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National Centre for Suicide Research and Prevention of Mental Ill-Health

SUICIDE AMONG THE ELDERLY IN SWEDEN

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ATTITUDES

Sweden, Denmark and Norway are countries with great similarities - historical, cultural and linguistic. Today, all three are prosperous, modern economies. These countries' prevailing Protestant Christian faith has largely lost its everyday significance in people's lives and been superseded by materialist values. In this context, youth, vigour and health are idealised, while the elderly, past their productive time of life, receive less and less respect. This is also an effect of industrialisation, with younger people leaving the countryside to work in urban areas, thus breaking up traditional family structures and alienating the generations from one another.

Another factor contributing to the problem of ageing in modern industrialised society is the growing proportion of elderly in the population. In Sweden in 1997, the over-65s made up some 17 per cent of the population - a figure that, by the year 2010, is expected to rise to almost 20 per cent. Supporting the growing elderly population represents, of course, a heavier burden on the diminishing segment of the population that is employed. Is this demographic trend reflected in changing attitudes towards the elderly?

One interesting study (Hagberg, 1993) compared attitudes towards the elderly in Sweden as shown in literary fiction between 1830 and 1950, on the one hand, with the image reflected in newspaper headlines in 1981 and 1991 on the other. Hagberg found that, historically, the elderly were seen as religious, mature, and enjoying life, but also as costly and a burden. The same attitudes recurred in both 1981 and 1991, but in these later years certain new opinions had surfaced: the elderly were looked upon as exposed to crime, as complaining and as requiring care. In 1981, the elderly were perceived as active, competent and fighting for their rights, but ageing was also looked upon as frightening. Unique attitudes found in 1981, but not in 1991, were that ageing is attractive, that the elderly are resourceful and show ego strength, and that they have equal rights to common resources. In 1991, again, the most common attitudes were that the elderly are active and that they cost money. One possible interpretation of this finding is that the elderly should be allowed to work. These attitude changes may possibly mirror economic trends in Sweden: in 1991, Swedish society was undergoing a sharp economic recession in the course of which its ranking in the global welfare league plummeted from second to 17th.

Society has a relatively high disposition to prevent its citizens from completing suicide, irrespective of whether these citizens are young or middle-aged. In practice, however, attitudes towards the elderly are divergent - and seem to have diverged over a long period, as Birgitta Odén points out in a historical study (Odén, 2000). In the 18th century, the proportion of suicides in Sweden was already highest among the elderly, as it

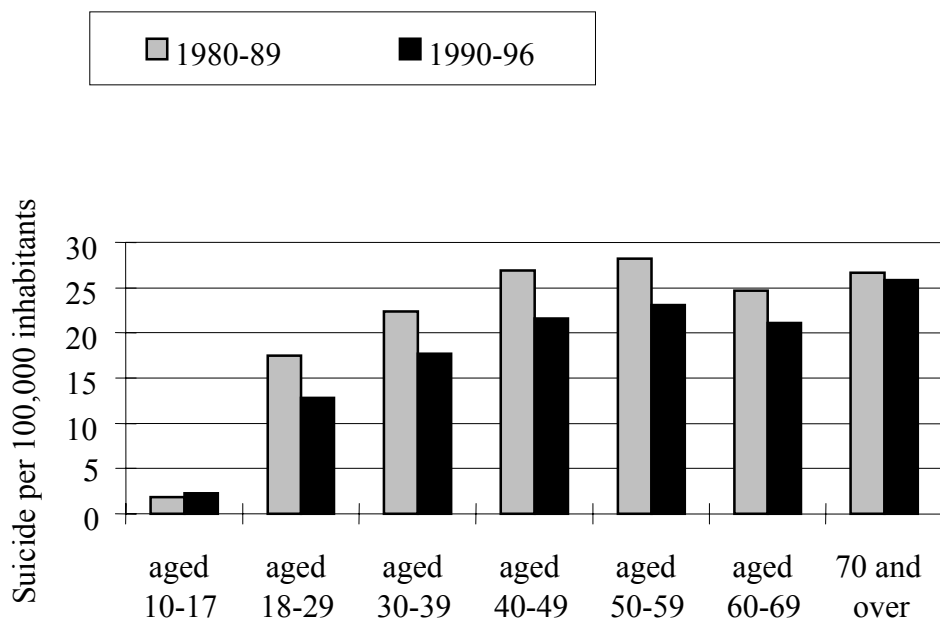
remains today. Nonetheless, most suicide-preventive efforts are focused on younger generations.

