Screening, Brief Intervention, Referral, and Treatment (SBIRT) of Acute Care Patients for Alcohol Use Disorders

Introduction

Alcohol use and abuse in America is a major health concern. 4 million American adults suffer from alcohol abuse or alcoholism, and more than 100,000 people die from alcohol-related diseases and injuries each year. Abuse and dependence are not the only problems, however, since risky drinking behavior also leads to a large number of injuries. Approximately one-third of all adults engage in some kind of risky drinking behavior, that is, levels of consumption that significantly elevate the risk of alcohol-related harm. Trauma centers across the country especially feel the effects of such behavior, as studies repeatedly demonstrate that 40-50% of their patients have positive blood alcohol levels at the time of their medical visit. Still, in trauma centers and emergency departments (EDs), the standard practice is to treat the injury and ignore the underlying alcohol problem. Because alcohol-related injuries and medical conditions result in millions of acute care visits each year, a growing number of health experts view these visits as an opportunity to screen patients for alcohol problems and provide screen-positive patients with brief counseling or referral specialized treatment. Many studies show that inexpensive brief interventions promote significant reductions in drinking levels for problem drinkers who are not alcohol dependent, thereby reducing the number of emergency room visits related to alcohol.

Despite the availability of effective interventions, many physicians do not screen for alcohol problems, partly because of concerns about confidentiality and denial of insurance coverage. State insurance laws based on the Uniform Accident and Sickness Policy Provision Law (UPPL), currently in effect in 38 states, serve as a barrier to screening and brief interventions by permitting insurers to deny payment for treatment of injuries sustained by a person under the influence of alcohol or other drugs. Thus, in order for alcohol screening to become a routine element of care provided during trauma center and ED visits, either efforts to prohibit the laws must increase or information about alcohol use would need to be segregated in the medical record. At its 2003 Interim Meeting, the American Medical Association adopted Resolution 912, which called for the AMA to support efforts to prohibit state laws modeled after UPPL, and six states have recently prohibited UPPL laws. In the meantime, a significant increase in support for screening and brief intervention as part of the ED visit is needed, as concerns about efficacy and efficiency remain.
1. Paradigms: Alcoholism vs. Alcohol Problems

Recently, there has been a shift in paradigm of what it means to have alcohol problems. The alcoholism paradigm postulated a dichotomy: unless a person was an alcoholic, he or she did not have problems with alcohol. Thus, non-drinkers and non-alcoholic drinkers who engaged in risky drinking behavior were combined into one group and not treated for alcohol problems. In effect, this view ignores the fact that many non-alcoholic risky drinkers become injured while under the influence of alcohol. In fact, the majority of alcohol-related incidents are experienced by individuals who do not meet the criteria for a diagnosis of dependence. The prevailing alcoholism paradigm prevents us from fully addressing the problem.

![Diagram of Alcohol Use Spectrum]

*Figure 1. The Spectrum of Alcohol Use.*

The spectrum of alcohol use extends from abstinence and low-risk use (the most common patterns of alcohol use) to risky use, problem drinking, harmful use and alcohol abuse, and the less common but more severe alcoholism and alcohol dependence. Consumption and the severity of consequences increase from low-risk use through dependence. The areas of the pyramid reflect the approximate prevalence of each category. Clinicians and public health practitioners should be most concerned with the categories in the shaded upper portions of the pyramid (representing unhealthy alcohol use).

On the other hand, the alcohol problems paradigm suggests that, instead of a dichotomy, the spectrums of alcohol problems is comprised of at least four groups. From most to least severe they are persons who could be diagnosed with alcohol dependence (commonly referred to as alcoholics); persons experiencing alcohol-related problems which, however, would not sustain a diagnosis of alcohol dependence; persons who drink so little that they experience no alcohol-related problems; and non-drinkers, a group composed of lifetime non-drinkers and ex-drinkers from the three preceding groups. Patients from the first two groups make a significant proportion of alcohol-related visits to emergency departments and trauma centers.
2. Prevention and Early Intervention

The need for prevention of alcohol-related emergency room visits is great, as currently there are about 110 million ED visits and 3.5 million trauma center admission in the U.S. every year. Effective screening and brief interventions would provide preventive value: fewer alcohol-related incidents, fewer emergency room visits, lower health care costs, and decreased human suffering. If acute care patients were screened and received brief counseling, repeat acute-care visits for alcohol-related medical conditions and injuries could be reduced.

