

The health service contacts of 87 suicides

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The Health of the Nation asserts that the suicide rate in England and Wales can be reduced by the provision of better health care services. In a sample of suicides in one district health authority, 61% had had contact with health services during the year prior to death, suggesting that improvements in these services could have an impact on the overall suicide rate. However, the proportion who had had prior contact varied between different age and sex groups and individuals in groups with the higher suicide rates tended to have the least contact. Therefore, the impact of health service improvements on the overall suicide rate may be limited.

One of the key areas identified in the government's recent White Paper, *The Health of the Nation*, which sets out a strategy for health improvement in England, is mental illness. Within this, one of the primary targets is "To reduce the suicide rate by at least 15% by the year 2000 (Department of Health 1992a)".

It is known that the causes of suicide are highly complex and suicides probably result from the interaction of various factors such as life events, psychological state, lack of effective treatment, and access to means. However, *The Health of the Nation* states that "most people who commit suicide have recently been in contact with the health services for some reason" and "suicide rates are influenced by many factors but there is significant scope for improvement by the provision of better health care and other services" (Department of Health, 1992a).

In order to investigate the impact that the "provision of better health care . . . services" will have on the overall suicide rate, it is necessary to know what proportion of people who commit suicide have had contact with health services during the year prior to death. Some people who commit suicide will not have had any prior contact and it is the prevention of these sudden, unexpected suicides that improvements in the health services will not affect. Others may have had contact with their GP or with mental health services.

To address these issues in a district health authority which has a relatively high suicide rate (age-standardised suicide rate of 20.5 per 1000 compared with 11.0 for England and Wales in

1989–1991) (Department of Health, 1992b) this study was undertaken with the following objectives:

- (a) to determine what proportion of residents who committed suicide between 1 January 1990 and 31 December 1992 who had been in contact with mental health services during the year prior to death
- (b) to determine the proportion who had been in contact with their GP during the year prior to death, and establish the date and reasons for the consultation.

The study

Computerised data which are provided by the Office of Population Censuses and Surveys (OPCS) on an annual basis, and are compiled anonymously from death certificates, were used to identify the suicide deaths. Any deaths of residents which took place between 1 January 1990 and 31 December 1992, and had an ICD-9 code for primary cause of death of E950–959 (suicide) or E980–989 (injury undetermined whether accidentally or purposefully inflicted) were selected, with one exception. Deaths coded as E988.8 deaths (usually because an inquest was adjourned subject to police investigation) were not included in the analysis.

The deaths were matched with the original death certificates in the Department of Public Health Medicine to obtain demographic details. Whether there had been any mental health service contact (as an in-patient, out-patient or in the community) during the year prior to death was determined using one of three methods.

- (a) The Coroner's notes on the inquests for all suicides which took place in the district were examined. In many cases a medical report was available.
- (b) Each mental health team was sent details of the residents of their area who had committed suicide, and asked for details of any contact with any member of the team.

- (c) A programme was run on the health authority computer system, Comcare, to identify any suicide victims who had been treated by a psychologist, an occupational therapist or a community psychiatric nurse.

It is thought unlikely that any health service contacts will have been missed because these three methods were used in conjunction.

Whether there had been any general practitioner (GP) contact during the year prior to death was obtained from inquest notes when a medical report from the GP was available. The time limit for the study meant that it was not possible to contact each GP individually, so this information is less complete than that for the mental health services.

The information was entered onto a confidential database and analysed using Epi-Info software.

Findings

There were 87 suicides which took place during the specified time period, of which 70 were male and 17 female. Forty-nine were aged 15–44 years, 20 were aged 45–64 years, and 18 were aged 65 years and over.

Contact with mental health services

Overall, 32.2% of the suicides had had contact with mental health services during the year prior to death.

On further analysis by age group, certain significant differences were noted. Only 11.1% of those aged over 65 years had had contact, compared with 30.6% of those aged less than 45 years, and 55.0% of those aged 45–64 years ($\chi^2=8.49$, $P<0.02$).

There was also a significant sex difference. While contact was low for both males and females aged 65 years and over, for people younger than this, the proportion was 31.7% for males compared with 77.8% for females (Yates corrected $\chi^2=5.26$, $P<0.05$).

Contact with GPs

Information on GP contact was available for only 78.2% of the suicides. Of these, 75.0% had seen their GP during the year prior to death, 47.1% within three months of death, and 35.3% within one month; 25.5% of the consultations were for a reason unconnected with the mental state.

Because the information was not complete, it was not thought appropriate to analyse GP contact by age group. However, when investigated by sex, it was found that only 68.5% of the men had visited their GP during the year prior to death

compared with all of the women. This difference was significant (Yates corrected $\chi^2=4.32$, $P<0.05$).

Overall health service contact

In total, 60.9% of the suicides had had definite contact, either with their GPs or with mental health services, during the year prior to death.

Comment

Investigations into contact with mental health services showed that the proportion of suicides who had had contact during the year prior to death was 32.2%. This finding is in agreement with the proportions in other studies, which range from 25% (Barraclough *et al.*, 1974) to 45% (Kraft & Babigian, 1976). The proportion varies for different age and sex groups.

The elderly (aged over 65 years) were the least likely to be known to mental health services. The suicide rate for this age group will therefore be the most difficult to reduce through improvement in the service. This is a worrying finding, especially for women for whom the elderly have the highest suicide rate. Although recent trends suggest that the suicide rate for women of all ages is decreasing, rates for women aged over 45 years have remained higher than those for women aged less than 45 years (Kraft & Babigian, 1976).

Among the younger suicides, the women were significantly more likely to be known to mental health services. However, as mentioned above, the suicide rate for this age group is already relatively low.

For men, the picture is very different. Since the early '70s the suicide rates for young men (aged less than 45 years) have been increasing to such an extent that they now exceed the suicide rates of the older age groups (except men over 75 years) (Kraft & Babigian, 1976). It is therefore worrying that the proportion of men aged 15–44 years in this sample who had had prior contact with mental health services was low (25.6%).

There will therefore be some potential for reducing the suicide rate through improvements in mental health services, given that approximately one third of the suicides had had prior contact. However, patterns of contact differ for different age and sex groups, and it seems that groups with the higher rates of suicide are in contact with services the least. Therefore, the overall impact of improvements in services may be limited.

The Health of the Nation suggests that 60% of people who commit suicide have seen their GP during the month prior to death, and 40% within a week of death. However, in this sample,

although three quarters had seen their GP during the year prior to death, only 35.3% had done so in the month before. This proportion is lower than that found in other studies (Vassilas & Morgan, 1993). There is a further possibility that availability of the information was associated with contact with the GP, that is a medical report was more likely to be requested or provided if it was known that the suicide victim had recently seen the GP. If this is a source of bias, it seems more likely that it will result in an over-estimate rather than an underestimate of GP contact.

It seems that women are more likely to have consulted their GP before suicide than men. Any improvements in the service provided by GPs will therefore have more impact on the female suicide rate, which is already lower than that for men. Again, the impact on the overall suicide rate could be limited.

Taking mental health services contact and GP contact together, the situation looks more encouraging. In total, 60.9% of the suicides were in contact with one or the other, or both, during the year prior to death, suggesting that improvements in health services should have some effect on the suicide rate.

Finally, the district has a very high suicide rate, especially among young men. The epidemiology of suicide in this area may therefore be slightly atypical and it is difficult to establish the extent to which these findings may be general-

ised. Nevertheless, they are worthy of note and further research in this area would be invaluable.

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