EPIDEMIOLOGY OF SUICIDE IN SWEDEN

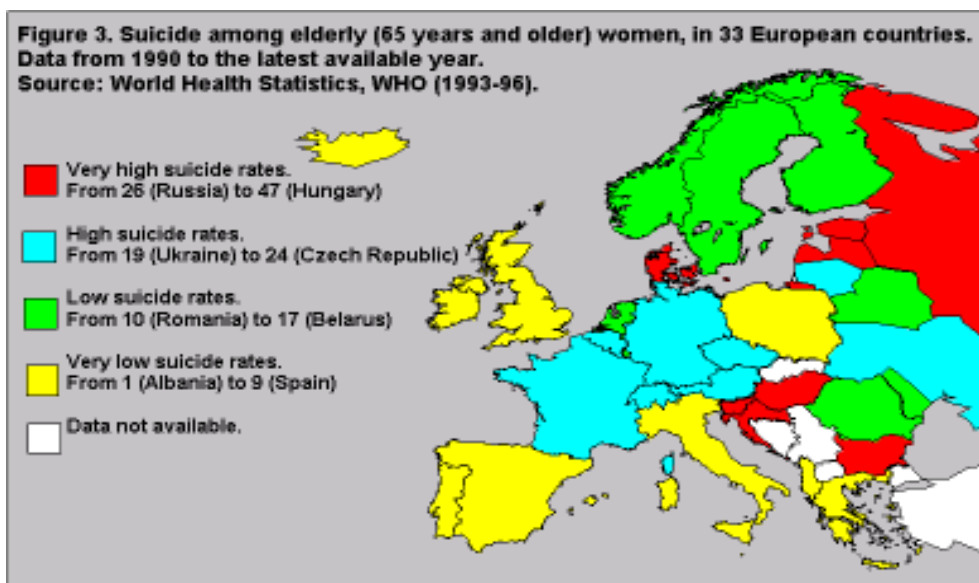
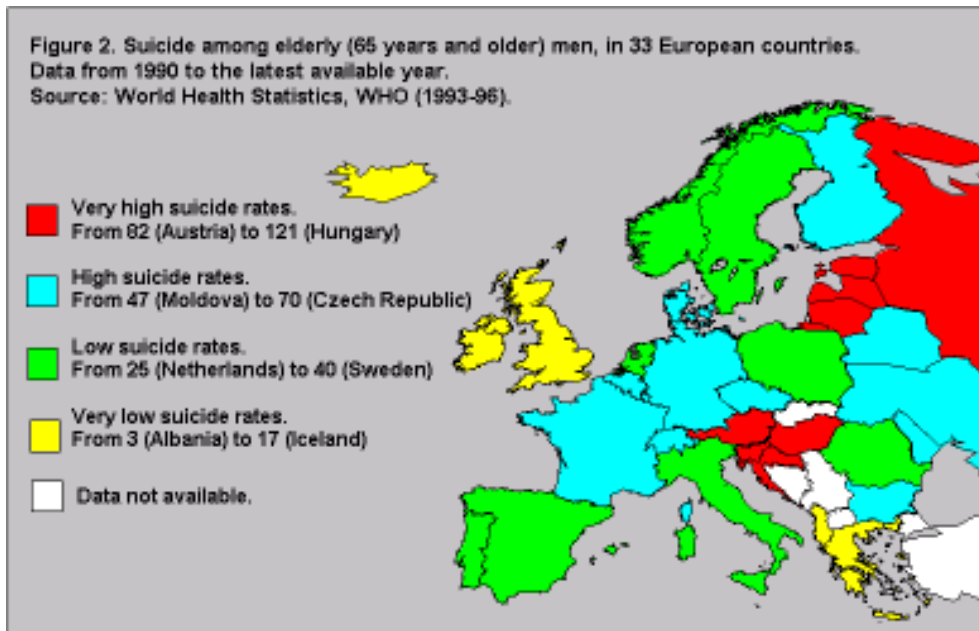
A myth still exists that Sweden is among the countries that have very high suicide rates. One contribution to the myth of Sweden as a country with high suicide figures was made by Ingmar Bergman's films, shown worldwide, depicting in poetic terms such ordinary human problems as marital conflict, various crises, loneliness and depression. These types of human conflict and depression occur throughout the world, but became associated with Sweden since they were shown in Bergman's films. This obviously fostered retention of the myth of Sweden as a "high-suicide country".

The fact is that suicide rates in Sweden showed a decrease from 27 per 100,000 inhabitants in 1980 to 19 per 100,000 inhabitants in 1996. Unfortunately, despite the favourable trend for the adult population, suicide among the youngest and oldest age groups in Sweden is not declining to the same extent (figure 1).

