Environmental Strategies: Selection Guide, Reference List, and Examples of Implementation Guidelines

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SELECTING THE APPROPRIATE ENVIRONMENTAL STRATEGY

BEFORE USING THIS BINDER…
We encourage you to review the information below which summarizes the connection between problem identification, identification of risk/protective/causal factors and the strategies that can be used to bring about change in outcomes. As you know, the choice of strategies is tied to the identified problem and the related risk/protective/causal factors that the strategy addresses.

We strongly encourage you to consult the guidance from the PIRE epi TA group's logic modeling workshop and your CSAP project officer before using the binder to help you identify potential strategies.

OUTCOME-BASED PREVENTION & LOGIC MODEL THINKING

Before determining what strategies to implement, outcome-based prevention indicates the need for understanding two things: 1) the outcomes – substance use and related consequences – to be addressed, and 2) the factors that have been identified as being strongly related to and influence the occurrence and magnitude of substance use and its consequences. Analysis of epidemiological and other data can help us understand and define priority outcomes; and, fortunately, the research literature can provide valuable guidance about contributing factors and their link to substance use and related consequences.

Identifying priority outcomes and the factors contributing to them is critical for next steps – designing and implementing a set of effective strategies that are relevant to the problem. Only after defining priorities and understanding factors contributing to them is it appropriate to review research and experiential evidence to clarify what strategies are effective and relevant for addressing them.
So, ultimately, an outcome based logic model for substance abuse prevention maps a strategic approach for addressing priorities in terms of three components:

1. A clear definition of problem(s) to be addressed (consequences and behaviors)
2. Risk and protective factors/causal factors which have scientific evidence of contributing to the problem, and
3. Prevention strategies (programs, policies, practices) with evidence of effectiveness to impact one or more risk and protective factors/causal factors and/or the targeted problems.

To bring about reductions in community problems, a comprehensive prevention approach must identify and target factors most strongly related to identified-problems. Alternatively, prevention strategies that focus on only one feature of the problem or that address factors only weakly associated with substance use and its consequences offer little promise of eliminating or reducing population-level problems.
WHY IMPLEMENT ENVIRONMENTAL PREVENTION STRATEGIES?
OVERVIEW ARTICLES

The articles listed below provide a brief overview of why environmental prevention strategies might work to help prevent or minimize substance abuse in your community.


INTRODUCTION, OVERVIEW AND METHODS

Prepared as part of the Strategic Prevention Framework-State Incentive Grant, funded by the Center for Substance Abuse Prevention (CSAP), Substance Abuse and Mental Health Services Administration (SAMHSA)

Introduction

It is well documented that environmental strategies are an effective way to prevent and reduce substance abuse. Unlike traditional substance abuse interventions, however, there is not a quick, easy curriculum that you can pull off of a shelf and implement. In addition, relatively few environmental strategies are included on lists of evidence-based interventions such as the National Registry of Effective Programs and Practices (NREPP), maintained by SAMHSA.

To assist SPF-SIG state and community grantees in selecting and implementing environmental strategies to prevent and reduce substance abuse, we have created a list of strategies that the grantees may choose, although they are not limited to using the environmental prevention strategies in this list. These strategies utilize diverse approaches in achieving a desired effect including policy change, media campaigns, enforcement/compliance regulations and so forth, and allow the grantee to select a strategy that is most appropriate for their particular goals. This list was created based on a review of the literature as well as input from state SPF-SIG grantees, members of the SPF-SIG Expert Technical Assistance Group and the cross-site evaluators.

Methods

We began with a literature search using PubMed, EBSCO and Google. The search terms used for conducting this literature review were chosen from a matrix of approximately 50 environmental strategies that was created by Jessica Nargiso, a graduate student working with Paul Florin at the University of Rhode Island. In addition, we reviewed the list of resources identified in Literature and Resources on Environmental Strategies to Prevent Substance Use and Abuse and included any articles from this list that seemed to fit the data we were seeking. We used the environmental strategy names, or a shortened form if necessary, as our search terms and limited our search to those articles in published journals and to documents provided on organizational Web sites such as the National Highway Traffic and Safety Administration and the Marin Institute. We were specifically looking for articles that 1) described the strategy, 2) provided guidelines for implementation, 3) identified output measures to evaluate the strategy, and 4) evaluated the effectiveness of the strategy at reducing substance abuse.
Through this process we identified 275 potential articles and documents. We reviewed the abstracts and identified 152 articles that fit our search criteria. Teams of two researchers reviewed each of the 152 articles. We followed a systematic review protocol to document whether each article:

1) Provided a general description, implementation guidelines, output measures or assessed effectiveness;
2) Should be considered evidence-based because it was published in a peer-reviewed journal, listed in NREPP, provided by Centers for the Application of Prevention Technologies (CAPT) or for some other reason;
3) Was implemented in the substance abuse prevention field; and
4) Described any adaptations that could be made to address setting, target population or specific substance.

The codes were compared and where the coding did not match, the researchers came to a consensus by reviewing the article again and discussing the issues. All article reviews were recorded using an abstract review template to standardize the review process.

**Environmental Strategies Selection Guide and Reference List**

The Selection Guide is intended to help state and community grantees select an environmental strategy to meet their needs. The chart identifies those strategies for which we found a general description, implementation guidelines and output measures. The chart also indicates if any information was provided to assess the effectiveness of the strategy at preventing or reducing substance abuse. Finally, we provide an indication of what substances are targeted (alcohol, tobacco, other drugs) and whether or not the strategy could be adapted for other substances. We also indicate the target populations (by age) that would be appropriate for these strategies. In addition to providing a Selection Guide in a chart format, we also provide a list of the references we identified. The Reference List was organized by importing all of the reference information to RefMan, a software tool for managing bibliographical data. This reference list includes a key to indicate what type of information we found in the article (i.e., a general description, implementation guidelines, output measures, and/or effectiveness). For those articles that are available electronically, we have also included a URL address to facilitate obtaining these documents. The Reference List is organized in the same order as the list of environmental strategies in the Selection Guide. You will notice that in cases where one reference was used to provide information for multiple strategies, we have included the reference information under all relevant strategies. Those articles that seemed useful, but did not fit our search criteria are documented in a category at the end of the Reference List called Broad Overview. An Effectiveness Analysis also is provided that describes the findings of effectiveness in detail.
Limitations of the Selection Guide

The Selection Guide does not provide an exhaustive list of environmental strategies that can be used to prevent and reduce substance use. We tried to identify as many strategies as possible, and ended up only including those for which we could find appropriate documentation. The Selection Guide only includes environmental strategies that were implemented in the substance abuse prevention field. Our original plan was to expand our literature review to areas outside substance abuse, such as physical activity promotion; however, we felt that we identified enough strategies within the substance abuse prevention field to provide a solid base of environmental strategies from which to choose.

