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Understanding Alcohol Misuse in Scotland

Harmful Drinking: Alcohol and Self-harm
Foreword

This is the third in a series of reports which aims to gather evidence on the impact of alcohol-related problems on the health service in Scotland. The first report examined the prevalence of such problems in emergency departments and was published in November 2006. The second report looked at the number and nature of assault presentations to emergency departments in Scotland, particularly those related to the use of alcohol, and was published in December 2006 (available at www.nhshealthquality.org).

This initiative developed from the Plan for Action on Alcohol Problems (Scottish Executive 2002)\(^1\) which included a commitment to consider the development of standards for the treatment and management of people with alcohol problems.

NHS Quality Improvement Scotland (NHS QIS) was asked to take this work forward and a short-life Alcohol Advisory Group was established to explore how best to support the implementation of key policies and the improvement of alcohol services. One of the key conclusions from the group’s work was that there is generally a lack of accurate, up-to-date information regarding the extent and impact of alcohol use and misuse. Without this information, it is very difficult to know where to focus future work.

We decided that priority should be given to gathering the necessary evidence and, with this in mind, we set up the NHS QIS Scottish Emergency Department Alcohol Audit (SEDAA) Group. This group has developed a five-part programme of work focusing on:

- the size of the problem
- alcohol and assaults
- alcohol and self-harm
- intravenous B vitamins for alcohol-related cases, and
- alcohol and children.

This report looks at the number and nature of self-harm presentations to emergency departments in Scotland, particularly those related to the use of alcohol. Further reports will follow over the next 6 months, designed to fill the information gap that exists in our knowledge and understanding about alcohol misuse. An overview report summarising the findings and considering the next steps will be published in March 2008.

NHS QIS commissioned the Scottish Trauma Audit Group (STAG), a national audit team based in mainland emergency departments in Scotland, to carry out this work and we are grateful to its project manager, the audit co-ordinators and particularly the emergency department staff. Thanks to their efforts, we now have a growing evidence base on alcohol misuse in Scotland. This will be strengthened further in the coming months.

David R. Steel
Chief Executive
Summary and key findings

Aim

The aim of the study was:

• to determine the number and nature of attendances to emergency departments in Scotland as a result of self-harm
• to record the involvement of alcohol in the patient’s presentation where applicable, and
• to report on the patient’s subsequent management.

For the purposes of the study, the term self-harm was taken from the National Institute for Clinical Excellence (NICE) guideline on self-harm and is defined as ‘self-poisoning or injury, irrespective of the apparent purpose of the act’. Further, the study defined poisoning as the swallowing of any toxic substances, including alcohol.

Sixteen out of a total of 25 mainland emergency departments took part in the study over 10 weeks from September to November 2006.

Key findings

Presentations to emergency departments as a result of self-harm

During the 10-week period, a total of 3,004 patients were seen in the emergency departments as a result of self-harm. A number of patients attended more than once, bringing the total number of self-harm attendances to 3,454.

• 43% of self-harm attendances were under 30 years of age, including 461 (15%) patients who were younger than 20 years of age.
• Self-poisoning with any substance was the most prevalent method of self-harm, involved in almost 80% of the attendances.
• Relationships were most often cited as the reason for self-harm. For men (36%) this was a relationship with their partner, and for women (31%) the relationship with their family.
• 50% of all self-harm attendances occurred between 8pm and 4am.
• The highest number of presentations were on Sundays and Tuesdays.

The role of alcohol

• 62% of males and 50% of females who attended an emergency department following self-harm reported consuming alcohol.
• 27% of men and 19% of women cited alcohol as the reason for self-harming.

* A total of 172,700 patients were seen in 16 participating emergency departments during the study period, with self-harm attendances making up 2% of all presentations (3,454).
• Clinical staff reported that 32% of males and 20% of females had alcohol-related conditions in their past medical history.
• Only 14 (0.4%) patients were assessed using an alcohol screening tool.

**Assessment and management of patients in the emergency department**

• The mental state of self-harm patients was assessed and a preliminary psychosocial assessment documented in 96% of cases.
• 68% of patients were referred from the emergency department for a specialist psychosocial assessment.
• 80% of attendances were managed in the emergency department within four hours.
• Among the patients who discharged themselves against medical advice (6%), mental capacity or willingness to remain for further assessment was not often documented.
• Only 103 (3%) patients had no existing care package in place or further follow-up.
• Death in hospital occurred in 11 cases (0.37%).

