

## **Impact of COVID-19 on factors promoting alcohol use disorders in female victims of intimate partner violence**

### **Introduction:**

It is widely accepted that alcohol use disorders (AUDs) in perpetrators are a contributing factor in male-to-female intimate partner violence (IPV; defined as sexual, physical or psychological violence in an intimate couple relationship)<sup>1,2</sup>. However, AUDs in female victims of IPV are a less prevalent area of research. Nevertheless, a clear positive association has been found between intimate partner victimisation and alcohol use in women<sup>3</sup>. Furthermore, during the ongoing COVID-19 pandemic increases in the prevalence of both alcohol abuse and IPV have been noted<sup>4,5</sup>. Therefore, it can be hypothesised that this pandemic may directly promote the incidence AUDs in these women, but also indirectly; for example by contributing to increases in IPV, which is in turn likely to increase the incidence of AUDs in female victims.

In order to assess the impact of COVID-19 on AUDs in female victims of IPV, it is important to first understand the factors which promote alcohol misuse in these women: here I will consider psychosocial factors including the role of socioeconomic status (SES), lack of social support, and alcohol misuse as a response to the psychological stress induced by experiences of IPV. Furthermore, I will examine how both these factors and the barriers these women face when accessing healthcare may have been exacerbated by the COVID-19 pandemic, therefore potentially contributing to the prevalence and severity of AUDs in this group. I will illustrate these issues with a case study of a patient whom I met in a District General Hospital during the second wave of the COVID-19 pandemic, a victim of IPV who was admitted with decompensated alcoholic liver disease. I have chosen to focus on female victims here as women are disproportionately affected by IPV<sup>6</sup>, however I do not imply by this that female-to-male IPV or IPV in homosexual relationships are insignificant issues without their own links to AUDs.

### **Epidemiological perspective:**

Prior to the COVID-19 pandemic, 4.9% of women living in England and Wales reported having been a victim of non-sexual intimate partner violence in the previous year, with little change in prevalence over the last decade<sup>6</sup>. National data indicate that during the first COVID-19 lockdown in the UK (beginning March 2020), there was a significant increase in domestic abuse-related crimes (e.g. an increase of 24% for the months of April-June 2020 in comparison to the same period in 2019)<sup>7</sup>, although it is important to note that the term 'domestic abuse' also encompasses non-IPV crimes such as child abuse. Similar trends have been seen internationally, including a 3-fold increase in domestic violence in the Hubei province of China in February 2020 (during the Chinese national lockdown) in comparison to February 2019<sup>8</sup>. Furthermore, an increase in gender-based violence has been noted in previous epidemics, such as the 2013-15 Ebola epidemic in West Africa<sup>9</sup>, suggesting that there are inherent features of pandemics (or possibly the restrictions which are imposed during pandemics), which promote violence against women in domestic settings.

Whilst the prevalence of AUDs is higher in men than women<sup>10</sup>, the mortality rate for women with AUDs is 50-100% higher than that of men with AUDs<sup>11</sup> – a statistic which has been partially attributed to their increased risk of becoming a victim of violence, alongside other social and biological factors<sup>11</sup>. Similarly, positive correlations have also been found between incidence of AUDs and past history of IPV in women<sup>12</sup>, with severity of experiences

of IPV being positively correlated with alcohol use<sup>13</sup>. Furthermore, during the COVID-19 pandemic a general increase in alcohol consumption has been widely noted both in the media<sup>14</sup> and research literature<sup>15,4</sup>, with a general trend towards both greater frequency and quantity of alcohol consumption; especially amongst previous heavy drinkers (defined as >7 units per day)<sup>15</sup> and a positive correlation between poorer mental health and increased alcohol consumption<sup>4</sup>. There is currently a lack of research specifically regarding the effect of COVID-19 on AUDs in women who experience IPV. However, the independent increases in both IPV and alcohol use in the UK population during COVID-19, alongside the increased risk of AUDs in female victims of IPV, indicate that these women are likely to be at greater risk of AUDs during the pandemic.

### **Case study – Maria\***

When AUDs are considered in relation to IPV, they are most commonly discussed in perpetrators, often as a factor which exacerbates violent behaviour<sup>2</sup>. However, I was lead to instead consider the issue of AUDs in IPV victims by Maria, a patient whom I met on a medical ward of a District General Hospital.