Finally, the Selection Guide tends to focus on environmental strategies that relate to alcohol and tobacco use. Many of these strategies could be adapted for implementation in another setting, for another target population or to address a different substance, but we were unable to find data to document these adaptations.

Examples of Implementation Guidelines

Also included in the binder are Examples of Implementation Guidelines, if such guidelines were identified during our literature review. The examples of implementation guidelines include specific instructions on how to implement a strategy. Some of these guidelines also include examples of how to publicize and evaluate the strategy. In an effort to reduce the length of this document, we only included links for those documents available electronically, with the expectation that the state and community grantees could print out the documents that they need.

Other Useful Publications

In some cases, a publication did not provide information that was specific enough to be considered an example of an implementation guideline, but it did provide a comprehensive overview of a strategy or set of strategies. These resources are listed at the end of the Examples of Implementation Guidelines. Included with these resources is a from The Marin Institute that can be ordered for free entitled, “The Roadmap for Environmental Prevention.” This resource is designed to “help you understand environmental prevention and how it can create policies, settings and community conditions that support positive choices about alcohol. Using real world success stories and engaging illustrations to bring the concepts to life, this publication is designed to help elected officials, foundation leaders, public health practitioners, and local advocates support communities in putting environmental prevention strategies into action.”
The following individuals contributed greatly to this effort:
Jessica Nargiso, MA, Community Research and Services Team, University of Rhode Island
Shelly Kowalczyk, MSPH, The MayaTech Corporation
Linnea Laestadius, The MayaTech Corporation
Kristianna Pettibone, PhD, The MayaTech Corporation
Rebecca Buchanan, PhD, Westat
Robert Orwin, PhD, Westat
Molly Smith, Westat

In addition, researchers from the Tennessee SPF-SIG and the Pacific Institute of Research and Evaluation (Knowlton Johnson, Bridgett Augustino-Wilke, and Andrew Treno) provided a valuable resource: Literature and Resources on Environmental Strategies to Prevention Substance Use and Abuse, which is included towards the end of this document.

Updates Still to Come
This binder is a work in progress. Some of the updates that will occur include:

- Adding a column to the Selection Guide to reflect CSAP’s categories of environmental strategies (policy, enforcement, education, communication, collaboration).
- Adding environmental strategies related to illicit drugs and prescription drugs.
- Reviewing the Centers for Disease Control and Prevention Community Guide to identify other appropriate strategies.
- Including measures of implementation fidelity.
## ENVIRONMENTAL STRATEGIES SELECTION GUIDE

<table>
<thead>
<tr>
<th>Environmental Strategy</th>
<th>General Description Provided</th>
<th>Implementation Guidelines Available</th>
<th>Output Measures Defined</th>
<th>Effectiveness Assessed</th>
<th>Evidence-Based (Journal article, NREPP or other list, CAPT, Other)</th>
<th>Substance (Targeted, Other Substances Could be Applied to)</th>
<th>Appropriate Populations</th>
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</thead>
<tbody>
<tr>
<td><strong>RETAIL ACCESS</strong></td>
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<td>Minimum age of purchase for alcohol and tobacco</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>√, A, T</td>
<td>&lt;21</td>
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<td>Limit and restrict the location and density of retail alcohol outlets</td>
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<td>All</td>
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<tr>
<td>Conditional use permits/land use ordinances for alcohol outlets</td>
<td>✓</td>
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<td>√, A</td>
<td>All</td>
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<tr>
<td>Regulations or bans on home delivery of alcohol</td>
<td>✓</td>
<td>✓</td>
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<td>Increase beverage servers’ legal liability</td>
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<td>√, √</td>
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<td>Minimum age of seller requirements</td>
<td>✓</td>
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<td>Instituting policies concerning cigarette vending machines</td>
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<td>Laws against adult provision of alcohol and tobacco</td>
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<td>Controls on alcohol service at private parties</td>
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<td>Alcohol restrictions at community events</td>
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<td>Beer keg registration</td>
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<td>SOCIAL NORMS</td>
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<td>Social norms campaigns/Social marketing</td>
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<td>A,T, OD</td>
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<td>PROMOTION</td>
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<tr>
<td>Alcohol and tobacco advertising restrictions in public places</td>
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<td>Prohibition of alcohol or tobacco sponsorship of events and other promotions</td>
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<td>Countermarketing/counteradvertising campaigns</td>
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<td>Media advocacy</td>
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<td>Media literacy</td>
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<th>Substance</th>
<th>Targeted</th>
<th>Other Substances Could be Applied to</th>
<th>Appropriate Populations</th>
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<td>PERCEIVED RISK</td>
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<td>blood alcohol content limits</td>
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<td>Graduated licensing policies</td>
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<td>Revoke license for impaired drivers</td>
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<td>Use of mass media campaigns appropriately</td>
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<td>ATOD warning posters</td>
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<td>A,T, OD</td>
<td>All</td>
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<tr>
<td>Media (e.g., billboards, PSAs) that describe penalties for certain offenses</td>
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<td>A,T</td>
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<td>PRICING</td>
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<tr>
<td>Increase price or taxes on alcohol or tobacco</td>
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<td>A,T</td>
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</tbody>
</table>
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<th>Evidence-Based</th>
<th>Substance</th>
<th>Appropriate Populations</th>
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<tbody>
<tr>
<td><strong>Business/Merchant</strong></td>
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<td>Compliance checks of alcohol or tobacco retailers</td>
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<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>A,T</td>
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<td>Administrative penalties</td>
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<td>A,T</td>
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<td><strong>Suppliers of Alcohol to Underage Youth</strong></td>
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<tr>
<td>&quot;Party patrols&quot;</td>
<td>✓</td>
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<td></td>
<td>✓</td>
<td>A</td>
<td></td>
<td>&lt;21</td>
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<tr>
<td>&quot;Shoulder-tap&quot; enforcement programs</td>
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<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>A</td>
<td></td>
<td>&lt;21</td>
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<td><strong>Drivers</strong></td>
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<tr>
<td>Enforce impaired-driving laws</td>
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<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
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<td>Sanctions and monitoring for convicted drunk drivers</td>
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<td>✓</td>
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<td>Immobilize or impound the vehicles of those convicted of impaired driving</td>
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<td>Output Measures Defined</td>
<td>Effectiveness Assessed</td>
<td>Journal article</td>
<td>NREPP or other list</td>
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EFFECTIVENESS ANALYSIS

The following summaries represent our attempt to briefly summarize the findings reported in the research with regard to the effectiveness of each of these strategies. Each summary begins with a list of the articles which provided some discussion of effectiveness.

**Responsible Beverage Service Training (voluntary or mandatory)**


The four articles above discuss the effectiveness of responsible beverage service training at reducing the number of patrons who become intoxicated, and who eventually drive while intoxicated. The general opinion of the articles is that the training is effective; however, the effectiveness varies greatly by the type of training. Training that is focused on specific behaviors, repeated at intervals, and paired with an increase in enforcement of related alcohol laws appears to be more effective.

