It is a very great pleasure to be allowed to pay tribute to Gale and the work he did among us. I first knew him when he was medical officer at the Board of Education, devoting himself largely to the well-being of handicapped children. I knew him also as a brilliant member of the epidemiological team at the Ministry of Health, and like many of you I also knew him when he came to Bristol where he undertook the direction of the medical postgraduate studies in the University of Bristol. We remember him not only with admiration for his brilliant qualities, but also with affection, for he was one of the most modest of men, and it is right that we should take this opportunity each year of refreshing our memory of him.

I have chosen to speak of the Mental Health Services for two reasons—first, because it is the branch of medicine in which the most rapid changes are taking place, and we should, I think, urgently take stock of the situation to see where we are going, and where we should be going—not necessarily the same thing; and secondly because it is a subject that would have fascinated Gale with its trends and counter trends; its passionate arguments and counter arguments. Indeed it is at a time like this that we miss him most. We need his keen analytical brain to cut through the confused thinking and false calculations that bedevil the scene, and his wonderful gift of clear exposition to make it all plain to us.

It is customary to date the change in the mental health services from the Mental Treatment Act 1930, but a moment's reflection will remind us that we had already come a long way by then. Our attitude to the mentally ill had changed a good deal since the time Hogarth painted "The Rake's Progress" and showed two ladies of quality enjoying the sights at Bedlam. We had already come a long way since idiot children were used as a sort of discount; in the early part of the last century children in factories worked longer hours

*Being the Gale Memorial Lecture for 1961 delivered before the South-west England Faculty in the Town Hall, Truro, on 7 October, 1961.

than convicts sentenced to hard labour or the slaves in our colonies; there was a heavy demand for pauper children to replace those who died, and one Lancashire mill owner outbid his rivals by offering to take one idiot child with every 20 healthy children. We had come a long way since the first part of our own county asylum at Bodmin was ready to be furnished, and the clerk was instructed to make sure that a three foot bed was wide enough for a man, and a four foot bed for two women.

But it is during the last 30 years that the public attitude to mental illness has changed most rapidly. It may well be, as some maintain, that this change is only skin-deep—that deep down there is still a horror and fear of mental illness. However superficial or deep the change has been, it has been sufficient to force upon the statute book three Acts of Parliament which have completely changed the method of dealing with the mentally ill.

The first was the Mental Treatment Act 1930. Until that date no one could go into a mental hospital unless he had been certified by a magistrate. We can all remember how ashamed the patient and his family were when he had been "certified". But there was no other way of getting hospital treatment. The Act of 1930 allowed patients for the first time to go into a mental hospital voluntarily without having to be "certified". But it wasn't as free and easy as it sounds. A voluntary patient had to give three days' notice if he wanted to go home.

The next change came in 1948 when the National Health Service Act 1946 came into operation. The mental hospitals were taken over by the same regional hospital board that took over the general hospitals. The last ties with the old Poor Law were snapped.

The third change is taking place now, under the Mental Health Act 1959. The whole system of magisterial certification has been swept away. Patients are sent to mental hospitals by their own doctors in exactly the same way as they are sent to general hospitals. In all but a few cases they can come and go as they like. Where compulsion has to be used, it is used by doctors and not by magistrates.

Our aim now is to bring the mental hospital services more into line with the general hospital services. The first step has been taken in modifying the method of admission to hospital. So far as the hospitals themselves are concerned, the mental hospitals are quite different from the general hospitals in origin and tradition. The difference between the two systems can best be appreciated by visualizing the general hospital service of Cornwall as it would have been if it had grown in the mental hospital tradition. There
would have been one central general hospital of 1,400 beds, 500 of which would have been for the elderly chronic patients—a hospital very similar in size and proportion of elderly patients to the Cornish psychiatric hospital, St. Lawrence’s at Bodmin.

During the last 20 years I have seen some interesting changes in the hospital services in Cornwall. In 1947 I persuaded the hospital authorities to build a considerable extension to the chest hospital to cater for our waiting list of 100 cases of pulmonary tuberculosis; now part of the hospital is used for other types of patient, part is in dust sheets, and only about a third is still required for the original purpose. The effect of modern drugs is not only curative, but has largely done away with the need for lengthy periods of treatment in hospital, and indeed makes treatment at home possible for some who would formerly have had to go to hospital. Is the same sort of thing going to happen to our mental hospital? With the mounting number of admissions each year it seems a ridiculous question to ask, but we see here again that the effect of modern forms of treatment on such patients as schizophrenics converts them from very long-stay to short-stay patients.

Figure 1 shows the annual number of admissions to St Lawrence’s Psychiatric Hospital over the last few years.