Maria\* is a 38 year old female who has been a victim of IPV by multiple different partners for most of her adult life, and has consumed approximately 500ml to 1 litre of vodka per day for around the last 10 years. She has lived with her current partner, who also drinks harmful quantities of alcohol and is regularly physically abusive towards her, for the last 4 years. Maria has a poor social situation; she is unemployed and lives in council housing, relying on benefits for financial support, and has almost no social support network – having not had contact with her family in many years. Additionally, she has not seen her limited social circle in several months due to COVID-19 restrictions.

Several months after the introduction of the first national lockdown, Maria was admitted to her local District General Hospital following repeated episodes of haematemesis, and appears unwell with severe ascites and significant peripheral oedema. She has had a stay of several weeks on the Gastroenterology ward, with treatment including endoscopic band ligation and ascitic drains. In the past, Maria has had several short-lived episodes of abstinence, however she states that she has not attempted to stop drinking in the past year, and had in fact increased her alcohol intake in recent months. As such, while Maria has been diagnosed with decompensated liver cirrhosis, she is not currently a candidate for liver transplant.

Maria has a history of extensive depressive symptoms, but has never received treatment and has little or no contact with primary care or psychiatric services. She expresses a lack of interest in counselling or support groups, and states that her alcohol use is “my way of coping with life”.

While Maria openly recognises that her partner’s behaviour is abusive, she expresses little desire to end the relationship and is in fact keen to be discharged home. She perceives this type of relationship as “normal” for her, having had several abusive partners during her adult life. Furthermore, she cites her relative lack of social support and financial instability as barriers to leaving the relationship.

---

\* Names and other personal details have been changed to maintain confidentiality

Meeting Maria led me to consider the role of IPV in promoting AUDs, and the factors which may contribute to this. In particular, Maria implied that her excessive alcohol use was part of a maladaptive coping mechanism to years of primarily IPV-related trauma, potentially further exacerbated by a lack of contact with healthcare services. Additionally, Maria's social situation appeared to have contributed to her difficulty in leaving an abusive relationship, and her social isolation at least had been exacerbated by COVID-19. Whilst Maria's alcohol use has been an ongoing issue for the last decade and therefore cannot be attributed to COVID-19, it is interesting that on a background of an AUD her intake had increased over the months since the pandemic began. Therefore, Maria's case raises several psychosocial factors which may lead to increased alcohol use in IPV victims, many of which are likely to have been exacerbated by the COVID-19 pandemic.

### **Psychological factors promoting alcohol use in IPV victims:**

Experiences of IPV can be considered as a form of chronic trauma<sup>16</sup>, and have been shown to be associated with the development of complex post-traumatic stress disorder (CPTSD)<sup>17</sup> – features of which include increases in impulsivity<sup>16</sup>. Furthermore, alcohol use has often been hypothesized to represent a maladaptive coping mechanism to stress and trauma<sup>18</sup>, a link which has been demonstrated in samples of IPV victims<sup>16</sup>. A positive correlation was also found between alcohol consumption and severity of CPTSD symptoms, with evidence that this link was mediated by 'drinking to cope'<sup>16</sup>. Motivational models have been developed which propose that some individuals use alcohol to regulate positive and negative emotions, and therefore 'coping motives' (defined as beliefs regarding the use of alcohol to regulate emotions) can promote alcohol use<sup>19</sup>. In samples of women with a history of violence-related trauma, coping motives play an important role in mediating alcohol use<sup>20</sup>, which can therefore be considered to be a form of 'self-medication'<sup>16</sup> in trauma-related psychiatric disorders such as CPTSD.

However, many studies measure only alcohol consumption (i.e. frequency of drinking; number of drinks on a 'peak' drinking day), rather than the actual presence of an AUD. There is also a lack of longitudinal studies assessing alcohol use as a response to trauma over time in IPV victims<sup>3</sup>, although data which show a positive correlation between severity of IPV and alcohol consumption<sup>16</sup> could reasonably be extrapolated to suggest that increased duration of IPV may also be associated with increased alcohol consumption as a maladaptive coping mechanism to trauma. Furthermore, while the link between IPV victimization and alcohol use can be explained as a coping mechanism for CPTSD, there are also alternative explanations (e.g. there are likely to be confounding social factors), and as data sets are primarily cross-sectional the temporal direction of any causative associations is difficult to determine.

