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L'EVOLUTION DES DESPENSES POUR LES SOINS DE SANTE DANS LE ROYAUME-UNI PENDANT LA PERIODE 1970-1976

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INTRODUCTION

The principal object of the study, set out in Dr. Dejardin's model report of 1st February 1979, is to quantify the factors influencing the annual growth in public expenditure between 1970 and 1976 on the following services: general medical care, specialist medical care (excluding in-patient hospital care), dental care, diagnostic radiology, pathology investigations, physiotherapy, surgery (excluding in-patient hospital surgery), and home nursing care. The method proposed by Dr. Dejardin for identifying the factors influencing changes in public expenditure on these services acknowledges the diversity of these influences, but seeks to take particular account of three factors: changes in the average cost of providing each item of service, changes in the number of beneficiaries, and changes in the average number of items of service received by each beneficiary per year. Accordingly, in his model report, Dr. Dejardin set out these data for Belgium between 1970 and 1976, and analysed them in a way that enabled conclusions to be drawn about the relative influence of each factor upon the year-to-year changes in public expenditure in each category of service provision.

An important assumption underlying Dr. Dejardin's method is that changes in expenditure in each category may be caused by changes in any of the three factors described. Such an assumption is most valid in systems which remunerate health care providers on a fee-for-service basis, where changes in expenditure from year to year will be influenced by changes in the number of beneficiaries, their demand for services, and the cost to public funds of each service provided. However, the assumption is less valid in national health service systems, where the level of expenditure in any year is, to a large degree, allocated by central government at the beginning of the year and is not directly determined either by the number of beneficiaries or by the items of service they receive. Because no price is charged to the consumers of services, health care providers in such systems are usually remunerated by salary or by capitation payments, and the level of public expenditure on remuneration does not depend upon the number of patients for whom they provide care or the volume of work they do. Changes from year to year in the number of beneficiaries affect the level of expenditure only to the extent that they determine the volume of capitation payments.

The National Health Service (NHS) in the United Kingdom makes much greater use of salaries and capitation payments than of fees for services

performed. Of the groups of workers in this study, hospital doctors, home nurses, radiographers, laboratory technicians and physiotherapists are remunerated for their NHS work almost entirely by salary. General medical practitioners are remunerated in a complex way that combines elements of salary, capitation payments, allowances and some direct fees for services performed. General dental practitioners approximate most closely to the assumption underlying Dr. Dejardin's method, for their remuneration for NHS work performed consists almost entirely of fees for specific items of care; but even here the fee schedules are determined in such a way that the 'average' dentist completing an 'average' volume of work will receive a predetermined target level of remuneration.

In short, the methods used in financing the National Health Service in the United Kingdom invalidate the application of Dr. Dejardin's model to the analysis of expenditure changes in this country. Total NHS expenditure in any year is mostly budgeted in advance by the Government as part of its overall strategy for public expenditure, and various administrative mechanisms are employed to ensure that the budgeted levels of expenditure (in cash terms) are not exceeded. The only areas of concern to this study in which expenditure may vary in response to the three factors identified by Dr. Dejardin are the capitation and fee-for-service payments to general medical practitioners (which together account for about half of the total expenditure on general medical services), and the fee-for-service payments to general dental practitioners. For most of the services, the important question is not that of identifying the relative influence of the numbers of beneficiaries and their demand for care on the level of expenditure, but rather that of the ways in which the demand for care is contained within the pre-determined level of resources available to meet it. The determinants of changes in expenditure in the United Kingdom must be sought principally at the macro-political level, and must focus upon the influences and pressures to which the Government responds in compiling its annual public expenditure plans. A brief note on this is added at the end of the report.

For these reasons, the application of Dr. Dejardin's methodology to the United Kingdom is regarded as inappropriate. However, data comparable to those used in Dr. Dejardin's report are available for most of the services in question, and the tables in this report present, for each service, the best available information on the number of beneficiaries in each year

between 1970 and 1976; the expenditure from public funds in each year at current and constant prices; the average number of items of service per beneficiary; and the average expenditure per item of service. The quality and completeness of the data vary considerably from item to item, and, following the decision at the meeting of experts on 29th March 1979, care has been taken to describe as precisely as possible the sources of each item of information and the definitions they embody. As agreed, a brief note is also given of the organisational features of each service.

In addition to these detailed comments, which are set out in the subsequent sections of the report, some general comments are offered here about the data as a whole. First, all the information relates to England and Wales only unless otherwise indicated. Data from Scotland and (particularly) Northern Ireland are less readily accessible and are not always comparable with the English and Welsh statistics. In the time available, it was not possible to gather data for the whole of the United Kingdom and present it in a comparable form. Second, the definition of 'beneficiary' that was agreed at the meeting of experts on 29th March 1979 includes the total population of England and Wales because the services provided through the National Health Service are available to all citizens unconditionally. The population estimates for England and Wales, by age and sex, are therefore contained together in Table 1, and are not repeated for each separate service. Third, all the data in this report relate to the years 1970-76. It was agreed at the last meeting of the experts that, if possible, the series should be extended back to 1966, but there are serious difficulties in doing this for some (though not all) of the information for England and Wales. It has not proved possible in the time available to extend the time span for all items of information, and so for the sake of consistency and comparability the data are limited to the period for which a complete set is available (1970-76). Fourth, the report is confined to published information only. Better information may exist in unpublished forms, but it has not been possible in the limited time available to explore sources of unpublished as well as published data.

The final introductory comment concerns the presentation of expenditure data. Although Dr. Dejardin's model report presents annual expenditure at current prices, there was a feeling among the experts at their meeting in March that, as far as possible, expenditure figures should be

expressed also in volume terms - that is, after allowing for the effects of price changes. There is no easy way of adjusting the annual expenditure figures in the National Health Service to take account of this. Various deflators might be used including the gross domestic product deflator, the consumer price index and the index of average earnings. Of these, the index of average earnings may be the most appropriate, since some two-thirds of NHS expenditure is allocated to wages and salaries. However, an alternative deflator, based on total NHS expenditure, can be computed for each year by dividing NHS expenditure at current prices by expenditure at constant (1970) prices. The figures for doing this, drawn from the national income and expenditure statistics published annually by the Central Statistical Office, are set out in Table 2, together with the resulting deflators. The expenditure figures at current prices are revalued to 1970 prices principally through changes in the number of staff employed in different grades and ranks in the NHS. The deflator for each year, set out in the third column of Table 2, is applied to each group of services in this report to convert current-price to constant-price expenditures. The important point to note about this method is that the deflator it employs is based on constant-price expenditure in the National Health Service as a whole. Separate deflators are not available for each service included in the study.

GENERAL MEDICAL SERVICES

(a) Organisation General medical services are provided by general practitioners (GPs), of whom there were 23,377 in England and Wales in 1976. Of these, 21,837 (93%) were unrestricted principals, 302 (1%) were restricted principals, 419 (2%) were assistants, and 819 (4%) were trainees. An unrestricted principal is a practitioner who provides the full range of general medical services and whose list is not limited to any particular group of patients. A restricted principal is a practitioner who either provides maternity services only, or who provides the full range of general medical services but whose list is limited to the staff or residents of particular institutions. An assistant is a practitioner who acts as an assistant to a principal. A trainee is a practitioner employed for a maximum of one year for the purpose of being trained in general practice and for whom the trainer receives a training grant.

Increasingly, general practitioners are working as members of primary health care teams. It was estimated that for every 100 GPs in England in 1974 there were 36 practice nurses, 56 domiciliary nurses and 38 health visitors working with primary health care teams. The number of practices with employed or attached nurses has increased substantially in recent years, from fewer than 2,000 in 1966 to more than 6,500 in 1974. The growth of ancillary staff in general practice (especially nursing staff) is important in understanding trends in the delivery of services by GPs, for part of the nurses' workload consists of service items which would otherwise be performed by the GP himself. The development of primary health care teams may therefore affect the content of the doctor's work in ways that will be reflected in trends across time in the rate of GP consultations.

(b) Sources of data There is no national recording system of the frequency or content of consultations with general practitioners in England and Wales. Partial data are available from interview surveys with patients and from workload recording by general practitioners. Interview surveys with patients are usually ad hoc studies in which random population samples are questioned about the number of consultations they have had with general practitioners in a specified time period. Information from such surveys is not routinely available over time. The only source of continuous data in England and Wales about trends in the use

of general medical services is the General Household Survey (GHS), based upon a sample of the population resident in Great Britain, and conducted since 1971 by the Social Survey Division of the Office of Population Censuses and Surveys (OPCS). Some 15,000 households are sampled each year, and a response rate of about 85% is achieved. The GHS includes questions on population, housing, employment, education and health.

