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UNIVERSITY of STIRLING

RAPID RESEARCH IN COVID-19 PROGRAMME

LOCKDOWN & LICENSED PREMISES

AIMS

1. To quantify changes in alcohol-related ambulance callouts and total ambulance callouts in Scotland following the UK-wide COVID-19 lockdown (Study 1).
2. To examine the management of COVID-19 transmission risks in re-opened bars after lockdown, including business practices, and consumer and staff behaviour (Study 2).

KEY FINDINGS

- The national lockdown (up until end of June 2020) was associated with an absolute fall of 2.1 percentage points (95% CI: -3.5-0.7; p=0.003) in alcohol-related callouts as a percentage of total callouts, followed by a daily increase of +0.03% (95% CI: 0.01-0.05; p=0.004).
- After April, the proportion of alcohol-related callouts gradually started to follow pre lockdown levels, but at weekends and weekend night-times, alcohol-related call-outs were still substantially lower in June 2020 than in the previous year.
- Licensing stakeholders generally sought clarity, flexibility and balance in government guidance for re-opening, and cited commercial and practical challenges to doing so safely. Alcohol consumption was perceived as an additional but potentially manageable challenge.
- Most observed premises had made physical and operational modifications to reduce virus transmission risks, however, practices were variable. Observed incidents of concern included close physical interaction between customers, and between customers and staff, frequently featuring alcohol intoxication and rarely effectively stopped by staff.
- Despite efforts on the part of bar operators and detailed guidance from Scottish Government, potentially significant risks of COVID-19 transmission persisted in a substantial minority of observed bars, especially when customers were intoxicated.

WHAT DID THE STUDY INVOLVE?

Study 1 involved describing trends over time in ambulance callouts in Scotland during and after the initial UK-wide lockdown. Data on ambulance callouts were descriptively analysed from 1st January 2018 to 30th September 2020. Alcohol-related ambulance callouts were estimated using an algorithm which makes use of free text notes completed by ambulance staff in electronic patient records for each callout. Interrupted time series (ITS) analysis was also conducted of alcohol-related ambulance callouts as a percentage of total callouts in Scotland before and during the first UK lockdown (1/1/2019 to 30/6/2020). **Study 2** involved in-depth, semi-structured telephone interviews conducted prior to premises re-opening in Scotland (May-June 2020) with participants from hospitality/alcohol trade associations, licensed premises, or in related roles (n=18). Interviews focused on anticipated business practices and challenges relevant to minimising Covid-19 transmission and impact on services. Study 2 also involved observations following re-opening (July-August 2020), focusing on relevant practices and behaviours in 29 bars purposively sampled for diversity, using a structured schedule.

WHAT WERE THE RESULTS AND WHAT DO THEY MEAN?

Overall ambulance callouts

From February 2018 to February 2020, the daily average level of ambulance callouts was about 1500. Overall, weekends showed a slightly higher volume of callouts compared to weekdays. In March 2020, as the UK-wide lockdown was introduced, a sharp drop in callouts occurred. The lowest level callouts was in April 2020 (-12% compared to April 2019), After April, the level slightly increased until August 2020 when it reached the equivalent level for the same period of 2019 (Figure 1). Callouts registered then a slight decrease at the end of September 2020.

Alcohol related ambulance callouts

The trends in daily alcohol-related ambulance callouts (Figure 2) are similar to those observed for all callouts (Figure 1) for the pre-lockdown period, with about 180 calls on average during weekdays, and more occurring at the weekends (approximately 260). From April 2020, as the UK-wide lockdown was introduced, a sharp drop was observed in alcohol-related ambulance call-outs, before callouts returned to pre-lockdown levels. In the first two months after lockdown, there was no longer an observed higher level of alcohol-related callouts at weekends compared with weekdays (Figure 2). This reduction in variance between weekend and weekday callouts was not observed for daily total ambulance callouts of all causes (Figure 1). Variations in daily alcohol related ambulance callouts due to lockdown were clearer in urban areas. In the Aberdeen area (postcode AB), which includes Aberdeen City where premises closed twice (20th March for over 3 months and 6th August for three weeks), there was a slight decrease in alcohol related callouts at both times. However, the effect of the first national lockdown was higher than the effect in August (Figure 3) as would be expected since the AB postcode covers Aberdeenshire and East Moray as well as Aberdeen City. Subject to availability of postcodes at a sufficient level of detail, and related confidentiality requirements, further analysis could consider the Aberdeen City local authority area specifically.

The ITS analysis found an association between lockdown and the proportion of callouts that were alcohol related. This proportion (alcohol related callouts as a percentage of total callouts) showed an absolute reduction of 2.1 percentage points (95% CI -3.5, -0.7; P=0.003). In relative terms, this corresponds to a 13% reduction in the proportion of callouts that were alcohol related compared to the period before the lockdown (1 January 2018–20 March 2020).