I now draw your attention to the surprising fact that the number of occupied beds has not increased in proportion—in fact it has fallen a little—but more of that later.

Is this apparent increase in mental illness peculiar to Cornwall? Figure 2 shows the corresponding increase in admissions in England and Wales. Even this does not necessarily mean a considerable increase in mental ill health.

To this increasing number of admissions to mental hospitals, there are some notable exceptions. Figure 3 shows the annual number of admissions to Graylingwell Hospital in Sussex, and you will see that something drastic has happened there.

To understand the origin of the famous Worthing experiment which has brought about this reduction in admissions, it is necessary to go back to Amsterdam in 1930. In that year the economic depression hit Holland, and Querido was appointed city psychiatrist, with instructions to cut the mounting cost of the care of the insane. An immediate survey of the mental hospital population showed that ten per cent of the patients did not really need to be in hospital and could be discharged to their homes. The next stage was the realization that the best way of saving money by reducing the numbers in the mental hospitals was not by discharging existing patients, but by preventing the admission of new ones. A regulation
was introduced to make it compulsory for all admissions to pass first through the hands of the city psychiatrist. A 24-hour service was set up at the city psychiatrist's, so that every case was promptly investigated on the spot before being sent to clinic or hospital. It is interesting that these measures introduced in the first instance to save money proved in the end to be far better for the patients than the arrangements they had superseded.

![Graph of St Lawrence's Hospital, Bodmin admissions and occupied beds from 1948 to 1960]
Figure 2
NUMBERS ADMITTED TO DESIGNATED ACCOMMODATION
(England and Wales)

Figure 3
ADMISSIONS TO GRAYLINGWELL HOSPITAL
To a patient mentally ill, removal from his home to a mental hospital is often something of a strain, and he is subjected to a second strain when after improvement in the hospital he is sent home to face the circumstances in which he broke down. By this system of domiciliary treatment both these strains are avoided. The amount of money saved on hospital expenditure has been largely spent on strengthening the domiciliary psychiatric teams. Unless there is an adequate number of psychiatrists for domiciliary work the Amsterdam system would fail. In 1955, the South West Metropolitan Regional Hospital Board sent a delegation to study the Querido methods in Amsterdam, and it is from this visit that the Worthing experiment emerged.

This experiment commenced on 1 January 1957. The whole basis of it was an instruction to the staff to “visit patients in their own homes, with a view to the patients being treated entirely at home or as outpatients in the outpatient clinics.” In order to achieve this, the area served by the Worthing experiment was sealed off psychiatrically so that no patient could be admitted to the Graylingwell Hospital without first being screened by a psychiatrist taking part in the experiment. Wherever possible, the patients were referred to the psychiatrist by their family doctor because of the importance of close and friendly co-operation between the general practitioners and the psychiatrists. Outpatient facilities were strengthened and an active day hospital and treatment centre was set up where suitable patients could spend the day or attend by appointment for examination or for special treatment. The first year of the Worthing experiment on these new lines was 1957, and during that year the number of admissions to hospital from the Worthing area was 284 compared with 645 the previous year. The object of the experiment, therefore, was rapidly achieved, and there is an interesting echo of Querido in the report on the Worthing experiment published by Carse, the medical director, in January 1959. He concludes that this system is better psychiatry and more in the interest of the patient in that whenever possible he has individual treatment at home where he can be with his family and friends. In 1958 the experiment was extended to include the Chichester area with similar striking results.

It is rather surprising to see that a reduction of the annual rate of admissions to the Graylingwell Hospital by very nearly one-half over 3 years succeeded in reducing the number of patients in the hospital by only 101, from 1,095 to 994. Indeed, we are told that approximately half of this reduction was due to the discharge of long-stay patients, so that a fall in the annual admissions of 559 reduced the bed occupancy of the hospital by about 50. It can
easily be calculated that the average length of stay of these admissions which did not take place would have been about a month each. The diminution in the admission of patients, therefore, has been achieved by bringing about a fall in the admission of short-term cases. If we are to make any substantial reduction in the bed occupancy, something must be done about the long-stay cases. There are now about 3,500 beds in mental hospitals per 1,000,000 population. About 2,500 of these—or 70 per cent—are for patients who have been in hospital for more than 2 years—long-stay patients. During the last 10 years a very great change has come about in the treatment of such conditions as schizophrenia; formerly the young or middle-aged schizophrenic was admitted to hospital and stayed till he died, 30 or 40 years later. Now he is admitted and treated for a short time and sent home. Many have to be readmitted from time to time for short courses of treatment. It is these re-admissions which largely account for the apparent rise in the admission rate, but it is the accumulation of schizophrenics admitted years ago that contribute largely to the hard core of the long-stay patients. In Cross and Yates's series there were 50 per cent more long-stay patients under 65 than over 65, and it is my view that it is going to take a great many years for this group to run down. In trying to forecast the future demand for mental hospital beds we must bear in mind particularly two groups of patients—these young and middle-aged, long-stay patients who are not being replaced as the numbers slowly run down, and the increasing numbers of elderly, confused patients who are being sent to mental hospitals.