Buka and Birdthistle (1999) review the results of the Rhode Island Community Alcohol Abuse and Injury Prevention Project, which utilized responsible beverage service training to reduce alcohol related injury and death. The study measured the self-reported behaviors of servers before and after training, and examined the “optimal amount of server training necessary to produce positive, long-lasting effects” (Project Objective, para. 2). They found that those servers participating in the project showed all of the desired behaviors more frequently than before training. While the effects diminished somewhat over time, they did remain significantly higher than the pre-training levels. They note that not all forms of server training are equally effective and suggest that “programs that target specific serving skills in repeat sessions may be most promising for improving server behavior” (Discussion, para. 5). Buka and Birdthistle find the results to be positive with regards to modifying server behavior, and suggest that it would be an effective strategy paired with “public education and programs targeted specifically to problem drinkers.”

Saltz and Stanghetta (1997) discuss the effectiveness of a community-wide responsible beverage service training program at reducing the likelihood of customer intoxication at licensed, on-premise establishments. Responsible beverage service programs were encouraged through a combination of incentives and disincentives, and close collaboration with hospitality industry representatives. An initial analysis of the program showed no significant changes in server
practices. However, the study did see “modest success as measured by the number of targeted businesses that came to training,” and having created a dialogue on responsible beverage service training at the community level (S247). Saltz and Stanghetta recommend increasing enforcement as a means of improving efficacy as the “enforcement of alcohol laws and the public perception of that enforcement is directly tied with the likelihood that skills learned in training will applied on the job” (S248).

The University of Minnesota’s Alcohol Epidemiology Program (2006) presents responsible beverage service training as an effective means of decreasing the likelihood that patrons will be intoxicated, and in turn, decreasing the likelihood that they will drive while intoxicated. They do note that the effectiveness of server training legislation varies greatly and that all laws showed room for improvement. They cite a study by Toomey et al. (2001) that indicated that sales to pseudo-intoxicated patrons at five bars participating in a pilot study decreased by 46% following training. An additional study by Saltz (1987) of server training at a United States Navy base indicated that where training was implemented “customer intoxication at the base was cut in half” (What research studies have shown, para. 2).

Wagenaar, Toomey, and Erickson (2005) assess the impact of training for management of retail alcohol establishments in the Complying with the Minimum Age project community trial. Establishments were offered a free, one-on-one 20-hour training program called the Alcohol Management Express to encourage the implementation of model alcohol policies and practices. Results indicated that the off-premise establishment training “had no effects on the likelihood of illegal sales to youth” (pg. 340). However, on-premise establishment training had an initial, non-significant reduction in sales, and an unexpected, “significant long-term increase in sales of approximately 7%” (pg. 341). They do note that it is possible that the effects of the training were delayed, and that they did observe a decrease in likelihood of sales to youth six weeks after training. Wagenaar, Toomey, and Erickson add that even if more effective training programs can be developed, “the overall effects of voluntary training will be limited by low participation rates”(pg. 343).
Checking Age Identification


Requirements to check age identification (ID) appear to be somewhat ineffective. The ID effect identified in the article above illustrates how showing a valid, underage ID can actually increase illegal sales of cigarettes. However, it is not implied that the strategy itself is ineffective on the whole, as the cause of the increase in illegal sales may be due a deficiency in the training of retail cigarette clerks on ID checking procedures.

Levinson, Hendershott, and Byers (2002) evaluated the results of a compliance check of age identification checks by retail cigarette clerks. The results indicated that most clerks do ask for ID, but also indicated that ID check requirements, as they currently stand, are not an effective environmental prevention strategy. The experiment found that the presentation of a valid, underage ID increased illegal sales to minors more than six fold compared to those who did not show ID at all. They suggest that additional training for retail clerks may help counter this ID effect.
Alcohol Restrictions at Community Events


The above article describes the effectiveness of alcohol restrictions at community festivals. While certain studies find that specific measures (such as compliance checks and server training) can help reduce illegal sales of alcohol to minors and intoxicated persons, the results of this study indicate that the number of policies rather than the specifics of the policies are effective at reducing sales to minors.

Toomey, Erickson, Patrek, Fletcher, and Wagenaar (2005) evaluated the “propensity for alcohol sales to underage customers and obviously intoxicated customers at community festivals” (p. 165). Previous studies have shown that community interventions, such as server training and compliance checks, have been useful at preventing illegal sales to those under 21 years of age. Toomey et al. (2005) utilized telephone interviews of community festival planners to assess implemented alcohol control policies, and utilized pseudo-intoxicated and pseudo-underage individuals to attempt to purchase alcohol. Of the 10 alcohol control policies specified, only restricting the number of servings per customer per sale was significantly related to predicting underage sales. However, there was a significant relationship between the policy index and the underage sales rate; thus suggesting that “festivals with more alcohol control policies in place—representing a more restrictive environment—were less likely to illegally sell alcohol to underage people” (p. 169).
Media Advocacy


The two articles above discuss the effectiveness of using media advocacy to influence the news media in a manner that will encourage both individuals and policy makers to take actions to reduce substance use and abuse behavior. Media advocacy training of community members appears to be an effective means of increasing the visibility of the target message. The effectiveness of the news coverage ultimately depends on the type of coverage, and if the message is linked to a local environmental prevention strategy.

Holder and Treno (1997) address the results of media advocacy in the Community Trials Project. By engaging in skills development training and technical assistance, such as collecting and organizing local data about alcohol-involved problems, learning approaches for interacting with news media, and organizing media events, a “noticeable increase in local news coverage of alcohol issues in the experimental communities” was found (S192). Holder and Treno also cite a study by Voas (1997) that indicates that an increase in local news coverage of DUI enforcement both increased the perceived risk of drunk driving by the public and provided support for increased police enforcement.

Holder and Treno find that the research indicates that training community members in media advocacy techniques will yield an increase in news events, which will in turn create an increase in both print and electronic news coverage of “local alcohol topics necessary to the community prevention effort” (p. S198). They also note that mass communication is best used as a reinforcer of specific environmental efforts and to create support for local prevention strategies (such as the DUI program). They cite an earlier study by Holder (1994) indicating that mass communication alone is not enough to “produce a reduction in alcohol-related trauma” (p. S191).

