

# Middle Articles

## GENERAL PRACTICE OBSERVED

### Experiences of Two Preventive Clinics for the Elderly

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The wear and tear of advancing years bring on changes so insidious that the elderly either remain unaware of them or if they notice them accept the changes as inevitable. The dividing line between normal senescence and early disease is so narrow that the change is not appreciated.

This has led us to the setting up of two clinics for the elderly for the specific purpose of studying the incidence of illness in the *apparently* healthy.

#### Material

The general practitioner being the most important link in such a study the patient was asked to attend through him. This safeguarded continuity in the care of the patient from access to previous history to reference to hospital when found necessary.

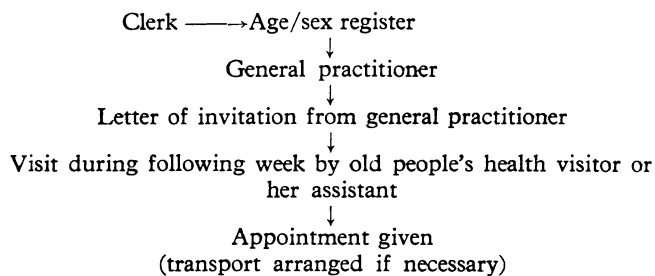
Two clinics based on such group practices have been started in Bristol, at (1) St. George Health Centre and (2) Corbett House. The St. George Health Centre houses two practices of five and three doctors respectively, with a total of 18,000 patients fairly representative of all age groups. The first clinic was started there in October 1964 and the second in October 1965 at Corbett House.

The types of elderly patient seen fell into two groups: (1) those selected at the month they reach 65—from the age/sex register, and (2) those over 65 referred by the general practitioner.

#### Method

The record of all patients reaching 65 in the coming month were extracted by the records clerk from the age/sex register and their notes submitted to their general practitioner, who removed the names of any already receiving regular treatment.

Invitation of suitable patients followed these steps:



The aim of the examination was to screen the patient thoroughly, an hour being thought long enough to subject an elderly patient to intensive examination. The investigations were confined to those which could be easily carried out with

standard equipment while giving a wide spectrum of information about those common pathological states expected in the elderly and amenable to treatment. These investigations comprised height, weight, temperature on a low-reading thermometer, pulse, blood pressure, haemoglobin (read directly on a spectrometer), and urine which was tested for albumin, sugar, and calcium by the Sulkowitch method. The patient then moved on to the doctor, who took a full history.

A complete physical examination was then carried out with special attention to foot defects, arthritic joints, and ears (for impacted wax), and included ophthalmic examination in a dark-room, tonometry by means of a Schiötz tonometer, and, in women, breast examination and a cervical smear. The examination was completed with an E.C.G.

At the end of the examination the doctor discussed the findings with the patient and any necessary treatment was arranged. Chiropody, dietetic advice, and physiotherapy could all be obtained at the clinic. The E.C.G.s were sent to an expert for interpretation, and all patients with a raised intraocular pressure were referred to the glaucoma clinic at the Bristol Eye Hospital. A chest x-ray examination was arranged for all patients with respiratory symptoms.

#### Results

At St. George in the first year 169 out of a total of 227 patients were selected by their general practitioners as suitable for study. In the second year 161 out of 226 were similarly selected. Table I gives a breakdown of these figures.

At Corbett House 156 patients were selected and it will be noticed from Table I that only a small number were aged 65.