The recording of workload by general practitioners is voluntary, and is un unreliable source of data about the services provided in general practice. Many GPs have kept more or less detailed records of their workloads, either over a period of several years or for shorter periods of time, and some of these records have been published. However, because the GPs who keep such records are self-selected, and because the definition of terms and the quality of the recording is variable, these reports are of little value in mapping time trends in consultations. On two occasions the Royal College of General Practitioners (RCGP), in collaboration with the Office of Population Censuses and Surveys, has organised a group of some 120 GPs in England and Wales in keeping comparable morbidity records for a period of one year, and the results have been published. These two National Morbidity Surveys were carried out in 1955/6 and 1970/1, and some items of information were common to both. The studies were, however, designed principally as morbidity surveys, and although they contained detailed information on consultation rates, they did not include any information about the items of service given to patients. Moreover the participating doctors, although geographically spread throughout England and Wales, were not in any sense a representative sample.

Information about public expenditure on general medical services is available in the audited accounts of the National Health Service, published annually by Her Majesty's Stationery Office as a House of Commons Paper.

(c) Consultation rates with general practitioners From the data sources described above, the 1970/1 National Morbidity Survey by the RCGP and the OPCS has been used as the source of information on consultation rates in 1970, and the General Household Survey for consultations in the years 1971-6. Valid comparable data for the period before 1970 do not exist. In the National Morbidity Survey, each participating GP recorded each consultation made by all patients during the course of the study year, and the average number of consultations per patient per year was

calculated by dividing the total number of consultations made by patients in each age- and sex-group by the number of patients in each group registered with the practices. A consultation was defined as any face-to-face contact between doctor and patient, at home or at the practice premises. Advice by telephone, consultations with ancillary staff, and prescriptions repeated without consultation were not included.

The data from the General Household Survey are drawn from replies to the following question: 'During the two weeks ending last Sunday, apart from visits to a hospital, did you talk to a doctor for any reason at all?' In response to a positive reply, respondents were further asked: 'How many times did you talk to him in these two weeks?' and 'Was the doctor a GP (family doctor), or was he a specialist, or was he some other kind of doctor?'

It is clear that the definition of a consultation is not comparable between the two studies, for whereas the National Morbidity Survey was restricted to face-to-face consultations, the GHS definition includes all consultations, whether or not they are face-to-face. Because of its more liberal definition of a consultation, the General Household Survey would be expected to show the higher average consultation rate.

Table 3 sets out the mean number of GP consultations (as defined above) by each person in the years 1970-76. The data are categorised by sex and age, and they show, for each category, the percentage changes from the preceding year from 1972 onwards. Because of the different sources of the data for 1970 and 1971 onwards, it is not valid to compute the percentage changes between these two years.

(d) Items of service No regular method exists in England and Wales for recording the specific items of service given by general practitioners, other than prescriptions dispensed, sickness absence certificates issued and the small number of fee-for-service items delivered. Records of these items are kept routinely for financial and administrative reasons. Several ad hoc studies of the content of the GP's work have been carried out in individual practices, but the results of such studies are totally inadequate as the basis for year-to-year trends.

(e) Public expenditure on general medical services Table 4 sets out the public expenditure on general medical services in England and Wales for the financial years 1969-70 to 1975-6. The data on expenditure at current prices are taken from the audited accounts of the National Health Service, and they include all payments made to GPs including fees, grants and allowances, direct payments for ancillary staff and practice accommodation, and superannuation contributions. The data on expenditure at constant 1970 prices are calculated by dividing the current-price expenditures in each year by the NHS deflator for the corresponding year (see Table 2).

Table 4 also sets out, for each year, the mean expenditure per consultation at current and at constant 1970 prices. These are derived by dividing the total expenditure by the total number of consultations recorded in the National Morbidity Survey (1970) and the General Household Survey (1971-6); they do not therefore in any way explain the level of expenditure on general medical services, and for this reason they cannot be used as independent variables in a model such as that proposed by Dr. Dejardin.

As in all the calculations in this report which relate items of service to their costs, there is a discrepancy between the time spans covered by the two sets of data: the data on consultations refer to calendar years in the case of the General Household Survey and the year October-September in the case of the National Morbidity Survey, whereas the data in expenditure refer to financial years ending on 31st March. It is technically possible to adjust the data to overcome this problem, but the benefits of doing so for the purposes of this study do not outweigh the time costs involved, for the principal interest in this study lies in broad trends over time, not in the detailed expenditure per item of service in any one year.

SPECIALIST MEDICAL SERVICES, EXCLUDING IN-PATIENT CARE

(a) Organisation The term 'specialist medical care' in the United Kingdom is conventionally used to describe the care given by hospital doctors working in the recognised specialties of medical practice. In 1976 there were 28,274 whole-time equivalent consultants in England and Wales, 2,154 senior registrars, 4,862 registrars and 10,487 house officers and senior house officers. These figures are expressed as whole-time equivalents in order to allow for time spent on work outside the National Health Service, and they are calculated by dividing the total number of half-days worked by 11 (in the case of consultants) or dividing the total number of hours worked by 38.5 (in the case of other grades).

Much of the care that is given by specialists is given to hospital in-patients, who are outwith the scope of this study, but four opportunities exist for specialist services to be available to non-inpatients. First, consultants in most specialties hold regular out-patient clinics at which they see patients who have been referred to them by general practitioners, and where they provide follow-up specialist care to patients who have been discharged from hospital. Patients who are referred to out-patient clinics by GPs may be admitted by consultants for in-patient care, they may be treated by them on an out-patient basis, or they may be sent back to the GP for treatment after specialist diagnosis. Second, the specialty of accident and emergency care is freely available to members of the public without referral from a GP, and a range of medical and surgical treatments are given on a non-inpatient basis in these hospital departments. Third, patients may receive specialist care in hospital as day cases, that is, without occupying a bed overnight. Fourth, a consultant may, at the request of a general practitioner, carry out a domiciliary consultation in the patient's own home.

(b) Sources of data As part of the national data-recording system in the National Health Service, hospitals and clinics providing specialist services are required to make annual returns to the Department of Health and Social Security on in-patient and out-patient services, classified by the consultant's specialty or department. These returns (which are known as 'SH3 returns' from the number of the form upon which they are made) are used as the source for many of the NHS hospital administrative statistics published annually by Her Majesty's Stationery Office in the Health and

Personal Social Services Statistics for England and Wales. They include information on the number of new out-patients, the number of out-patient attendances, the number of accident and emergency attendances, and the number of day-case attendances.

Information about public expenditure on specialist medical services is available in the annual Costing Returns published by the Department of Health and Social Security and the Welsh Office. These returns were titled 'Hospital Costing Returns' until 1973 and 'Health Services Costing Returns' from 1974 onwards, but they are referred to for convenience throughout this report as the Health Services Costing Returns.

(c) Out-patient attendances Table 5 sets out the mean number of attendances at NHS hospital out-patient clinics per head of the population for the years 1970-6. The figures include all specialties except accident and emergency, which is dealt with separately below. An out-patient attendance, of which a patient may make several in the course of a single spell of treatment, includes attendance for both treatment and advice, and each attendance is included in the year in which it occurred. The published data can be further classified by region and specialty, but that is not done in this report. Percentage changes from preceding years are given in brackets.

(d) Accident and emergency attendances Table 5 also sets out the mean number of attendances at NHS hospital accident and emergency departments per head of the population for the years 1970-76, together with percentage changes from preceding years. The attendances recorded are those of patients who arrived at a hospital unannounced and were seen and treated otherwise than at a consultant's out-patient session.

(e) Day-case attendances Table 5 further shows the mean number of day-case attendances in all specialties at NHS hospitals per head of the population for the years 1972-76. (Information about day-case attendances is not available prior to 1972.) Day-case patients are defined as non-residents who attend hospital for investigation, therapeutic tests or other treatments, and who require some form of preparation or period of recovery involving the provision of non-residential accommodation and services. About three-quarters of all day-case attendances occur in the surgical specialties, and about a further 15% in the medical specialties.

(f) Consultant domiciliary consultations No information is published about the number of domiciliary consultations made by consultants. From a small number of studies of general practitioners' referral behaviour it appears that about 5% of all out-patient consultations undertaken by consultants occur in patients' homes; but the available data are quite inadequate to plot year-to-year trends.

(g) Items of service The data summarised in Table 5 refer to attendances. No data are published about the specific items of service that are given during the course of out-patient, accident and emergency or day-case attendances.

