3.3 Injuries reduced even when interventions do not stop problem drinkers drinking

Findings After an unusually thorough attempt to garner all the available evidence, researchers suggest that treatment and other interventions with problem drinkers can reduce injuries and deaths due to accidents even when this is not the aim of the intervention and even when drinking appears unaffected.

The authors searched general, alcohol, and accident-related databases, contacted relevant institutions, and asked authors for further published or unpublished work – one way to overcome bias towards publishing studies with positive outcomes. Only studies in which interventions were compared with control or comparison conditions to which subjects had been randomly allocated – the most satisfactory way to establish efficacy – were included in the review. If reports did not mention relevant outcomes, authors were contacted for any unpublished data on injuries.

The search uncovered 19 randomised controlled trials of interventions with alcoholics or other problem drinkers which reported injury-related outcomes. Seven of these compared interventions to a control condition as opposed to another intervention; in nearly all the comparisons, interventions reduced injuries, in some cases substantially. This was true whether the recorded outcomes were fatal injuries, non-fatal injuries, violence, or motor vehicle crashes and injuries. Several studies reported that reduced injuries or violence were not associated with reduced drinking.

The authors' conclusion that "interventions to reduce problem drinking could have an important effect on the incidence of injuries and deaths" is expressed tentatively because of the poor quality of many studies and small sample sizes.

LINKS *Nuggets* **3.4** **3.10**

In context UK figures show that 1 in 7 road accident deaths result from drink-drive incidents. Studies usually implicate alcohol in a large minority of fatal and non-fatal accidents and sometimes in the majority. As campaigns and laws here and overseas have reduced the overall level of drink driving, attention has turned to the residual 'hard core' of undeterred heavy drinkers who repeatedly offend and who may account for a high proportion of drink-drive fatalities. Many of these are problem drinkers, and many are alcohol dependent. Approaches similar in principle to those used to treat problem drinkers have proved a more promising approach to drink-drivers than educational approaches. However, treatment of problem drinkers can only have a limited impact on the overall level of alcohol-related injuries: many occur during an episode of intoxication which is not part of pattern of problem drinking susceptible to treatment-type interventions.

In the reviewed studies the most common indicator of whether drinking had been reduced was the percentage of subjects totally abstinent; changes in the amount drunk or in patterns of use might be more relevant to whether injuries occur.

Practice implications Impacts on injuries (to self and others) should be among the outcomes evaluated even when problem drinking is the focus of the intervention. Reduction of harm from injuries may be one highly desirable outcome with clients who do not achieve abstinence. If further research substantiates the trends documented in this study, cost-benefit analyses of alcohol treatment will need to take into account potentially substantial savings in health costs (particularly emergency attendances and admissions to hospital) and other costs due to injuries.

Main sources Dinh-Zarr T., *et al*. "Preventing injuries through interventions for problem drinking: a systematic review of randomized controlled trials." *Alcohol and Alcoholism*: 1999, 34(4), p. 609–621. Copies: apply Alcohol Concern.

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