Brief review of effective models of suicide prevention

NICE guidance on preventing suicides in community and custodial settings will be available in September 2018. Two recent systematic reviews considered the international evidence for the effectiveness of suicide prevention interventions. The key findings were:

- There is good evidence for the prevention of suicide by **restricting access to lethal means**, particularly in relation to the control of analgesics and the erection of barriers at sites popular for suicide by jumping (overall reduction in deaths by jumping of 86% (95% CI 79–91) and little evidence of major substitution to other potential jumping sites) (1).
- There is good evidence for **school based awareness programmes**, which can reduce suicide attempts (odds ratio [OR] 0·45, 95% CI 0·24–0·85; p=0·014) and suicidal ideation (0·5, 0·27–0·92; p=0·025) (1).
- There is good evidence that the World Health Organization (WHO) **brief intervention and contact (BIC) model**, which includes patient education and follow up, reduces the odds of suicide amongst previous suicide attempters (OR = 0.20, 95% CI 0.09-0.42), though this was only evaluated in low and middle income countries (2).
- There is some evidence that clozapine and lithium are effective in reducing suicide risk in those with severe mental illness (1), though these findings have been disputed (2).
- There is some evidence that psychotherapeutic approaches, including cognitive behavioural therapy, are effective in reducing suicide risk in people with depression (1), though these findings have also been disputed (2).
- Both reviews highlight several **gaps in the evidence** relating to screening in primary care, general public education, media guidelines, gatekeeper training, education of physicians, and internet and helpline support.

In the UK there have some non-randomised and small scale evaluations of suicide prevention models. Findings from these studies typically relate to process indicators or intermediate outcomes, rather than outcomes such as suicide rates.

- A **zero suicides programme** was implemented in the East of England, which had a system-wide approach to reducing suicide. An evaluation found the approach to be successful overall. For example, in Hertfordshire, GP referrals to a Wellbeing service increased by 17% following targeted training, which was rated as ‘useful’ by 96% of the >100 GPs who participated (3)
- The Lincolnshire Rural Support Network runs **health checks at local livestock markets** in conjunction with NHS nursing staff. The health checks cover emotional wellbeing as well as physical health assessments, such as blood pressure. Last year over 1,000 checks took place with about 130 families receiving help from the case workers (including other referrals). Clients reported a 44% improvement in their ability to manage their own mental wellbeing and a 59 % improvement in how hopeful they felt about the future. (4)
- In Kent and Medway, the **Release the Pressure social marketing campaign** was launched to make men aware of a 24/7 charity helpline. The campaign was designed specifically to appeal to middle aged men, and avoided references to mental health. The campaign was publicised on the BBC news, social media and in local football clubs. In the seven months

following the campaign launch there was a 30 % increase in calls overall, with a 56 per cent increase in calls from men (an extra 200 calls a month) (4).

- In Blackpool the public health team has set up a **community café** in conjunction with Camerados, a national social movement involved in suicide prevention. It is intended to be a peer led therapeutic service aimed at people who feel isolated. The café currently has 30-50 visitors a day (4).

Economic modelling has estimated that if all GPs in England received suicide prevention training this could result in net savings of over £500 million after one year and further substantial savings in the longer term (5). However this assumes that GP training is effective at reducing suicide risk, a claim for which there is currently no evidence.

Works Cited

1. *Suicide prevention strategies revisited: 10 year systematic review.* **Zalsman, G, et al., et al.** 2016, Lancet Psychiatry, Vol. 3, pp. 646-59.

2. *Strategies to prevent death by suicide: a meta-analysis of randomised controlled trials.* **Riblet, N, et al., et al.** 2017, The British Journal of Psychiatry, pp. 1–7. doi: 10.1192/bjp.bp.116.187799.

3. **Centre for Mental Health.** *Aiming for 'zero suicides': An evaluation of a whole system approach to suicide prevention in the East of England.* 2015.

4. **Local Government Association.** *Suicide Prevention: A Guide for Local Authorities.* 2017.

5. **Knapp, M, McDaid, D and Parsonage, M.** *Mental health promotion and prevention: the economic case.* Personal Social Services Research Unit, London School of Economics. s.l. : Department of Health, 2011.