Wakefield, Flay, Nichter, and Giovino (2003) discuss the importance of media messages and their impact on youth smoking. They cite a study by Laugesen and Meads (1991) that showed that the number of tobacco purchases was significantly related to the number of weekly news stories about tobacco. While the effect was short-lived, it was “estimated that a doubling of news coverage had the same impact as a 10% increase in price” (91). Wakefield et. al (2003) also address the importance of the manner in which the media frames the issue, certain types of framing being more effective than others. They cite a time-series analysis by Fan (1996) indicating that the change in the public perception of drugs as the most important problem facing the United States, from 5% in 1985 to 60% in 1994, was explained “by increases in the news media describing drugs as ‘a crisis’, whereas other types of discussion about drugs contributed negligibly” (p. 91).
Media Literacy


The two articles on the topic of media literacy both find that media literacy training significantly improves the ability of adolescents to identify and resist tobacco advertising. While these two studies relate specifically to tobacco, there is also a suggestion that media literacy can be effectively used for other topics in health promotion and that it should be used more widely.

Austin, Pinkleton, Hust, and Cohen (2005) evaluated the effectiveness of a pilot program that employed media literacy training of adolescents as a tobacco use prevention strategy. The test group received lessons designed to “educate students about the tobacco industry’s efforts to target young people, help them create counter advertising, and encourage their own participation in tobacco use prevention activities” (80). The study found that the test group displayed a significant increase in understanding of advertising techniques, an increased level of “efficacy regarding the extent to which they would participate in advocacy and prevention activities,” and a reduced belief that most of their peers use tobacco (p. 75). The researchers also suggest that media advocacy may be effective in other decision making situations.

Gonzales, Glik, Davoudi, and Ang (2004) assessed the effectiveness of a media literacy curriculum designed to “raise students’ awareness and critical consciousness about the contemporary marketing strategies of tobacco companies via the media, in addition to advocacy and peer resistance training sessions” (p. 192). Post intervention the intervention group showed a significant increase in knowledge compared to the control group. A “slowing in the growth rate of existing positive attitudes toward tobacco” and a decrease in tobacco use were also found among the intervention group (p. 197). The researchers concluded that the study lends support to the growing body of research indicating that “media literacy is an effective approach to behavior change among adolescents” (p. 197).
Social Norms Campaigns/Social Marketing


The articles above all view social norms campaigns as effective means of influencing norms regarding tobacco and alcohol use, however, two of the articles illustrate the factors that can cause social norms campaigns to fail. In general, it is important to ensure that the campaign is easy to understand and presents information in a credible manner. One suggested solution is to involve the target audience in the production of the social norms campaign materials.

Glider, Midyett, Mills-Novoa, Johannessen, and Collins (2001) review the effects of a social marketing campaign on alcohol consumption at the University of Arizona. The campaign was developed to advertise majority norms around alcohol use on campus, to provide “a supporting educational component on lesser known or understood facts about alcohol,” and to offer an opportunity to redefine the “public conversation” around alcohol use (p. 210). The major outlet for the advertising effort was the school newspaper. Notably, the campaign avoided negative tactics, instead focusing on messages that were positive, inclusive, and empowering. After the first three years of implementation, the program indicated a 29.2% decrease in the student binge drinking rate and a 38% drop in the number of students who reported using alcohol in the past year. The study also indicated a change in student attitudes towards alcohol consumption, with the number of students believing that college students have 5 or more drinks when they party decreasing by 33.3%. The researchers conclude that social marketing offers a great deal of promise as it is both “cost-effective and community-empowering” (p. 219).
Gomberg, Schneider, and DeJong (2001) review the effects of a peer drinking social norms campaign conducted at the University of Mississippi. Freshmen, the intended primary target of the campaign, were surveyed on their alcohol use, attitudes towards alcohol, and exposure to the campaign. After the campaign the number of students accurately reporting that high risk drinking is not the norm increased from 23% of students to 31.6% of students. There was also a “decrease in freshmen’s self-reported alcohol consumption, although this effect could not be attributed singly to the campaign” (pg. 388). Overall the impact of the campaign was seen as “promising, but inconclusive” as the results could conclusively be attributed to the campaign, and may have simply been reflecting general trends among freshmen during that school year (pg. 386).

Haines et al. (2005) view social norms campaigns as “an evidence-based, data-driven process, and a very cost effective method of achieving large-scale, positive results” (pg. 20). They cite several studies conducted at the high school level as evidence of the effectiveness of social norms campaigns. The DeKalb County Partnership surveyed high school students to obtain an accurate reflection of their norms regarding alcohol and tobacco use and then developed and market tested social norms campaign messages for each school in the project. Two years after implementation parents, teachers, and students “more accurately perceived the student norms of nonuse,” alcohol use among students decreased by 30.4%, and tobacco use among students decreased by 34.4 (pg. 14). Haines et al. cite two additional high school studies where strong positive trends were seen after the implementation of social norms campaigns. They conclude that social norms campaigns are a highly effective means of promoting healthy behaviors.

Martino-McAllister and Wessel (2005) discuss the impact of the Harrisonburg/Rockingharn Tobacco Use Prevention Project and the Anti-Tobacco Media Blitz social norms marketing campaign. The campaign targeted students age 12-18 and “relied heavily on peer participation in creating, explaining, and disseminating the messages” (pg. 188). The campaign was effective both in that the majority of students surveyed recognized the messages in the ads and posters, and that both middle and high school students “showed a change in the desired direction regarding their perception of the number of their peers who think tobacco use in harmful to health” (pg. 195). However, the students still overestimated negative behaviors and underestimated positive attitudes. Martino-McAllister and Wessel stress that it is key to involve the target audience developing plans for goals for social norms campaigns.

Russell, Clapp, and DeJong (2005) examine the “Done 4” social norms campaign which was shown to be ineffective at changing student norms regarding alcohol consumption. The campaign materials were designed by a professional advertising agency and tested in student focus groups. At the end of the campaign only 9.5% percent of students recognized the campaign slogan, and students continued to overestimate the number of drinks consumed by students when partying. Russell, Clapp, and DeJong surveyed undergraduate marketing students as to the cause of campaign’s failure. They conclude that the campaign was ineffective because the social norms marketing materials were confusing and that students did not believe the statements made regarding norms. They stress that a campaign’s success depends on the “information being salient, understood, and memorable” and that post hoc advertising testing would be superior to focus groups in the design of social norms marketing campaigns (pg. 63).
Thombs et al. (2004) analyze the factors that caused a social norms marketing campaign at Kent State University to be ineffective. The majority of students were either “uncertain” about the validity of the statistics used in the campaign, or they found them to be “unbelievable” or “very unbelievable.” Thombs et al. find that students are reluctant to believe self-reported survey data on student drinking behavior. Students also had trouble understanding the campaign’s purpose. Only 38.5% of students correctly understood the reason of the campaign. Despite these findings Thombs et al. do not find the “conceptual underpinnings of the social norms model” and necessarily challenged (pg. 66). However, they do suggest that they do point to “need to develop more effective applications of the model” (pg. 66).
Graduated Licensing Policies


The four articles above address graduated licensing policies as a means of reducing the number of teenage motor vehicle crashes and related fatalities. While limits on blood alcohol levels are a common part of graduated licensing programs, none of the studies address their efficacy specifically. However, graduated licensing policies on the whole do appear to be an effective means of reducing the crash rate among teenagers. The length of the time the driver holds a permit before obtaining a license appears to be one of the more significant elements of the programs.

