of road and industrial accidents, serious consideration should be given to the establishment of Trauma Units—to cope as effectively as possible with the results of such accidents. There is also a need to greatly expand and develop the Rehabilitation Services, in order to restore the victims to an useful life in the community as swiftly and as completely as possible.

Suggestion for a Poisons Advisory Service

A related subject to Accidents are the poisonings, accidental or otherwise, which are occurring in the home and in the factory. As we import so many kinds of potentially toxic chemicals from all over the world, and as their composition is often hidden under all sorts of trade-names, it is sometimes extremely difficult for the doctor to know what antidote to use in the event of poi-

soning. The feasibility of a Poisons Advisory Service should therefore be looked into. Such a Service, possibly located in a large hospital, which gives advice, laboratory facilities and treatment on a round-the-clock basis, can be of immense benefit in toxicological cases.

The Importance of Mental Health

With urbanization and industrialization there also tend to be more problems of social maladjustment and psycho-neurosis. Side by side with the rat-race in modern industry may occur the disintegration of old traditional values and the extended family structure, which used to buttress the individual against loneliness and the hostility of the outside world. In view of all this, the time is perhaps ripe for further development of psychiatry, for the study and treatment of the psycho-neuroses as well as the psychoses.

Next we come to priorities in the medical profession itself.

The Need to Recapture the Spirit of Service

First of all, I think there is a dire need for practitioners and would-be practitioners to maintain the spirit of service. There is a serious temptation for doctors the whole world over—and not least in Singapore—to become very materialistic and mercenary in their outlook and behaviour. There is perhaps no gainsaying of the fact that some doctors are underpaid, compared with their fellows in other countries or other professions. It is also perhaps not wrong to seek for a better standard of living for one's loved ones or even oneself—but it is definitely wrong if the search consumes most of one's energies and excludes the spirit of service to mankind. Robert Herrick, in his "Litany to the Holy Spirit" wrote three hundred years ago:

"When the artless doctor sees
No one hope but of his fees,
And his skill runs on the lees:
Sweet spirit comfort me."

We live in a rather materialistic society. If we are carried away by materialism, then we have no longer any right to consider ourselves as belonging to a noble profession, as the medical profession has been for a very major part of human history. I was having a conversation with two other medical educators a short while ago. We were discussing the lack of local graduates in certain departments of the Medical Faculty. One of my friends said, "The truth of the matter is—the hero whom our young doctors admire is the practitioner who makes pots of money, not the one who climbs the ladder of scientific achievement or the one who gives unselfishly of his services to the community." Can we prove him wrong?

The Need to Treat the Patient as a Whole

As Medicine becomes more and more specialized, there is a danger that doctors look at parts of the patient rather than treat his whole being. The other day, a friend asked me to recommend a "head specialist" for his wife as she had a chronic headache. I told him I was not sure which specialist he meant. My friend could be needing a neurologist—if the headache involved some structural or functional disorder of the nervous system. He could be needing an ophthalmologist—as refractive errors can also result in headache. He could be wanting a psychiatrist—as mental troubles could also lead to pain in the head. Specialists have multiplied to such a tremendous extent that there are allegedly consultants who specialize in diseases of the left kidney or the posterior basic segment of the lower lobe of the right lung!

You cannot make a person whole unless you treat him as a whole—not just the disease, not just the part of his body affected by the disease—but his entire personality—mind, body and soul. It is a sad commentary on the failure of many practitioners of Western Medicine to treat their patients as a whole that so many people in Singapore—including those with Western education—are turning back to the Eastern systems of Medicine. This is what a Chinese "sinsei" said when interviewed by one of our newspapers some time ago, "A lot of sick people come to us after Western medicine hasn't done them any good. Others go to government clinics only to get medical certificates for their employers. Once they have these, they come to us, ignoring the medicine the doctor has prescribed for them."

Why? Another "sinsei" gave the explanation. "A sinsei normally diagnoses the outward as well as the inward symptoms. In short, we find out more about the patient... Thus no two people are given the same herbal remedy."

Contrast this with what is happening in some clinics. One doctor comes and sees 100-200 patients a day. This works out to about 10-20 patients an hour at least or thereabouts, counting walking in and walking out of the consulting room by the patients, disrobing and robing, and scribbling on the prescription pad and record cards by the doctor. In practice, there is very little taking of history or physical examination. In that short space of time, one may be able to treat an illness but probably not the patient as a whole!

The management of Mr. Wong with a "cold" may need to be very different from Mr. Tan or Mrs. Lim with an equally severe cold. Mr. Wong may have a neurosis underlying his cold. The neu-

rosis might indeed have been the primary motivation for his seeking the advice of the doctor. He needs help, not just a cough mixture and fever tablets. We also know that disease is always multifactorial. You cannot treat Rohaini binte Ahmad for her rheumatic fever with simply salicylates or corticosteroids. You need to ensure that she can rest, either at home or in the hospital. You need to be sure that her mother will bring her up for regular check-ups and prophylactic penicillin—otherwise the next time you see her will be years ahead when she has full-blown mitral stenosis. You cannot treat Mr. Ramachandran for his coronary thrombosis unless you have the patience to go into details about his way of life, habits and diet and then give advice and discuss with him about necessary changes relating thereto.