Interview findings regarding re-opening licensed premises post-lockdown

Licensing stakeholders identified factors that may support management of COVID-19 risks in licensed premises including: an expressed willingness of businesses to work to government requirements to protect staff/customer safety, support consumer confidence and enable a return to trading; perceptions that it was in premises' own interests to help control the spread of the virus; and a belief that many premises were well managed prior to the pandemic. Stakeholders expressed an intention to work within government guidance but cited commercial and practical challenges to successfully and safely re-opening. The unique nature of licensed premises as social spaces where alcohol is consumed was recognised by interviewees, however risks arising were presented as potentially manageable, with expertise and effort in premises. Participants identified challenges balancing risks to health, livelihoods, businesses and the economy in plans for reopening hospitality. Uncertainty about forthcoming government measures was particularly frustrating and challenging for trade interviewees who desired clarity and flexibility, although risks in providing too much discretion were also mentioned. Some doubts were raised about whether local governments would be adequately resourced to successfully enforce compliance.

Observations of licensed premises after re-opening post-lockdown

Upon re-opening, however, substantial efforts to reduce virus transmission risks were observed, including physical and operational modifications, and appeared to be working well in many diverse bars. Nonetheless, there remained premises where tables were close together (<1m apart), many premises where PPE was not consistently worn by staff, and some which had poorly prepared to prevent breaches of distancing measures in queues, pinch points, and toilets. Customers were observed shouting, embracing or routinely interacting closely with different groups from other households and staff in several premises; and staff intervention was rare or ineffective. Alcohol intoxication was observed in most sustained incidents involving multiple risks or greater numbers of customers. Our data suggests that a substantial minority of bars failed to ensure adherence to recommended safety measures upon re-opening, even after stricter guidance was provided.

WHAT IMPACT COULD THE FINDINGS HAVE?

Ambulance Callouts & Alcohol during COVID-19: These findings evidence how demand for ambulances changed over the months following the initial UK-wide COVID-19 lockdown period. These results suggests that the closure of licensed premises may have contributed to a reduced demand for ambulance services during the early months of the COVID-19 pandemic. Indeed, the volume of alcohol related callouts decreased more than the volume of overall callouts in relative terms in April 2020. The main effect was registered in April 2020, after which total alcohol-related callouts returned to pre-pandemic levels even though weekend alcohol-related callouts remained lower, perhaps due to increases in home drinking. As society adapts to the pandemic, authorities could be looking to address preventable causes of ambulance call-outs, including better alcohol policies that protect frontline services. Effective multi-faceted interventions already exist to reduce drunkenness and violence around the night-time economy, and could be more widely and consistently deployed, although are costly, and unlikely alone to be transformative. Policies which address home drinking, such as increased prices or control of online sales, and interventions to transform the night-time economy to rely less on alcohol consumption for entertainment, should also be considered. These are discussed further in our second paper below.

Reducing transmission risk for COVID-19 in bars involves attempts to modify long-standing norms of behaviour in social spaces where alcohol directly impairs customers' ability and likely willingness to follow new rules. Premises characteristics, operation, intoxication and the actions (or inaction) of customers and staff interact to give rise to transmission risks, in ways that may be difficult to fully control. Overall, our findings suggest grounds for uncertainty about the extent to which new rules can be consistently and effectively implemented in a sector where alcohol is routinely consumed. It remains to be seen whether support for bar operators (such as training or visits to premises to provide guidance) and sanctions for higher risk premises can sufficiently reduce the risks; where bars are open, continued monitoring of practices and impacts is needed throughout the pandemic. Risks may be ameliorated by stopping alcohol being sold inside bars, or eliminated through closure of premises, but at a direct economic and indirect social cost. Such actions may have both positive and negative unintended consequences that should also be considered when weighing up the most appropriate approach to reducing transmission risks in this setting. Furthermore, there is a need to consider whose responsibility it is to ensure that guidance and regulations in licensed premises are adhered to and to weigh up the monetary and opportunity costs of what would be needed for more proactive, effective enforcement versus the economic costs of simpler measures such as closure. These issues are discussed further in our first paper below.

HOW WILL THE OUTCOMES BE DISSEMINATED?

We published two papers from this study:

- Fitzgerald N, Uny I, Brown A, Eadie D, Ford A, Lewsey J, *et al.* Managing COVID-19 transmission risks in bars: An interview and observation study. *J Stud Alcohol Drugs* 2021;**82**:42–54. https://doi.org/10.15288/jsad.2021.82.42 .
- Fitzgerald N, Manca F, Uny I, Martin JG, O'Donnell R, Ford A, *et al.* Lockdown and licensed premises: COVID-19 lessons for alcohol policy. *Drug Alcohol Rev* 2022;**41**:533–45. https://doi.org/10.1111/dar.13413 .

We shared the manuscripts with policymakers across the UK, Republic of Ireland and states in North America (where relevant), to inform their decision-making on COVID-19 and on alcohol policy. We also engaged with the media when the papers were published: both attracted television and extensive radio, social media and press coverage. We submitted two expert witness reports drawing on our findings and the wider literature to inform legal proceedings involving the Irish Government. The Institute for Social Marketing and Health at the University of Stirling successfully secured funding (led by Dr. Richard Purves) to analyse COVID-19 transmission risk management during the UEFA EURO2020 football tournament, which took place in summer 2021.