McIntosh and Katcher (2000) discuss the details of a new graduated licensing program being implemented in Wisconsin. However, the program is too new to have yielded any measurable results. McIntosh and Katcher do find graduated licensing to be an effective policy to “reduce the number of teenage motor vehicle crashes and fatalities” (p. 33). Data cited from a National Highway Traffic Safety Administration report (2000) indicate that a graduated licensing program in Ontario yielded a 73% reduction in the fatal crash rate among 16-year-old drivers. Upon the introduction of similar programs in Maryland and California the teen crash rate decreased by more than 5%.

McKnight, Peck, and Foss (2002) assess the effectiveness of several graduated licensing program elements. On the whole they find graduated licensing an effective means of reducing the per capita crash rate among teens. Specifically, they find that “a major portion of the decline in crashes can be attributed to the greater proportion of time spent driving on a permit” (p. ii34). Additionally, the initial implementation of these programs was found to yield a decrease in the number of young drivers who are licensed, due to the increased time required at the learner’s permit level. The researchers found that the drop in the number of licensed drivers also contributed a great deal to the decrease in crashes. Among the elements assessed, they found “extended learning, accelerated driver improvement interventions, night driving restrictions, and passenger restrictions” to all be effective to varying degrees (p. ii35).
Presseur and Stewart (1998) review graduated licensing as a means of reducing crashes among teenage drivers. They note that restrictions on alcohol levels, paired with restricted unsupervised night driving “should limit the extent to which alcohol and other drugs contribute to crash injury and fatality of young drivers” (p. 16). The researchers find that reductions in fatal crashes among teens have been demonstrated nationally by comparing those states with and without graduated licensing programs. A study by Ferguson, Leaf, Williams, and Presseur (1996) found that states that implemented licensing at an earlier age, but with several key components of graduated licensing, had higher crash rates among 16 year olds than those states which did not begin licensing until age 17. However, the states with graduated licensing began to see lower crash rates as the drivers increased in age, suggesting that those states “were better able to ‘ease’ young drivers into the traffic stream by allowing them to accumulate driving experience during the less hazardous daylight driving situations” (p. 13).

The National Highway Traffic Safety Administration (2004) finds that the effectiveness of adopting graduated licensing laws has been clearly demonstrated. They cite a Florida study (NHTSA, 2002) which found that a graduated licensing law “resulted in a 9 percent reduction in crashes for drivers who were between 16 and 17 years old.” Similar ongoing research in Michigan and North Carolina indicated “a 26 percent and 25 percent reduction respectively in crashes involving 16-year-old drivers.”
Revoke License for Impaired Drivers


The study above indicates that revoking licenses for impaired drivers is among the most effective strategies available for deterring driving while intoxicated. In particular, the long-term withdrawal of licenses appears to be more effective than staying or suspending licenses.

Nichols and Ross (1989) review a number of studies on the effects of different types of sanctions as “deterrence-based policies for reducing alcohol-impaired driving” (p. 93). They find the three possible sanctions to be confinement in jails or other facilities, license revocation or suspension, and fines. Of the three, license revocation is both the most cost effective and the most effective at reducing recidivism. They cite a study by Ross (1987) which indicated that after the implementation of a new administrative licensing law a 15% reduction in the proportion of alcohol related fatalities was seen. A study by Sadler and Perrine (1985) found that longer license withdrawal periods yielded fewer subsequent crashes and convictions. Nichols and Ross conclude that the most effective strategies include withdrawing licenses rather than merely staying or suspending them, applying longer sanctions, and “not offering remedial programs in lieu of license actions” (p. 105).
Use of Mass Media Campaigns Appropriately


The four articles above discuss the effectiveness of using mass media campaigns to change substance use and abuse behaviors, attitudes, and norms. In general, mass media campaigns have been shown to be most effective when used in conjunction with other environmental or participant-based strategies. Mass media campaigns used as a sole strategy tend to show little if any effect at reducing alcohol, tobacco, or other drug use.

Specifically, Eischen et al. (1994) discuss the results of a coalition-based effort to promote school tobacco policies. One component of the effort was a television campaign that consisted of paid and donated advertising. The messages were designed to address the impact of seeing adults smoking on school campuses and the dangers of second-hand smoke. The researchers conducted a follow-up survey with school districts, 75% of whom responded. They found that 6% (3 schools) had implemented tobacco policies because of the television campaign.

Jason, Pokorny, Kohner, and Bennetto (1994) evaluated a media-based substance abuse prevention campaign designed to “increase knowledge and awareness and to promote and direct audience participation in parent training workshops” (p. 63). The media campaign included newspaper and television advertising and was combined with parent training. The test group of parents received both advertising and parent training. A control group of parents did not receive the parent training. The study found that exposure to the advertising was not significantly different for the two groups. The researchers report that one of the major findings was a significant increase in substance abuse prevention knowledge among the test parents. The information presented in the training was taken directly from information included in the newspaper advertisement. The researchers suggest that this finding indicates that the media campaign alone was not effective at increasing alcohol and other drug knowledge.

Wallack (1981) reviews “the history, commonalities, assumptions and effects of planned, large-scale campaigns to communicate information to the general population to encourage moderation or abstinence in the use of alcohol, drugs, or tobacco” (p. 209). He reports that the impact of mass media campaigns on substance use behaviors is limited. After reviewing many studies on the effectiveness of mass media campaigns, Wallack concludes that while the direct effects of mass media on behavior are limited, “those who considered the use of mass media as
only a part of a comprehensive program to be examined found some interesting and positive results” (p. 230).

Finally, Worden’s (1999) article presents a set of challenges associated with mass media campaigns and a set of recommendations on how to use campaigns effectively. He also discusses a group of tobacco-use prevention studies that were implemented in the mid-1980s to assess the effects of broadcast interventions on youth. The study measured a group of youths who participated in a school-based prevention program. In addition, one group of students received the media campaign. The research found that the group that received both the school-based program and the media campaign reported lower rates of smoking than the group that only received the school-based intervention. In addition, the effects persisted 2 years after the media campaign ended. The study also found that the media campaign was most effective with those students at increased risk of becoming potential smokers.
Compliance Checks


The three articles above discuss the effectiveness of compliance checks at reducing sales of alcohol to minors. In general, compliance checks appear to be an effective means of achieving this, especially when paired with increased media coverage and increased penalties for non-compliance.

The Morbidity and Mortality Weekly Report (2004) cites a study of compliance checks conducted by the Concord, New Hampshire Police Department (CPD) and the New Hampshire Liquor Commission. The CPD conducted an increased enforcement campaign, which included quarterly compliance checks of all off-sale alcohol licensees, enhanced administrative penalties for noncompliance, and media coverage of the enhanced enforcement activities. The increased enforcement “resulted in a 64% reduction in retail alcohol sales to underage youths“ and at least a temporary decline in the number of students in the study who reported alcohol use and binge drinking (p. 452).