If AUDs among female victims of IPV can be considered to be a maladaptive coping strategy to trauma, then it is likely that alcohol use among this group will have increased during the COVID-19 pandemic due to increased exposure to stress and trauma. Given the previously discussed increase in IPV, it could be assumed that severity and/or frequency of trauma has increased, at least for some women. Therefore, as there is a positive correlation between severity of trauma-related CPTSD in IPV victims and their alcohol use<sup>16</sup> it is likely that some of these women have increased their drinking. However, there are currently no empirical studies on this specific topic and this therefore remains a hypothetical link. It is also important to note that experiences of the COVID-19 pandemic itself (e.g. increased social isolation, fear of unemployment, health-related fears) may act as stressors, therefore promoting 'drinking to cope' in these individuals.

Additionally, the noted increases in alcohol consumption in the general UK population during pandemic restrictions (see previous) have been found to be significantly associated with poor mental health<sup>4</sup>, and studies of samples of female IPV victims have found that the majority of these women meet diagnostic criteria for mental health disorders (most commonly PTSD)<sup>21</sup>. Therefore, this evidence suggests that IPV victims may be more susceptible than the average UK adult to increasing their alcohol use during COVID-19, not only due to the increased trauma they may be exposed to but also their predisposing mental health conditions.

In summary, while the development of AUDs is a complex process which is unlikely to be attributable to a single factor, it can certainly be expected that AUDs in many female victims of IPV have at least partly developed as a coping mechanism in response to chronic trauma and stress. This is aptly highlighted by Maria's statement that she utilized alcohol as a "way of coping with life", implying that for her, drinking represented a maladaptive coping strategy for years of abuse.

### **Social factors promoting alcohol use in IPV victims:**

There are numerous socioeconomic factors which have been shown to be associated with IPV and/or the development of AUDs, such as ethnicity<sup>24</sup>, however many of these will not be directly impacted by the COVID-19 pandemic. Therefore, I have chosen to focus upon issues of financial stability (e.g. unemployment and household income), and social isolation, as these are particularly pertinent examples, and are highlighted by Maria's case.

Whilst alcohol consumption is generally higher amongst individuals with greater household incomes<sup>10</sup>, it has been demonstrated that alcohol-related morbidity and mortality are disproportionately high in individuals with lower socioeconomic status<sup>22</sup>. This trend, often referred to as the 'alcohol harm paradox', has been partly attributed to increased incidence of other health risk behaviors (e.g. smoking, poor diet, lack of exercise)<sup>23</sup>. However, even after accounting for these alternative risk factors there remains a negative correlation between socioeconomic status and alcohol-related harm<sup>22</sup>, and in US samples, annual household income has been found to be the socioeconomic factor which is most strongly associated with IPV<sup>25</sup>.

Similarly, unemployment has been clearly identified as a risk factor for IPV<sup>24</sup>. In particular, in the UK 8.6% of unemployed adults had experienced domestic violence (although again this does not only include IPV) in comparison with 5.4% of employed adults<sup>6</sup>. It could also be suggested that these unemployed adults are also likely to be more socially isolated due to the lack of social interactions in a work environment, and therefore potentially more at risk of IPV and AUDs (see later). In summary, socioeconomic factors such as financial instability and lack of employment are independently associated both with harmful alcohol use and IPV, and can therefore be assumed to be associated with alcohol use in victims of IPV.

It is likely that the COVID-19 has had a significant negative effect on many of these socioeconomic factors which may promote alcohol use in IPV victims. For example, unemployment rose from 3.7% to 4.9% between August 2019 and August 2020<sup>31</sup>. As unemployment is independently linked to both risk of IPV<sup>6</sup> and prevalence of AUDs<sup>32</sup>, this can be assumed to have increased risk of AUDs in IPV victims both directly and via increased frequency and/or severity of IPV, which could then promote increased 'drinking to cope'. Similarly, other previously mentioned socioeconomic factors (e.g. annual household income) are likely to have been negatively impacted by the COVID-19 economic recession, with similar effects on alcohol use in these women.