CONCLUSION

Reducing alcohol-related ambulance call-outs to protect frontline services likely requires action to address callouts related to weekend drinking as well as to reduce alcohol consumption at home throughout the week. Furthermore, our observations and interviews suggest grounds for uncertainty about the extent to which rules designed to reduce COVID-19 transmission in licensed premises can be consistently and effectively implemented in a sector where alcohol is routinely consumed. This is important in case mitigation measures to prevent virus transmission are required in future.

Figure 1. Number of daily ambulance callouts over time (Jan2019-Sept2020). The dashed red line indicates the national lockdown date. Weekends are defined as Fridays, Saturdays and Sundays (weekdays Mondays to Thursdays).

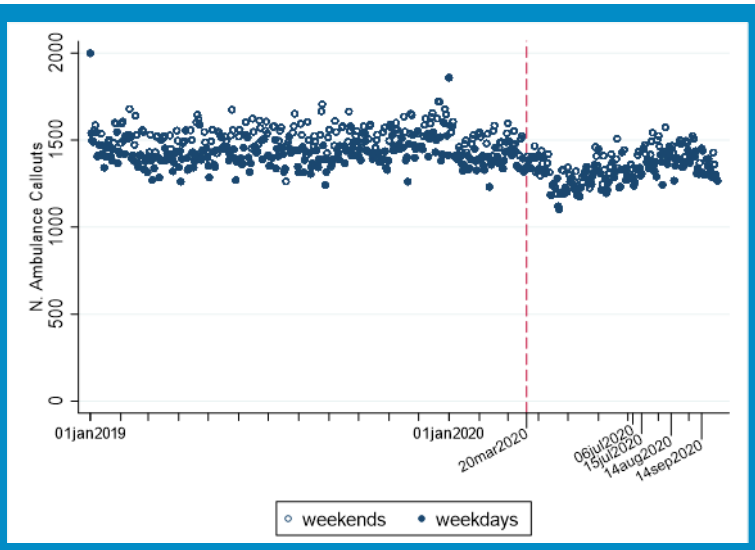


Figure 2. Number of daily alcohol-related ambulance callouts over time Jan2019-Sept2020). The dashed red line indicates the lockdown date. Weekends are defined as Fridays, Saturdays and Sundays (weekdays Mondays to Thursdays)

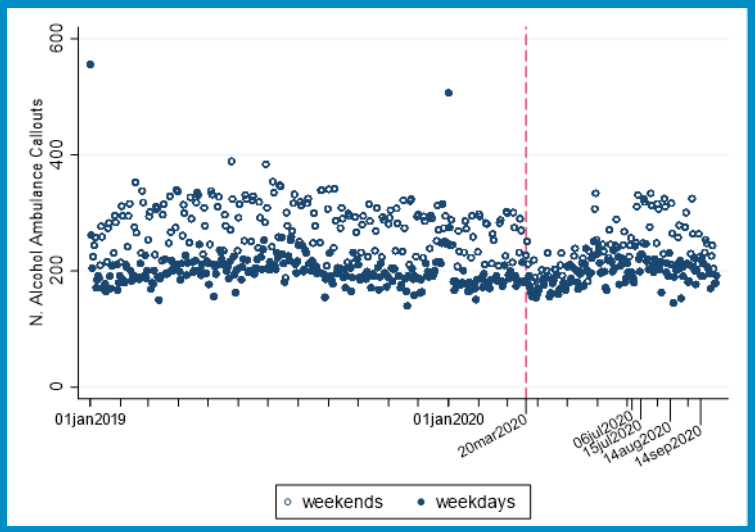
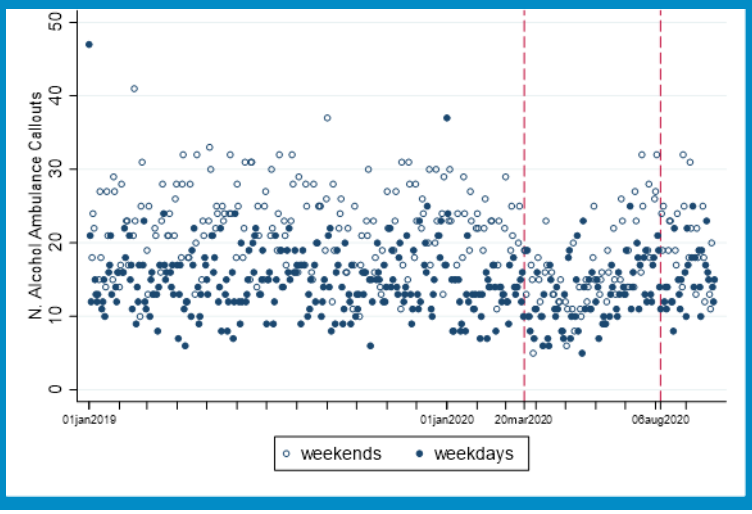


Figure 3. Alcohol related ambulance callouts in Aberdeen area (Jan2019-Sept2020)



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ADDITIONAL INFORMATION

Completed 30th November 2020. Funding received: £60,008

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