Figure 1. Suicide in Sweden, 1980-89 and 1990-96, by age group



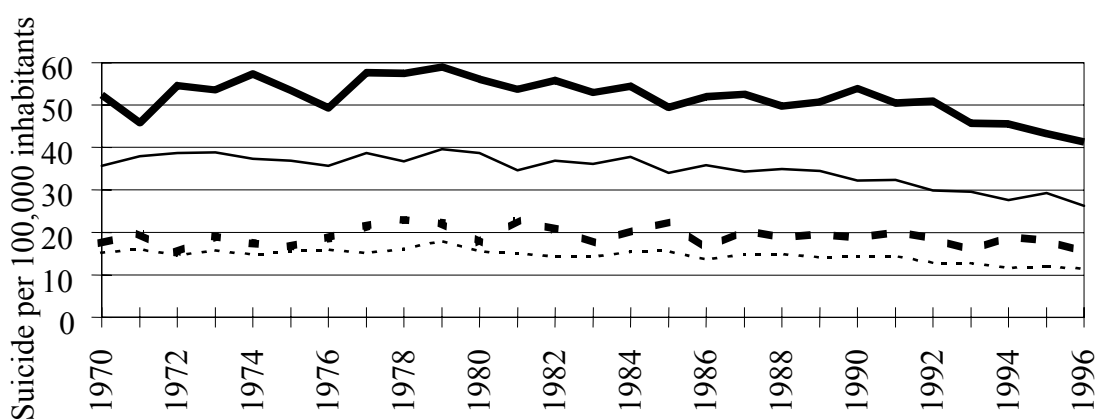
When suicide rates for the entire population of Europe are divided into four categories - classified as "very high", "high", "low" and "very low" - Sweden comes into the category with "low suicide rates" for both men and women. The same is true of men and women aged 65 and over (figures 2 and 3). However, suicide remains a major problem area in Sweden since suicide is still the most common cause of death in the 15-44 age group. In terms of gender differences, suicide retains its lead in this age group as the foremost cause of death among men, and comes second after cancer for women aged 15-44.



EPIDEMIOLOGY OF SUICIDE AMONG THE ELDERLY IN SWEDEN

The longitudinal trend of suicide from 1970 to 1996 among men and women aged 65 and over (figure 4) shows that suicide rates are relatively stable in this age group. The suicide rate for men aged 65 and over was 52.5 per 100,000 men in 1970 and 41.5 per 100,000 in 1996. The corresponding figures for women aged 65 and over were 17.5 per 100,000 in 1970 and 15.5 per 100,000 in 1996.

Figure 4. Suicide among elderly people aged 65 and over in Sweden 1970-96, by gender



Comparison of these suicide rates with the corresponding figures for the entire Swedish population shows that the overall male suicide rate of 26/100,000 is well below that of men aged 65 and over. The suicide rate for women in the general population is 11.5 per 100,000 - also well below that of women in the 65 and over age group.

This fact has been noted by the National Council for Suicide Prevention in Sweden, and prevention of suicide in these groups is one of the priority areas in this country.

In 1996, 1,663 people took their own lives in Sweden: 1,150 men and 513 women (table 1). These figures include both certain and uncertain suicides. Undetermined deaths constitute about a quarter of the aggregate total of certain suicides and undetermined deaths. The 1,663 suicides included 408 deaths of people aged 65 and over (270 men and 138 women). This means that roughly a quarter of suicides in Sweden are committed by elderly people.

Table 1. Numbers of suicide among elderly people in Sweden, 1996.

	Men	Women	Total
Aged 65-74	270	138	408
75 and over	129	80	209
Whole Population	1150	513	1663

Suicide methods used by the elderly

The suicide method used most frequently by elderly people in Sweden is hanging. Among men poisoning using drugs ranks second, while among women poisoning using drugs is the most frequent method used. The drugs used most often for suicidal purposes among the elderly are benzodiazepines. Reduced sale of benzodiazepines in Sweden over the past ten years has, unfortunately, not been reflected in a decrease in suicide among elderly people who use these drugs for this purpose.

Attempted suicide among the elderly in Sweden

Elderly people who attempt suicide are known to be at higher risk of subsequent suicide (Nordentoft et al, 1993; Conwell et al, 1998). The attempted-suicide rates found among people aged 65 and over in Huddinge, south of Stockholm, the catchment area in Sweden that forms part of a WHO multicentre study on attempted suicide/parasuicide (Schmidtke, 1993) are 74 per 100,000 for men and 93 per 100,000 for women.