*Sources: McDonald, Crawford et al*

Advocates of this new paradigm encourage screening all patients who come to trauma centers and EDs to identify these two groups. They recommend that patients who are potentially alcohol dependent be helped to enter specialized alcohol treatment programs and the non-alcoholic problem-drinking patients receive an on-site brief counseling intervention because this group is perhaps the most ready to change their drinking habits. A 1990 IOM report described the new paradigm and recommended that the scope and target of treatment be broadened—the scope to include brief counseling and the target to include individuals who are not alcohol dependent but have moderate alcohol-related problems.

*Sources: IOM Report, Hungerford/Pollock paper*

3. Efficacy

Even if physicians accept the alcohol problems paradigm, they may still believe that screening and brief counseling interventions are not the appropriate approach because they fear these new techniques would be ineffective in their practice setting. Although further implementation research is needed to optimize these methods for EDs and trauma centers, many studies in a variety of settings confirm their efficacy. For example, recent studies in emergency departments or trauma centers demonstrate that alcohol interventions are associated with reductions in alcohol intake and repeat acute care visits. Groups studied include adolescents, college students, and adults, all of whom readily complied with screening and intervention procedures. These results warrant increased attention and further study, and health care providers should be encouraged by this potential beneficial tool.

*Sources: Daeppen, Gentilello et al (in Annals of Surgery), Spirito et al, D’Onofrio and Degutis, Crawford et al*
4. Economics

Notwithstanding the value of screening and brief interventions, it may be extremely difficult for many trauma centers and EDs to implement them when they are already overcrowded and understaffed. Some studies demonstrate that community workers and non-specialists can administer the program effectively. Even so, most EDs do not have the resources to hire additional staff to perform alcohol screening. Other studies show that staff ED physicians can perform them with only a minimal increase in time they spend with patients. Advocates for having physicians perform the intervention assert that alcohol problems are an underlying cause of medical conditions and injuries. Therefore, it is appropriate to have the physician screen and provide the intervention. In this view, although it may be helpful to include other personnel in the process, the physician must also have a significant role. Clearly there are several staffing options to meet the varied operational and resource requirements of different institutions. In the busiest settings, it may be best to hire non-medical personnel. In settings with more limited funding, the best solution may be to use medical professionals in ways that minimize additional time spent on the program.

Once questions of staffing are settled, it is important to ensure that screening and interventions are carried out cost-effectively. Although SBIR programs will add costs in one sector of the health-care system, they can also reduce health care and legal costs so that total system costs decrease. Research studies demonstrate that SBIR can be implemented at a cost low enough to result in a favorable cost-benefit ratio. In order to maximize this ratio, it is important for EDs to plan out their strategy carefully. D’Onofrio and Degutis suggest addressing the following questions in designing an SBIR plan.

- What is the exact message that will be presented through screening and intervention?
- Should it be tailored to different age groups?
- Who should screen and who should perform the intervention?
- Will resources for follow-up care will be needed?
- Is potential benefit great enough to outweigh costs and barriers?

Thoroughly addressing questions like these while formulating a plan for screening and intervention will aid in maximizing efficiency and benefits received.

Sources: D’Onofrio and Degutis, Degutis, Schiller et al

5. Feasibility

Given the ED’s primary mission and its complex operational reality, ED staff question the feasibility of performing SBIR. Staff are conditioned to focus on treating patients’ presenting condition rather than providing preventive clinical services for underlying risk factors that lead to emergency room visits. Because incorporating SBIR into routine practice might seem incompatible with the staff’s current treatment approach, they might balk at programs that would require increased resources and a change in practice patterns.
However, SBIR research shows that emergency room staff have been encouraged by the short amounts of time required for the process and found the protocol acceptable as part of their treatment procedure. Nonetheless, these issues must be addressed more fully in order to win ED staff and physician support for incorporating SBI as a routine element of emergency care.

Furthermore, patients too could be opposed to screening and intervention that would require intrusive questions about drinking behavior. Although a mandatory testing policy would overcome the need for informed consent, it might cause some patients to avoid or delay seeking care in the emergency room. However, even studies involving college students and minors have been marked by high rates of informed consent and acceptance of counseling. Research has also shown that although interventions performed out by physicians did increase the length of the physician-patient interaction, they did not increase the length of the patient’s stay in the emergency room. Thus, it appears that screening protocols are acceptable to patients, and patients are comfortable describing their alcohol-related behavior. The modest times required for the process and the acceptability to patients and emergency room staff suggest that screening and brief interventions are quite feasible in EDs.

