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Australian Bureau of Statistics (ABS) suicide death statistics have shown a consistent and gradual decline since the late 1990s. In 2006, an editorial in the Medical Journal of Australia (Goldney RD 2006) highlighted this decline as good news and claimed that better community awareness, suicide prevention programs and treatments including better anti-depression drugs have helped in reducing suicide. The editorial acknowledged that the data might be affected by late registration and changes in coronial practices and cause of death certification.

Since then, there have been many studies that cast serious doubts on the accuracy of the ABS data. These include a study of 2002-2004 suicides in Queensland (De Leo D, Klieve H and Milner A 2006; De Leo D 2007), a study into the certification and coding practices (Walker S, Chen L, and Madden R 2008), a comparison of ABS data with data from the National Coroners Information System (NCIS) (Elnour A and Harrison J 2009) and a general review of suicide statistics by the Australian Institute of Health and Welfare (2009). These studies have shown that ABS has seriously been under reporting the number of suicides. The Queensland study reported that this under reporting had increased during the period under study and that the under count negates any apparent decrease in suicide deaths shown in ABS statistics. The coding study by Walker Chen and Madden hypothesised that strict reliance on a coroner's finding may have caused much of the ABS under reporting of suicides. The comparative study of coding by the ABS and the NCIS has shown that many cases of suicides were coded as accidents and many more were not coded at all (left blank) by the ABS. These studies are consistent with an earlier analysis by Ruzicka and Choi (1996) that showed a considerable proportion of deaths that have the characteristics of suicide can be determined as accidental deaths by coroners.

Another reason for undercounting suicide deaths by the ABS is a procedure one. The ABS has a publication schedule that does not allow

late information from the coroners to be used for causes of death coding. Thus, cases where the coroners' determinations were too late for the ABS's processing and publication schedule were not coded as suicides. The ABS did not have a practice of revising their suicide death data based on late coroner information.

Indirect indicators of suicide trends also support the claims of under reporting by the ABS. Australian hospitals data showed that separations involving intentional self-harm have not decreased, fluctuating around 30,000 in a year in the period 2001-02 to 2006-07. In 2006-07, 31,000 separations were recorded. Mental health disorders, in particular mood disorders and schizophrenia, are strongly correlated with suicides and intentional self-harm. Routine ABS national health surveys have reported significant increases in self assessed mental and behavioural problems – from 5.9% of the population in 1995 to 10.7% in 2004-05 (ABS 2006). Use of medical services involving mental health conditions has also increased considerably in almost all sectors of health services (AIHW 2007). Abuses of drug and alcohol, risk factors for suicide, also have not declined in recent years.

While it is quite clear that ABS have been under reporting suicide deaths, it is not at all clear that the declining suicide mortality trend is not real. Decreases in suicide death rates are reported in many developed countries, many of them may not have experienced the complication in suicide recording and coding as in Australia. Moreover, the number of suicide deaths in Australia due to the most obvious suicide means – firearm discharges - have declined, from over 300 per year in the late 1990s to around 150 in the mid 2000s. These are not the cases that coroners would have great difficulties in making a determination of the intention of the injury. However the same is not true with suicide by hanging. These have remained stable, at around 1,000 cases a year.

Suicide is a very important social issue. Reliable suicide data are critical in monitoring its trend and the pattern. The ABS has agreed to revise suicide death statistics from 2007 data onwards taking into account late coroner information on open cases. However, this is not sufficient to correct time series data so that the declining trend since the mid 1990s can be confirmed or refuted. ABS should be encouraged to revise their suicide death data as far back as possible taking into consideration all information that can be provided by the coroners so that the rate of suicide death in Australia and change over time can be more accurately measured.

The ABS has introduced coding of multiple coding of causes of death since 1997. This provides very useful information on the co-morbidity of suicide deaths that can be used to analyse risk factors for suicides, such as the prevalence of mental illness and terminal illness in suicide deaths. A general study using these data for 1997-2001 showed a strong association with mental health conditions and a much weaker association with other conditions (Ruzicka L, Choi, C and Sadkowsky K, 2005). The study also showed surprisingly that about half of suicide death records do not contain information on other diseases related to the certified cause of death. A review of the quality of multiple causes of death information on suicide deaths should be investigated by the ABS to ensure that suicide data can be used confidently to investigate suicide risk factors.

References:

Goldney RD. Suicide in Australia: Some Good News. Med J Aust 2006. 185 (6): 304.

Australian Bureau of Statistics. National Health Survey 2004-05: Summary of Results. Canberra. 2006

Australian Institute of Health and Welfare. Mental Health Services in Australia 2005-06, Canberra, AIHW 2007

AIHW: Harrison J et al. A Review of suicide statistics in Australia, Australian Institute of Health and Welfare. Canberra 2009.

De Leo D. 2007 Suicide mortality data need revision. MJA, 186 (3): 157-158

De Leo D, Klieve H, and Milner A. 2006. Suicide in Queensland 2002-2004: Moralty rates and related data. Brisbane, Australian Institute for Suicide research and prevention.

Walker S, Chen L, and Madden r. 2008. Deaths due to suicide: rthe effect of certification and coding practices in Australia, Aust and N Z journal of Public Health, 32 (20) 126-130

Elnour AA and Harrison J. 2009 Suicide decline in Australia: where did the cases go? Australian and New Zealand journal of Public Health 33 (1): 67-69

Ruzicka L T, Choi C Y 1996. Demographic and social profile of suicide mortality in Australian in Australia. GENUS. 52(3-4): 135-154

Ruzicka L T, Choi C Y, and Sadkowsky K. 2005. Medical disorders of suicides in Australia: analysis using a Multiple-cause-of-death approach, *Social Science and Medicine*, 61, 333-341