TABLE I.—Source of Patients Studied

	St. George Health Centre		Corbett House
	1965	1966	1966
No. aged 65 .. ..	167	159	14
No. aged 66 and over ..	60	67	142
Total .. ..	227	226	156
No. under treatment ..			
excluded .. ..	58	65	
No. refused or not traced .. ..	56	51	44
No. still working, did not attend .. ..	7	10	6
No. accepted and studied	65 (40%)	64 (40%)	14 (100%)
Aged 65	41 (68%)	36 (53%)	92 (66%)
Aged 66+	24 (32%)	28 (47%)	14 (100%)
	106	130	105

*Age/Sex Distribution.*—At St. George the age/sex distribution for 1965 and 1966 being similar, the two sets of figures have been combined and are shown in Table II. These show that 64% of the patients seen were aged 65, 23% aged 66-70, leaving

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13% >70. At Corbett House the higher proportion of people in the older age groups as opposed to the 65-year-olds is shown in Table II. Only 13% were aged 65, as against 60% aged 66-70, leaving 27% >70.

TABLE II.—Age and Sex Distribution

Age	St. George 1965-6			Corbett House		
	Males	Females	Total	Males	Females	Total
65	52	79	131 (64%)	4	10	14 (13%)
66-70	17	31	48 (23%)	25	39	64 (60%)
71-75	7	6	13 (6%)	18	6	24 (22%)
76-80	4	7	11 (5%)	2	1	3 (3%)
81+	0	3	3 (1%)	0	1	1 (1%)

**Marital Status.**—The past and present marital status of these patients was also analysed (Table III). There was a close similarity between the two clinics.

TABLE III.—Marital Status

	St. George Health Centre 1965-6		Corbett House 1966	
	Males	Females	Males	Females
Married .. ..	66	72	37	31
Single .. ..	7	7	2	12
Widowed .. ..	5	47	10	14
Total .. ..	78	126	49	57

**Incidence of Illness.**—The incidence of illness in the 65-year age group was then compared with that in all ages (Figs. 1 and 2). The patients were classified into three groups: (1) quite fit, (2) single disability, and (3) multiple disability (no patient was found to have more than five disabilities). At St. George, at the age of 65, only 3.1% were considered to be physically and mentally fit. The percentage quite fit for all ages was 3.4%. Those with one disability only at 65 totalled 13.2%, compared

with 15% at all ages. This left a total of 83.7% with two or more disabilities at 65, and 81.6% at all ages. In contrast, at Corbett House the smaller number in the 65 age group led to a different picture with 7.1% quite fit at 65 and 8.4% at all ages. At 65 28.4% had a single disability and 15% at all ages. The remainder of the patients with multiple disabilities constituted 64.5% at 65 and 76.6% at all ages.

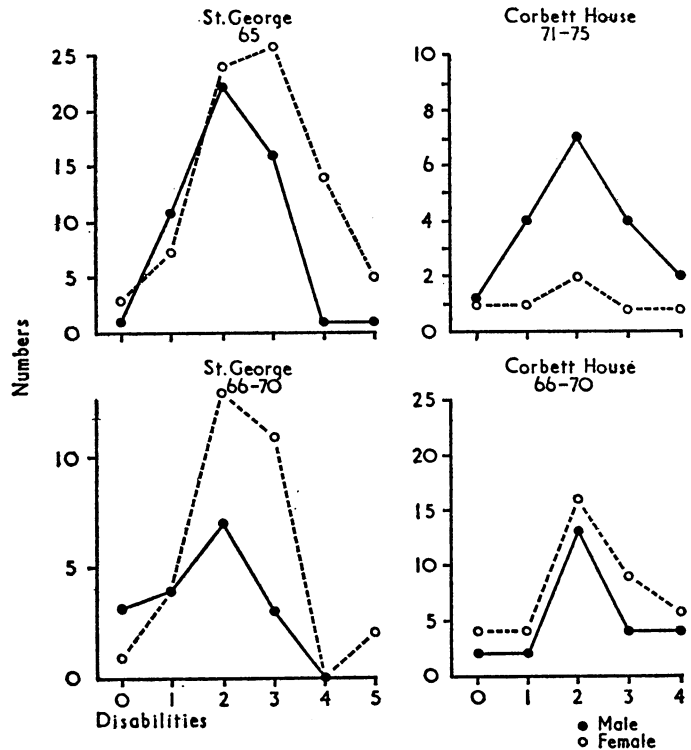


Fig. 3.—Sex and disability distribution.

