



Steps towards alcohol misuse prevention programme (STAMPP): a school and community based cluster randomised controlled trial

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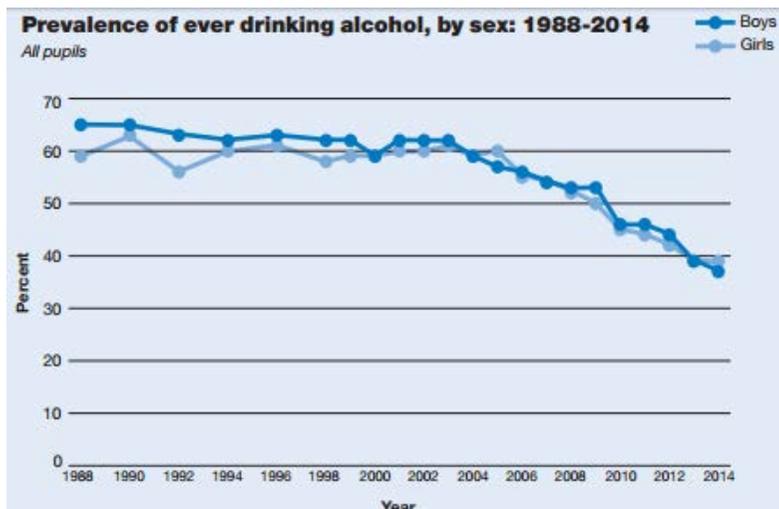
Acknowledgements

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- ▶ *The views and opinions expressed in this presentation are those of the authors and do not necessarily reflect those of the NIHR-PHR, NIHR, NHS or the Department of Health.*

Alcohol education in the UK

- ▶ Primarily delivered through the science (factual) and personal social and health education curricula
- ▶ Overall provision consistently rated poor by independent inspectors and pupils – most pupils receive 1 hour a year, non-evidence based approaches
- ▶ Most public health attention focused on environmental and structural change
- ▶ UK predominately pro-alcohol society (9m million people drink > national daily guidelines)

Alcohol use in young people in UK



- Number of 11-15 year olds reporting abstinence increasing (62% in 2014 vs 32% in 1988)
- Around half of children who drink consume > 6 units in previous week
- 22% drank > 15 units in previous week
- 5610 alcohol related hospital admissions per year
- ESPAD (2011) proportion drinking > EU average

STAMPP

- ▶ Delivered across 2 phases over 2 years (Autumn terms).
- ▶ Two components:
 1. An adapted version of the Schools Health and Alcohol Harm Reduction Programme (**SHAHRP**) (McKay et al., 2012; McBride et al., 2004)
 2. A brief parental intervention designed to support parents in setting family rules around drinking broadly, based on approach taken by Koning et al in their PAS trial – itself an adaptation of Orebro/Effekt
 - ▶ Parent/carer evening – discussing role of family in reducing alcohol use; CMOs alcohol guidelines for young people
 - ▶ Followed up by a leaflet detailing main points, posted to all intervention children parents/carers

Basis of intervention

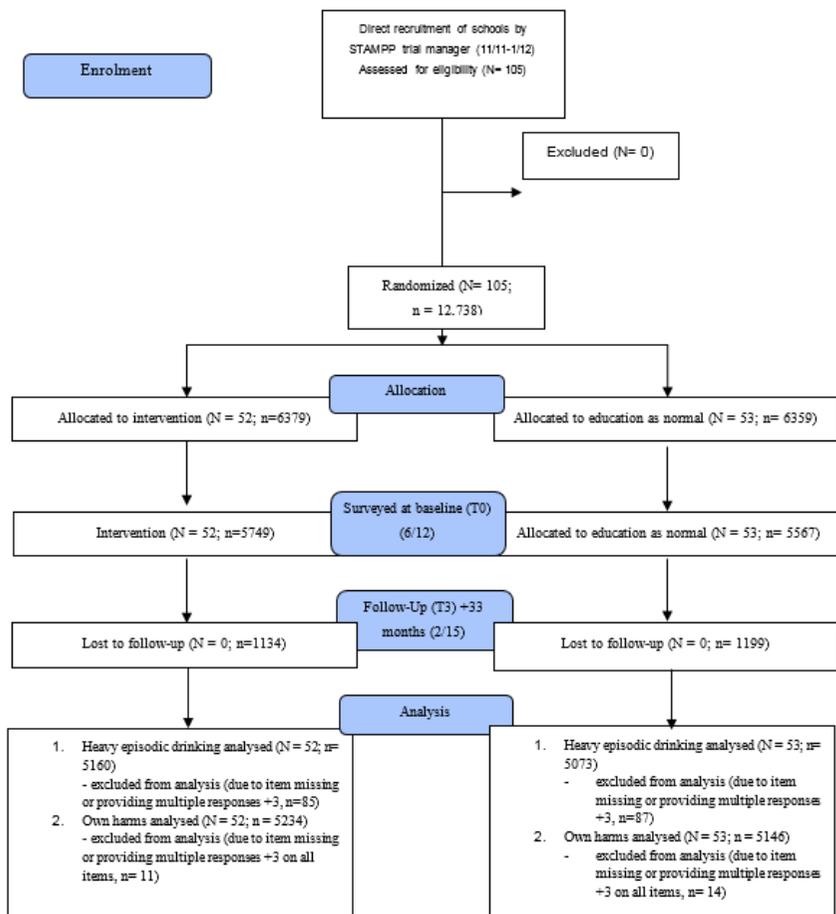
- ▶ *Universal developmental* programme
- ▶ **Classroom intervention** broadly based on social norms and social cognitive theory
 - ▶ Alcohol use behaviour is learned through modelling, imitation and responding to the emotions and behaviours of others, and this influenced by individual cognitions, attitudes, and beliefs
 - ▶ Includes elements of resistance skills training, and alcohol-specific personal and social skills training
 - ▶ Supplemented by knowledge (e.g. alcohol units, statistics, health and social)
- ▶ **Parental rule setting** reinforces classroom skills; reducing opportunities and exposure to alcohol at home