Sources: Hungerford et al (in Am J Emer Med), D’Onofrio and Degutis, Degutis, Schiller et al

6. Discuss other barriers here
   • Lack of Knowledge
   • Treatment Effectiveness
   • Lack of Collaboration with Trauma Surgeons
   • Role Responsibility
   • Trauma Center Verification Criteria
   • Cost Factors
   • Lack of Reimbursement
   • Insurance Laws and Regulations (UPPL)
   • Patient Privacy and Confidentiality
   • Research Priorities and Funding
   • Lack of Collaboration with Partners

Sources: NIAAA guide, McDonald, UPPL, Rivara, WSJ article (2/26/03), Gentilello “Confronting the Obstacles” article

7. How to Champion—What You Can Do to Support Changes in Routine Practice

Screening and brief interventions for alcohol and drug problems will require further support in order to gain a more prominent role as part of emergency room treatment. Physicians and lawyers can do much to help advance the cause.
First, emergency room staff, as well as medical and legal professionals across the nation, must be educated about the goals, process, and benefits of screening and brief intervention. This technology comprises a skill set that could be included in resident orientation and taught at meetings and conferences—locally, regionally, and nationally. Role models can set the standards for residents and colleagues. In order for these approaches to be successful, an education curriculum must be developed and implemented.

Second, attitudes and beliefs must change. As noted earlier, it is important that we complete the shift to the alcohol problems paradigm by understanding the full spectrum of alcohol-related risk. We must address the problem of alcohol-related injuries by developing methods that are operationally feasible in EDs and trauma centers. Furthermore, we must initiate discussions about the ways in which attitudes about alcohol affect emergency care and how to delegate roles and responsibilities for SBIR in acute care clinical settings.

Third, we must continue to refine our approaches to screening in order to minimize costs and maximize benefits. There are currently several screening tests in use, and different EDs use different approaches. Increased discussion regionally and nationally would assist in helping new partners implement screening and intervention into their practice and current users adjust their methods.

Fourth, we must identify resources and partners to aid in advancing the cause. Each ED must work with its community to identify local referral resources for extended and specialized alcohol treatment, including AA groups, the faith community, and other departments within the hospital. Regional and national partners can help promote screening and intervention on a broader scale. We must lobby managed care organizations and federal and state agencies for support.

Finally, we must advocate for changes in UPPL laws, which would remove a major obstacle to more widespread implementation of screening and brief intervention in acute care clinical settings. These laws prevent us from being able to fully address the problem at hand and introduce helpful preventive strategies.

Sources: D’Onofrio (in Acad Emer Med), WHO Brief Intervention Manual

8. How to Implement—Actions and Tools that You Can Add to Your Practice

Currently, there are several screening questionnaires available for use, each of which has its own advantages and disadvantages. Each may be appropriate for different EDs and trauma centers, and so each must address operational factors that influence which should be used.


**DRAFT**

- **AUDIT (The Alcohol Use Disorders Identification Test)**
  - Developed by WHO
  - Ten-item questionnaire
    - Three questions on amount and frequency of drinking
    - Three questions on alcohol dependence
    - Four questions on problems caused by alcohol
  - Requires two minutes to administer, one minute to score

- **CAGE**
  - Developed by John Ewing (JAMA 252 p. 1905-7)
  - Four yes/no questions
  - Requires less than a minute to complete
  - Well suited to busy primary and acute care settings
  - May fail to detect low but risky levels of drinking
  - Performs less well among women and minority populations

- **SMAST (Short Michigan Alcoholism Screening Test)**
  - 26 questions
  - Requires five minutes to administer, five minutes to interpret
  - No training required for administration

Furthermore, there are different types of intervention that could be used, each varying in time and depth used in the ED versus in other locations.

Above all, it is critical to have a well thought-out strategy in place prior to initiating screening and brief intervention. EDs and trauma centers should address questions such as who will be participate in the process, which questions will be asked in screening, what types of intervention will be offered, and how will (or can) patients be followed after their acute care visit or admission. Resources are available to help at every step in the process.

*For more, see:*
- WHO Brief Intervention Manual
- WHO AUDIT Manual
- NIAAA—Helping Patients with Alcohol Problems: A Health Practitioner’s Guide
- Jointogether.org