Finally, another important social factor in IPV is lack of access to social support (i.e. social isolation). It has been found in multiple samples that increased social support (e.g. increased size of network of friends) mitigates the negative impacts of IPV on victims' mental

health<sup>26,27,28</sup>. In particular, increased social support is associated with decreased symptoms of PTSD among these women<sup>27</sup>. However, some studies have found that only social support from family sources is significantly protective in reducing the prevalence of IPV itself<sup>28</sup>. Nevertheless, social support is strongly indicated to reduce the negative impacts of IPV on victims' mental health, particularly PTSD symptoms. Additionally, in the general population poor access to social support is associated with increased alcohol use<sup>29,30</sup>. Therefore, as poor mental health (particularly PTSD) among these women is believed to be a factor which promotes alcohol use (see previous), it can be suggested that lack of access to social support will promote alcohol use, both directly and via negative effects on mental health.

One of the most obvious socioeconomic changes which has occurred as a result of the COVID-19 pandemic is the increase in social isolation – primarily due to the many months of restrictions placed on socialising outside households or travelling to workplaces, but also likely due to a fear of infection. The previously described increases in reports of IPV-related crimes since March 2020 have been extensively linked to the introduction of lockdown restrictions and social distancing measures<sup>33,34</sup>. Therefore, social isolation represents another socioeconomic factor which already contributed to the prevalence of AUDs among female victims of IPV, and since the pandemic began is likely to have made an even more significant contribution.

In summary, COVID-19 has exacerbated many of the socioeconomic factors which have for many years been strongly linked with IPV and AUDs, and therefore are expected to contribute to the development of AUDs in victims of IPV. In particular, many months of isolation have placed strain on these women, limiting their access to family and friends who may provide psychological support and potentially even assistance in escaping abusive relationships and reducing alcohol consumption. These women are now spending more time at home with their abusive partners, and are therefore probably suffering more frequent or severe violence. It is important to also note that as alcohol use has increased during COVID-19 in the general population, it can be expected to have also increased in perpetrators. While a detailed discussion of the role of AUDs in perpetrators is outside the scope of this essay, it is likely that their increased drinking has to an increase in their violent behaviour<sup>2</sup>, therefore increasing exposure to trauma for victims.

Generally, the socioeconomic factors discussed here are suggested to increase alcohol consumption in victims both directly and via increased exposure to abuse. Therefore, they are also compounded with psychological factors by promoting alcohol consumption by victims as a stress response. While Maria stated that drinking was her “way of coping with life”, it is difficult to know which parts of her life she referred to, however it could be suggested that she referred not to a single issue, but to her complex background of unemployment, financial instability, social isolation and experiences of IPV, demonstrating that these factors rarely act in isolation.

### **Barriers to treatment for AUDs among IPV victims:**

Fewer than 25% of individuals with AUDs utilise healthcare or support services aimed at assisting their recovery<sup>33</sup>. Female victims of IPV face not only the barriers faced by the general population (such as stigma), but also barriers specific to their demographic. Factors such as stigma or ethnicity, while undoubtedly important in preventing access to AUD treatment, are unlikely to have been specifically impacted by COVID-19, and will therefore not be discussed here. Similarly, a wide range of socioeconomic factors are widely accepted to have a significant impact on healthcare access in general, including the scarcity of available services and funding,

but these are too extensive to explore here. Instead, this section will focus specifically on barriers which are relatively unique to IPV victims.

Firstly, a lack of understanding or awareness of IPV can prevent disclosure of abuse in healthcare settings, which in turn is likely to also impact full disclosure of issues relating to AUDs, and adequate access to healthcare. For example, in a qualitative study of female IPV victims, women emphasised that safe and private surroundings were important; citing examples where their partners had been kept in the room or even used as interpreters during history-taking<sup>36</sup>. Therefore, increased awareness among healthcare professionals may encourage them to ensure they conduct interviews in private, and perhaps utilise screening questions for IPV in every consultation. Simple measures such as these are likely to increase the chances of victims disclosing abuse in healthcare settings.