The University of Minnesota’s Alcohol Epidemiology Program (2006) views compliance checks as an effective means to reduce alcohol sales to minors. They cite a study by Waagenar, Toomey, and Erickson (2005), which found that sales to youth were “reduced immediately by 17% in alcohol establishments that experienced a check” (Why compliance checks are important for your community, para. 2). They also cite an article by Kelling (2005) indicating that after two waves of compliance checks, the compliance rate of alcohol establishments in Butte, Montana jumped from 61% after the first wave of checks to 81% after the second. They note that effectiveness may be further increased if compliance checks are “coupled with administrative penalties that allow local governments to impose sanctions on non-compliant licensees” (How compliance checks fit into a larger context, para. 1).

Wagenaar, Toomey, and Erickson (2005) assess the impact of enforcement checks of alcohol establishments in the Complying with the Minimum Age project community trial. Results indicated that there was a 17% decrease in sales of alcohol to youth at off-premise establishments immediately following a law enforcement check. The effect decayed to an 11% decrease two weeks after the check, and to a 3% decrease in the 2 months following an enforcement check. However, “enforcement effects eventually decay to zero, with no residual long-term permanent effect” (p. 340). Enforcement checks at on-premise establishments had a more lasting effect with a long-term decrease in sales of 8.2%. Wagenaar et al. conclude that
enforcement checks are an effective strategy, but that given the rapid decay of the deterrence effect the “common practice of one enforcement check per year is not sufficient” (pg. 341).
“Shoulder-Tap” Enforcement Programs


Shoulder tap enforcement programs appear to be an effective means of reducing the number of adults purchasing alcohol for minors. In the above study, the use of minors as decoys, paired with working closely with the local police department and the media, yielded a strong reduction in the number of patrons willing to purchase alcohol for minors.

The California Department of Alcoholic Beverage Control (2006) has found positive results from their shoulder tap enforcement programs. By utilizing underage decoys to solicit adults for alcohol purchases, and then drawing media attention to the resulting arrests, they effectively reduced the number of adults willing to buy alcohol for minors from one out of every three to only one out of 35 adults. They also reported that “local liquor stores became more active in calling the police or sheriff’s department to report minors loitering in front of their stores” (Case Example: Sutter County/Yuba City, para. 3).
### Enforce Impaired Driving Laws


The enforcement of impaired driving laws, paired with increased media attention to the enforcement, serves as an effective strategy for calling attention to drinking and driving problems and stopping the trend of lower numbers of arrests. The article above also notes that sustained efforts are needed for any long-term effects, as the impact of the program will diminish if discontinued.

Voas (1997) reviewed the results of the drinking and driving component of the Community Trials Project, which was designed to “reduce alcohol-involved crashes through an increase in drunk driving enforcement and public awareness of enforcement” (S201). The study combined state grants for additional officer hours for enforcement, the provision of new breathalyzer equipment, and high visibility DUI enforcement, with media advocacy and a community leader task force. Voas cites Vingilis and Salutin (1980) to state that it is the perception of risk, and not the actual detection risk, which is significant to the deterrence of drunk driving; thus the media component is key to effectiveness.

The results differed somewhat between the test sites, but overall the drinking and driving component was effective at stopping “the trend to lower numbers of arrests and attract increased public attention to the drinking driving problem” (S218). Voas finds that the most effective new element to the program was the use of media advocacy to attract coverage to the new enforcement efforts. He adds that enforcement efforts that cannot be permanently sustained are “likely to lose impact once terminated” (S202). However, a study by Voas and Hause (1987) did find that after the completion of such a program, the nighttime motor vehicle crash rate leveled off at about 10% below the pre-program period, indicating that enforcing impaired driving law programs does have some lasting effect.
Apply Appropriate Penalties to Minors


All of the above articles deal with applying appropriate penalties to minors; two deal specifically with zero tolerance policies for youth driving while under the influence, and two deal with youth tobacco possession, use, and purchase (PUP) laws. Zero tolerance laws appear to be an effective means of reducing the number of youths who drink and drive, especially when paired with a media effort to raise awareness and the impression of risk among youths. However, PUP laws come across as less effective, largely due to the fact that the laws are more difficult to enforce compared to zero tolerance laws. For both types of policies, media advocacy is key to ensure that individuals are aware of the laws and the fact that they are being enforced.

Lazovich, Ford, Forster, and Riley (2001) studied the effects of a tobacco diversion program on youth smoking habits. Youths cited for smoking received the option of choosing between a fine and attending a tobacco diversion program. The program utilized open discussions, visual aids, and participatory exercises in addition to providing resources for smoking cessation. The study found only minor differences in readiness to quit smoking after attending the program compared to the initial interview. Also, only 35% of those in the study sample chose the program over the fine. The researchers suggested that youth receptiveness to the program might be reduced if they view the program as punishment or coercive. The study also found that 23.3% of those who paid the fine reported not smoking in the past month, compared to only 5.1% of those who attended the program. The study indicates that tobacco diversion programs, as applied in the study, are not an effective means of reducing youth tobacco use.

Martin (1996) evaluated the impact of the California Zero Tolerance Law for drivers under the age of 21 on the attitudes and behaviors of youth, including driving and drinking and fatalities related to driving under the influence. In the first year of the zero tolerance law the total number of citations to underage drivers remained essentially the same, and in the first two years of the law “the perceived risk of being stopped or being tested and suspended did not change significantly” (p. 149A). However, the law did appear effective in that the “proportion of tested drivers in fatal crashes with positive BALs (Blood Alcohol Levels) and the proportion of fatal crashes that involve single vehicles at night” showed a greater post-law decline among youth under 21 years of age in California than was found in comparison states or among older
drivers in California (p. 149A). Martin suggests that the effectiveness may increase over time as attitudes change and enforcement begins to improve.

Presseur and Stewart (1998) discuss zero tolerance laws as a means of preventing drunk driving by youth. They cite a study by Hingson, Heeren, and Winter (1991) on the first four states to establish zero tolerance laws. These states saw a 34% decline in nighttime fatal crashes among the target group of adolescents, and a decline that was “one-third greater than a similar decline observed in four selected nearby comparison states” (p. 5). They add that public awareness campaigns can increase the effectiveness of zero tolerance laws even further. They cite a study by Blomberg (1993) which indicated that upon enacting their zero tolerance law, Maryland experienced an 11% statewide reduction in the number of drivers under age 21 who crashed after drinking, while those counties that implemented special public education campaigns saw alcohol related crashes reduced by as much as 50%. Presseur and Stewart conclude that the zero tolerance laws are highly effective as they have created a substantial reduction in crashes, “particularly in those places where the law has been well publicized” (p. 7).