I propose to refer to four statistical surveys, beginning with one most meticulously carried out by Alan Norton at the Bexley Hospital, Kent, who analysed the duration of stay and the outcome of treatment of groups of female patients admitted at various times in the past 30 years.

He shows that schizophrenia has been replaced by senile and arteriosclerotic psychoses as the most important cause of a stay in hospital of over 2 years. The percentage of patients admitted 30 years ago and staying in hospital more than 2 years who were diagnosed as schizophrenics was 56.4, but by 1957 it had fallen to 27.7. During the same period the percentage of admissions diagnosed as senile and arteriosclerotic staying for that period rose from 4.6 to 30.8. It is true that during the same period the re-admission rate had increased considerably, but this need cause no anxiety. In a condition which is episodic, it is difficult to justify keeping the patient in hospital for long periods when he could be at home and often at work for a greater part of the time. Looking to the future he estimates that without any change in policy, total numbers may decline by nearly 30 per cent in 20 years, and the last
of his present long-stay patients will die in about the year 2000. If alternative accommodation elsewhere is provided for those long-stay patients who do not need the facilities of a mental hospital, a further fall of 30 per cent could be achieved. The provision of psychiatric units attached to general hospitals and units for medium-stay patients would finally reduce the mental hospital to about a quarter of its present size. It is important in looking to the future to distinguish clearly between the results of the present tendencies and the possibilities of providing beds elsewhere which will involve an immense building programme costing millions of pounds and taking many years to achieve.

I now turn to the group of elderly patients who are replacing the young and middle-aged schizophrenics in our mental hospitals. This is a group increasing in size. Is there no better way of treating them than by sending them to a mental hospital? Is it indeed in the best interests of these old people themselves that they be admitted in the first instance to a psychiatric hospital?

In trying to answer these questions we should bear in mind the work of Bedford. He points out that the underlying cause of confusion in the elderly is rarely psychiatric, being in the vast majority of cases physical in origin. It is therefore futile to offer them only psychiatric treatment when their urgent need is physical investigation and treatment. The brains of the elderly are more easily upset by purely physical causes than those of younger people. Many of these patients are severely physically ill on admission so that their death rate is high. In his series, 33 per cent died within a month of admission to hospital. But mental confusion lasted for less than a month in all but 18 per cent and for more than 6 months in less than six per cent. These results certainly support his view that elderly patients should occupy mental hospital beds only when they are likely to respond to specialized psychiatric treatment, or when severe and persistent behaviour disorder makes mental hospital nursing and management imperative.

If Bedford is right, and he is certainly very convincing, it is no kindness to confused old people to send them to a psychiatric hospital when they also urgently need specialist physical investigation and treatment. In the Cornish psychiatric hospital, St Lawrence's, at the end of 1959, no less than 442 patients out of a total of 1,159 were 65 years of age or over. During the year 252 had been admitted. In the same year 158 were admitted to Barncoose Geriatric Unit. Some means must be found of bringing these two groups together elsewhere, where they will get specialist physical and psychiatric care.

What do we mean by "elsewhere"? A somewhat similar problem
faced us in the care of the chronic sick. Large numbers of old people were lying in the wards of the public assistance institutions without the benefit of that skilled investigation and treatment that can only be given by a properly organized geriatric service. The establishment of such a service at Barncoose has changed all that so far as Cornwall is concerned. Patients are admitted to the active treatment centre where they are thoroughly investigated and treated. The whole resources of modern medicine and rehabilitation are brought to their aid. Many of them go home after a course of treatment; those who cannot be transferred either to a long-stay annexe if they require continuous nursing care, or to a home for frail ambulants or an ordinary old folks' home provided by the county council. This sets the pattern for a service for the elderly confused. The physical ailments of this group are clearly preponderantly a geriatric problem, and any arrangement for their physical investigation and treatment should be set up in close association with a geriatric unit. It has been shown that a large proportion of these patients either die or recover in a month, so that some sort of assessment and short-stay treatment unit is indicated. It should be set up in the grounds of Barncoose where the full resources of the geriatric services are available, including not only the expert medical advice and full facilities for investigation, but also rehabilitation by such means as physiotherapy and occupational therapy. Consultant geriatric and psychiatric advice must combine in the care of these patients. Not least important is a good almoner service to keep in touch with the patient's home and try to ensure that the patient can return home when cured. It is here that the health visitors have been of the greatest value in connection with the geriatric service.