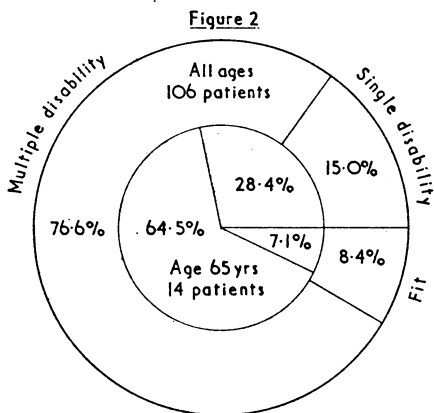
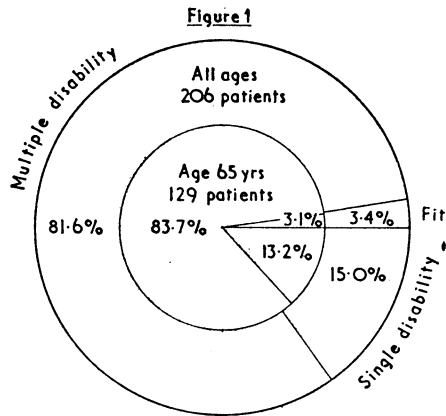


FIG. 1.—Incidence of disabilities. St. George Health Centre, 1965-6. FIG. 2.—Incidence of disabilities. Corbett House, 1966.

**Sex-disability Distribution.**—The numbers of disabilities were plotted against age group in each of the two sexes, and both curves are recorded in the same graph (Fig. 3). At St. George only two groups were compared—namely, 65-year-olds and those 66-70. The numbers above 71 years were too small to be valid. The same held true at Corbett House for the 65-year-old group, the two groups studied being 66-70 and 71-75. Fig. 3 compares dissimilar numbers in each sex, so that the relevant information derives from the shape of the

TABLE IV.—Types of Disabilities

	St. George				Corbett House			
	65		Over 65		65		Over 65	
	M	F	M	F	M	F	M	F
Cardiac	14	25	5	8	3	1	7	12
{ High B.P. > 170/110	6	6	5	4	0	0	7	3
{ Abnormal E.C.G. ..	11	3	3	2	1	0	11	1
Respiratory	4	2	1	2	2	1	3	2
{ Chronic bronchitis ..	4	2	1	2	2	1	3	2
Digestive disorders	9	35	5	14	0	4	9	16
{ Foot defects ..	9	35	5	14	0	4	9	16
{ Arthritis ..	8	36	5	20	1	2	7	12
{ affecting locomotion	8	18	2	3	0	1	8	13
{ Varicose veins ..	8	18	2	3	0	1	8	13
Weight disorders	6	20	3	0	2	4	6	6
{ Overweight ..	6	20	3	0	2	4	6	6
{ (10% > ideal weight)	6	20	3	0	2	4	6	6
{ Underweight ..	3	2	3	2	0	0	3	3
Low Hb (< 12 g./100 ml.)	3	8	2	0	0	0	2	2
{ ..	3	8	2	0	0	0	2	2
{ ..	1	4	0	0	0	0	1	6
{ Cataract ..	1	4	0	0	0	0	3	2
{ Myopia ..	2	4	0	0	0	0	3	2
{ Glaucoma ..	0	2	0	2	0	0	0	1
Hearing defects	6	14	3	6	0	1	4	5
{ ..	6	14	3	6	0	1	4	5
Mental disturbances	0	2	1	4	0	0	0	1
{ ..	0	2	1	4	0	0	0	1
{ ..	1	0	1	0	0	0	5	3
{ ..	1	0	1	0	0	0	5	3
{ ..	1	6	1	1	0	0	3	0
Miscellaneous	0	1	0	2	0	0	3	0
{ Herniation ..	0	1	0	2	0	0	3	0
{ Skin disorders ..	0	2	0	2	0	0	0	1
{ Endocrine and metabolic disorders	0	2	0	2	0	0	0	1
{ Gynaecological ..	0	2	0	2	0	0	0	1
{ Neurological ..	1	3	2	0	0	0	1	2
{ Genitourinary ..	2	0	3	0	0	0	0	0
Abnormal urinary findings	14	20	4	9	2	2	8	7
{ Calcium ..	14	20	4	9	2	2	8	7
{ Albumin ..	2	4	0	0	0	0	0	0
{ Sugar ..	0	2	0	0	0	0	0	0