However, this solution may be more difficult to achieve during the COVID-19 pandemic. Primary care consultations are now routinely conducted by telephone, therefore providing little opportunity for privacy from other members of the patient's household. In telephone consultations, healthcare professionals are also not able to visualise their patient, preventing them observing significant signs such as unusual bruising which could prompt questioning relating to IPV. Additionally, as discussed previously, due to lockdown restrictions victims are likely to be spending significantly more time with their violent partners. Therefore, the likelihood of victims feeling safe enough to disclose violence with a perpetrator likely in the home is very low, as demonstrated by significantly decreased rates of police reports of IPV during lockdowns, which then increase as restrictions are lifted<sup>37</sup>. While lack of disclosure of IPV to emergency services does not itself prevent victims from seeking support for AUDs, it can be expected that women who are unable to disclose abuse to healthcare professionals for fear of their partners are also less likely to present to primary or secondary care due to the same fear, even if their presentation is related to alcohol use rather than IPV. Furthermore, as many women (such as Maria) may feel that their drinking is a coping mechanism for the abuse they suffer, they can be presumed to be less likely to disclose the full extent of an AUD to healthcare professionals if they are unable to disclose their experiences of IPV.

Finally, while not specific to IPV victims, it should be noted that access to face-to-face healthcare is itself reduced by fear of COVID-19. In one sample, almost 75% of individuals in the general population stated that they had reduced their visits to healthcare facilities since the beginning of the pandemic due to fear of infection<sup>38</sup>, with some hospital emergency departments reporting decreases in visits of 73-88% over March 2020<sup>39</sup>. Therefore, fear of contracting COVID-19 is likely to have prevented access to treatment for alcohol-related health issues (including AUDs) alongside other health issues in victims of IPV as well as in the general population.

While Maria had disclosed her experiences of IPV to healthcare professionals, this could potentially be attributed to the ban on hospital visiting during pandemic restrictions, meaning her partner would not come into contact with healthcare staff, and does not necessarily demonstrate that she would feel safe enough to make a similar disclosure under 'normal' circumstances. She admitted to a prolonged lack of contact with primary care, and while she did not explain this it is possible it was the result of isolation imposed by her partner. Furthermore, she intended to return to her partner and expressed little intention of accessing alcohol support services, indicating that she potentially did not feel that the healthcare system could provide the support she needed, or that she had not been given sufficient support in accessing appropriate care. In summary, while Maria's case does not necessarily demonstrate all the barriers to AUD treatment faced by victims of IPV, it is important to note that the late stage of disease in which she presented indicated that her engagement with healthcare services had likely not been successful or significant in the past.

**Conclusions:**

In conclusion, female victims of intimate partner violence are at significantly increased risk of AUDs and alcohol-related morbidity and mortality. This association can be at least partly explained by understanding alcohol use as a coping mechanism for the chronic psychological trauma they experience. However, a number of socioeconomic factors also have complex roles in promoting alcohol use, both directly and via increased exposure to violence. Women have long faced violent behaviour from their partners, and have developed AUDs possibly as a direct result, however, COVID-19 has led to unprecedented increases in the stresses this group face in their daily lives, with numerous impacts on their psychological and physical health. In particular, barriers to healthcare have been exacerbated or created by the pandemic, which have resulted in this already isolated group being even less likely to seek help for alcohol addiction. Both during and after the COVID-19 pandemic, I believe that some of the most meaningful impacts that we as healthcare professionals can have is to ensure screening for IPV is a regular feature of conversations with patients, that they are provided with a safe space to talk, and to increase awareness of the complicated factors which promote alcohol use in these women.