Such a service should be of the greatest value to the general practitioner. How often do we find an old person confused and ill at home who should obviously be in hospital—but what sort of hospital? Should it be the psychiatric or the geriatric hospital—or does he just need care and good food in an old folks' home? All such patients should go straight to the assessment unit, and in a week or two it will be obvious where he should go next. It is to be hoped that a large proportion of cases, especially those living with relatives, will be able to return to their homes. At the time of reorganization of the geriatric service the cry went up "The right patient in the right bed". It is as well to remember that the best bed of all is the patient's own bed at home. If they cannot go home they may go to an ordinary old folks' home, or one of the special homes for confused old people such as those the Cornwall County Council is now building; other possibilities are a psychiatric long-stay annexe run by the psychiatric hospital service or a geriatric
long-stay annex run by the geriatric service, depending on the preponderance of mental or physical symptoms; a few may have to go to St Lawrence's for intensive psychiatric treatment, but it is to be hoped that this number will be small indeed. It may seem that I have described a wide variety of types of accommodation, some of which are in being and some of which are planned. Anyone who has run a variety of accommodation for old folks will know how essential it is to group the old people in such a way that they can live together in peace and comfort. There must be a wide variety of accommodation so that the right patient can be got into the right bed.

I have said that after adequate treatment many of these patients will be able to go home. It should be the object of any service to support the efforts of relatives who are looking after these old people at home. Just as the parents of severely sub-normal children must have some relief from the strain of constant care, so those who have the care of confused old people must have their burden eased. Short-term admission to hospital from time to time allows the family an occasional rest and holiday. A day hospital to which the patient goes by day and returns home by night eases the strain in the family and provides an opportunity of care and treatment for them as required.

I now turn to the future needs of beds in mental hospitals. It is obvious that with the recent change in the treatment of mental illness, the successful treatment of many schizophrenic patients which prevents their becoming the chronic long-stay patients which they used to do, and largely in the future the establishment of other forms of accommodation to which I have referred—all these things will in time reduce the need for beds in mental hospitals. The questions are by how much and how soon, and I find these questions extremely difficult to answer. You will remember that the official view of the Ministry is that in 15 years only half our present places for mental illness will be needed, in other words, 75,000 beds will be redundant and the remaining 75,000 should be provided mostly within general hospitals and not at special mental hospitals. The Minister forsees the elimination of the greater part of our present mental hospitals.

The Minister's forecast is based largely on two recent large-scale statistical studies, one undertaken in the Birmingham region, and the other by the Ministry and the General Register Office covering the whole country. It is necessary to be very careful in reading these surveys because they can easily be misunderstood.

The statistical survey in Birmingham, carried out by Cross and Yates, first analysed the patients in residence in 1958, and on this based an estimate of the number of beds required for patients
staying less than 2 years. From an examination of the records of patients admitted in the years 1953-55 they estimated the rate of build-up of the long-stay population. What they did not do was estimate the rate of run-down of the present long-stay population of the hospitals, so they did not give an estimate of the hospital requirements for long-stay patients in 10 years’ time. They reckon that a population of one million will require 340 beds for short-stay patients, 600 for patients staying between 3 months and 2 years, and 1,000 new long-stay patients will have accumulated in 10 years. This gives a total of about 2,000 beds, to which must be added the remainder of the present long-stay population about which they give no forecast but which may be considerable. In their own figures it is shown that one third of the long-stay patients are expected to be still in hospital 10 years after admission; two thirds of these are still under 75 years of age, and one eighth still under 45 years of age so it is going to take a long time for the number to run down. Cross and Yates therefore estimate that a population of one million will in 10 years’ time require 2,000 beds plus the residue of the present long stay population instead of the 3,000 to 3,500 at present occupied. The run-down in the next 10 years may not be very considerable.