(h) Public expenditure on specialist medical services The apportionment of total hospital expenditure between the different forms of specialist care described above is fraught with difficulty, and all figures must be regarded as approximate indicators only of the broad magnitude of expenditure. The fullest sources of information are the annual Health Services Costing Returns, but these are of variable quality and consistency during the period under review. The Returns for each of the financial years ending 31st March 1970-73 show the total NHS expenditure on hospital out-patient departments in English and Welsh hospitals. These expenditure fugures combine out-patient clinics, accident and emergency departments and day-patient attendances, and they do not enable expenditure on each individual service to be itemised separately. The Returns for the years ending 31st March 1974 and 1975 are less detailed than those of previous years because of the need to reduce the workload of the health authorities during and after the NHS reorganisation. In addition, the 1974 Returns exclude data from four regions and seven London teaching hospitals, and the returns from several other authorities are incomplete. The 1976 Health Services Costing Returns are the first to be produced under the revised system of accounts and cost analysis introduced into NHS hospitals on 1st April 1974. They are more detailed than those of previous years in that they separate out the expenditure on out-patient, day-case, and accident and emergency attendances, but because of the revised accounting procedures on which they are based, they are not comparable with those for earlier years. In none of the years under review is the cost of domiciliary consultations by specialists known.

The following procedures have been adopted in coping with this material. The combined expenditure on out-patient, day-patient, and

accident and emergency attendances have been derived for 1970-73 and for 1976 by aggregating the total expenditure on these services in each year from the data supplied in the Health Services Costing Returns for each category of hospital. The figures include English and Welsh teaching and non-teaching hospitals, and they encompass all types of hospitals. Because of the deficiencies described above in the 1974 and 1975 Returns, the combined expenditure for these two years has been estimated by assuming that it represented the same proportion of total NHS expenditure as the average proportion for the years 1970-73 (that is, 6.13%). Table 6 sets out these combined expenditure figures, at current and constant prices, for each year between 1970 and 1976. The expenditure figures at current prices are taken directly from the Costing Returns; the figures on expenditure at constant 1970 prices are calculated by dividing the current-price expenditures in each year by the NHS deflator for the corresponding year (see Table 2). Table 6 also shows the mean expenditure for each attendance, at current and constant prices. This is calculated by dividing the combined expenditure by the combined numbers of out-patient, day-case and accident and emergency attendances in each year. Because of the lack of comparability in the expenditure figures over the period under review, the year-to-year changes have not been computed in Table 6. Expenditure on domiciliary consultations by consultants has been ignored.

From published information, the only way in which the combined expenditure figures in Table 6 can be disaggregated into the component categories of out-patient, day-case and accident and emergency attendances is by applying the 1976 distribution of expenditure between these three services to the combined expenditure in previous years. This distribution is known only for 1976 because, as explained above, the Health Services Costing Returns for that year distinguished between the three categories of services for the first time. From the 1976 Returns it is calculated that 79% of the combined expenditure in that year went to out-patient attendances, 20% to accident and emergency attendances, and 1% to day-case attendances. By dividing the combined expenditure figures for each of the years 1970-75 in these proportions, estimates are derived of the expenditure on each of the three services in those years. These estimates can in turn be used to compute the mean expenditure per attendance, in 1970 prices, for each type of service. Table 7 sets out the results, but because of the tenuous assumption upon which they rest, they should be regarded as only very broadly indicative of the real world.

GENERAL DENTAL SERVICES

(a) Organisation General dental services are provided by general dental practitioners, of whom there were 12,054 in England and Wales in 1976. Of these, 11,872 (98%) were principals and 182 (2%) were assistants. Unlike general medical practitioners, dentists in the National Health Service are paid almost entirely by fees based upon the actual items of service they provide, and they do not therefore have lists of registered patients. Dentists are free to mix NHS and private work in whatever way they wish, and patients seeking treatment under the National Health Service must find a dentist willing to provide such treatment at the beginning of each course of treatment. An increasing proportion of general dental care is provided privately, and some forms of treatment are almost impossible to obtain through the NHS. The changing balance between NHS and private dental treatment is an important background factor in understanding time trends in the provision and cost of services. The data set out below refer only to courses of treatment provided under the National Health Service, and to the net cost paid from public funds. With the growth of private dental care they may increasingly misrepresent changes in the total output and costs of dental services in England and Wales.

(b) Sources of data Because dentists are paid on a fee-for-service basis, records are made of all items of dental service provided through the NHS. Information from these records is processed by the Department of Health and Social Security and the Welsh Office, and published annually in the Health and Personal Social Services Statistics for England and Wales. All the data in this section on courses of treatment are drawn from these sources. It should be noted that patients may have more than one course of treatment in a year, and the data therefore represent the number of courses of treatment provided, not the number of patients treated. General anaesthetics have been excluded from all the data.

Information about public expenditure on general dental services is available in the audited accounts of the National Health Service, published annually by Her Majesty's Stationery Office as a House of Commons Paper.

(c) Courses of dental treatment Table 8 sets out the mean number of courses of treatment, including emergency treatment, per head of the population for the years 1970-6. The data distinguish between the principal categories of treatment, and they show, for each category, the percentage

changes from the preceding years. The total number of courses of treatment and emergency cases in each year are derived from a full count of the treatments for which payment was scheduled during that year. The figures for each separate type of treatment are derived from a sample of the forms used by dentists for claiming their fees for courses of treatment. The figures from 1973 onwards are based upon a 5% sample of all items of treatment; prior to 1973 the figures are based upon a 2% sample supplemented for certain items of treatment by a further 2% sample.

A full course of treatment, which may require several separate visits to the dentist, normally includes all the treatment necessary to secure dental fitness. Emergency treatment covers any treatment immediately required for the relief of pain or other urgent symptoms. The category 'diagnosis' includes examination, X-ray and report. The category 'conservation' includes scaling and gum treatment, fillings of permanent teeth, conservation of deciduous teeth, root treatment, inlays and crowning. The category 'extractions' includes the extraction of permanent and deciduous teeth and the removal of cysts, buried roots, impacted teeth, etc. The category 'dentures' includes the supply of, and repairs to, plastic, vulcanite and metal dentures. The category 'all courses' is based on a lower figure than the aggregate of each separate type of treatment, for different types of treatment that form part of the same episode of care (for example diagnosis and conservation) are classified separately.

More detailed data are available for the period in question showing a further breakdown of each major category of treatment, the categorisation of emergency cases, and the age and area of residence of patients receiving each type of treatment; but these are not included in this report.

(d) Public expenditure on general dental services Table 9 sets out the public expenditure on general dental services in England and Wales for the financial years 1969-70 to 1975-6. The data on expenditure at current prices are taken from the audited accounts of the National Health Service, and they include all fees, salaries, allowances and superannuation contributions; but they do not include the direct charges that are made to patients for some types of treatment. The data on expenditure at constant 1970 prices are calculated by dividing the current price expenditures in each year by the NHS deflator for the corresponding year (see Table 2).

Table 9 also sets out, for each year, the mean expenditure per item of treatment at current and at constant 1970 prices. These are derived by dividing the total expenditure by the total number of courses of treatment. Percentage changes from year to year are given in brackets in the Table.

RADIOLOGY

(a) Organisation The term 'radiology' is used to describe the medical use of radiation for the diagnosis and treatment of disease. With the exception of mobile mass x-ray units, radiology is a hospital-based specialty under the control of consultant radiologists, of whom there were 761 whole-time equivalents in England and Wales in 1976. The techniques of radiology are carried out by radiographers, whose training and qualifications are regulated by the Council for the Professions Supplementary to Medicine. In 1975 there were 5,880 whole-time equivalent radiographers in England and Wales, of whom about four-fifths were diagnostic radiographers and one-fifth were therapeutic or teaching radiographers.

Although radiology is a hospital-based specialty, it serves ambulatory as well as hospital in-patients. Patients may be referred for diagnostic or therapeutic radiology directly by general practitioners as well as from consultant out-patient clinics and from accident and emergency departments.

A mass miniature radiography (MMR) service, delivered through mobile x-ray units, is provided directly by the Regional Health Authorities. The service may be used in various ways, including for example the screening of population sub-groups such as employees in particular industries.

(b) Sources of data The work of hospital departments of radiology is measured as units of radiological treatment, and is recorded on the SH3 forms submitted to the Department of Health and Social Security and the Welsh Office. The data are subsequently published in the annual Health and Personal Social Services Statistics for England and Wales, distinguishing between units of treatment given to in-patients, out-patients, accident and emergency patients, and patients referred from general practitioners and other hospitals. This report is concerned with radiology services for non-inpatients only.