*(3,483 words)*

## **References:**

1. Leonard K. (2001) Domestic violence and alcohol: what is known and what do we need to know to encourage environmental interventions? *Journal of Substance Use*. 6(4):235-247
2. Foran HM, O’Leary KD. (2008). Alcohol and intimate partner violence: a meta-analytic review. *Clinical Psychology Review*. 28(7):1222-1234
3. Devries KM, Child JC, Bacchus LJ, Mak J, Falder G, Graham K, Watts C, Heise L. (2014). Intimate partner violence victimisation and alcohol consumption in women: a systematic review and meta-analysis. *Addiction*. 109(3):379-391
4. Jacob L, Smith L, Armstrong NC, Yakkundi A, Barnett Y, Butler L, McDermott DT, Koyanagi A, Shin JI, Meyer J, Firth J, Remes O, Lopez-Sanchez GF, Tully M. (2021). Alcohol use and mental health during COVID-19 lockdown: a cross-sectional study in a sample of UK adults. *Drug and Alcohol Dependence*. 219:108488
5. Bradbury-Jones C, Isham L. (2020). The pandemic paradox: The consequences of COVID-19 on domestic violence. *Journal of Clinical Nursing*. 29(13-14):2047-2049
6. Office for National Statistics: Domestic abuse victim characteristics, England and Wales: year ending March 2020. Available online at <https://www.ons.gov.uk/peoplepopulationandcommunity/crimeandjustice/articles/domesticabusevictimcharacteristicsenglandandwales/yearendingmarch2020> (Accessed 21/01/2021)
7. Office for National Statistics: Domestic abuse during the coronavirus (COVID-19) pandemic, England and Wales: November 2020. Available online at <https://www.ons.gov.uk/peoplepopulationandcommunity/crimeandjustice/articles/domesticabuseduringthecoronaviruscovid19pandemicenglandandwales/november2020#coronavirus-and-measuring-domestic-abuse> (accessed 25/01/2021)
8. Roesch E, Amin A, Gupta J, García-Moreno C. (2020). Violence against women during covid-19 pandemic restrictions. *BMJ*. 369:m1712
9. Onyango MA, Resnick K, Davis A, Shah RR. (2019). Gender-based violence among adolescent girls and young women: A neglected consequence of the West African Ebola outbreak. *Pregnant in the time of Ebola: Global Maternal and Child Health*. Published by Springer.
10. NHS: Statistics on Alcohol, England 2019 [PAS]. Available online at <https://digital.nhs.uk/data-and-information/publications/statistical/statistics-on-alcohol/2019/part-4> (Accessed 25/01/2021)
11. National Institute on Drug Abuse: Substance Use in Women Research Report: Sex and Gender Differences in Substance Use. 2020. Available online at <https://www.drugabuse.gov/publications/research-reports/substance-use-in-women/sex-gender-differences-in-substance-use> (Accessed 25/01/2021)
12. Ullman S, Sigurvinsdottir R. (2015). Intimate partner violence and drinking among victims of adult sexual assault. *J Aggress Maltreat Trauma*. 24(2):117-130
13. Clark AH, Foy DW. (2000). Trauma exposure & alcohol use in battered women. *Violence against women*. 6(1):37-48
14. Lawrence R. ‘If lockdown has tipped you into problem drinking, you’re probably not alone’. *The Guardian*. 18 Nov 2020. Available online at <https://www.theguardian.com/commentisfree/2020/nov/18/lockdown-problem-drinking-not-alone-alcohol-dependence-challenging> (Accessed 25/01/2021)
15. Alcohol Change UK. Research: drinking in the UK during lockdown and beyond. 2020. Available online at <https://alcoholchange.org.uk/blog/2020/drinking-in-the-uk-during-lockdown-and-beyond> (Accessed 25/01/2021)



