Improving safety and reducing access to the means of suicide

Why include this strategy in LifeSpan?

Restricting access to the means of suicide is considered to be one of the most effective suicide prevention strategies[1,2,3]. Significant declines in general suicide rates have been reported after restricting access to firearms, toxic domestic gas, pesticides, barbiturates, erecting safety barriers, and introducing 'safe rooms' (which eliminate suspension points for hanging) in prisons and hospitals[1]. Means restriction appears to work because when individuals are prevented from using a preferred method of suicide, some will defer their attempt or use a less lethal means.

Evidence supporting recommended interventions in LifeSpan

A number of studies have reported on the impact of restricting access to suicide methods in Australia. These include limiting access to firearms[4], jumping sites[5], motor vehicle exhaust[6], and means of self-poisoning[7].

The effectiveness of means restriction is quite strong in the case of restricting access to jumping sites and barbiturates. Structural interventions (e.g. barriers and safety nets at jumping suicide hotspots) resulted in a 28% reduction in all jumping suicides annually, with the reduction in suicides outweighing substitution of means at other locations[8].

The decline in rates of suicide in most parts of Australia between 1988 and 2007 coincides with restricted access to lethal suicide methods. In Australia, no evidence of means substitution (i.e. substituting an unavailable suicide method with one that is more readily available) has been found for jumping from heights,**Error! Bookmark not defined.** firearms,[9] and motor vehicle exhaust.**Error! Bookmark not defined.**

What is happening in LifeSpan NSW trial sites?

Local suicide trends in the LifeSpan trial sites are being documented and analysed to identify locations and means that may be amendable to means restriction (suicide audit). The suicide audit will assist trial sites to:

- Identify geospatial suicide clusters in their region
- Prioritise means restriction activities and interventions
- Investigate funding and policy levers
- Develop a means restriction plan or scoping study
- Liaise with relevant bodies e.g., council about barriers or pharmacists and prescribers about pharmacovigilance, with appropriate evidence to support the proposed means restriction.

A local focus group comprising police, ambulance, hospital emergency department staff, schools, community mental health staff as well as the local coroner, local council, and Aboriginal mental health staff will be held to consider the suicide audit findings, contribute local knowledge and identify where means restriction may be appropriate and practical.

A reference guide documenting means restriction has been compiled, along with guidance in implementing means restriction. The costs and effectiveness of each documented location where means restriction has been implemented (primarily international) is documented, where available. Each site is or has established a working group to progress means restriction activity based on the suicide audit report.

How will this be evaluated in LifeSpan?

LifeSpan is working with a team at the National Centre for Geographic Resources & Analysis in Primary Health Care, Australian National University, to geospatially map suicides and suicide attempts over the course of the project. This will identify changes in suicide cluster locations and in means.

Key References

For more detailed information on the evidence underpinning LifeSpan and the NSW research trial visit www.lifespan.org.au

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