Statistics on the use of the mass miniature radiography service are also published annually in the Health and Personal Social Services Statistics, but they record the number of examinations performed, not the units of treatment given. (A miniature chest x-ray uses two units of treatment in the scale of values currently employed by NHS hospital departments of radiology, but it is not known whether a valid conversion can be made from numbers of examinations to numbers of units of treatment

simply by doubling up.) The published statistics of mass miniature radiography examinations make further distinctions between people examined as factory or office employees, volunteers from the general public, and patients referred by general practitioners.

Information about public expenditure on radiology services for ambulatory patients is available in the Health Services Costing Returns published annually by the Department of Health and Social Security and the Welsh Office.

(c) Units of treatment The upper part of Table 10 sets out the mean number of units of radiological treatment per head of the population delivered in NHS hospital departments of radiology for the years 1970-6. The figures distinguish between out-patients, accident and emergency patients, and patients referred from general practitioners;but they do not include units of treatment delivered to in-patients or to patients referred from other hospitals. The definition of a 'unit of treatment' does not enable any distinction to be made in the published statistics between units of diagnostic and therapeutic radiology.

The 'unit of treatment' is actually an indicator of resource input, not of service output, for it is a measure of the cost of materials used and of time taken. Each separate radiological examination requires a specified number of units, and a standard scale is employed in radiology departments showing the number of units required in each of about 200 separate radiological examinations. Thus, for example, arteriography uses 90 units, intravenous pyelography uses 60 units, and mammography of both breasts uses 30 units. A miniature chest x-ray, as noted above, uses 2 units. However, because the published statistics show only the total number of units of treatment, they do not permit identification either of the number or type of examinations performed or of the number of patients examined. Furthermore, the unit values were substantially revised in 1973, making comparison with earlier years invalid. For this reason, the percentage changes from 1972 to 1973 are not shown in the Table; for other years, the percentage changes from year to year are given in brackets.

(d) Mass miniature radiography examinations The lower part of Table 10 sets out the average number of mass miniature radiography examinations received by each person between 1970 and 1976. The data, which are drawn from a 10% sample of examinations, cover England and Wales for

1970-72 and England only for 1973-74. No information about the number of MMR examinations is available for either country after 1974.

(e) Public expenditure on radiological services As with the specialist medical services, expenditure data on hospital radiological services for ambulatory patients are extremely difficult to interpret, and must be regarded with great caution. The Health Services Costing Returns for the years ending 31st March 1970-73 give the average cost of diagnostic radiology services per 100 out-patient, accident and emergency and day-case attendances combined. It is not possible to distinguish the average cost of diagnostic radiology services separately for each of the three categories of attendance. The average costs are presented separately in the Returns for 18 different types of hospital in England and Wales, but because the number of attendances is also given for each type of hospital, it is possible to compute the total expenditure on out-patient diagnostic radiology services in each type of hospital, and hence to derive an aggregate for all hospitals in England and Wales. The Costing Returns for the years ending 31st March 1974 and 1975, as explained above, are less detailed than those of previous years, showing neither the average nor the total cost of out-patient diagnostic radiology services. The 1976 Returns are arranged in a different way to those of previous years, but by showing the average cost of radiology per out-patient attendance, and also the number of attendances, it is again possible to compute the aggregate expenditure for the country as a whole. However, it is possible from the 1976 Returns to do this for England only, not for Wales, and as noted above, the new system of accounting used in the 1976 Returns renders the data incompatible with those of earlier years.

The following procedures have been adopted in coping with this material. Expenditures on diagnostic radiology services for out-patient, accident and emergency and day-case attendances combined have been calculated from the 1970-73 Costing Returns in the manner described above. Expenditures for 1974 and 1975 have been estimated by assuming that they represented the same proportion of all expenditures on non-inpatient specialist services as the average proportion for the years 1970-73 (that is, 9.73%). The 1976 expenditure figures have been calculated from the Costing Returns for that year in the manner described above. Table 11 sets out these expenditure figures, at current and constant prices, for each year between 1970 and 1976, but because of the substantial lack of

comparability from year to year, percentage charges are not shown. The expenditure figures at current prices are taken directly from the Costing Returns; the figures on expenditure at constant 1970 prices are calculated by dividing the current-price expenditures in each year by the NHS deflator for the corresponding year (see Table 2). No information is given in Table 11 about the mean expenditure per unit of treatment, partly because of the lack of commensurability between the units of treatment set out in Table 10 and the expenditure data in Table 11, and partly because, as noted above, the units are themselves measures of resource inputs, not of service outputs.

Expenditure on the mass miniature radiography service is given in the annual National Health Service Accounts, published each year as House of Commons papers. This expenditure includes the salaries and wages of officers of the service and expenses other than salary and wages. Table 12 sets out the total expenditure on the service in England and Wales between 1970 and 1976, at current and at 1970 prices, and it also shows the average cost per examination between 1970 and 1974 (no information being available about the number of MMR examinations after 1974 - see Table 10).

PATHOLOGY

(a) Organisation Pathology work in the United Kingdom is conventionally classified into four departmental divisions: bacteriology and serology, chemical pathology, haematology, and histology (including surgical histology, post-mortem examination and exfoliative cytology). Most pathology investigations take place in hospital departments of pathology, under the control of consultant pathologists, of whom there were 1,070 in England and Wales in 1976. Requests for pathology examinations may be received by pathology departments from various sources, including other hospital departments, general practitioners (who usually have direct access to the services of hospital departments of pathology), and the Public Health Laboratory Service. In addition, many general practitioners perform some pathology analyses themselves, with equipment available in their own surgeries. There is no systematic record of the extent to which GPs carry out their own pathology analyses, although a recent report from the Royal College of General Practitioners, based upon a non-randomly selected group of GPs, found that for every 1,000 consultations, an average of 18 specimens were collected and analysed in the practices. This compared with an average of 68 specimens per 1,000 consultations that were analysed in hospital departments of pathology.

(b) Sources of data Records of the requests received by hospital departments of pathology are submitted to the Department of Health and Social Security and the Welsh Office on the SH3 form, and are subsequently published in the annual Health and Personal Social Services Statistics for England and Wales. These statistics distinguish between four sources of requests (hospitals, general practitioners, the Public Health Laboratory Service, and other sources) and between seven departments or sub-departments examining the requests (general bacteriology, serology, chemical pathology, haematology, surgical histology, autopsy, and exfoliative cytology). However, the statistics do not inter-lock these two classifications: hence it is not possible, for example, to distinguish the different departments involved in examining requests from general practitioners or the PHLS. No routine information is available about pathology examinations carried out other than in hospital departments of pathology.

Information about public expenditure on pathology services for ambulatory patients is available in the Health Services Costing Returns, published annually by the Department of Health and Social Security and the Welsh Office.

(c) Requests for pathology investigations Table 13 sets out the mean number of requests from non-hospital sources for hospital laboratory pathology investigations, per head of the population, for the years 1970-6. The data distinguish between requests from general practitioners, the Public Health Laboratory Service, and other sources excluding hospitals. A 'request' is defined as a demand in respect of one patient for pathology work in one division of the laboratory. Thus a demand for investigations in both haematology and chemical pathology would count as two separate requests.

(d) Public expenditure on pathology investigations The available information about expenditure on pathology investigations for ambulatory patients is the same as that for radiological services, and it must be treated with the same degree of caution. The Health Services Costing Returns for the years ending 31st March 1970-73 give the average cost of pathology services per 100 out-patient, accident and emergency and day-case attendances combined, and it is possible to calculate from them the total expenditure on these services in all hospitals in England and Wales. The data do not, however, permit distinctions to be made between the different sources of requests shown in Table 13. The Costing Returns for 1974 and 1975 give neither the average nor the total cost of pathology services for ambulatory patients. The 1976 Returns give the average cost of pathology services per out-patient, accident and emergency and day-case attendance separately, and also the total number of attendances in each category. From this it is possible to compute the total expenditure on pathology services for these categories of patients, but as with the 1970-73 Returns, no distinction can be made between the different sources of requests. Moreover, as noted above in connection with radiological services, the 1976 Returns allow this calculation to be made for England only, not for Wales; and they cannot be compared with previous years because of the different system of accounting upon which they are based.

The following procedures have been adopted in coping with this material. Expenditures on pathology services for out-patient, accident and emergency and day-case attendances combined have been calculated from the 1970-73 Costing Returns in the manner described above. Expenditures for 1974 and 1975 have been estimated by assuming that they represented the same proportion of all expenditures on non-inpatient specialist services as the average proportion for the years 1970-73 (that is, 5.63%). The 1976

expenditure figures have been calculated from the Costing Returns for that year in the manner described above. Table 14 sets out these expenditure figures, at current and constant prices, for each year between 1970 and 1976, but because of the substantial lack of comparability from year to year, percentage changes are not shown. The expenditure figures at current prices are taken directly from the Costing Returns; the figures on expenditure at constant 1970 prices are calculated by dividing the current-price expenditures in each year by the NHS deflator for the corresponding year (see Table 2).