Wakefield and Giovino (2003) address the effectiveness of PUP laws as a means of reducing youth smoking at the population level. They discuss several studies on the implementation of the laws and find it “difficult to conclude that there are strong positive effects from PUP laws” (p. i11). While certain studies do indicate slight positive effects, Wakefield and Giovino argue that on a theoretical and practical level PUP laws are ineffective because the offenders have a low likelihood of detection and an uncertain punishment, there is a large potential for active avoidance of the law, and there is a long time delay between the offense and the punishment. They note that enforcement efforts would need to be “accompanied by concerted media advocacy” to let people know the law is being enforced (p. i8). Additionally, the strategy may be more effective with “younger and more conventional youth” than with “older and more marginal youth” (p. i11). They also express concern that PUP laws may divert attention from tobacco control strategies that have been proven effective.
The article above discusses the effectiveness of Cops in Shops program at preventing youth access to alcohol. Cops in Shops programs appear to be effective at both reducing the number of adults willing to purchase alcohol for minors, and increasing the chance that minors attempting purchases will be apprehended.

The Century Council (2006) finds that Cops in Shops programs have been effective as a means to “stop underage alcohol purchases and prevent adults from purchasing for kids” (Cops in Shops, para. 1). A survey of high school and college students in communities with Cops in Shops programs found that adults were less likely to be willing to purchase alcohol for minors, and that “it was more likely someone under the age of 21 would get caught and arrested for purchasing alcohol following the launch of the program” (Program Success, para. 2). An evaluation of a number of underage drinking prevention projects, conducted by the National Highway Traffic Safety Administration, found that the Cops in Shops program was the only program to have a significant “impact on reducing underage alcohol-related crashes among youth” (Program Success, para. 1).
RETAIL ACCESS

Minimum age of purchase for alcohol and tobacco

Ahmad, S. (2005). Closing the youth access gap: the projected health benefits and cost savings of a national policy to raise the legal smoking age to 21 in the United States. *Health Policy*, 75, 74-84. GD


Limit and Restrict the Location and Density of Retail Alcohol Outlets


Conditional Use Permits/Land Use Ordinances for Alcohol Outlets


Regulations or Bans on Home Delivery of Alcohol


Responsible Beverage Service Training (voluntary or mandatory)


http://alcoholpolicy.niaaa.nih.gov/  GD


University of Nebraska-Lincoln, Office of Extended Education & Outreach Web Design Team.  (2002). Responsible Beverage Service Training.  8-1-2006.  http://eeando.unl.edu/rbst/ne/  GD, IG


Checking Age Identification for Alcohol and Tobacco


Increase Beverage Servers’ Legal Liability


Minimum Age of Seller Requirements

Instituting Policies Concerning Cigarette Vending Machines


Prohibiting Minors from Bars
No articles found.

Methamphetamine Precursor Prohibition
SOCIAL ACCESS

Curfews
No articles found.

Laws Against Adult Provision of Alcohol and Tobacco
No articles found.

Teen Party Ordinances/Party Patrols

http://www.udetc.org/documents/UnderageDrinking.pdf GD, IG


Social Host Liability
http://www.publicstrategies.org/pdfs/East_Social_HOST_5_03.pdf GD


Controls on Alcohol Service at Private Parties
No articles found.

Alcohol Restrictions at Community Events
http://www.publicstrategies.org/pdfs/ventura_special_events_updated.pdf GD, IG


**Beer Keg Registration**


**SOCIAL NORMS**

**Alcohol Use Restrictions in Public Places**


**Social Norms Campaigns/ Social Marketing**


**PROMOTION**

**Alcohol and Tobacco Advertising Restrictions in Public Places**


**Prohibition of Alcohol or Tobacco Sponsorship of Public Events**


**Countermarketing/Counteradvertising Campaigns**


**Media Advocacy**


Enforcing the Underage Drinking Laws Program.

http://prev.org/documents/mediaadvocacy.pdf GD, IG

Media Literacy


PERCEIVED RISK
Lower (Less than .08) BAC Limits


Graduated Licensing Policies


**Revoke License for Impaired Drivers**


**Use of Mass Media Campaigns Appropriately**


**ATOD Warning Posters**

**Media (e.g. billboards, PSAs) that Describes Penalties for Certain Offenses**


**PRICING**

**Increase Price or Taxes on Alcohol or Tobacco**


**ENFORCEMENT**

**Compliance Checks**


**Administrative Penalties**


“Party Patrols”

http://www.udetc.org/documents/UnderageDrinking.pdf GD, IG


“Shoulder-tap” Enforcement Programs


Enforce Impaired Driving Laws


Sanctions and Monitoring for Convicted Drunk Drivers
http://www.ncadd.com/060.cfm GD

Immobilize or Impound the Vehicles of Those Convicted of Impaired Driving


Random BAC Testing for Drivers; No Probable Cause Required


Combine Sobriety Checkpoints with Positive Passive Breath Sensors


Highly Visible Roadside Sobriety Checkpoints


Open Container Laws

Apply Appropriate Penalties to Minors


Cops in Shops


[http://www.centurycouncil.org/underage/cops.html](http://www.centurycouncil.org/underage/cops.html)  GD, E

OTHER

College Campus Policies


**Developing “Alcohol Units” in Law Enforcement**


**Communities Mobilizing for Change on Alcohol (CMCA)**


**Community Prevention Trials**


Get to Know State Legislators – General Policy Development


Support Clean Indoor Air Laws

Broad Overview


The effects of environmental factors on alcohol use and abuse. (2006). [http://www.alcoholpolicysolutions.net/research_studies_effects.htm](http://www.alcoholpolicysolutions.net/research_studies_effects.htm)


EXAMPLES OF IMPLEMENTATION GUIDELINES: LINKS & ARTICLES

RETAIL ACCESS
Conditional Use Permits/Land Use Ordinance for Alcohol Outlets
http://www.marinstitute.org/action_packs/land_use.htm

Regulations or Bans on Home Delivery of Alcohol
University of Minnesota Alcohol Epidemiology Program. (1-6-2006). Alcohol Home Delivery Restrictions. 7-28-2006.
http://www.epi.umn.edu/alcohol/policy/homdeliv.shtm

Responsible Beverage Service Training
University of Nebraska-Lincoln, Office of Extended Education & Outreach Web Design Team. (2002). Responsible Beverage Service Training. 8-1-2006.
http://eeando.unl.edu/rbst/ne/

Checking Age Identification


Meth Precursor Prohibition
SOCIAL ACCESS
Alcohol Restrictions at Community Events
http://www.publicstrategies.org/pdfs/ventura_special_events_updated.pdf

Beer Keg Registration

SOCIAL NORMS
Social Norms Campaigns/Social Marketing


PROMOTION
Alcohol and Tobacco Advertising Restrictions in Public Places

Prohibition of Alcohol or Tobacco Sponsorship of Public Events


Media Advocacy
http://www.marininstitute.org/action_packs/media_advocacy.htm

OJJDP Enforcing the Underage Drinking Laws Program.  

