

Has the rising incidence of Crohn's disease reached a plateau?

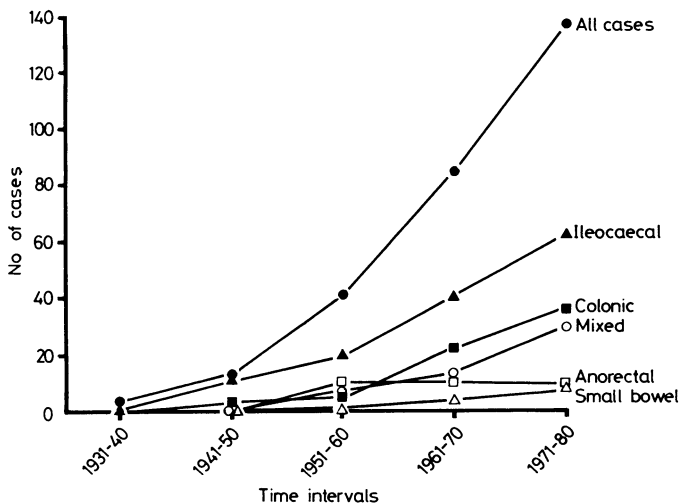
Crohn's disease is a chronic condition of unknown cause and for which there is no effective medical treatment to prevent recurrence or spread. During 1934-77 the incidence of the disease in Cardiff greatly increased.¹ Since Cardiff has a stable, clearly defined population and a good medical records system it is particularly suited for an epidemiological study. We have therefore examined the incidence of Crohn's disease during 1976-80 and related the findings to an earlier report.¹

Patients, methods, and results

Patients who were resident in the City of Cardiff when newly diagnosed with Crohn's disease were identified from a diagnostic computer index and from personal records belonging to clinicians, radiologists, and pathologists. Patients were considered to have Crohn's disease only if (a) the disease had been confirmed histologically in either the resected specimen or biopsy samples or (b) there was radiological evidence of Crohn's disease and a suitable clinical history. The patient's age, date, and distribution of disease at the time of diagnosis as well as the method by which the diagnosis had been first made were noted. Details of the population structure of Cardiff were obtained from census data and used to calculate incidence figures.

The mean yearly incidence of Crohn's disease in Cardiff during 1976-80 was 4.92 cases/100 000 population; this was not significantly greater than the 4.83/100 000 during 1971-5. The individual yearly incidences per 100 000 during the five years were 3.2 in 1976, 6.8 in 1977, 4.3 in 1978, 3.5 in 1979, and 6.7 in 1980. The figures were also analysed according to sex and showed a slight preponderance of women (1.0:1.5). Among the 69 new cases, the distribution of disease at the time of diagnosis was ileocaecal in 35, colonic in 21, anorectal in five, small-bowel in three, and a combination of these sites in five. The initial diagnosis was made radiologically in 52 cases, by surgery with positive histological findings in 11, and by sigmoidoscopy or colonoscopy with histological confirmation from biopsy in six.

When compared with the decade 1961-70 the number of new cases during 1971-80 had continued to rise, with an increase in all the major groups of Crohn's disease except anorectal disease (figure).



Number of new cases presenting during each decade from 1931 to 1980: site of disease is that when first diagnosed.

Comment

Though there was a pronounced increase in new cases of Crohn's disease in Cardiff during 1971-80, the yearly incidence over the two five-year periods 1971-5 and 1976-80 had apparently levelled out at around 4.9 cases/100 000 population. Though we do not attribute any importance to variations that occur from year to year, during 1977 and 1980 the incidence exceeded 6.5 cases/100 000 population, which may suggest that the plateau is not yet stable. The highest recorded figures come from Malmö, Sweden, with an incidence of 6.0 cases/100 000 population/year during 1966-73,² and figures from Cardiff continue to approach this.

Increased recognition of Crohn's colitis is not the main factor accounting for the rise, as all the major groups—particularly ileocaecal and mixed disease—are represented. This may partly be due to

more frequent recognition of milder forms of the disease. Nevertheless, if this was so the standardised mortality rates for patients diagnosed in recent years would be expected to fall, which is not the case³; furthermore, deaths from Crohn's disease in England and Wales from 1950 to 1973 rose steadily.⁴ Since this condition places a heavy burden on medical, surgical, social, and community services, it is important to continue to monitor changes in the incidence.

We are grateful to the radiology department and colleagues who have helped to compile the list of new patients with Crohn's disease in Cardiff.

¹ Mayberry JF, Rhodes J, Hughes LE. Incidence of Crohn's disease in Cardiff between 1934 and 1977. *Gut* 1979;**20**:602-8.

² Brahme F, Landstrom C, Wenckert A. Crohn's disease in a defined population. An epidemiological study of incidence, prevalence, mortality, and secular trends in the City of Malmö, Sweden. *Gastroenterology* 1975;**69**:342-51.

³ Mayberry JF, Newcombe RG, Rhodes J. Mortality in Crohn's disease. *Q J Med* 1980;**49**:63-8.

⁴ Office of Population Censuses and Surveys. *Registrar General's statistical reviews of England and Wales for the years 1950-75*. London: HMSO, 1951-73.

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Discrepancy in results from three guaiacum resin tests

The guaiacum resin test has been claimed to be an effective method of detecting occult blood loss due to asymptomatic cancer and pre-cancerous lesions of the colon and rectum.¹ Numerous proprietary versions of this test are readily available: the effectiveness of these products has been investigated, and the variation in results is by no means negligible.² In the present study we compared the results obtained with three proprietary preparations for detecting occult blood in the faeces.

Patients, methods, and results

We studied 75 patients in hospital who had presented with symptoms suggestive of colorectal disease. The entire colon of each patient was examined by rectocolonoscopy.

The study compared the results obtained with HemoFEC, Haemocult II, and Fecatest in patients maintained on a normal diet. The three tests were performed on the same stool sample before endoscopy and were interpreted blind within 12 hours, always by the same physician. Positive test results were considered to be falsely positive when no colorectal lesion was found on endoscopy.

The table shows the results. Overall, 33 patients had colonic lesions capable

Results obtained in 75 patients (33 presented with a colonic lesion)

	HemoFEC	Haemocult II	Fecatest
Positive	12	15	38
Falsely positive	2	4	18
Negative	63	60	37
Falsely negative	23	22	13

of inducing occult blood loss: seven had cancer, 11 polyps, six ulcerative colitis, three Crohn's disease of the colon, three diverticulitis, and three other diseases. HemoFEC and Haemocult II detected only three of the seven cancers and Fecatest five. HemoFEC and Haemocult II detected only one and Fecatest four of the 11 cases of polyps.