Table 14 also shows the mean expenditure per request at current and at constant 1970 prices. These are derived by dividing the total expenditure by the total number of requests for hospital laboratory pathology investigations from all non-hospital sources.

PHYSIOTHERAPY

(a) Organisation The majority of physiotherapists working in the National Health Service are employed in hospitals. Of the 5,298 whole-time equivalent physiotherapists in England and Wales in 1975, about 90% were employed in hospitals and only 10% in a community context.

(b) Sources of data The Health and Personal Social Services Statistics for England and Wales contain information about the number of new patients seen by physiotherapists and the total number of attendances each year, distinguishing between individual treatments and group exercises. However, the data do not distinguish between the work of physiotherapists with hospital in-patients, out-patients, day-patients, and patients treated in community facilities.

(c) Physiotherapy attendances Table 15 sets out the mean number of physiotherapy attendances per head of the population for the years 1970-6. The figures include individual treatments and group exercises among all categories of patients, including hospital in-patients. They are therefore not compatible with the data on specialist medical care and on radiology and pathology services, which attempted (within the limitations of the published data) to confine themselves to patients other than hospital in-patients.

(d) Public expenditure on physiotherapy services The available information about expenditure on physiotherapy services is the same as that for radiology and pathology, and it must be treated with just as much caution. The Health Services Costing Returns for the years ending 31st March 1970-73 give the average cost of physiotherapy services per 100 out-patient, accident and emergency and day-case attendances combined, and it is possible to calculate from them the total expenditure on these services in all hospitals in England and Wales. The Costing Returns for 1974 and 1975 give neither the average nor the total cost of physiotherapy services for ambulatory patients. The 1976 Returns give the average cost of physiotherapy per out-patient, accident and emergency and day-case attendance separately, and also the total number of attendances in each category. From this it is possible to compute the total expenditure on physiotherapy for these categories of patients. However, the 1976 Returns allow this computation to be made for England only, not for Wales; and they cannot

be compared with previous years because of the different system of accounting upon which they are based.

The following procedures have been adopted in coping with this material. Expenditures on physiotherapy services for out-patient, accident and emergency and day-case attendances combined have been calculated from the 1970-73 Costing Returns in the manner described above. Expenditures for 1974 and 1975 have been estimated by assuming that they represented the same proportion of all expenditures on non-inpatient specialist services as the average proportion for the years 1970-73 (that is, 2.75%). The 1976 expenditure figures have been calculated from the Costing Returns for that year in the manner described above. Table 16 sets out these expenditure figures, at current and at constant prices, for each year between 1970 and 1976, but because of the substantial lack of comparability from year to year, percentage changes are not shown. The expenditure figures at current prices are taken directly from the Costing Returns; the figures on expenditure at constant 1970 prices are calculated by dividing the current-price expenditures in each year by the NHS deflator for the corresponding year (see Table 2).

No information can be given about the average expenditure per physiotherapy attendance because the data on attendances (Table 15) and on expenditure (Table 16) do not cover the same categories of patient. The data on attendances relate to <u>all</u> hospital patients (including hospital in-patients), whilst the data on expenditure are restricted to out-patients only (including accident and emergency and day-case attenders.)

SURGERY (EXCLUDING HOSPITAL IN-PATIENT SURGERY)

(a) Organisation The great majority of surgical operations carried out through the National Health Service are performed on hospital in-patients, but certain operations (including abortions) may be performed on patients attending as day cases, and on those requiring treatment in accident and emergency departments. In such cases the operations will be performed by hospital doctors. In addition, general practitioners may carry out minor surgical procedures either in community hospitals or, if the necessary equipment is available, in their own consulting rooms.

(b) Sources of data Whilst full information is recorded and published about surgical procedures carried out on in-patients, the information is very sparse about surgical activities among other categories of patients. There is no systematic source of data about the number of operations performed by general practitioners, and the statistics of attendances at accident and emergency departments fail to show the specific treatments given to patients in these departments. Data are available about the number of attendances at surgical out-patient clinics, but these attendances are usually for the pre- and post-operative assessment of in-patients and day-patients, not for the actual performance of surgery. The best available statistics are probably those relating to the number of day-case attendances in the surgical specialties. The definition of a day-case attendance has already been noted (see above, page 10), and whilst this includes patients undergoing minor surgery, it may also include those receiving other forms of treatment and investigation. Information about the number of day-case attendances in the surgical specialties has been published annually since 1972 in the Health and Personal Social Services Statistics for England and Wales, drawn from the hospital SH3 returns.

(c) Surgical day-case attendances Table 17 sets out the mean number of day-case attendances in the surgical specialties at NHS hospitals per head of the population for the years 1972-76. Day-cases are defined as non-residents who attend hospital for investigation, therapeutic tests or other treatments, and who require some form of preparation or period of recovery involving the provision ofnon-residential accommodation and services. The surgical specialties are: general surgery, ear, nose and throat, traumatic and orthopaedic surgery, ophthalmology, radiotherapy, urology, plastic surgery, thoracic surgery, dental surgery, neurosurgery,

and gynaecology. Information about attendances by day patients has been published only since 1972. No information is available about the surgical procedures performed by general practitioners, or in hospital accident and emergency departments.

(d) Public expenditure on surgical services The available information about NHS expenditure on surgical services other than for hospital in-patients is similar to that for radiology, pathology and physiotherapy. The Health Services Costing Returns for the years ending 31st March 1970-73 give the average cost of operating theatres per 100 out-patient, accident and emergency and day-case attendances combined, and it is possible to calculate from them the total expenditure on these services in all hospitals in England and Wales. The Costing Returns for 1974 and 1975 give neither the average nor the total cost of operating theatres for ambulatory patients. The 1976 Returns give the average cost of medical and surgical supplies and equipment per out-patient, accident and emergency and day-case attendance separately, but in a form that is quite incompatible with the costing data from the 1970-73 Returns.

The following procedures have been adopted in coping with this material. Expenditures on operating theatres for out-patient, accident and emergency and day-case attendances combined have been calculated from the 1970-73 Costing Returns in the manner described above. Expenditures for 1974-76 have been estimated by assuming that they represented the same proportion of all expenditures on non-inpatient specialist services as the average proportion for the years 1970-73 (that is, 2.20%). Table 18 sets out these expenditure figures, at current and at constant prices, for each year between 1970 and 1976, but because of the substantial lack of comparability from year to year, percentage changes are not known. The expenditure figures at current prices are taken directly from the Costing Returns; the figures on expenditure at constant 1970 prices are calculated by dividing the current-price expenditures in each year by the NHS deflator for the corresponding year (see Table 2).

No information can be given about the average expenditure per attendance because the data on attendances (Table 17) and on expenditure (Table 18) do not cover the same categories of patients. The data on attendances relates to day-patients only, whilst the data on expenditure include out-patient and accident and emergency attendances as well as day-patient attendances.

COMMUNITY NURSING

(a) Organisation The term 'community nursing' conventionally embraces three distinct categories of nursing services: health visiting, home nursing and domiciliary midwifery. Health visitors, of whom there were 7,655 whole-time equivalents in England and Wales in 1975, are employed by area health authorities in accordance with the National Health Service Act of 1946 and the Health Service and Public Health Act of 1968 to visit people in their own homes and elsewhere to prevent illness and to promote good health. Health visitors are registered nurses who have undergone prescribed obstetric and midwifery training and who have successfully completed a one-year course, controlled statutorily by the Council for the Education and Training of Health Visitors, leading to the Health Visiting Certificate. Health visitors are concerned with antenatal and child care, the prevention of home accidents, and advising on immunisation, diet, hygiene, infectious diseases, family planning, care of the elderly, cytological testing and other aspects of cancer, alcoholism, mental breakdown, sexually transmitted diseases and dental hygiene.

Home nurses (otherwise called district nurses), of whom there were 11,665 whole-time equivalents in England and Wales in 1975, are employed by area health authorities to nurse patients who require nursing in their own homes. They typically work under the clinical direction of general practitioners and they provide all forms of general and specialised nursing care in patients' homes. The education and training of district nurses is not prescribed by statute, although most employing authorities have recognised the desirability of having all their district nurses properly trained. Since 1968 a single, national examination course has been available leading to a National Certificate in District Nursing.