graph. The tendency in the male is for a sharp rise followed by an equally sharp fall. Among females there is a tendency towards a plateau effect.

*Types of Disabilities.*—The disorders were classified according to the system affected and to abnormalities found on common routine tests. All others were placed under the heading miscellaneous (Table IV). For comparison these were divided into the 65-year-olds and the over 65s, and further subdivided according to sex. Only 12 were found to have a major occult disorder which if untreated could have been fatal. These were two diabetics (both women), one patient with grade I carcinoma of the cervix, and nine with severe anaemia (haemoglobin below 50%), of whom six were women. In each case the anaemias were of the iron-deficiency type. A far more common picture was the patient with two or three disabilities, each minor in itself and often thought to be a normal part of advancing age but which together constituted a severe disablement. The pattern of disabilities showed a marked contrast between the sexes (Table IV).

### Discussion

The initial aim of studying the incidence of disease in the apparently healthy has shown that in two clinics in different parts of the city the number of patients available for study follows a definite pattern. When the patients are extracted from the age/sex register, approximately one-third over the age of 65 are already ill. Among the remainder there is a much higher acceptance rate in those aged 66 and over as compared with the 65-year-olds, if the figures from St. George are considered. About 40% of all patients of 65 and 60% of those 66 and over were studied, which would suggest that at 65 many probably still feel fit and not in need of a check, whereas the older age group are probably becoming conscious of various disabilities.

When the marital status was next considered the striking fact that emerged was that both clinics showed a very similar pattern. At 65 there is already a predominance of women—many have been already widowed and may have had to face up to 20 years of life without a partner, though over 50% will have moved to live with one of their children. This cross-section therefore follows the national trend.

Next the incidence of illness was considered. At St. George, where two-thirds of all patients seen were aged 65, the impression was that the pattern of future disability was already determined at that age, since there was very little difference between the incidence of single and multiple disabilities on comparing the 65-year-olds with all ages (see Fig. 1). This, however, could be a false impression resulting from the large number aged 65. At Corbett House, however, where the 65-year-olds make up only 13% of the total, the incidence of multiple disabilities rose with age, whereas the percentage of single disability was the same as that recorded at St. George (15%). The increase, however (from 64.5 to 76.6%), may not be as significant as appears at first sight, since it results from a rather higher proportion of single disability (28.4%) in a small number of patients (14). The figure of 76.6% with multiple disabilities at Corbett House follows closely that of 81.6% at St. George and would tend to confirm the impression that the pattern at 65 dictates that in the older age group. So if the pattern in the population reflects the one in the study, when patients are examined at 65 the vast majority (over 90%) will be in need of advice and treatment to maintain a reasonable standard of health.

When the distribution of disabilities between the sexes is then considered, the shape of the curves shows that with men the number of disabilities increases sharply, then falls off suddenly, which would suggest that, in men, mortality overtakes morbidity. With women the number of disabilities tends to

increase gradually, reaching a plateau before decreasing again—a feature consistent with greater longevity in which morbidity does not usually have a fatal outcome.

An analysis of the types of disabilities showed that while this form of routine examination will reveal a few cases of potentially fatal diseases such as diabetes or carcinoma of the cervix, its great value lies in the discovery of a vast number of minor disabilities already present at 65 but not yet troubling the patient, which if left undiscovered and untreated will result in severe handicap and greatly limit their ability to cope with and enjoy life unaided.