**Study limitations**

This audit involved 16 of Scotland’s 25 mainland emergency departments. There were no audit co-ordinators in post at the other centres at the time of the study to allow them to participate. However, the 16 departments that did take part cover the biggest population centres and account for 67% of all attendances seen in Scotland’s mainland emergency departments.

Data was collected over a 10-week period, from September to November 2006, therefore seasonal variations in the pattern of self-harm are not taken into account.

Documentation of alcohol consumption was variable. It is likely that our figures underestimate the true picture of the contribution alcohol makes to emergency department attendances in Scotland following self-harm.
Introduction

Misuse of alcohol is a serious problem in Scotland. It is estimated to cost the Scottish economy at least £1 billion a year in reduced productivity, accidents and injuries, increased crime and violence and direct costs to the NHS, social services and the criminal justice system³.

Excessive use of alcohol is a major issue and the evidence suggests that the problem is getting worse:

- consumption of alcohol in the adult population has increased by 23% over the last 10 years⁴
- 44% of men and 27% of women in Scotland are drinking in excess of recommended levels, with 26% of men and 10% of women drinking more than double these levels⁴
- one in 30 deaths is directly related to alcohol, with alcohol-related death rates more than tripling in the past 25 years⁴, and
- in 2004, 40% of boys and 46% of girls reported drinking while underage⁵.

Problems relating to alcohol use are common among self-harm patients⁶. For many, this factor may complicate immediate management, either by impairing judgement and capacity, or by interacting with swallowed substances such as antidepressants.

Hospital emergency departments are in the front line in responding to many of the health issues related to alcohol misuse, from treating the consequences of alcohol-induced accidents, to helping people who are intoxicated or have poisoned or harmed themselves. Although this is recognised as a key part of the work of emergency departments, no national data has been collected to quantify the extent of this problem.
Methods

This study involved recording the number and nature of attendances to emergency departments in Scotland as the result of self-harm (self-poisoning or self-injury); the extent to which alcohol was a contributory factor in the patient’s presentation; and reporting on the patient’s subsequent management in the emergency department. It took place in 16 emergency departments over a 10-week period from September to November 2006.

An alcohol and self-harm pro forma was designed to incorporate aspects of both the NICE guidelines on self-harm and the Royal College of Psychiatrists’ report, ‘Better Services for People who Self-Harm, Quality Standards for Healthcare Professionals’, including the recommendation that a Basic Mental State (BMS) and a Preliminary Psychosocial Assessment (PPA) be administered in the emergency department.

The assessment for the BMS included the following aspects: behaviour, speech, appearance, mood, orientation and physical health. The PPA included: risk of further injury, previous self-harm episode, ongoing intent to self-harm, history of events, recent major stress, known mental illness, drug or alcohol use, contact with mental health services and family/social network.

Local audit co-ordinators identified all patients who had directly intended to injure or poison themselves. A distinction was made between a new attendance and a repeat attendance.

Clinical staff were also asked to record:

- patients where alcohol was considered to have contributed to their attendance
- the use of alcohol around the time of self-harm
- previous medical history of alcohol problems, and
- the use of an alcohol-screening tool.

For an additional 300 people, 123 men and 177 women, further information was collected about the reasons for self-harm. The data was taken from a more comprehensive assessment conducted by specialist mental health professionals.

Local audit co-ordinators made arrangements with emergency department staff to identify and follow up patient records according to specific circumstances in their own hospital. Sources utilised were: ambulance patient report forms, emergency department notes and specialist psychiatric assessments.
Results

1. Number and characteristics of patients involved in self-harm

During the study period, 3,004 patients presented to the 16 emergency departments as a result of self-harm. Some patients attended more than once, bringing the number of documented self-harm presentations to 3,454. In total, self-harm constituted 2% of all attendances.

Women (1,679 or 56%) were slightly more likely to present to the emergency department following self-harm and their mean age was 33. Men presenting to the emergency departments were, on average, one year older. 40% of patients were younger than 30 years of age, whilst a further 461 (15%) patients were younger than 20 years of age.