16. Kaysen D, Resick PA. (2007). Domestic violence and alcohol use: trauma-related symptoms and motives for drinking. *Addictive Behaviours*. 32(6):1272-1283
17. Roth S, Newman E, Pelcovitz D, van der Kolk B, Mandel F. (1997). Complex PTSD in victims exposed to sexual and physical abuse: results from the DSM-IV field trial for Posttraumatic Stress Disorder. *Journal of Traumatic Stress*. 10:539-555
18. Marshall-Berenz EC, Vujanovic AA, MacPherson L. (2011). Impulsivity and alcohol use coping motives in a trauma-exposed sample: the mediating role of distress tolerance. *Personality and Individual Differences*. 50(5):588-592
19. Cooper ML, Frone MR, Russell M, Mudar P. (1995). Drinking to regulate positive and negative emotions: a motivational model of alcohol use. *Journal of Personality and Social Psychology*. 69(5):990-1005
20. Ullman SE, Filipas HH, Townsend SM, Starzynski LL. (2005). Trauma exposure, posttraumatic stress disorder and problem drinking in sexual assault survivors. *Journal of Studies on Alcohol*. 66(5):610-619
21. Nathanson AM, Shorey RC, Tirone V, Rhatigan DL. (2012). The prevalence of mental health disorders in a community sample of female victims of intimate partner violence. *Partner Abuse*. 3(1):59-75
22. Katikireddi SV, Whitley E, Lewsey J, Gray L, Leyland AH. (2017). Socioeconomic status as an effect modifier of alcohol consumption and harm: analysis of linked cohort data. *The Lancet Public Health*. 2(6):267-276
23. Bellis MA, Hughes K, Nicholls J, Sheron N, Gilmore I, Jones L. (2016). The alcohol harm paradox: using a national survey to explore how alcohol may disproportionately impact health in deprived individuals. *BMC Public Health*. 16, 111
24. Field CA, Caetano R. (2004). Ethnic differences in intimate partner violence in the US general population: the role of alcohol use and socioeconomic status. *Trauma, Violence and Abuse*. 5(4):303-317
25. Cunradi CB, Caetano R, Schafer J. (2002). Socioeconomic predictors of intimate partner violence among white, black, and Hispanic couples in the United States. *Journal of Family Violence*. 17:377-389
26. Escriba-Aguir V, Ruiz-Perez I, Montero-Pinar MI, Vives-Cases C, Plazaola-Castano J, Martin-Baena D. (2010). Partner violence and psychological well-being: buffer or indirect effect of social support. *Psychosomatic Medicine*. 72(4):383-389
27. Coker AL, Smith PH, Thompson MP, McKeown RE, Bethea L, Davis KE. (2004). Social support protects against the negative effects of partner violence on mental health. *Journal of Women's Health and Gender-Based Medicine*. 11(5):465-476
28. Wright EM. (2012). The relationship between social support and intimate partner violence in neighbourhood context. *Crime & Delinquency*.
29. Groh DR, Jason LA, Davis MI, Olson BD, Ferrari JR. (2006). Friends, family, and alcohol abuse: an examination of general and alcohol-specific social support. *American Journal on Addictions*. 16(1):49-55
30. Peirce RS, Frone MR, Russell M, Cooper ML, Mudar P. (2000). A longitudinal model of social contact, social support, depression, and alcohol use. *Health Psychology*. 19(1):28-38
31. Office for National Statistics. Labour market overview, UK: December 2020. Available online at <https://www.ons.gov.uk/employmentandlabourmarket/peopleinwork/employmentandemployeetypes/bulletins/uklabourmarket/december2020#employment-unemployment-and-economic-inactivity> (Accessed 31/01/2021)
32. Popovici I, French MT. (2013). Does unemployment lead to greater alcohol consumption? *Ind Relat*. 52(2):444-466

33. Ertan D, El-Hage W, Thierree S, Javelot H, Hingray C. (2020). COVID-19: urgency for distancing from domestic violence. *European Journal of Psychotraumatology*. 11:1
34. Couldtard P, Huthison I, Bell JA, Coultard ID, Kennedy H. (2020). COVID-19, domestic violence and abuse, and urgent dental and oral and maxillofacial surgery care. *British Dental Journal*. 228:923-926
35. Tucker JA, Chandler SD, Witkiewitz K. (2020): Epidemiology of recovery from alcohol use disorder. *Alcohol Research*. 40:3
36. Chang JC, Decker MR, Moracco KE, Martin SL, Petersen R, Frasier PY. (2004). Asking about intimate partner violence: advice from female survivors to health care providers. *Patient Education and Counseling*. 59(2):141-147
37. Silverio-Murillo A, Balmori de la Miyar JR, Hoehn-Velasco L. (2020). Families under confinement: COVID-19, domestic violence and alcohol consumption. *Andrew Young School of Policy Studies Research Paper Series*, Forthcoming, Available at [https://papers.ssrn.com/sol3/papers.cfm?abstract\\_id=3688384&download=yes](https://papers.ssrn.com/sol3/papers.cfm?abstract_id=3688384&download=yes) (Accessed 31/01/21)
38. Balkhi F, Nasir A, Zehra A, Riaz R. (2020). Psychological and behavioural response to the coronavirus (COVID-19) pandemic. *Cureus*. 12(5):7923
39. Lazzarini M, Barbi E, Apicella A, Marchetti F, Cardinale F, Trobia G. (2020). Delayed access or provision of care in Italy resulting from fear of COVID-19. *The Lancet*. 4(5):10-11