Domiciliary midwives, of whom there were 2,995 whole-time equivalents in England and Wales in 1975, are State Certified Midwives employed by area health authorities to work in the community. Rules for the conduct and supervision of midwives are laid down by the Central Midwives Board, and are administered locally by the area health authorities. With the growing trend towards hospital confinements, the number of domiciliary midwives has declined in recent years, and their role has changed. Increasingly, hospitals are providing facilities for women to enter for short periods of time for their confinements, under the overall supervision of

the domiciliary midwife, but with specialist obstetric care available if required.

(b) Sources of data The annual Health and Personal Social Services Statistics for England and Wales contain information about the number of cases attended by health visitors each year, the number of people nursed through the home nursing service, and the number of deliveries and early discharge cases attended by domiciliary midwives.

(c) Cases and patients attended by home nurses Table 19 sets out, first, the mean number of cases attended by health visitors per head of the population in 1970-76. The figures are not comparable between years. Those for 1970 and 1971 are restricted to cases seen only at patients' homes, whilst those for 1972 onwards also include cases seen elsewhere, principally in health centres and on general practitioners' premises. For this reason the percentage change between 1971 and 1972 is not shown.

Table 19 next sets out the number of people nursed through the home nursing services in 1970-76, expressed as a rate per head of the population. As with the data on health visitor caseloads, the figures before and after 1972 are not comparable. Those for 1970 and 1971 are restricted to cases seen only at patients' homes, whilst those for 1972 onwards also include cases seen elsewhere by district nurses, mainly in health centres and on general practitioners' premises. For this reason the percentage change between 1971 and 1972 is not shown.

Table 19 finally sets out the number of deliveries and the number of early discharge cases attended by domiciliary midwives in 1970-76, expressed as a rate per hundred head of the population. It would be conventional to express these attendance figures as rates per hundred women aged 15-45, but for the sake of consistency with other tables in this report, the total population is used as the base for calculating rates. Early discharge cases are those discharged from hospital and attended by domiciliary midwives.

(d) Public expenditure on community nursing services The only available information about expenditure on community nursing services is contained in the Local Health and Social Services Statistics, published annually until 1974 by the Institute of Municipal Treasurers and

Accountants (IMTA) and the Society of County Treasurers (SCT). Following the reorganisation of the National Health Service in 1974, responsibility for the community nursing services was transferred from local government to the new area health authorities, and the expenditure on these services should therefore appear in the National Health Services Costing Returns. So far, however, these Returns have contained very little information about the costs of community nursing, and nothing that is compatible with the IMTA/SCT statistics up to 1974.

Table 20 sets out the average cost per visit by health visitors and home nurses, and the average cost per confinement attended by domiciliary midwives at current and at constant prices, for the years ending 31st March 1970-74. The data are taken from the IMTA/SCT Statistics, but it should be noted that they are widely regarded as being of limited accuracy, and that definitions change from year to year. Direct comparisons between years are therefore misleading. For example, it is reported in each year that certain costs (including those for health visiting and home nursing) omit a number of local authorities for which the information was not available. In general, expenditure on common services (such as 'administration') is apportioned to reflect as far as possible the true costs of carrying out each function. In the case of midwifery services in Table 20, hospital deliveries that are attended by domiciliary midwives after discharge from hospital are 'weighted' by counting four such confinements as equivalent to one complete domiciliary case.

No information is given in Table 20 about expenditure on community nursing services after 1974 because, as noted above, such information is not published in the Health Services Costing Returns for 1975 and 1976.

A NOTE ON THE GOVERNMENT'S PUBLIC EXPENDITURE PLANS

Since 1966, Governments in the United Kingdom have followed an annual cycle in formulating and publishing their plans for public expenditure. Early in the year, each Department of Government surveys its financial requirements for the next year, and submits proposals for the programme of activities to be carried out. These proposals are brought together and, in the light of the Treasury's forecasts of future economic prospects, they are harmonised by Ministers into an overall statement of the Government's plans for public expenditure, often over a five-year period. The statement is published as a Public Expenditure White Paper, usually early in each year, and it subsequently forms the basis of the Government's request to Parliament for voted expenditure in that year. A system of 'cash limits', first introduced in 1974-5 and extended in 1976-7, ensures that spending authorities do not exceed their monetary allocations even if price inflation proves to be higher than the estimate on which the allocations are based.

The annual Public Expenditure White Papers might be expected to indicate the reasons for changes in levels of expenditure in different sectors, but in practice they are not particularly useful in this respect. During the period reviewed in this report, seven Public Expenditure White Papers were published, each containing a chapter on the health and welfare services, but at a high level of generality. For example, the 1972 White Paper (Cmnd.5178) contained this paragraph:

> 'The overall objective of the (health services) programme is to secure, within the resources provided, the best combination of health and personal social services to meet the needs of the population. This implies that services should be organised to provide comprehensive treatment and care effectively and efficiently; balanced to remove inadequacies in particular localities or particular types of care; modified as needs are altered by demographic, morbidity and social changes; and developed in step with public expectations of rising standards, with advances in medical knowledge and with professional awareness of technological and other progress.'

Similar general statements of objectives are contained in the other six White Papers.

More specific objectives are discernible in most of the White Papers, although they are not quantified in ways that enable them to be related to the planned increases in expenditure. For example, each of the White Papers published during the period under review noted that the future increase in expenditure would enable more general medical and dental practitioners to be employed, giving rise to better standards of treatment and care; but no indication was given of the number of extra doctors and dentists to be employed, or the share of the increased expenditure they would consume. Similarly, each White Paper stated that more resources would be allocated to the care of the mentally ill, the mentally handicapped and the elderly; but no information was specified about the volume of additional resources to be allocated to these client groups, the number of clients to benefit, or the specific services to be made available to them. The White Papers of 1971, 1972, 1973 and 1976 mentioned demographic changes as a factor influencing the increase in expenditure; the White Paper of 1972 mentioned rising public expectations as a factor; and the 1973 and 1975 White Papers made reference to increases in the demand for care by patients.

The strong impression created by the Public Expenditure White Papers is that year-to-year increases in total National Health Service expenditure are influenced much more heavily by political considerations than by any rational assessment of the 'needs' of the population for health care. In practice, the NHS has received the maximum increases that the Secretary of State for Social Services has been able to secure in the light of the general economic state of the country and the political strength of claims from other spending departments. Factors of the kind discussed in the Public Expenditure White Papers may contribute to the political strength of the NHS's claim, but it is doubtful whether they are used in a quantifiable way to determine the magnitude of annual increases in expenditure. However, within the total volume of NHS expenditure secured each year, these factors may be important in changing the emphasis of expenditure away from some services towards others. The declared intention of Governments to shift resources away from acute hospital care towards primary care in the community and towards the care of the mentally disordered, the physically handicapped and the chronically ill is consistent with the expenditure objectives of the White Papers, but there is little evidence of such a shift having actually occurred.

Table 1 Population of England and Wales, by age and sex, 1970-76

(Registrar General's mid-year estimates)

thousands

	Age					All ages
	0-4	5-14	15-44	45-64	65+	
1970						
Males	2,055	3,882	9,694	5,782	2,418	23,831
Females	1,953	3,689	9,419	6,162	3,934	25,157
Total	4,008	7,572	19,113	11,944	25,157	48,988
1971						
Males	2,010	3,980	9,580	5,704	2,446	23,720
Females	1,911	3,777	9,367	6,090	3,951	25,095
Total	3,920	7,757	18,947	11,794	6,397	48,815
1972						
Males	1,963	4,005	9,606	5,708	2,559	23,841
Females	1,864	3,801	9,363	6,085	4,085	25,198
Total	3,827	7,806	18,969	11,793	6,644	49,039
1973						
Males	1,917	4,037	9,679	5,675	2,609	23,917
Females	1,818	3,832	9,429	6,036	4,145	25,260
Total	3,735	7,869	19,108	11,711	6,754	49,177
1974						
Males	1,842	4,057	9,743	5,639	2,660	23,941
Females	1,742	3,851	9,472	5,983	4,206	25,254
Total	3,584	7,908	19,215	11,622	6,866	49,195

contd.....