Figure 1: Number of patients by age and sex
(n=3,004)

* Age was not documented in one case
2. Day and time of presentation

The busiest times for self-harm presentations were during evenings and nights, with 50% of attendances between 8pm and 4am. Nearly 81% of self-harm attendances occurred outside normal working hours (9am to 5pm, Monday to Friday).

Figure 2: The number of patients by time and day of presentation
(n=3,454)
3. Method of self-harm

All self-harm attendances at emergency departments were as a result of poisoning or injury. Poisoning by swallowing any toxic substance was the most prevalent method of self-harm and was involved in almost 80% of the self-harm attendances. Poisoning was almost always (92%) with drugs, whether legal or illegal. Intentional self-injury by any method was more likely among men than women (24% versus 19%). Cutting was the most common method of self-injury in self-harm presentations. In 6% of attendances patients used both methods.

**Figure 3:** Percentage of attendances by method of self-harm and sex

![Graph showing percentage of attendances by method of self-harm and sex](image)

- **Poisoning (n=2,504)**
- **Injury (n=730)**
- **Both (n=213)**

Method of self-harm: Female, Male
4. Reasons for self-harm

For 123 men and 177 women, additional information was collected about the reasons for self-harm (this data originated from the more comprehensive assessment conducted by specialist mental health professionals – see section 6).

While ‘relationship with family’ was the most prevalent reason for self-harm among females (31%), males were less likely to state that this was a cause of their behaviour (18%). The most prevalent reason for self-harm among males was their relationship with their partner (36%) followed by alcohol (27%).

The specialist assessment also collected detailed information on socio-demographic factors associated with risk of self-harm. Marital status was very similar between sexes - almost half (49%) of both male and female patients were single. Female self-harm patients were more likely to live with relatives than males (32% compared to 25%), while males were more likely to live alone (33% compared to 20%). Over half of patients were unemployed. Males were more likely to be in full-time employment than females (19% compared to 11%) and females were more likely to be in education (10% compared to 0%). Responses to each of these questions were undocumented in between 15% and 30% of cases.

Figure 4: Percentage of attendances according to the reasons for self-harm* (n=300)

Percentages can add up to more than 100% because more than one reason can apply.

* Percentages can add up to more than 100% because more than one reason can apply.
5. **Involvement of alcohol**

There is no standard method for identifying patients for whom alcohol is a contributory factor in their presentation to an emergency department in Scotland. Moreover, the practice of documenting alcohol use varies widely across the country.

In this study, only 14 (0.4%) patients were assessed using an alcohol screening tool.

Clinical staff reported that alcohol was a contributory factor in 40% of all self-harm presentations. More than half (56%) of the people who attended an emergency department following self-harm had consumed alcohol in the previous 24 hours: 62% of males and 50% of females. In addition, clinical staff reported that a quarter of all self-harm presentations had alcohol-related conditions in their past medical history (32% of males and 20% of females).

These figures are likely to underestimate the role played by alcohol. In 36% of attendances, there was no documentation of whether alcohol was involved.

**Figure 5:** Percentage of attendances according to alcohol issues

(n=3,454)

<table>
<thead>
<tr>
<th>Involvement of alcohol</th>
<th>Alcohol in past medical history</th>
<th>Alcohol used around time of self-harm</th>
<th>Alcohol a contributory factor</th>
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<tr>
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<td>40</td>
<td>80</td>
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<td>60</td>
<td>20</td>
</tr>
<tr>
<td>Not documented</td>
<td>40</td>
<td>20</td>
<td>0</td>
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</table>

Percentage of attendances
6. Assessments of self-harm patients

It is suggested that all people who have self-harmed and attend the emergency department should be offered an assessment of their mental state and of psychological factors specific to the act of self-harm. The results of this study suggest that the mental state of self-harm patients was assessed in 96% of cases, and that some form of preliminary psychosocial assessment was also documented in 96% of cases. As part of the latter assessment it was established that the majority of attendances (88%) had a documented history of the events that led to the episode of self-harm. Continued physical risk was documented in 43% of attendances. Ongoing intention to self-harm was documented in 37% of attendances.