Primary research questions

- ▶ What is the effectiveness and cost-effectiveness of STAMPP on self-reported alcohol use (heavy episodic drinking) and self-reported alcohol-related harms?
 - ▶ *Heavy episodic drinking* (HED), defined as consumption of ≥ 6 units in a single episode in the previous 30 days for males and ≥ 4.5 units for females) assessed **at +33** months from baseline
 - ▶ *Alcohol-related harms* (ARH) included indicators such as getting into fights after drinking, poorer school performance, and trouble with friends and family
- ▶ Research trial was STEPS TOWARDS ALCOHOL MISUSE PREVENTION PROGRAMME (STAMPP). Publication expected late 2016/early 2017

The STAMPP Trial

- ▶ A cluster randomised controlled trial with schools as the unit of randomisation comparing STAMPP vs alcohol education as normal (EAN)
- ▶ Trial sites: 105 post-primary schools in Northern Ireland and Glasgow/Inverclyde Educational Board areas. Powered to detect a standardised effect size of $\delta = 0.2$
- ▶ Participants: 12,738 male and female secondary school students. Baseline survey undertaken in year 8/S1 (11/12) and intervention delivered in Year 9/S2 (12/13)
- ▶ 4 waves of data collection (+33 months)
- ▶ Data collected using self-completed pupil surveys. Bespoke alcohol use questionnaires, an adapted service utilisation inventory, and other validated measures (e.g. personality measures, parental monitoring, self-efficacy)



- No schools dropped out (2 intervention schools merged)
- 81.7% pupil retention (questionnaires at T0 and T3)
- ITT using CC population
- 2-level regression models adjusted by baseline randomisation variables (linear, negative binomial)
- Process outcomes were assessed across eight pre-specified domains, using nine data sources (not reported here)
- Secondary, sensitivity, and exploratory analyses (not reported here)

Figure 1 School and participant flow diagram - STAMPP Trial. Analysis was conducted at +33 months (T3) on pupils who had completed each of the primary outcome measures. N = number of schools; n = pupil numbers

Headline findings

- ▶ Children receiving STAMPP reported **reduced HED (9 percentage points)** compared with education as normal at +33 months (estimate = -0.516, SE=0.102; $p < 0.001$; OR = 0.596; 95% CI 0.490 – 0.725)
- ▶ There were **no significant differences** in ARH (estimate -0.101, SE = 0.083; $p = 0.222$; IRR = 0.916, 95% CI 0.780 – 1.052), which were very low in both groups (median 0; 63% reported no harms)
- ▶ The process evaluation showed that the classroom component was enjoyed by, and engaged, pupils, and was valued by teachers (and stakeholders) for its evidence based and structured content
- ▶ The mean cost of delivery per school was £818 and the mean cost per individual was £15 ('weakly dominated EAN') – this was a conservative estimate (can be delivered as part of PSHE to reduce costs)
- ▶ However, although SHAHRP was delivered as intended, there was very low attendance at the parent/carer evenings (9%; although all received an information leaflet)

Next steps...

- ▶ Publication of health economic evaluation
- ▶ Sub group analysis to investigate differential programme impact on baseline drinkers (cf McKay et al., 2014)
- ▶ Detailed investigation of programme effects on development of alcohol harms in higher risk children
- ▶ Analysis of variability in programme implementation and fidelity on outcomes
- ▶ Mediation and moderation analysis to refine programme theory (collected lots of proximal data)
- ▶ Impacts on wider health behaviour - schools followed up in independent research)
- ▶ Role of parental intervention in programme outcome

Conclusion

- ▶ The results of this large cRCT provide support for the effectiveness of a combined classroom and brief parental intervention for reducing HED, but not ARH, in younger adolescents at +33 months.
- ▶ Effects on ARH may manifest later, but further research would be required to clarify this.

Contact and further information about the STAMPP trial

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