Table 1 continued

thousands

	Age					All ages
	0-4	5-14	15-44	45-64	65+	
1975						
Males	1,769	4,058	9,820	5,604	2,706	23,957
Females	1,669	3,851	9,525	5,935	4,263	25,243
Total	3,438	7,909	19,345	11,539	6,969	49,200
1976						
Males	1,671	4,053	9,914	5,571	2,741	23,950
Females	1,576	3,845	9,612	5,887	4,315	25,235
Total	3,247	7,898	19,526	11,458	7,056	49,185

Source Department of Health and Social Security and Welsh Office, Health and Personal Social Services Statistics, HMSO, Annual

Table 2 Total expenditure on National Health Service good and services at current and at 1970 prices (year ending 31st March)

	Expenditure at current prices (£m)	Expenditure at 1970 prices (£m)	Current prices / 1970 prices
1970	1,861	1,861	1.000
1971	2,103	1,905	1.104
1972	2,417	1,979	1.221
1973	2,703	2,039	1.325
1974	3,627	2,114	1.715
1975	4,903	2,260	2.169
1976	5,884	2,340	2.514

Source Central Statistical Office, National Income and Expenditure 1966 - 1976, HMSO, 1977

Table 3 Mean number of general medical practitioner consultations per person per year, 1970-76, England and Wales

Sex and age	1970	1971	1972	1973	1974	1975	1976
Males							
0-4	3.8	4.6	4.3(-7%)	4.2(-2%)	4.8(+14%)	3.9(-19%)	4.2(+8%)
5-14	1.9	2.1	2.3(+10%)	2.2(-4%)	2.4(+9%)	2.3(-4%)	2.4(+4%)
15-44	2.0	2.4	2.9(+21%)	2.5(-14%)	2.4(-4%)	2.3(-4%)	2.4(+4%)
45-64	3.0	3.4	3.6(+6%)	3.8(+6%)	3.9(+3%)	3.7(-5%)	3.1(-16%)
65+	4.0	5.5	4.7(-15%)	5.0(+6%)	4.5(-10%)	4.6(+2%)	4.1(-11%)
All ages	2.6	3.1	3.3(+6%)	3.2(-3%)	3.2(-)	3.0(-6%)	2.9(-3%)
Females							
0-4	3.5	4.6	4.8(+4%)	3.5(-27%)	4.8(+37%)	3.7(-23%)	3.7(-)
5-14	2.0	2.2	1.9(-14%)	1.9(-)	2.4(+26%)	2.1(-13%)	1.9(-10%)
15-44	3.8	4.5	4.8(+7%)	4.4(-8%)	4.5(+2%)	4.1(-9%)	4.3(+5%)
45-64	3.2	4.2	3.9(-7%)	3.5(-10%)	3.6(+3%)	3.7(+3%)	3.1(-16%)
65+	4.1	6.2	5.7(-8%)	4.6(-19%)	4.8(+4%)	5.2(+8%)	4.6(-12%)
All ages	3.4	4.3	4.2(-2%)	3.8(-10%)	4.0(+5%)	3.8(-5%)	3.7(-3%)

Sources Office of Population Censuses and Surveys and the Royal College of General Practitioners, Morbidity Statistics from general practice, Studies on Medical and Population Subjects No.26, HMSO, 1974.

Office of Population Censuses and Surveys, The General Household Survey, HMSO, Annual.

Table 4 Expenditure on general medical services, 1970-6, England and Wales (financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976	1970-1976
Expenditure at current prices (£m)	128.602	158.235 (+23%)	171.339 (+8%)	185.332 (+8%)	199.519 (+8%)	231.832 (+16%)	300.172 (+29%)	+133%
Average expenditure per consultation at current prices (£)	0.872	0.911 (+4%)	0.920 (+1%)	1.083 (+18%)	1.121 (+4%)	1.368 (+22%)	1.857 (+36%)	+113%
Expenditure at 1970 prices (£m)	128.602	143.328 (+11%)	140.326 (-2%)	139.873 (-)	116.337 (-17%)	106.884 (-8%)	119.400 (+12%)	-7%
Average expenditure per consultation at 1970 prices (£)	0.872	0.824 (-6%)	0.753 (-9%)	0.817 (+8%)	0.653 (-20%)	0.630 (-4%)	0.738 (+17%)	-15%

Source House of Commons, National Health Service Acts 1946 to 1973, Accounts, HMSO, Annual (House of Commons Papers)

Table 5 Mean number of specialist out-patient, accident and emergency, and day-case attendances per person per year, 1970-76, England and Wales

Type of attendance	1970	1971	1972	1973	1974	1975	1976	1970-1976
Out-patient clinics	0.694	0.713 (+3%)	0.712 (-)	0.711 (-)	0.713 (-)	0.662 (-7%)	0.693 (+5%)	-
Accident and emergency departments	0.287	0.284 (-1%)	0.281 (-1%)	0.287 (+2%)	0.277 (-3%)	0.279 (+1%)	0.282 (+1%)	-2%
Day cases	Not available	Not available	0.007	0.008 (+14%)	0.009 (+13%)	0.008 (-11%)	0.010 (+25%)	1972-1976 +43%

Source Department of Health and Social Security and Welsh Office, Health and Personal Social Services Statistics, HMSO, Annual

Table 6 Combined expenditure on specialist out-patient, accident and emergency, and day-case attendances, 1970-76, England and Wales (financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976	1970-1976
Expenditure at current prices (£m)	108.824	132.485	153.460	169.301	222.153	300.308	340.088	+213%
Average expenditure per attendance at current prices (£)	2.262	2.720	3.124	3.416	4.512	6.422	7.012	+210%
Expenditure at 1970 prices (£m)	108.824	120.004	125.684	127.774	129.535	138.455	135.278	+24%
Average expenditure per attendance at 1970 prices (£)	2.262	2.463	2.558	2.578	2.631	2.960	2.789	+23%

Source Department of Health and Social Security and Welsh Office, Hospital Costing Returns/Health Services Costing Returns, HMSO, Annual.

Table 7 Average expenditure, in 1970 prices, per out-patient attendance, per accident and emergency attendance, and per day-case attendance, 1970-76, England and Wales (financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976	1970-1976
Average expenditure per out-patient attendance at 1970 prices (£)	2.543	2.740	2.841	2.883	2.915	3.355	3.131	+23%
Average expenditure per accident and emergency attendance at 1970 prices (£)	1.584	1.772	1.822	1.809	1.895	2.017	1.950	+23%
Average expenditure per day-case attendance at 1970 prices (£)	Not available	Not available	3.255	3.007	2.773	3.154	2.711 -	1972-1976 -17%

Source Department of Health and Social Security and Welsh Office, Hospital Costing Returns/Health Services Costing Returns, HMSO, Annual.

Table 8 Mean number of courses of dental treatment per person per year, by type of treatment, 1970-76, England and Wales

Type of treatment	1970	1971	1972	1973	1974	1975	1976	1970-1976
Diagnosis	0.448	0.478 (+6%)	0.495 (+5%)	0.520 (+5%)	0.545 (+5%)	0.570 (+5%)	0.594 (+4%)	+33%
Conservation	0.374	0.399 (+7%)	0.418 (+5%)	0.439 (+5%)	0.460 (+5%)	0.483 (+5%)	0.479 (-1%)	+28%
Extractions	0.069	0.074 (+7%)	0.076 (+3%)	0.077 (+1%)	0.076 (-1%)	0.075 (-1%)	0.070 (-7%)	+1%
Dentures	0.060	0.063 (+5%)	0.057 (-10%)	0.056 (-2%)	0.055 (-2%)	0.056 (+2%)	0.057 (+2%)	-5%
Orthodontics	0.002	0.002 (-)	0.003 (+33%)	0.003 (-)	0.003 (-)	0.004 (+33%)	0.004 (-)	+100%
All courses	0.398	0.426 (+7%)	0.452 (+6%)	0.479 (+6%)	0.501 (+5%)	0.529 (+6%)	0.539 (+2%)	+35%

Source Department of Health and Social Security and Welsh Office, Health and Personal Social Services Statistics, HMSO, Annual

Table 9 Expenditure on general dental services, 1970-6, England and Wales (financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976	1970-1976
Expenditure at current prices (£m)	73.800	81.100 (+10%)	82.300 (+1%)	90.000 (+9%)	115.500 (+28%)	159.300 (+40%)	177.500 (+11%)	+141%
Average expenditure per item of treatment at current prices (£)	3.781	3.895 (+3%)	3.709 (-5%)	3.817 (+3%)	4.686 (+23%)	6.120 (+31%)	6.687 (+9%)	+77%
Expenditure at 1970 prices (£m)	73.800	73.460 (-)	67.404 (-8%)	67.925 (+1%)	67.347 (-1%)	73.444 (+9%)	70.605 (-4%)	-4%
Average expenditure per item of treatment at 1970 prices (£)	3.781	3.528 (-7%)	3.037 (-14%)	2.880 (-5%)	2.732 (-5%)	2.821 (+3%)	2.659 (-6%)	-30%

Source House of Commons, National Health Service Acts 1946 to 1973, Accounts, HMSO, Annual (House of Commons Papers)