It can be argued that these findings of a significant amount of unsuspected illness in a highly selected group of patients are not representative of the city of Bristol as a whole. The figures from the 1% sample census for April 1966 were as follows:

Total = 43,305  
Females >65 = 16.1%      Males >65 = 13.1%  
Total population 65 = 13.1%

If these figures are compared with the age/sex distribution in the practices at St. George in 1966 (Table V) it becomes evident that the findings at St. George parallel those of the city of Bristol and can therefore be looked on as fairly representative.

TABLE V.—Percentage of Patients in Two Practices at St. George Health Centre

Subjects	Practice A			Practice B			Average
	Subjects as % Practice	Patients > 65		Subjects as % Practice	Patients > 65		
		As % Practice	As % of Same Sex in Practice		As % Practice	As % of Same Sex in Practice	
Males . .	48	4.1	8.5	48	6.5	13.5	11
Females	52	7.0	13.5	52	10	19.2	16.35

When these figures are extrapolated on a national scale, remembering that by 1975 there will be 7,000,000 old-age pensioners in Great Britain (Godber, 1961) the maintenance of health in those over 65 becomes a major concern. The early detection of unsuspected chronic illness would appear to be the best way of preventing future ill-health. This is the basis of the concept of a preventive clinic for old people (Beattie, 1963).

These periodic examinations will show what self-reporting of minor illnesses has failed to achieve (Williamson *et al.*, 1964; Richardson, 1964). In the long run this early detection avoids hospital admission, as has been shown at Rutherglen (Anderson and Cowan, 1955), and must inevitably reduce the demands made by the aged on the community as a whole.

### Conclusion

The results of this study have shown in the two groups of patients fairly representative of the city of Bristol that the pattern of disability has already been determined at 65 and heralds the pattern to be found at an older age.

It would seem reasonable to have a routine examination of all patients at 65 in the same way as all school leavers are examined, as at this age most of the disabilities are already apparent at a stage when they can be treated, and as this is also the time of retirement the patients can be helped to adapt physically and mentally to their new way of life.

### Summary

The establishment of two preventive clinics for the elderly is described and the findings reported. The 65-year-old patients were extracted from the age/sex register and the

apparently healthy invited to attend. Approximately two-thirds accepted. The incidence of illness was studied, patients being divided into three groups: (1) quite fit, (2) with a single disability, and (3) with multiple disabilities.

Group 1 was very small (3 and 7%) in the two clinics, while group 3 made up more than 80%. The breakdown of disabilities showed only a small number with major occult disease—the majority had two or three minor diseases which if allowed to progress would constitute a severe handicap. The striking feature was that the number of disabilities did not increase markedly with age. It would seem that the pattern of future disability is already determined at 65. A case is made for the establishment of preventive clinics at or before the age of 65.

I wish to thank Professor R. C. Wofinden for his help and encouragement in starting the clinics, and the House Committee of St. George Health Centre (Chairman, Dr. G. L. Foss); also Dr. R. P. Golding and Dr. R. Brown at Corbett House for their co-operation in providing the patients, and Mr. W. B. Fletcher for his help in preparing the record forms.

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## Review Body on Doctors' and Dentists' Remuneration

*The Ninth Report of the Review Body\* was published on 7 May. Printed below is the Summary of Conclusions (slightly abbreviated) and the Summary of Recommendations as they appear in the report. The numbers are those of the paragraphs in the report. Leading article p. 319.*

203. As we have explained in Chapter II, this review has taken place in circumstances of unusual difficulty. Like everyone else, doctors and dentists cannot escape the realities of the economic situation or the application of incomes policy. But, as we have emphasized, they should not be subjected to greater restraint than other sections of the community, particularly those to which the Royal Commission had regard when formulating their recommendations on the remuneration of doctors and dentists in 1960.