Further to assessments made in the emergency department, guidelines specify that all people who have self-harmed should be offered a more comprehensive assessment conducted by specialist mental health professionals. In our study, 68% of attendances (2343/3454) resulted in a referral for a specialist psychosocial assessment (SPA) from the emergency department. Of the remaining 943 attendances for which data was available, only 103 (3% of the total group) had no existing care package in place or further follow-up.

Figure 6: Percentage of attendances according to further follow-up

| Was the patient referred for a Specialist Psychosocial Assessment? (n=3454) |
|---|---|---|
| Yes | 68% (2343) |
| No | 27% (943) |
| Not documented | 5% (168) |

| No, but was the patient discharged with follow-up care? (n=943) |
|---|---|---|---|---|
| Yes | 47% (457) |
| No, discharged against medical advice | 14% (130) |
| No, did not wait for assessment | 12% (111) |
| No follow-up | 11% (103) |
| Not documented | 15% (137) |
| Not applicable | 1% (5) |
7. **Subsequent management of self-harm patients**

A total of 2,576 patients (75%) were referred to another specialty in the hospital after being managed in the emergency department. Of these, 42% were referred to a psychiatrist or to psychiatric services and 33% were referred to a general hospital specialty.

Over half of the patients (58%) were admitted (mean length of stay 1.5 days), 31% of patients were discharged home and 11% discharged themselves against medical advice or did not wait.

Six men and five women died in hospital following their episode of self-harm.
Conclusion

Problems relating to alcohol use are common among self-harm patients. Of the 3,004 patients who presented at emergency departments following an episode of self-harm, clinicians cited alcohol as a contributory factor in 40% of attendances. The reasons for self-harm, however, are frequently multiple and complex. Rigorous assessment of the risks to the individual (and their specific needs) is required so that the patient and healthcare professionals can make informed and appropriate choices to manage the issues related to alcohol and self-harm.

It is beyond the scope of this study to suggest what should be done in the future. Clearly it requires a continued response from many agencies, both in the effective treatment and prevention of alcohol misuse and self-harm.

The focus of emergency departments is on treating the life threatening consequences of self-harm. However, greater efforts to identify those who would benefit from advice to reduce their alcohol consumption may have an effect in preventing future problems. Improved documentation is required to record the role alcohol has played, coupled with simple screening tools to identify alcohol problems. In this audit only 14 (0.4%) of 3,454 patients were assessed using a screening tool.

Meanwhile, work is progressing on two further areas of work, which will add to our current knowledge about alcohol misuse in Scotland and help develop more effective ways of responding.

The table shown here gives timelines for this work. An overview report summarising all aspects of this audit will be published in March 2008.

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<th>Study Reports</th>
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<tr>
<td>The use of intravenous B vitamins</td>
<td>3rd Quarter 2007</td>
</tr>
<tr>
<td>Alcohol and Children</td>
<td>4th Quarter 2007</td>
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Understanding Alcohol Misuse in Scotland

Harmful Drinking: Alcohol and Self-harm
Useful Contacts

This section provides a list of support agencies and organisations that can help those affected by alcohol and/or self-harm.

1 Alcoholics Anonymous
   Tel: 0845 769 7555
   Website: http://www.alcoholics-anonymous.org.uk/
   Email: aanewcomer@runbox.com

2 Alcohol Focus Scotland
   Tel: 0141 572 6700
   Website: http://www.alcohol-focus-scotland.org.uk
   Email: enquiries@alcohol-focus-scotland.org.uk

3 Childline
   Tel: 0800 1111 (freephone)
   Website: http://www.childline.org.uk/

4 Drinkline Scotland
   0800 7 314 314 (freephone)

5 National Self Harm Network
   Website: http://www.nshn.co.uk
   Email: info@nshn.co.uk

6 NHS 24
   Tel: 08454 24 24 24
   Textphone: 1800108454 24 24 24
   Website: www.nhs24.com

6 Samaritans
   Tel: 08457 90 90 90
   Website: http://www.samaritans.org.uk
   Email: jo@samaritans.org
References


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- in large print
- on audio tape or CD
- in Braille, and
- in community languages.

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