Suicidal thoughts among the elderly in Sweden

In questionnaire surveys, 10.8% of Stockholm residents aged 75 and over have reported "fleeting suicidal thoughts" and 2.5% reported "frequent suicidal thoughts" (Forsell et al, 1997). A study from Gothenburg (Sweden's second-largest city) reports that 4% of mentally healthy (non-demented) people aged 85 and over had thoughts that life was not worth living, against 29% among mentally ill members of this age group. Among the mentally ill, 9.2% have been found to have suicidal thoughts, compared with 0.9% among mentally healthy 85 year olds (Skoog et al, 1996). The incidence of suicidal thoughts and feelings was gauged by instruments designed by Paykel et al (1974).

Suicidal thoughts in the above-mentioned Stockholm study (Forsell et al, 1997) characterised elderly people who were depressed, lived in institutions and suffered from functional disabilities in everyday life, and also those who used more psychotropic drugs than their mentally healthy counterparts who had no suicidal thoughts.

Why do elderly people take their own lives?

The above-mentioned findings show that suicidal thoughts are fairly rare among elderly people who are in a mentally stable state, and indicate that mental illnesses are not a feature of ordinary ageing. It is, perhaps, time to discard the common myth or misunderstanding that such mental troubles as despondency, worry and anxiety are part and parcel of the normal ageing process. Today, vitality is retained up to an advanced age. Most old people find a new role and a new way of life.

Unfortunately, for some people ageing is a lonely wait for nothing. Some elderly people may have no relatives, or the relatives they have are too busy to visit them. Expectations may be dashed, in some individuals physical health fails, and institutional care is the outcome.

Elderly people are also relatively stress-intolerant, and adjust more slowly to new circumstances. In old age, one needs much more time both for various tasks and for mental activity. Some elderly people are plagued by aches and pains, and troubled by the deterioration in how their bodies function. Nor, perhaps - owing to age-related changes in the neurotransmitters' function in the brain - is their mental functioning what it was. One major risk factor for suicide, among elderly and younger people alike, is depression (Wasserman, 1999/2000).

Depression in the elderly

Of all suicides in Sweden, 70-75% are triggered by a depressive illness (Beskow, 1979). Other major risk factors include advanced age and male gender. Thus, the risk of suicide rises with age; and the highest suicide rates are in men over 65.

A depressive illness is caused partly by a person's psychosocial situation and partly by disturbances in the brain's neurotransmitters. Psychosocial and social changes undergone by elderly people can frequently impact upon their emotional life and mood. Such changes may include the situation where their skills and knowledge are no longer in demand, and age-related changes in the central nervous system causes reduced activity in the noradrenergic, serotonergic and dopaminergic systems. From here a relapse into depression is not far off (Katona, 1997). Dementia illnesses, such as vascular dementia and Alzheimer's, also cause disturbances in noradrenaline and serotonin metabolism in the brain.

Deteriorating bodily functions, and also physical illnesses such as stroke, cancer, cardiac illness, Parkinson's disease, epilepsy and multiple sclerosis, may also contribute to the emergence of depression in an elderly person. Certain drugs used by the elderly to treat their somatic ill-health can also, as a side-effect, cause depression.

Summing up, depression in the elderly - as among younger people - may be said to be multifactorial in origin. Undiagnosed and untreated depression is a major risk factor for suicidal acts, i.e. attempted and completed suicide (Isacsson et al, 1999). Manifestations of depression in the elderly differ somewhat from those in other age groups. This is why learning how to diagnose depression among elderly people and treat it adequately is important. It is commonly estimated that 15% of people aged 65 and over suffer from depression (Katona, 1994). However, the incidence of depression is not evenly spread. Depression is much more widespread, for example, among elderly residents of institutions than among elderly people living in their own homes: as many as 30-40% of the former, against well under 10% of the latter, suffer from depression.

Other risk factors for suicide among the elderly

Previous and current suicide attempts are a major risk factor for completed suicide. Substance and alcohol abuse are fairly rare among elderly people who commit suicide in Sweden. On the other hand, the incidence of anxiety disorders among elderly suicides is underestimated, and more attention should be paid to this factor.

Treatment of depression: an important measure of suicide prevention among the elderly

Carefully devised strategies for treating depression are required. Strategies for depression in the elderly must be closely tailored to their needs. A study from Sweden (Waern, 1996) has shown that treating depression with antidepressant drugs alone fails to prevent suicide. Although 52% (139/275 patients) of those studied aged 65 and over who took their own lives had been receiving antidepressant or lithium treatment, this medication did not suffice to prevent their suicides.