It has been estimated that 20% or more of patients seen at an average general practice suffer from emotional disorders⁹. This makes it even more necessary for the doctor to treat the patient as a whole. As someone has rightly said, "It is still true that most people feel the need at times for a personal doctor who is also a friend, to whom they can turn for advice and help when they are in any kind of trouble... The more complicated, scientific and specialized medicine becomes, the greater is the need for such a family doctor to concern himself with patients and people."

There is little doubt, in my mind, that the general practitioner, the primary physician, the doctor of first access, the family doctor (as he is variously called) has a most important part to play in the giving and co-ordination of medical care. But he must not be a mere pill-peddler. He must be willing and able to spend time and sympathy on his patients. He can never expect a rise in public regard if he does not do so.

The Need for Better Distribution of Medical Facilities and Manpower

It is very tragic indeed that countries and areas with the greatest amount of ill-health are the ones with the least number of doctors and other medical personnel. Take the doctor: population ratio as a yardstick. The most favourable ratio in the world is in Russia, where there is one doctor to 400 people. The United States of America have one doctor to 600 people; most Western European countries have one doctor to 800 to 1,000 people, just as Japan has. Singapore has about one doctor to 1,600 people. Compare this with other developing countries. For every one doctor there are 4,855 people in Malaysia¹⁰; 7,500 people in Thailand¹⁰; 9,490 people in Kenya¹¹; 28,740 in Nigeria¹².

Next, let us take the "Infant mortality rate", defined as the number of deaths of infants (children under one year of age) per 1,000 live births. In Singapore the rate is standing around 20, compared with 18.17 for Australia, 90-100 for Indonesia, 139 for India, and 155 for Pakistan¹³.

In the light of the above, isn't there an urgent need to channel more medical manpower and facilities to the less fortunate countries of the world? Everyone would agree, but the lack of concern on the part of the "haves" and the reluctance of doctors to give up a cozy living in the developed countries and in the towns have not enable this need to be filled. As far as we in Singapore are concerned, we could do our bit towards helping at least this part of the world.

The first Minister for Overseas Development in Britain said several years ago, "career should normally include a period of work overseas in a developing country." His wish is yet unfulfilled.

The Need for Getting the Maximum Benefit from Expenditure on Health Facilities

It will not be possible for even the richest nations to spend more and more money on health. There are inevitably other claims upon the national purse. Singapore is already spending about \$80 million yearly on its national health facilities. The developed nations are spending between 4-7% of their total budgets on health.

As in other fields of human endeavour, we need constant planning and evaluation of existing health projects. We need to resist spending money on very sophisticated equipment and techniques unless necessary when a fraction of that money could be spent on less glamorous but more useful purposes.

As Dr. Brotherston, formerly Professor of Social Medicine and Public Health in Edinburgh, Scotland, once said, "Perhaps we have been too preoccupied with the mechanics of provision to pause and to take stock. In the past it was possible to proceed on the assumption that all provision must be good—why waste time, therefore, over the details? But there are major forces at work now affecting the medical-care systems of all advanced countries which completely invalidate such a point of view."

The situation is even more urgent in the developing countries, which need to evolve new patterns of health care and which cannot blindly follow the examples of developed countries.

In both developed and developing countries, there is an undue tendency to regard the hospital as the pivot of medical care. It is true that the hospital is very important, especially for the more severe illnesses. It is nevertheless true that there is

a need to work out a more comprehensive and efficient delivery of medical care than exist in most countries at present.

Side by side with the hospitals there should be other things such as health centres. Now "health centres" mean different things to different people. For our purpose we should define them as units which provide a family with all the health services it requires, other than those which can only be provided in a hospital or by general practitioners. They take their services and exert their influence outside their own precincts. Once their staff stop visiting—they cease being health centres, according to this definition.

Health centres can provide the following services:

- Outpatient Services
- Domiciliary Service
- Antenatal and Postnatal Care
- Care of School-children
- Care of Pre-school Children
- Midwifery Service
- Environmental Health Services
- Health Education
- Simple Dental Care

How are they, then, so different from the Outpatient Services, Maternity and Child Welfare Clinics, School health clinics and district health offices that we have today? They are different in respect of better integration of all these services. Moreover, there can be better co-ordination between the hospital and such health centres. In fact, there can be interchange of staff—specialists from the hospitals can follow up their patients in the health centres and health centre staff can undertake some duties in the hospital. Where does the general practitioner fit in? In some circumstances, the general practitioner can help to staff the health centres. In other circumstances, the work of the general practitioners can supplement the work of those centres.