204. In Chapter III we have discussed the case put forward by the representatives of both professions for a general increase in remuneration to take account of increases in the cost of living and movements in outside wages and salaries which have occurred since we made our Seventh Report and those which might be expected to occur during the period that it was assumed might be covered by the present review. We have pointed out the difficulty of making any adjustments for these factors in view of the uncertainty both of future economic developments and of incomes policy, and we have decided on this occasion not to make recommendations to cover the next two years. In following that course at our last review we made allowance for expected economic changes up to the present time. Since in our view the present general level of doctors' and dentists' remuneration cannot yet be regarded as having fallen seriously behind, we have concluded that we would not be justified in recommending an increase on this ground at present.

205. This conclusion is subject to two essential conditions. First, the principle of comparability must continue to be a main factor in assessing appropriate levels of remuneration for the medical and dental professions and the incomes policy must not be applied to them in a discriminatory way.

Second, we emphasize that, while we think that a general increase would not be justified at present, we cannot tell how long this state of affairs will last or how soon the twin principles of non-discrimination and comparability may require a general increase. We therefore propose to keep the position under review and should an increase be shown to be justified by movements in remuneration generally, or by changes in economic circumstances or incomes policy, we shall not hesitate to make the necessary recommendations to adjust the situation.

206. In the remaining chapters we have considered more detailed questions affecting the remuneration of general medical practitioners, hospital doctors and dentists, and general dental practitioners. In our Seventh Report we undertook a comprehensive reconsideration of the remuneration of general medical practitioners and of hospital doctors and dentists which led us to make recommendations altering both their pay structures and the relative levels of their remuneration. Moreover, we were then considering the remuneration of general medical practitioners in the context of an entirely new and complex system of payment. We did not therefore expect on the present occasion to conduct another far-reaching review but rather to identify and adjust any anomalies, to put right any undesirable consequences of the recommendations in our Seventh Report that might have come to light, and to take account, as appropriate, of any changes of circumstances which might have occurred in the two years since that report.

207. Our task has been complicated by the absence of any conclusive evidence on some of these matters. In particular it is not yet possible to estimate the effect of the recommendations in our Seventh Report on the remuneration of general medical practitioners, a deficiency which is due largely to the Government's decision to phase those recommendations in two instalments. It is also, in our view, too soon to estimate the

effect of our recommendations on the manpower situation, particularly as regards the rate of emigration among doctors, on which the evidence available to us was in any case unsatisfactory and out-of-date. In these circumstances we have concluded that no increase in remuneration would be justified on recruitment or retention grounds for the moment. Finally, it has not been possible to be sure to what extent the trend towards increasing work load in the two main branches of the medical profession continues, and this has complicated the task of deciding what account should be taken of this factor. Bearing in mind, however, that allowance was made for increased work load in the recommendations in our Seventh Report, we conclude that the method of remuneration for general medical and dental practitioners already makes reasonable provision for any further increase which has taken place since then or is likely to do so in the near future. While this hardly applies to hospital doctors and dentists, we have found insufficient evidence to justify a general increase in their remuneration at present, but we consider that efforts should be intensified to ease the burden of work load by a general reappraisal of the organization of the hospital service.

208. Our recommendations for general medical practitioners are therefore mainly confined to an allowance to cover the increase in the expenses element (apart from direct reimbursement) in their remuneration. We have dealt with this by recommending additions to the basic and supplementary practice allowances. For the rest we have made certain limited recommendations for improvements in individual items of payment where these seem to us to be necessary.

209. We have made two main recommendations affecting hospital doctors and dentists. The first is for an improved salary scale for medical assistants in order to reflect the changing nature of this grade. Second, we have recommended increases in the numbers of distinction awards for consultants in recog-

\* *Review Body on Doctors' and Dentists' Remuneration. Ninth Report, 1968, Cmnd. 3600. H.M.S.O. 6s. 3d. net.*