Another interesting finding of the same study (Waern, 1996) was that for people aged 65 and over suffering their first episodes of depression, the median interval between the first suicidal communication and the final act was only one month. This finding should focus further attention on the importance of very prompt provision of adequate depression treatment, with frequent medical checks and social support. This is especially so in view of the fact that the impact of antidepressants - especially the newer drugs - becomes apparent only after prolonged treatment, while during the initial stages of treatment anxiety increases. This exacerbation of anxiety may, in a despondent person who has previously entertained fleeting suicidal ideation, prompt more intense suicidal thoughts while, at the same time, he/she may experience utter hopelessness, be inundated with anxiety and, eventually, opt for suicide as the final way out.

Clearly, antidepressant treatment alone is insufficient. Treatment of depression in the elderly, as in other groups, needs to be reinforced with

psychological treatment methods and social support. Underlying somatic illnesses must also be treated adequately (Wasserman, 1999/2000).

EUTHANASIA AND PHYSICIAN-ASSISTED SUICIDE IN NORDIC COUNTRIES

In Denmark, Norway and Sweden alike, both physician-assisted suicide and euthanasia are illegal. However, in Denmark, the notion of a “living will” has been sanctioned by law. Writing such a will means that, on a special form, a person chooses one, two or three options for the care he/she wishes to receive in the event of terminal illness, senile decrepitude or severe pain. The living will is then centrally registered in a special unit of the National Hospital in Copenhagen, and physicians are obliged to comply with the wishes expressed therein if the life-or-death circumstances it refers to arise for the individual concerned.

In the Nordic countries, physician practice regarding euthanasia has been investigated in Denmark, Norway and Sweden. In Denmark in 1995, Folker et al. investigated attitudes towards and the practice, if any, of euthanasia among 500 physicians (Folker, 1996). The doctors formed a random sample from the register of the Danish Medical Association, covering all medical specialities. The rate of response to a questionnaire sent by post was 64 per cent.

This survey showed that 74 per cent of the respondent Danish physicians had been asked by their patients to administer pain-relieving morphine in lethal doses. Moreover, with the patients’ informed consent, 80 per cent of the doctors had done so. Fifty-three per cent of the physicians stated they had done so on occasion without the informed consent of the patient.

Twelve per cent of the Danish doctors investigated had administered morphine in twice the lethal dose, without the patient requesting it. Twenty-six per cent had been asked to participate in physician-assisted suicide (PAS), and 7 per cent of these had complied with this request. Finally, 30 per cent of the physicians had been asked to administer a lethal injection (containing a drug other than morphine), and 13 per cent of these doctors had done as their patients asked.

In Norway, in 1996, Förde et al. sent a questionnaire to a sample of 1,476 physicians, and the response rate was 66 per cent (Förde, 1997). Six per cent of the doctors had performed actions intended to hasten a patient’s death. However, whether this involved active euthanasia, passive euthanasia or physician-assisted suicide was not clearly defined. Controlling for gender and the number of years since graduation from medical school, regression analysis showed that the doctors exercising most restraint were those with the specialities of internal medicine, surgery and psychiatry. Physicians who had been educated outside Norway or who were opposed to the idea of the patient’s autonomy proved to have more liberal views on euthanasia.

In Sweden in 1998, Valverius et al. sent a questionnaire to a random sample of 952 physicians and also to 122 doctors in palliative care and 130 physicians in the Swedish Association of Algologists (Valverius et al., 1998). The aim of the study was to determine the extent to which Swedish physicians talk to their adult patients about euthanasia, the preferences expressed by the patients and the ways in which the doctors act.

The response rate was 79 per cent. Half of the physicians studied had experienced their patients expressing a wish to die or received a request to withhold potentially life-sustaining or life-prolonging treatment, and 9.5 per cent had been asked about PAS. Some 1 per cent of the doctors asserted that they might have directly or indirectly participated in a patient's suicide. No cases of active euthanasia were reported. However, some euthanasia cases in Sweden have been publicised, since the physicians involved have been prosecuted. In three of these cases (in 1986, 1987 and 1995), the prosecution has been withdrawn. In recent years, four cases of euthanasia have come to light in Sweden. The Swedish National Board of Health and Welfare is investigating these cases at present.

CONCLUSIONS

In Sweden, ever since the 18th century, the majority of suicides have taken place among the older age groups. However, suicide-preventive resources are directed largely at the young or middle-aged, reflecting society's low valuation of the elderly. In recent years, public attitudes towards the elderly in Sweden appear to have become less favourable, possibly reflecting harsher economic conditions in the country, as well as the growing proportion of elderly people in the population.

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