Tooth and Brooke in the other survey which covers the whole country, analyse the patients admitted to mental hospitals in 1954 and 1956 and examine their subsequent history. Their conclusions are very close to the Birmingham figures. But Tooth and Brooke go further than Cross and Yates and try to estimate the rate of decline of the present long-stay population, and by an astonishing piece of statistical method have reached an astonishing answer. They say “Discharges and deaths together reduced this long-stay population by 28 per cent for males and 32 per cent for females in 5 years. On this basis none of the long-stay patients resident on 31 December 1954, would be in hospital after about 16 years.”. From their own figures it is obvious that the decline in population gets less as the years go by—the graph is a curve and not a straight line, and to extrapolate by multiplication is wrong. It may be said that it doesn’t make much difference to the end result. The published article dates the decline from 1954; the official circular seems to date it from the present time. Depending upon the date used, Alan Norton points out that the Minister’s forecast of 75,000 redundant beds would be out by either 10,000 or 25,000 beds on this method of calculation.\textsuperscript{10}

More recently, an attempt has been made by Gore and Jones\textsuperscript{11} to forecast the length of stay of their long-stay patients in the Menston Hospital. Three quarters of the men and half the women are under 65 years of age, and they estimate that 40 per cent of their
long-stay patients will still be alive in 16 years' time and still be in the hospital. This, of course, is in addition to the number of patients who can be expected to be admitted during the same period.

I have quoted these surveys at some length to show how difficult it is to forecast with any assurance the demand for beds in the years to come. I believe that Norton's forecast of a drop of 30 per cent in total bed requirements in 20 years is as near as it is possible to get. It seems to me that the Minister's hope to eliminate the greater part of our present mental hospitals by the mid-1970s is too optimistic. It would involve the provision in new buildings by regional hospital boards and local authorities of 75,000 (or 100,000) beds in 15 years—five or six thousand new beds a year.

There is no time to consider the services for the mentally subnormal. There the problems are quite different from those we have been considering so far. Nor is there time to consider in any detail such preventive services as the child guidance service. Suffice it to say that, if, as is said, the pattern of our behaviour is laid down in our early years, the sooner a disturbance of behaviour is dealt with, the better. In Cornwall half the children referred to the child psychiatrist are over 10 years of age, and even then there is not time to deal fully with their problems.

No scheme of improving the mental health services will succeed unless an adequate number of psychiatrists is available to staff the expanded domiciliary and outpatient services. Ferguson has drawn attention to the danger of trying to run a service without sufficient time for the psychiatrist to do his best work. In this branch of medicine time is of the essence. No psychiatrist can do his best work if he is conscious all the time of the pressure of the waiting room or if his sessions often extend 1½ or 2½ hours longer than their appointed time. Unless enough psychiatrists are appointed to do their work quietly and without stress it is impossible to expect any great expansion of domiciliary and outpatient care.

Perhaps I could best summarize this rather diffuse account of the mental health services by describing what we have and what we hope to have in this part of the county. We have included a psychiatric department in the new area hospital which is about to be commenced on the outskirts of Truro. There are psychiatric outpatient sessions already in existence in this part of the county, but they need to be greatly expanded as they are suffering from extreme pressure of numbers. The field staff of mental health workers has already been doubled, and the first social club for the mentally ill has been commenced in Falmouth.

The regional hospital board propose to build an assessment and short-term treatment centre and day hospital for the elderly,
in association with the active Geriatric Treatment Centre at Barncoose, Redruth. We hope to see this started next year. Patients from this unit will either go home, or go to one of the old folks' homes in existence in this area; to a home for frail ambulant elderly people recently opened at Camborne; or to the psychiatric home for elderly confused patients which is in course of being built at Redruth.

In this section of the mental health services there is an obvious gap. There is no consultant psychiatrist living in this area to cope with the psychiatric services in the area and—with the help of supporting staff—run a domiciliary service on the lines of Querido and Carse. Unless a consultant psychiatrist comes to live here, we will not be able to run an intensive domiciliary service which has been found to be so useful to patient and doctor alike elsewhere. This psychiatrist could still have some beds in St Lawrence's Hospital at Bodmin, and visit the patients there in much the same way as consultants in other branches of medicine do rounds in general hospitals. His supporting staff could include some mental health nurses to form the nucleus of a mental home nursing service for patients in need of it. I regard the establishment of such a domiciliary psychiatric service as one of the most pressing needs of the day.

So far as the other branches of the mental health service are concerned, we have a child guidance service which is grossly overworked and needs expanding. We have outpatient sessions for the mentally subnormal, and at Redruth training centres for juniors and adults are in course of construction.

I have given you my own view of the direction in which I think we should go. Our speed will depend principally on two factors—first, the enthusiasm of those responsible for planning and running the service, and second, the friendship—not co-operation but friendship—between those of us in the different branches of the service.

I would like to say how much I have valued the help of my friends, Dr J. F. Donovan, medical superintendent, St Lawrence's Hospital, and Dr T. S. Wilson, consulting geriatrician, Barncoose Hospital.

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