Table 10 Mean number of units of radiological treatment, and mean number of mass miniature radiography examinations per person per year, 1970-76, England and Wales

	1970	1971	1972	1973	1974	1975	1976
Units of radiological treatment:							
Out-patients	0.256	0.265 (+3%)	0.273 (+3%)	1.343	1.429 (+6%)	1.390 (-3%)	1.554 (+12%)
Accident and emergency patients	0.131	0.135 (+3%)	0.148 (+10%)	0.800	0.807 (+1%)	0.859 (+6%)	0.907 (+6%)
Patients referred from general practitioners	0.082	0.089 (+9%)	0.095 (+7%)	0.427	0.453 (+6%)	0.479 (+6%)	0.531 (+11%)
Total	0.469	0.488 (+4%)	0.516 (+6%)	2.570	2.689 (+5%)	2.728 (+1%)	2.992 (+10%)
Mass miniature radiography examinations	0.046	0.040 (-13%)	0.033 (-18%)	0.026 (-21%)	0.025 (-4%)	Not available	Not available

Source Department of Health and Social Security and Welsh Office, Health and Personal Social Services Statistics, HMSO, Annual

Table 11 Expenditure on diagnostic X-ray services for out-patient, accident and emergency and day-patient attendances, 1970-76, England and Wales (financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976
Expenditure at current prices (£m)	11.226	12.405	15.046	16.084	18.883	22.523	21.952
Expenditure at 1970 prices (£m)	11.226	11.236	12.323	12.139	11.010	10.384	8.732

Source Department of Health and Social Security and Welsh Office, Hospital Costing Returns/Health Services Costing Returns, HMSO, Annual

Table 12 Expenditure on mass miniature radiography services, 1970-76, England and Wales

(financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976	1970-1976
Expenditure at current prices (£m)	0.813	0.833 (+2%)	0.810 (-3%)	0.785 (-3%)	0.668 (-15%)	1.115 (+67%)	1.430 (+28%)	+76%
Average expenditure per examination at current prices (£)	0.353	0.422 (+20%)	0.488 (+16%)	0.603 (+24%)	0.539 (-11%)	Not available	Not available	
Expenditure at 1970 prices (£m)	0.813	0.754 (-7%)	0.663 (-12%)	0.592 (-11%)	0.389 (-34%)	0.514 (+32%)	0.568 (+11%)	-30%
Average expenditure per examination at 1970 prices (£)	0.353	0.382 (+8%)	0.399 (+4%)	0.455 (+14%)	0.314 (-31%)	Not available	Not available	

Source House of Commons, National Health Service Acts, 1946 to 1973, Accounts, HMSO, Annual (House of Commons Papers)

Table 13 Mean number of hospital pathology department requests per person per year, 1970-76, England and Wales

Source of request	1970	1971	1972	1973	1974	1975	1976	1970-1976
General practitioners	0.101	0.109 (+8%)	0.119 (+9%)	0.132 (+11%)	0.135 (+2%)	0.152 (+13%)	0.166 (+9%)	+64%
Public Health Laboratory Service	0.005	0.006 (+20%)	0.006 -	0.007 (+17%)	0.006 (-14%)	0.005 (-17%)	0.006 (+20%)	+20%
Other Sources	0.032	0.035 (+9%)	0.036 (+3%)	0.038 (+6%)	0.039 (+3%)	0.043 (+10%)	0.045 (+5%)	+41%
Total	0.138	0.150 (+9%)	0.161 (+7%)	0.177 (+10%)	0.180 (+2%)	0.201 (+11%)	0.218 (+8%)	+58%

Source Department of Health and Social Security and Welsh Office, Health and Personal Social Services Statistics, HMSO, Annual

Table 14 Expenditure on hospital laboratory pathology requests for out-patient, accident and emergency and day-patient attendances, 1970-76, England and Wales (financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976
Expenditure at current prices (£m)	5.798	7.238	8.985	10.272	12.496	16.892	19.189
Average expenditure per request at current prices (£)	0.851	0.986	1.132	1.177	1.399	1.705	1.785
Expenditure at 1970 prices (£m)	5.798	6.556	7.358	7.752	7.286	7.787	7.632
Average expenditure per request at 1970 prices (£)	0.851	0.893	0.927	0.888	0.815	0.786	0.709

Source Department of Health and Social Security and Welsh Office, Hospital Costing Returns/Health Services Costing Returns, HMSO, Annual

Table 15 Mean number of physiotherapy attendances per person per year, 1970-76, England and Wales

Type of attendance	1970	1971	1972	1973	1974	1975	1976	1970-1976
Individual	0.462	0.475 (+3%)	0.479 (+1%)	0.481 (-)	0.482 (-)	0.492 (+2%)	0.534 (+9%)	+16%.
Group	0.087	0.084 (-3%)	0.081 (-4%)	0.079 (-2%)	0.075 (-5%)	0.075 (-)	0.080 (+7%)	-8%
Total	0.549	0.559 (+2%)	0.560 (-)	0.560 (-)	0.557 (-1%)	0.567 (+2%)	0.614 (+8%)	+12%

Source Department of Health and Social Security and Welsh Office, Health and Personal Social Services Statistics, HMSO, Annual

Table 16 Expenditure on physiotherapy services for out-patient, accident and emergency and day-patient attendances, 1970-76, England and Wales (financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976
Expenditure at current prices (£m)	3.229	3.841	4.204	4.526	5.554	7.207	8.129
Expenditure at 1970 prices (£m)	3.229	3.479	3.443	3.415	3.238	3.322	3.233

Source Department of Health and Social Security and Welsh Office, Hospital Costing Returns/Health Services Costing Returns, HMSO, Annual

Table 17 Mean number of day-case attendances per person per year, in the surgical specialties, 1972-76, England and Wales

	1972	1973	1974	1975	1976	1972-1976
Mean number of surgical day-case attendances per person	0.0062	0.0068 (+10%)	0.0053 (-22%)	0.0067 (+26%)	0.0079 (+18%)	+27%

Source Department of Health and Social Security and Welsh Office, Health and Personal Social Services Statistics, HMSO, Annual

Table 18 Expenditure on operating theatres for out-patient, accident and emergency and day-patient attendances, 1970-76, England and Wales (financial year ending 31st March)

	1970	1971	1972	1973	1974	1975	1976
Expenditure at current prices (£m)	2.184	2.878	3.388	4.129	4.887	6.607	7.472
Expenditure at 1970 prices (£m)	2.184	2.607	2.775	3.116	2.850	3.046	2.972

Source Department of Health and Social Security and Welsh Office, Hospital Costing Returns/Health Services Costing Returns, HMSO, Annual

Table 19 Mean number of health visiting cases attended, persons nursed by home nurses, and deliveries and early discharge cases attended by domiciliary midwives per person per year, 1970-76, England and Wales

Type of nursing attendance	1970	1971	1972	1973	1974	1975	1976	1970-1976
Cases attended by health visitors	0.090	0.093 (+3%)	0.096	0.091 (-5%)	0.090 (-1%)	0.084 (-7%)	0.084 (-)	
People nursed by home nurses	0.021	0.023 (+10%)	0.040	0.045 (+13%)	0.047 (+4%)	0.052 (+11%)	0.060 (+15%)	
Deliveries attended by domiciliary midwives (per 100 people)	0.218	0.179 (-18%)	0.170 (-5%)	0.127 (-25%)	0.108 (-15%)	0.089 (-18%)	0.078 (-12%)	-64%
Early discharge cases attended by domiciliary midwives (per 100 people)	0.840	0.910 (+8%)	0.970 (+7%)	0.980 (+1%)	0.930 (-5%)	0.970 (+4%)	0.970 (-)	+15%

Source Department of Health and Social Security and Welsh Office, Health and Personal Social Services Statistics, HMSO, Annual

Table 20 Expenditure on community nursing services, 1970-74, England and Wales

(financial year ending 31st March)

	1970	1971	1972	1973	1974
Average expenditure per visit by health visitors:					
at current prices (£)	0.71		1.13	1.64	1.54
at 1970 prices (£)	0.71		0.93	1.24	0.90
Average expenditure per visit by home nurses:					
at current prices (£)	0.61		0.81	0.92	1.05
at 1970 prices (£)	0.61		0.66	0.69	0.61
Average expenditure per domiciliary confinement by midwives:					
at current prices (£)	41.75		59.03	74.09	94.88
at 1970 prices (£)	41.75		48.35	55.92	55.32

Source Institute of Municipal Treasurers and Accountants and Society of County Treasurers, Local Health and Social Services Statistics, Annual