The Need for Better Team-work in Medical Care

The doctor cannot serve society in isolation as well as he could if he works as a member of a team. Group practices, on the whole, give better coverage for emergencies and when the individual doctors have to go to leave. At the same time, there is a need for doctors to realise that nurses, trained medical receptionists and social workers can be of immense help to them. This is a lot of work which can be done by such medical personnel instead of by doctors. This would free the doctor's time to attend to cases requiring their special attention. In many of the world's undeveloped areas, some medical at-

tion is better than no medical attention. In the foreseeable future, a sufficient number of doctors trained to supervise and work with them, may be the only possible principal channels through which medical care can be distributed.

In the developed countries, the expertise provided by the para-medical professions, such as social workers, can be very valuable in helping the busy doctor to know about aspects in the social circumstances of individual patients which may make the entire difference between success or failure in medical treatment.

The Need for Medical Personnel to Look Beyond Themselves

It is increasingly realised that there are many problems affecting the health of mankind which cannot be solved by the doctors and the para-medical professions by themselves. For example, this decade is called the Decade of the Environment. In a United Nations Report in 1969, these solemn words occur:

“If current trends continue, the future of life on earth could be endangered¹⁴.”

These words do not refer to dangerous experiments with or the proliferation of atomic bombs. They refer to the pollution of the environment—land, sea and air, which, in the opinion of experts, threaten the very survival of mankind. Year by year, about 800 million tons of pollutant are belched into the atmosphere by automobiles and the chimneys of factories and dwelling houses. In recent years smogs, which are due to a combination of certain atmospheric conditions and pollution, have probably killed thousands of people in the major cities of the world—such as London, New York and Tokyo. In Japan, Sweden and elsewhere, hundreds of people have died or become ill from the pollution of water with organic mercury, cadmium and other substances. In 1969 alone 40 million fish died in the River Rhine from the effects of effluent insecticides¹⁵.

To control such matters as Pollution, doctors will require the help of health educators, sociologists, psychologists, engineers, biologists, chemists and a host of other people. More than ever before, there is a need for the medical profession to learn to work with those in other professions. Inter-professional co-operation is also essential in the conquest of other health problems—for example, those in the working environment and those connected with malnutrition.

The Need for an Overhaul in the Medical Curriculum

All the world over, there is a movement in the medical schools to bring the medical curriculum up-

to-date and make it more relevant to medical needs. There is need to teach medical students about the sick in the community and not only about the 3% or so which enter the portals of hospitals. If training is done exclusively or mainly on hospital patients, the students may get distorted ideas about the natural history and distribution of diseases.

There is a need for the students to go out into the community. Too often there is a gulf of understanding between the English-educated, Western oriented medical students and doctors and the rest of their countrymen. The medical profession, therefore, should learn more about the native culture, languages and history of their own country to understand better the attitudes and behaviour of their patients. The medical students, too, should have some experience of and training in general practice. In most countries, general practitioners still form the largest group of doctors.

I have mentioned hitherto that mental health problems seem to be increasing as our society grows more complex and sophisticated. It seems to be reasonable to develop the teaching and research in psychiatry—perhaps first as a sub-department, and later, a full-fledged department of the University.

In connection with the role of the medical schools, perhaps the words of Professor A. de Vries of the Tel Aviv University Medical School are pertinent. “The end goal of the medical school should be to serve society and . . . its very existence is dependent and in the final analysis justified only by its benefit to society¹⁶.”

The Need for the Doctor to Set a Better Example

A priority for medical men and women must be to show greater sacrifice and service in the practice of their professions—to resist being swept away by the mercenary spirit of the age, to recapture the spirit of humility, loving-kindness, patience, devotion to duty and self-discipline; to practise a code of ethics above the minimum demanded by the Singapore Medical Association or the Singapore Medical Council. Ideals are easy to have when we are young—almost spectators in the arena of life. They are hard to keep to and get rubbed away too easily by frustration, selfish ambition, success and prosperity. It is so convenient to rationalise about a greed for money or power or fame. We may even deceive ourselves that we are serving our fellowmen when we are merely serving ourselves. If we want medical care to improve, we must start with ourselves. Rather than becoming too critical of others, we must watch our own actions and thoughts more closely. There is much wisdom in the old Chinese proverb, “Forgive thyself less and others more.”

Our tortuous journey through the labyrinthine path of Priorities in Medicine is almost done. Someone has said that if an audience likes a speaker and agrees with his views, it will say that his talk is stimulating. If it is interested but does not agree, it will label his talk as provocative. By these criteria, I cannot hope to have stimulated all of you. I trust, on the other hand, that neither have I provoked all of you—but I do sincerely hope that I have given some food for thought to at least some members of this gathering today.

Once again I would stress that the priorities I have mentioned are neither exhaustive nor mutually exclusive. The contemplation and determination of priorities are, moreover, not enough by themselves. Feasibility studies will have to be carried out, and factors such as cost-effectiveness will have to be considered before priority projects can be launched. What may seem wonderful in theory may prove impracticable or even disastrous in practice. My only justification for speaking on this subject is that it is better to think about priorities than not at all.

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