**Media Literacy**  
U.S. Department of Health and Human Services, Substance Abuse and Mental Health Services Administration, Center for Substance Abuse and Prevention, with the Centers for Disease Control and Prevention Office of Smoking and Health. Mediasharp: Analyzing tobacco and alcohol messages leader's guide.  
http://www.cdc.gov/tobacco/educational_materials/mdiashrp.pdf

**PERCEIVED RISK**  
**Graduated Licensing**  

**Revoke License for Impaired Drivers**  

**Use of Mass Media Appropriately**  
http://www.nhtsa.dot.gov/people/injury/alcohol/Community%20Guides%20HTML/Book7_MediaRelations.html#Intro

**PRICING**  
**Increase Price or Taxes on Alcohol or Tobacco**  

**ENFORCEMENT**  
**Compliance Checks**  


**Party Patrols**


**Shoulder Tap Programs**

**Enforce Impaired Driving Laws**

**Sobriety Checkpoints**

**Open Container Laws**

**Apply Appropriate Penalties to Minors**

**Cops in Shops**
OTHER STRATEGIES
Developing Alcohol “Units” in Law Enforcement

Get to Know Your State Legislators

Marin Institute California Legislation Action Pack
[http://www.marininstitute.org/action Packs/CA_leg.htm](http://www.marininstitute.org/action Packs/CA_leg.htm)
Other Useful Publications


LITERATURE AND RESOURCES ON ENVIRONMENTAL STRATEGIES TO PREVENT SUBSTANCE USE AND ABUSE

Prepared by
Pacific Institute for Research and Evaluation, Inc.

Knowlton Johnson
Bridgett Augustino-Wilke
Andrew Treno

for
Tennessee SPF SIG

April 2006
Environmental Strategies Literature: Published and Unpublished Sources

I. Published Documents


Langley, J.D., Wagenaar, A.C., and Begg, D.J. "An evaluation of the New Zealand graduated driver licensing system," Accident Analysis and Prevention, 28(2): 139-146, 1996.


Ling, P.M., Landman, A., and Glantz, S.A. "It is time to abandon youth access tobacco programs," Tobacco Control, 11:3-16, 2002.


McKnight, A.J. and Voas, R.B. "Prevention of alcohol-related road crashes." In N. Heather, T.J. Peters, and T. Stockwell (eds.) International Handbook of Alcohol


Nygaard, P. "Decentralisation, local ownership and the role of the researchers." In S. Larsson and B.S. Hanson (eds.) Community Based Alcohol Prevention in Europe—Research and Evaluations, pp. 200-207. Sweden: University of Lund, 1999.


Ross, H.L. "Deterrence-based policies in Britain, Canada and Australia.” In M.D. Laurence, J.R. Snortum, and F.E. Zimring (eds.) Social Control of the Drinking Driver, pp. 64-78, Chicago, IL: The University of Chicago Press, 1988.


Treno, A.J. and Holder, H.D. "Evaluating efforts to reduce community-level problems through structural rather than individual change: A multicomponent community


Wagenaar, A.C., Murray, D.M., Gehan, J.P., Wolfson, M., Forster, J.L., Toomey, T.L., Perry, C.L., and Jones-Webb, R. "Communities mobilizing for change on alcohol:


II. Unpublished Documents


Alcohol Policies in the United States: Highlights from the 50 States
Looks at alcohol policies in the 50 states and how they have used environmental strategies to change local policies and norms. Examining how alcohol is produced, distributed, taxed, and used can be effective tools to diminish the persistent and costly social and health problems associated with alcohol use. www.epi.umn.edu/alcohol/pdf/Chrtbook.pdf


Changing the Larger Environment: Critical Components
This material excerpts key points made in Science-Based Prevention Strategies, with a particular focus on the environment.
www.northeastcapt.org/products/critical/envir/evir.pdf


Environmental Prevention Strategies: An Introduction and Overview
Discusses the advantages of environmental strategies and why this comprehensive approach is successful and reducing substance abuse.
www.tmfnet.org/rcyc/environmental.pdf

Environmental Prevention Strategies: Evidence of Effectiveness
Provides examples of environmental strategies regarding alcohol, drug, and tobacco use and the effects.
www.healthiercommunities.org/info/Stewart.htm

Environmental Prevention Strategies: Putting Theory into Practice
This video and accompanying 116 page guide are intended to be used to raise awareness and increase knowledge about environmental prevention strategies in youth drug abuse prevention.
The video is available to purchase from the National Clearinghouse for Alcohol and Drug Information (NCADI) by calling (800) 729-6686 and requesting inventory number VHS122. You can preview the video online at: http://overhill.health.org/asf1/InventoryVideos/Environmental.aspx


Holder, H.D. "Monopoly retail sale of alcohol and changes in availability: Results from the United States." Prepared for Social Research Unit on Alcohol Studies, STAKES, Helsinki, Finland, October 10, 1997.


*Integrating Environmental Change Theory Into Prevention Practice*
This document provides information about developing environmental strategies and the important components.


Keep Kids Alcohol Free: Strategies for Action
Describes the public and private application of three science-based prevention models. Informative online "e-sources" that highlight prevention strategies in action are also included. www.alcoholfreechildren.org/en/pubs/pdf/prevention.pdf


Longo, D., Johnson, J., Kruse, R., Browson, R., and Hewett, J. "A Prospective Investigation of the Impact of Smoking Bans on Tobacco Cessation and
http://tc.bmjjournals.com/cgi/content/full/10/3/267


National Institutes of Health, National Institute on Alcohol Abuse and Alcoholism, Alcohol Policy Information Center. *Selected policy topics: Alcohol and pregnancy:*


OJJDP – “Environmental Strategies to Prevent Alcohol Problems on College Campuses” This document describes strategies that are used to create healthier campus environments in which alcohol is less available, more responsibly promoted and served, and poses less of a threat to the health, safety, and well-being of all students.
www.udetc.org/documents/EnviroStrat.pdf


*Science-Based Prevention Strategies*

The Northeast CAPT has compiled the following information on science-based strategies, which is drawn in large part from the Center for Substance Abuse Preventions (CSAP’s) Science-Based Practices in Substance Abuse Prevention. www.northeastcapt.org/products/critical/sciencestrat/strategies.pdf


State of Alaska, Department of Health and Social Services, Division of Behavioral Health. (September 13, 2004). *Alaska’s FASD Project* [Memorandum]. Obtained from L. Diane Casto, Program Manager, State of Alaska, Department of Health and Social Services, Office of Fetal Alcohol Syndrome.


U.S. Code, Title 21, Chapter 13, Subchapter I, Part D, 860. Distribution or manufacturing in or near schools and colleges.


